Selector guide

IXYS UK WESTCODE

PSC Square body fuses – Size 7X 900-1300VAC Blade Terminals

October 2013 – Issue 1

The IXYS UK range of 1300V/1250V protistor fuse links provides maximum flexibility in equipment design and ultimate protection for today's power conversion equipment. These square body fuse links are available in different body sizes, each size having multiple worldwide acceptable mounting styles.

These protistors have been designed to provide state-of-the-art protection for all IXYS UK high power semiconductors; diodes, thyristors, GTO's and IGBT devices. These fuses are assembled with pure silver, die-cut elements embedded in solidified sand, which helps control arcing characteristics for a lower I^2t and high interrupting rate level. All contact surfaces are silver plated and all hardware is non-magnetic

Each fuse link is equipped with a low voltage trip indicator which can operate a field mountable microswitch.



Features and Benefits

- Ultra-fast acting
- Current limiting
- Very low I^2t for improved semiconductor protection
- Superior cycling capability
- Multiple body sizes and blade combinations
- aR class according to VDE 636-23 and IEC 60269-4

Applications

Protection of inverters, UPS systems, motor drives and similar equipment rated at 1300V/1250V or less

Approvals

- UL/CSA recognised component
- AC: UL guide no. E76491
- IEC 60269-4 compliance
- RoHS compliant

Nomenclature

The IXYS UK range of 1300V/125V protistor fuse links with blade terminals consists of five different body styles and the following nomenclature details the breakdown of each type

1	2	3	4	5	6
125	**UR**	**0**	**D**	**0250**	**B**
Rated voltage ÷ 10	Type and standard	Size	Fixing dimension	RMS current rating	Indicator type

Type and Standard Information

US – DIN 43 653 US dimensions, large square body

UR – DIN 43 653, German/French dimensions, large square body

Body Size

0 – 70

1 – 71

2 – 72

3 - 73

Fixing Dimension

D – 110mm (DIN110)

Indicator Type

B – Button type

Example

125UR2D0500B is – 1300V/1250VAC (RMS), DIN 43-635 German/French dimensions, large square body, size 72, 110mm fixing, 500A nominal RMS current with button indicator

Size 70 fuses – Part numbers

Weight – 380g Max.

US0D fuses – US dimensions

Rated Voltage (UL/IEC) V	Nominal Current A	Class	Part Number
1300/1250	63	aR	130US0D0063B
1300/1250	80	aR	130US0D0080B
1300/1250	100	aR	130US0D0100B
1300/1250	125	aR	130US0D0125B
1300/1250	160	aR	130US0D0160B
1300/1250	200	aR	130US0D0200B
1300/1250	250	aR	130US0D0250B
1300/1250	280	aR	130US0D0280B
1300/1250	315	aR	130US0D0315B
1200/1100	350	aR	120US0D0350B

UR0D fuses – UR dimensions

Rated Voltage (IEC) V	Nominal Current A	Class	Part Number
1300/1250	63	aR	125UR0D0063B
1300/1250	80	aR	125UR0D0080B
1300/1250	100	aR	125UR0D0100B
1300/1250	125	aR	125UR0D0125B
1300/1250	160	aR	125UR0D0160B
1300/1250	200	aR	125UR0D0200B
1300/1250	250	aR	125UR0D0250B
1300/1200	280	aR	120UR0D0280B
1300/1200	315	aR	120UR0D0315B
1200/1100	350	aR	110UR0D0350B*

Size 70 fuses – Ratings

Rated Voltage (UL/IEC) V	Nominal Current A	Class	Pre-arcing I^2t kA^2s	Clearing I^2t @ rated voltage kA^2s	Watts loss @ 100% In W	Breaking capacity @ rated voltage kA
1300/1250	50	aR	0.116	0.7	16	100
1300/1250	63	aR	0.21	1.2	26	100
1300/1250	80	aR	0.47	2.7	27	100
1300/1250	100	aR	0.83	4.8	30	100
1300/1250	125	aR	1.3	7.5	38	100
1300/1250	160	aR	2.55	15	45	100
1300/1250	200	aR	4.7	27	56	100
1300/1250	250	aR	9.6	55	61	100
1300/1200	280	aR	14	82	64	100
1300/1200	315	aR	20	115	72	100
1200/1100	350	aR	28	158	75	150

* - Non UL recognised rating

Size 71 fuses – Part numbers

Weight – 630g Max. for US dimensions, 570g Max. for UR dimensions

US1D fuses – US dimensions

Rated Voltage (UL/IEC) V	Nominal Current A	Class	Part Number
1300/1250	160	aR	130US1D0160B
1300/1250	200	aR	130US1D0200B
1300/1250	250	aR	130US1D0250B
1300/1250	280	aR	130US1D0280B
1300/1250	315	aR	130US1D0315B
1300/1250	350	aR	130US1D0350B
1300/1250	400	aR	130US1D0400B
1300/1250	450	aR	130US1D0450B
1200/1100	500	aR	120US1D0500B
1200/1100	550	aR	120US1D0550B
1100/1000	630	aR	110US1D0630B*

UR1D fuses – UR dimensions

Rated Voltage (UL/IEC) V	Nominal Current A	Class	Part Number
1300/1250	160	aR	125UR1D0160B
1300/1250	200	aR	125UR1D0200B
1300/1250	250	aR	125UR1D0250B
1300/1250	280	aR	125UR1D0280B
1300/1250	315	aR	125UR1D0315B
1300/1250	350	aR	125UR1D0350B
1300/1250	400	aR	125UR1D0400B
1300/1250	450	aR	125UR1D0450B
1200/1100	500	aR	110UR1D0500B
1200/1100	550	aR	110UR1D0550B
1100/1000	630	aR	100UR1D0630B

Size 71 fuses – Ratings

Rated Voltage (IEC/UL) V	Nominal Current A	Class	Pre-arcing I^2t kA^2s	Clearing I^2t @ rated voltage kA^2s	Watts loss @ 100% In W	Breaking capacity @ rated voltage kA
1300/1250	160	aR	2.6	15	46	100
1300/1250	200	aR	4.7	27	54	100
1300/1250	250	aR	8.9	51	61	100
1300/1250	280	aR	12	68	70	100
1300/1250	315	aR	16	92	76	100
1300/1250	350	aR	22	127	80	100
1300/1250	400	aR	38	220	80	100
1300/1250	450	aR	47	270	95	100
1200/1100	500	aR	68	390	100	150
1200/1100	550	aR	84	485	112	150
1100/1000	630	aR	125	725	120	150

* - Non UL recognised rating

Size 72 fuses – Part numbers

Weight – 860g Max. for US dimensions, 800g Max. for UR dimensions

US2D fuses – US dimensions

Rated Voltage (UL/IEC) V	Nominal Current A	Class	Part Number
1300/1250	280	aR	130US2D0280B
1300/1250	315	aR	130US2D0315B
1300/1250	350	aR	130US2D0350B
1300/1250	400	aR	130US2D0400B
1300/1250	450	aR	130US2D0450B
1300/1250	500	aR	130US2D0500B
1300/1250	550	aR	130US2D0550B
1200/1100	630	aR	120US2D0630B
1200/1100	700	aR	110US2D0700B
1100/1000	800	aR	110US2D0800B

UR2D fuses – UR dimensions

Rated Voltage (UL/IEC) V	Nominal Current A	Class	Part Number (110mm fixing)
1300/1250	280	aR	125UR2D0280B
1300/1250	315	aR	125UR2D0315B
1300/1250	350	aR	125UR2D0350B
1300/1250	400	aR	125UR2D0400B
1300/1250	450	aR	125UR2D0450B
1300/1250	500	aR	125UR2D0500B
1300/1250	550	aR	125UR2D0550B
1200/1100	630	aR	110UR2D0630B
1200/1100	700	aR	100UR2D0700B
1100/1000	800	aR	100UR2D0800B

Size 72 fuses – Ratings

Rated Voltage (IEC/UL) V	Nominal Current A	Class	Pre-arcing I^2t kA^2s	Clearing I^2t @ rated voltage kA^2s	Watts loss @ 100% In W	Breaking capacity @ rated voltage kA
1300/1250	280	aR	10	60	72	100
1300/1250	315	aR	15	87	76	100
1300/1250	350	aR	21	120	77	100
1300/1250	400	aR	32.5	190	80	100
1300/1250	450	aR	44	255	89	100
1300/1250	500	aR	57	330	98	100
1300/1250	550	aR	68	390	120	100
1200/1100	630	aR	105	610	125	150
1200/1100	700	aR	145	815	140	150
1100/1000	800	aR	215	1240	146	150

Size 73 fuses – Part numbers

Weight – 1250g Max. for US dimensions, 1150g Max. for UR dimensions

US3D fuses – US dimensions

Rated Voltage (UL/IEC) V	Nominal Current A	Class	Part Number
1300/1250	315	aR	130US3D0315B
1300/1250	350	aR	130US3D0350B
1300/1250	400	aR	130US3D0400B
1300/1250	450	aR	130US3D0450B
1300/1250	500	aR	130US3D0500B
1300/1250	550	aR	130US3D0550B
1300/1250	630	aR	130US3D0630B
1300/1200	700	aR	130US3D0700B
1200/1100	800	aR	120US3D0800B
1100/1000	900	aR	110US3D0900B
1000/900	1000	aR	100US3D1000B
1000/900	1100	aR	100US3D1100B
1000/900	1250	aR	100US3D1250B
900/850	1400	aR	090US3D1400B

UR3D fuses – UR dimensions

Rated Voltage (UL/IEC) V	Nominal Current A	Class	Part Number
1300/1250	315	aR	125UR3D0315B
1300/1250	350	aR	125UR3D0350B
1300/1250	400	aR	125UR3D0400B
1300/1250	450	aR	125UR3D0450B
1300/1250	500	aR	125UR3D0500B
1300/1250	550	aR	125UR3D0550B
1300/1250	630	aR	125UR3D0630B
1300/1200	700	aR	120UR3D0700B
1200/1100	800	aR	110UR3D0800B
1100/1000	900	aR	100UR3D0900B
1000/900	1000	aR	090UR3D1000B
1000/900	1100	aR	090UR3D1100B

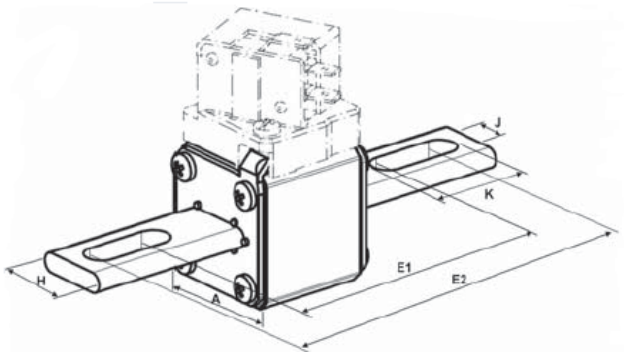
Size 73 fuses – Rating and curves

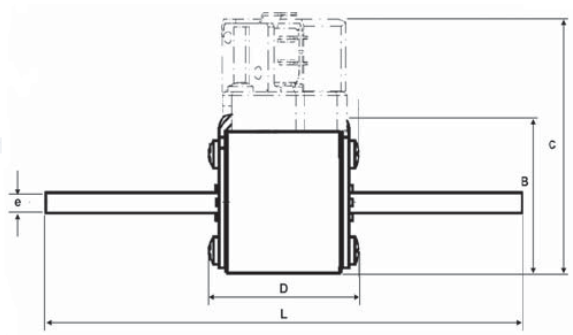
Rated Voltage (UL/IEC) V	Nominal Current A	Class	Pre-arcing I^2t kA^2s	Clearing I^2t @ rated voltage kA^2s	Watts loss @ 100% In W	Breaking capacity @ rated voltage kA
1300/1250	315	aR	12	68	84	100
1300/1250	350	aR	17	100	86	100
1300/1250	400	aR	25	145	93	100
1300/1250	450	aR	35.5	205	100	100
1300/1250	500	aR	44	255	112	100
1300/1250	550	aR	57	330	120	100
1300/1250	630	aR	84	485	132	100
1300/1200	700	aR	110	640	-	100
1200/1100	800	aR	190	1090	148	150
1100/1000	900	aR	250	1440	170	150
1000/900	1000	aR	370	1920	174	150
1000/900	1100	aR	445	2280	208	150
1000/900	1250	aR	585	3080	-	150
900/850	1400	aR	755	3700	-	150

Drawings and Dimensions

USxD fuses

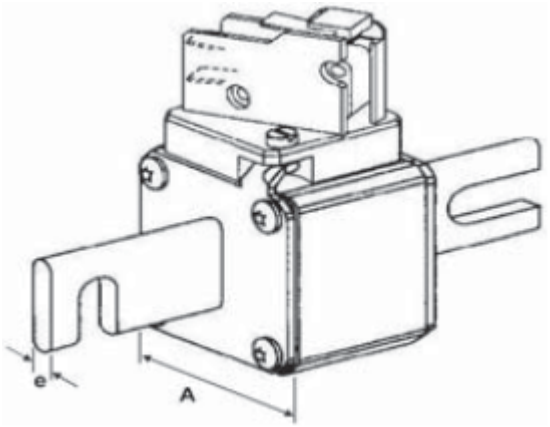
Size	A	B	C	D	E1	E2	F	H	J	K	L	e
US0D	40	46.5	82	71	91.4	1304	21	25.5	10.5	30	152.4	6
US1D	51	56.5	91	71	91.4	130.4	25.5	25.5	14.6	30	152.4	6
US2D	60	65.5	100	71	97.6	132.4	30	32	14.6	32	157.4	6
US3D	74	79.5	114	72	98.8	131.4	37.2	40	15.9	32	157.4	6

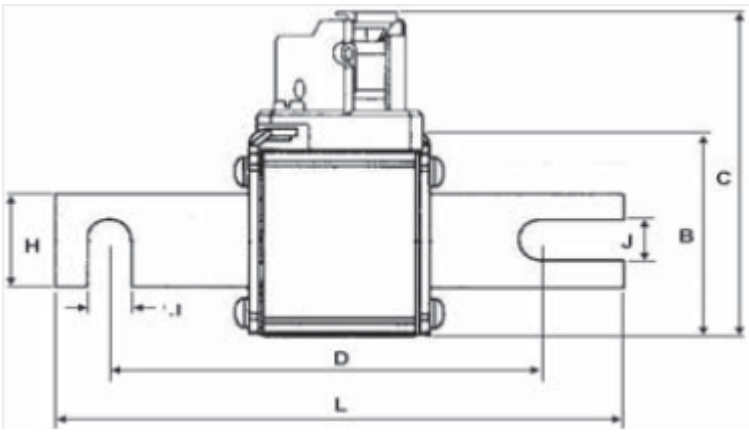




URxD fuses

Size	A	B	C	D	E	F	H	J	K	L	M	N	R	e
UR0D	40	46.5	82	71	100.4	21	25	10.5	17.7	133.4	11.5	18.5	25.2	6
UR1D	51	56.5	91	71	100.4	25.5	25	10.5	17.7	133.4	11.5	18.5	25.2	6
UR2D	60	65.5	100	71	100.4	30	32	10.5	21.2	133.4	11.5	18.5	25.2	6
UR3D	74.5	79.5	114	72	100.4	37.2	40	10.5	25.2	133.4	11	18	25.2	6





All dimensions in mm

Microswitches

IXYS UK can offer a range of microswitches to suit our PSC square-bodied fuse ranges

System: MS 7V 1
Fuse sizes: 70, 71, 72, 73
Indication style: MS 7V 1-5 = Standard NO-NC
MS 7V 1-5 BS = Low Level NO-NC
MS 7V 1-5 ET = Low Level NO-NC IP 50 (9)
MS 7V 1-9 BS = Low Level NO-NC

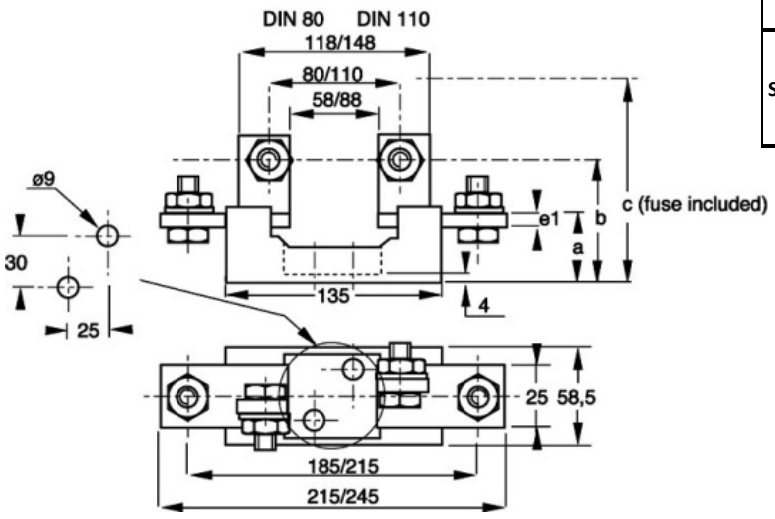


Part number	AC Insulation Voltage Rating *** (V)	Positive Operating Voltage/Current (V/mA)	Current Rating (A)	Interrupting Rating (A)							AC Voltage Withstand * (kV)	Impulse Voltage test Vimp 1.2/50µs ** (kV)	Fire Class according to UL 94
				Current (A)	Non inductive circuit			Inductive Circuit: L/R = 25ms					
					30V	110V	250V	30V	110V	250V			
MS 3V 1-5	1500	20/50	10	AC 50/60Hz	10	10	10	10	10	10	8.5	14	H.B.
				DC	8	0.4	0.2	4	0.2	0.1	12	20	
MS 3V 1-5 BS		10/10	3	AC 50/60Hz	3	3	3	2	1	1	8.5	14	
				DC	3	0.5	0.25	3	0.2	0.1	12	20	
MS 3V 1-5 ET		10/10	3	AC 50/60Hz	3	3	3	2	1	1	8.5	14	
				DC	3	0.5	-	2	0.2	-	12	20	
MS 3V 1-9 BS		10/10	3	AC 50/60Hz	3	3	3	2	1	1	8.5	14	
				DC	3	0.5	0.25	2	0.2	0.1	12	20	

Fuse Holder

Part Number	Fuse size	Fuse Type	Insulation Voltage (V) AC, 50/60Hz & DC	Rated Current (A)
SI DIN110 630A	70-73	DIN110	1500	2500
SI DIN110 1250A				

Part Number	Size	a	e1	b	c
SI DIN110 630A	70	40	5	68	93.5
	71				99.0
	72				103.5
	73				110.3
SI DIN110 1250A	70	45	10	73	98.5
	71				104.0
	72				108.5
	73				115.3



All dimensions in mm

Certificate FM26085

IXYS UK Westcode Ltd's BS EN ISO9001 quality system is registered by BSI

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