Plascraft Product Datasheets
Catalogue 5 www.plascraft.co.za

METAL OXIDE VARISTORS (ZnO) 7MM TYPE SMV

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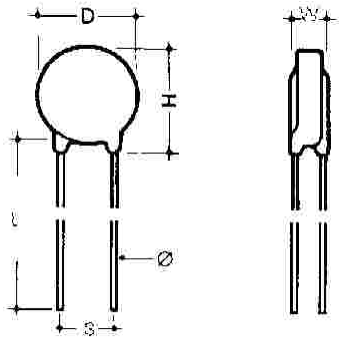
These varistors are voltage dependant symmetrical resistors which ,when exposed to high energy voltage transients cause the impedance to change from a high standby value to a very low conducting value thus clamping the transient voltage to a safe level and are ideal for use in power distribution equipment ,telecommunication equipment, data processing equipment, industrial instrumentation and automatic control systems . They are available in the preferred values and sizes shown below:-



RATINGS 7mm STANDARD ENERGY 1.2 KA TYPE SMV

Type	Stock Code	Varistor Voltage	Max Allowable Voltage		Max Clamping Voltage (8/20us)		Rated Wattage	Energy		Max Peak Current		Capacitance 1Khz
		V1ma(V)	AC r.m.s(V)	DC(V)	Vc(V)	Lp(A)	(W)	10/1000us	2ms	1 Time	2 Times	
SMVS7K275	03/009	431(387-	275	350	710	10	0.25	26.2	18.7	1.2	0.6	150

DIMENSIONS

Description	Stock Code	D Max	H	S	W Max
SMVS7K275	03/009	7.5	11.5	5+-	3.0

METAL OXIDE VARISTORS (ZnO) 10MM TYPE SMX

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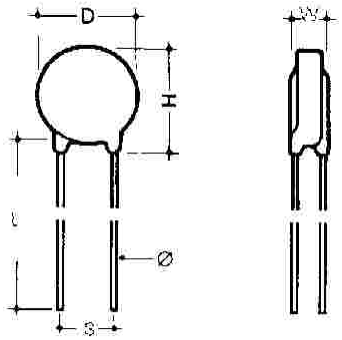
These varistors are voltage dependant symmetrical resistors which ,when exposed to high energy voltage transients cause the impedance to change from a high standby value to a very low conducting value thus clamping the transient voltage to a safe level and are ideal for use in power distribution equipment ,telecommunication equipment, data processing equipment, industrial instrumentation and automatic control systems . They are available in the preferred values and sizes shown below:-



RATINGS 10mm HIGH ENERGY 3.5KA TYPE SMX

Type	Stock Code	Varistor Voltage	Max Allowable Voltage		Max Clamping Voltage (8/20us)		Rated Wattage	Energy		Max Peak Current		Capacitance 1Khz
		V1ma(V)	AC r.m.s(V)	DC(V)	Vc(V)	Lp(A)	(W)	10/1000us	2ms	1 Time	2 Times	
SMXH10K27	03/007	431(387-473)	275	350	710	25	0.4	80	55	3500	2500	185

DIMENSIONS

Description	Stock Code	D Max	H	S	W Max
SMVH10K275	03/007	14.0	18.0	7.5+-	6.5

METAL OXIDE VARISTORS (ZnO) 14MM TYPE SMY

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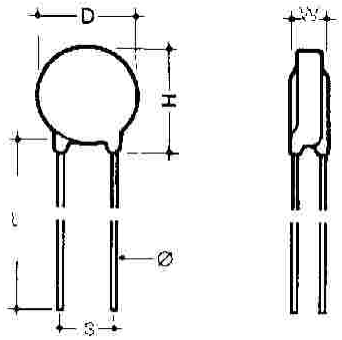
These varistors are voltage dependant symmetrical resistors which ,when exposed to high energy voltage transients cause the impedance to change from a high standby value to a very low conducting value thus clamping the transient voltage to a safe level and are ideal for use in power distribution equipment ,telecommunication equipment, data processing equipment, industrial instrumentation and automatic control systems . They are available in the preferred values and sizes shown below:-



RATINGS 14mm HIGH ENERGY 6KA TYPE SMY

Type	Stock Code	Varistor Voltage	Max Allowable Voltage		Max Clamping Voltage (8/20us)		Rated Wattage	Energy		Max Peak Current		Capacitance 1Khz
		V1ma(V)	AC r.m.s(V)	DC(V)	Vc(V)	Lp(A)	(W)	10/1000us	2ms	1 Time	2 Times	
SMYH14K275	03/010	430(387-473)	275	350	710	50	0.6	155	110	6000	4500	340

DIMENSIONS

Description	Stock Code	D Max	H	S	W Max
SMVH14K275	03/010	17.5	22.0	7.5+-1	6.5

METAL OXIDE VARISTORS (ZnO) 20MM TYPE SMZ

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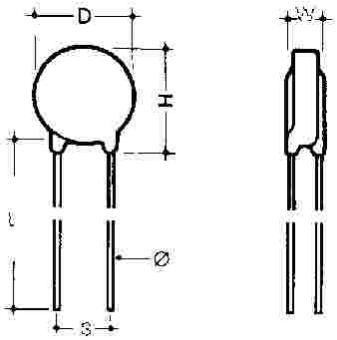
These varistors are voltage dependant symmetrical resistors which ,when exposed to high energy voltage transients cause the impedance to change from a high standby value to a very low conducting value thus clamping the transient voltage to a safe level and are ideal for use in power distribution equipment ,telecommunication equipment, data processing equipment, industrial instrumentation and automatic control systems . They are available in the preferred values and sizes shown below:-



RATINGS 20mm HIGH ENERGY 10KA Type SMZ

Description	Stock Code	Varistor Voltage	Max Allowable Voltage		Max Clamping Voltage (8/20us)		Rated Wattage	Energy		Max Peak Current		Capacitance 1Khz
		V1ma(V)	AC r.m.s(V)	DC(V)	Vc(V)	Lp(A)	(W)	10/1000us	2ms	1 Time	2 Times	
SMZH20K275	03/011	430(387-473)	275	350	710	100	1.0	303	215	10000	6500	660
SMZH20K420	03/012	680(612-748)	420	560	1120	100	1.0	382	273	10000	6500	435

DIMENSIONS

Description	Stock Code	D Max	H	S	W Max
SMVH20K275	03/011	23.0	26.0	10.01	7.0
SMVH20K420	03/012	25.0	29.0	10.01	9.5

METAL OXIDE VARISTORS (ZnO) 32MM TYPE SMB

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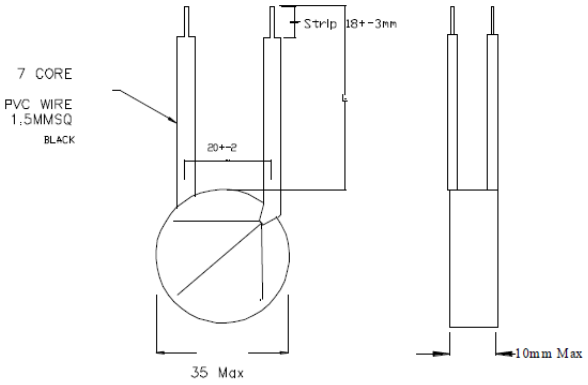
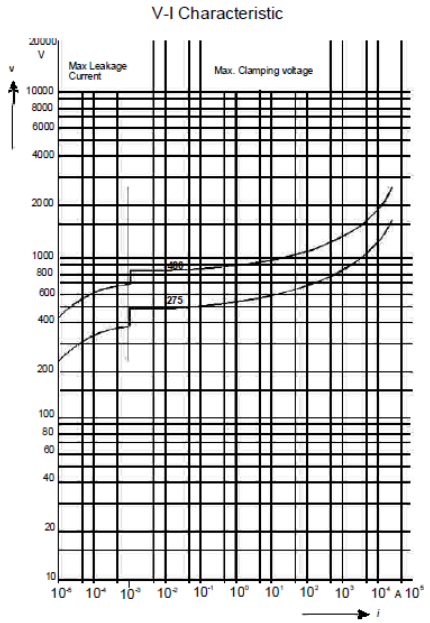
These varistors were developed in 1997 in conjunction with the major manufacturers in the South African energy metering industry in conjunction with Eskom in order to protect energy meters from the effects of the harsh Electrical Environment specific to South Africa.

*** Complies with Eskom Specification TRMSCAAP 2 Rev 2 (1994)**

LEADED VARISTOR 45/604
Disk Type Type SMB
Applications
Overvoltage protection
Features
. High surge current rating of 25 KA
Complies with Requirement of **TRMSCAAP2 REV 2 (Test Report Available)**
Dimensional drawings in mm





Electrical data
Maximum ratings (85 C)
Max. Operating AC voltage **V**rms = 460 V
Max. Operating DC voltage **V**dc = 615 V
Surge current (8/20 uS) 1 time **I**max = 25000 A
Energy absorption (2 ms) **E**max = 660 J
Average power dissipation Pmax = 1.2 W
Characteristics (25 C)
Varistor voltage at 1 mA Vv = 750 V +_10%
Clamping voltage at 200 A (8/20 uS) V cmax = 1240 V
Typical. Capacitance at 1 kHz C = 1200 pF

METAL OXIDE VARISTORS (ZnO) 32MM TYPE SMB

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Special electrical data for use in accordance with TRMSCAAP2 REV 2

Maximum continuous operating voltage (Uc)	440 V rms
Rated voltage (Ur)	480 V rms
Norminal lightning discharge current In (8/20 us)	5 kA
Peak residual for 8/20 us current impulse	
Of the following impulse :	
1 kA	
5 kA	2500 V peak MAX.
10 kA	
Steep current impulse residual voltage	2500 V peak MAX.
Virtual front time T1: 2 us +_10 %	
Virtual time to half value	
Of the tail:	<20 us
Peak value of current :	5 kA +_5 %
Long duration current impulse withstand test	
Peak current 75 A	
Virtual duration of peak	1000 us
Rectangular pulse shape in Accordance with IEC 60 -1	
Number of groups of applications	4
Number of impulses per group	5
Interval between groups	25 – 30 minutes
Interval between impulses	50 -60 seconds

Operating duty test
- Initial measurement :residual voltage at In = 5 kA (8/20 us)
- Conditioning : 20 impulses at In = 5 kA (8/20 us) in 4 groups of 5 impulses;
  - Interval between impulses : 50 -60 seconds
  - Interval between groups :25 – 30 minutes
  - Superimposed on continuous operating voltage +20%
  - (1.2 * Uc = 528 V rms)

High current impulse 4/10 us :
- 1 impulse at Imax =30 kA
- Preheat to 60 C +_3 C
- 1 impulse at Imax = 30 kA
- Rated voltage at Ur = 480 V for 10 seconds
- Continuous operating voltage U c=440 V for 30minutes
- Cool to ambient , 20 C +_15 C

Requirement : power dissipation decreases at least during the last 15 minutes of U c application
measurement : residual voltage at In = 5 kA (8/20 us)
requirement : change of residual voltage less 10 %
no visible damage.

METAL OXIDE VARISTORS (ZnO) 40MM TYPE SMC

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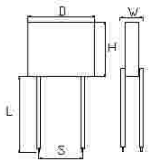


For Use in SPDs

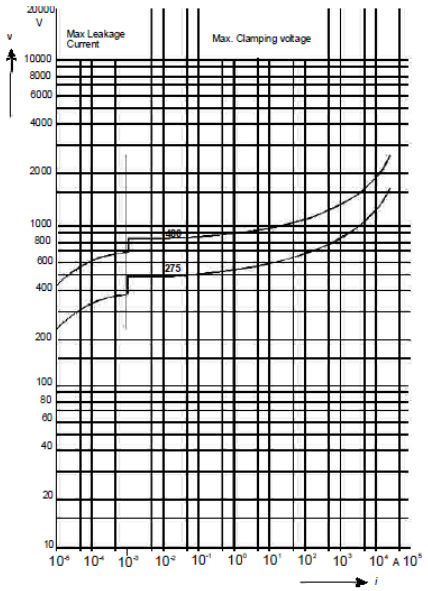
RATINGS 40mm 40KA

Description	Stock Code	Varistor Voltage	Max Allowable Voltage		Max Clamping Voltage (8/20us)		Rated Wattage	Energy		Max Peak Current		Capacitance 1Khz (pf)
		V1ma(V)	AC r.m.s(V)	DC(V)	Vc(V)	Lp(A)	(W)	10/1000us	2ms	1 Time	2 Times	
SMC40K275	45/015	430(387-	275	350	710					40000		2700

DIMENSIONS

Description	Stock Code	D Max	H	S	W Max
SMV40K275	**45/015**	35.0	36.0	20.0	

V-I Characteristic



MOV'S WITH THERMAL DISCONNECTS TYPE SMT

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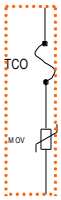
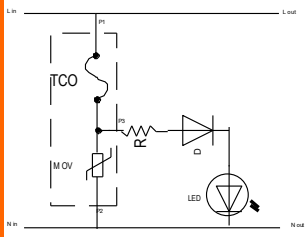
These modules consist of Mov's in different combinations with built in thermal disconnects to disconnect the Mov from the circuit to prevent the risk of fire and bursting due to degradation . Degradation can cause an increasing leakage current resulting in Thermal runaway . Applications in Power supplies, Surge Protectors, Surge Filters, Led Lighting , Surge protected multiplugs and Industrial equipment. Suitable for PCB Mounting

TP Thermally protected MOV
Operation: When Mov fails it will be disconnected preventing it from Thermal runaway and the risk of fire or bursting



Type SMT-A
PM L/N

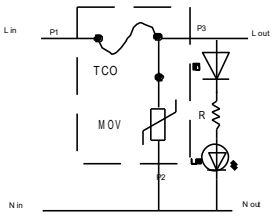


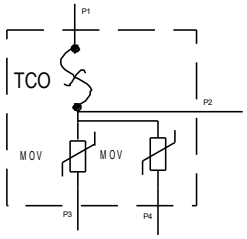
Type SMT-B
PM L/N

Thermally protected MOV with indicator output lead . Type SMT-B
Application: When MOV fails the light will go out and the Mov will be disconnected.

Thermally protected Mov with disconnect to the load circuit ..
Application: When MOV fails power to the load circuit will stop and the Mov will be disconnected

Type SMT-B
PM L/N/E



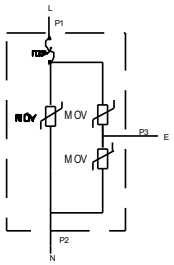


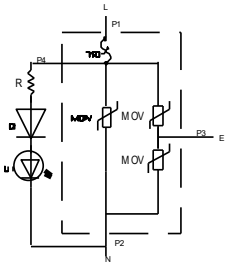
Type SMT-C
PM L/N

Two Thermally protected Movs with Output for Signal Remote Warning or Load Disconnection .
Application: When Mov fails the switch for the remote output will open and the Both Movs will be disconnected.

Three Thermally protected Movs For Live , Neutral and Earth Connection
Application : When Movs fail they will be disconnected preventing them from Thermal runaway and the risk of fire or bursting

Type SMT-D
PM L/N/E





Type SMT-E
PM L/N/E

Three Thermally protected Movs For Live , Neutral and Earth Connection, includes lead for Remote Indication and Load Circuit disconnection
Application : When Movs fail they will be disconnected preventing them from Thermal runaway and the risk of fire or bursting. At the same time the Load will be disconnected to avoid the risk of being damaged due to failure of the protection.

MOV'S WITH THERMAL DISCONNECTS TYPE SMT

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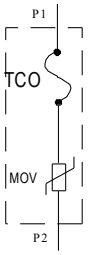
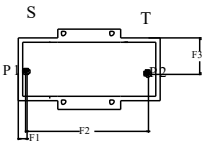
TYPE SMT-A PM L/N



Thermally protected MOV
Operation: When Mov fails it will be disconnected preventing it from Thermal runaway and the risk of fire or bursting

Connection



Dimensions PC2
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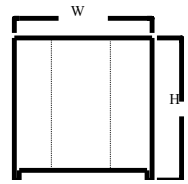
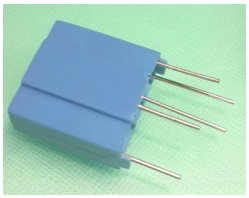
H=31.0
T=13.5
F1=
F2=
F3=
D=

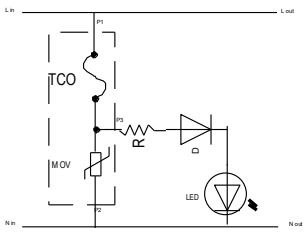




Specifications

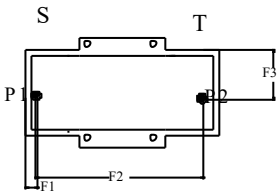
Stock Code	Max Continous operating Voltage Ac Rms	Dc	Varistor Voltage at 1mA dc Min	Max	Clamping Voltage (Max) Vc	Lp	Maximum Peak Current (8/20us) Ln	Imax	Voltage Clamping Ratio Rd	Ln	Max Energy (Joule) 10/1000 us	Typical Capacitance Ref. @1Khz	Thermal disconnect TCO Amps
	(V)		(V)		(V)	(A)	(kA)			(kA)	(J)	(pf)	
45/022	275	350	387	473	710	75	5	10	2.3	5	248	750	16

TYPE SMT-B PM L/N

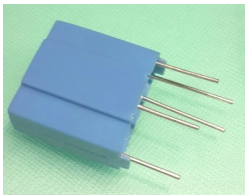


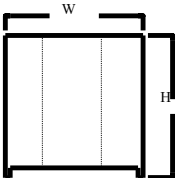
Connection

Thermally protected MOV with indicator output lead or load Disconnect Lead
Application: When MOV fails the light will go out and the Mov will be disconnected. Does not include Indication components



Dimensions PC2
W=33.0
H=31.0
T=13.5
F1=
F2=
F3+





Specifications

Stock Code	Max Continous operating Voltage Ac Rms	Dc	Varistor Voltage at 1mA dc Min	Max	Clamping Voltage (Max) Vc	Lp	Maximum Peak Current (8/20us) Ln	Imax	Voltage Clamping Ratio Rd	Ln	Max Energy (Joule) 10/1000 us	Typical Capacitance Ref. @1Khz	Thermal disconnect TCO Amps
	(V)		(V)		(V)	(A)	(kA)			(kA)	(J)	(pf)	
45/018	275	350	387	473	710	75	5	10	2.3	5	248	750	16

MOV'S WITH THERMAL DISCONNECTS TYPE SMT

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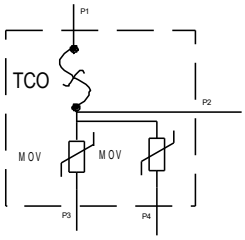
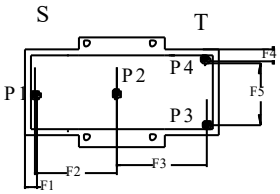
TYPE SMT-C PM L/N



Connection

Two Thermally protected Movs with Output for Signal Remote Warning .
Application: When Mov fails the switch for the remote output will open and then Both Movs will be disconnected.



Dimensions PC2
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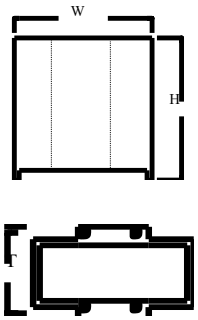
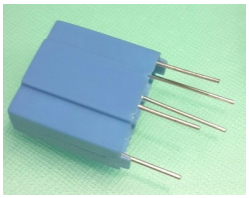
H=31.0
T=13.5
F1=
F2=
F3=

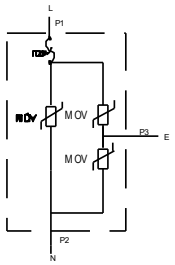




Specifications

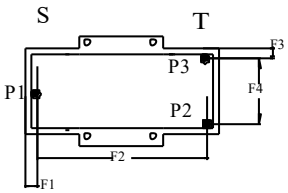
Stock Code	Max Continous operating Voltage Ac Rms	Dc	Varistor Voltage at 1mA dc Min	Max	Clamping Voltage (Max) Vc	Lp	Maximum Peak Current (8/20us) Ln	Imax	Voltage Clamping Ratio Rd	Ln	Max Energy (Joule) 10/1000 us	Typical Capacitance Ref. @1Khz	Thermal disconnect TCO Amps
	(V)		(V)		(V)	(A)	(kA)			(kA)	(J)	(pf)	
45/019	275	350	387	473	710	75	5	10	2.3	5	248	750	16

TYPE SMT-D PM L/N/E



Connection

Three Thermally protected Movs For Live , Neutral and Earth Connection
Application : When Movs fail they will be disconnected preventing them from Thermal runaway and the risk of fire or bursting



Dimensions PC2
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H=31.0
T=13.5
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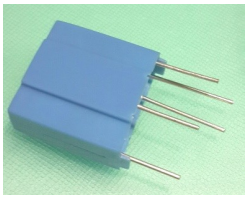
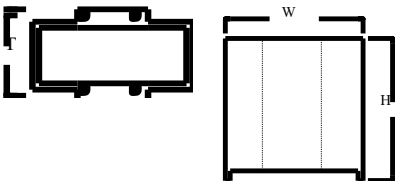
F2=
F3=
F4=





Specifications

Stock Code	Max Continous operating Voltage Ac Rms	Dc	Varistor Voltage at 1mA dc Min	Max	Clamping Voltage (Max) Vc	Lp	Maximum Peak Current (8/20us) Ln	Imax	Voltage Clamping Ratio Rd	Ln	Max Energy (Joule) 10/1000 us	Typical Capacitance Ref. @1Khz	Thermal disconnect TCO Amps
	(V)		(V)		(V)	(A)	(kA)			(kA)	(J)	(pf)	
45/020	275	350	387	473	710	75	5	10	2.3	5	248	750	16

MOV'S WITH THERMAL DISCONNECTS TYPE SMT

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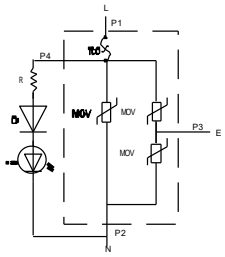
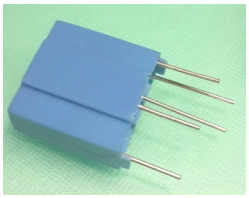
TYPE SMT-E PM L/N/E

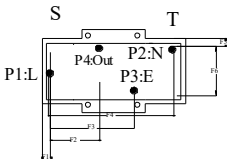


Three Thermally protected Movs For Live , Neutral and Earth Connection, includes lead for Remote Indication and Load Circuit disconnection

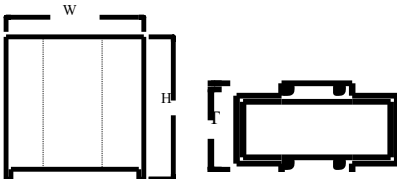
Application : When Movs fail they will be disconnected preventing them from Thermal runaway and the risk of fire or bursting. At the same time the Load will be disconnected to avoid the risk of being damaged due to failure of the protection.



Connection



Dimensions PC2
W=33.0
H=31.0
T=13.5
F1=
F2=
F3+



Specifications

Stock Code	Max Continous operating Voltage Ac Rms (V)	Dc	Varistor Voltage at 1mA dc Min (V)	Max	Clamping Voltage (Max) Vc (V)	Lp (A)	Maximum Peak Current (8/20us) Ln (kA)	Imax	Voltage Clamping Ratio Rd	Ln (kA)	Max Energy (Joule) 10/1000 us (J)	Typical Capacitance Ref. @1Khz (pf)	Thermal disconnect TCO Amps
45/021	275	350	387	473	710	75	5	10	2.3	5	248	750	16

Surge Arresters PM LN Class II TYPE SAA

BACK TO INDEX

These Two wire Surge Protection modules are for connection to Live and Neutral , encapsulated for convenient attachment to LED Lighting Systems, Gate Motors, Pool Pumps, Distribution Boards, They are available in I max KA Ratings from 10 to 50KA and clamping Voltages 710 and 1200VDC

Specifications Type SAA

Maximum Peak Current (8/20us)	Max Continuous operating Voltage Uc	Clamping Voltage (Max)				
Imax (kA)	**Ac Rms** (V)	**Vc** (V)	**Stock Code**	**Image**	**Housing**	**Dimensions mm**
10	275	710	**45/041**	Fig 1	Epoxy Dip	OD23/T8.5
20	275	710	**45/023**	Fig 2	PC2	33/31/18.0
25	275	710	**45/014**	Fig 1	Epoxy Dip	OD34/T11.5
25	480	1200	**45/042**	Fig 1	Epoxy Dip	OD34/T11.5
25	480	1200	**45/043**	Fig 4	RS	OD37/H12.5/Stud 8
30	275	710	**45/024**	Fig 3	B2	OD35/H43/Bracket 30
50	480	1200	45/044	Fig 4	RS	OD37/H25/Stud 8

Fig 1 Epoxy Dipped

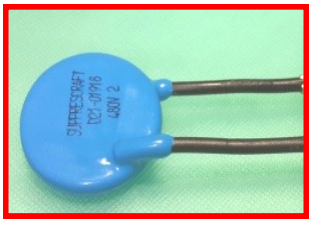


Fig 2 Rectangular Plastic Housing

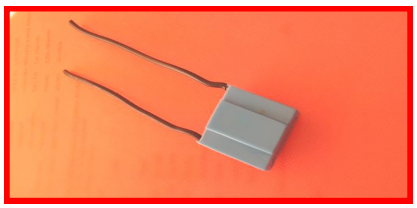
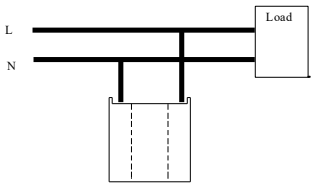


Fig 3 Cylindrical Housing with Bracket

Fig 4 Round Plastic Housing with 8mm Stud

Connecting Diagram



Connect One wire to Live and one wire to Neutral. These units are not polarised

Surge Arresters PM L/N Class II TD TYPE SAF

BACK TO INDEX

These Surge Arresters are used in Mains Installations where the protection Mode is required between the Live and Neutral Supply Lines. They include Thermal Disconnects as a safety measure to disconnect the Varistors in the event of degradation due to excessive discharges over time. They may include a status light or Output lead to disconnect the load or for remote monitoring. They are encapsulated for convenient attachment to LED Lighting Systems, Gate Motors, Pool Pumps, Distribution Boards, Available in Imax KA Ratings from 10 to 50KA and Clamping Voltages 710 and 1200 Vc(V)

Specifications Type SAF

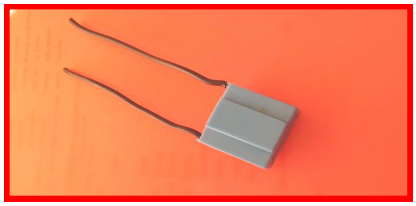
Maximum Peak Current (8/20us)	Max Continuous operating Voltage Uc	Clamping Voltage							
Imax (kA)	**Ac Rms** (V)	**Vc** (V) Max	**Status Light**	**Output Lead**	**Image**	**Connection**	**Housing**	**Dimension mm**	**Part No**
10	275	710			Fig 4	1	PC2	32/31/18	45/046
10	275	710	X		Fig 4	1	PC2	32/31/18	45/047
10	275	710		X	Fig 4	2	PC2	32/31/18	45/048
20	275	710			Fig 4	1	PC2	32/31/18	45/049
20	275	710	X		Fig 4	1	PC2	32/31/18	45/050
20	275	710		X	Fig 4	2	PC2	32/31/18	45/051
25	275	710			Fig 3	1	RS	OD37/15/Stud 8	45/052
25	275	710	X		Fig 2	1	RS	OD37/25/Stud 8	45/053
25	275	710		X	Fig 2	2	RS	OD37/25/Stud 8	45/054
25	480	1200			Fig 2	1	RS	OD37/25/Stud 8	45/055
25	480	1200	X		Fig 2	1	RS	OD37/25/Stud 8	45/056
25	480	1200		X	Fig 3	2	RS	OD37/15/Stud 8	45/057
25	480	1200			Fig 1	1	HS	OD33/T12	45/029
25	480	1200		X	Fig 1	2	HS	OD33/T12	45/030

Fig 1 Encapsulated with Resin in Heat Shrink Sleeving

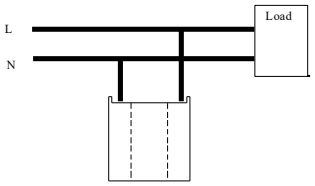
Fig 2 Round Plastic Housing with 8mm Stud

Fig 3 Round Plastic Housing with 8mm Stud

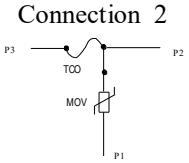
Fig 4 Rectangular Plastic Housing



Connection 1



Connection 2



Surge Arresters PM L/N/E Class II TP 25KA TYPE SAB

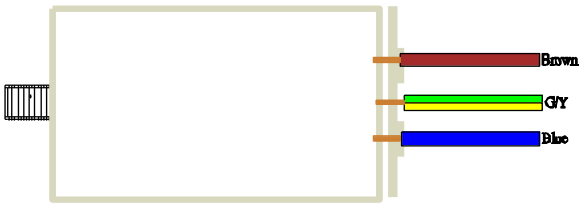
BACK TO INDEX

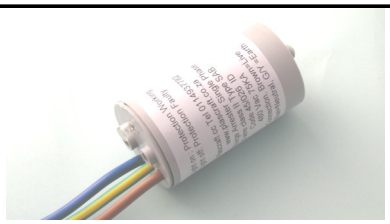
These Surge Arresters are for use in high exposure areas and use multiple 25KA varistors configured for connection to single phase mains supply with earth.
Typical applications are for use in Traffic Light Controllers and L.E.D Lighting systems as well as Industrial equipment operating in harsh environments
These units include thermal cutouts to prevent damage caused by overheating of varistors due to excessive surges and degradation over time as found in harsh environments
A status indicator may be included that monitors when the protection is no longer operating and indicates when the unit needs to be replaced.
Depending on the model it may include disconnection of the load to isolate the circuit when the protection fails

Specifications Type SAB

Maximum Peak Current (8/20us)	Status Light	Output Lead	Max Load Current	Max Continuous operating Voltage		Clamping Voltage (Max)	Housing	Stock Code
Imax (kA)				Ac Rms (V)	Dc (V)	Vc (V)		
25 x 3				480	560	1200	Rs3	45/060
25 x 3	X			480	560	1200	RS3	45/026
25 x 3	X	X	20A	480	560	1200	RS3	45/061

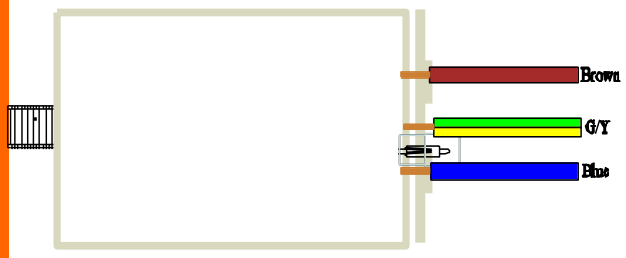
Tyoe SAB 25KA 480 VAC Single Phase 3 Wire with Thermal Cutouts Code 45/060. For Parallel Connection

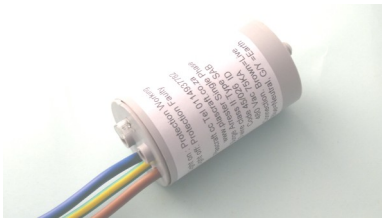




CONNECTION:
Brown=Live
Blue=Neutral
G/Y=Earth
DIMENSIONS
OD=44mm
Length excluding Stud=80mm.

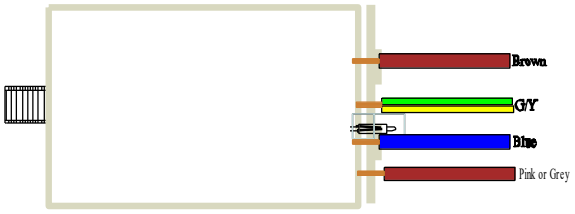
Tyoe SAB 25KA 480 VAC Single Phase 3 Wire with Thermal Cutouts and Mov Failure Indication Code 45/026.





CONNECTION:
Brown=Live
Blue=Neutral
G/Y=Earth
DIMENSIONS
OD=44mm
Length excluding Stud=80mm.
Stud=M8

Type SAB 25KA 480 VAC 3Wire with Thermal Cutouts and Mov Failure Indication Includes disconnection of the load circuit Code 45/061 For Series Connection



CONNECTION:
Brown=Live in
Blue=Neutral
G/Y=Earth
Grey=Live out
DIMENSIONS
OD=44mm
Length excluding Stud=80mm.

Surge Arresters Three Phase 10 and 25Ka 420V /480 TYPE SAC

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These Surge Arresters are for use in high exposure areas and use multiple 25KA varistors configured for connection to Three Phase Mains Supplies.
They are for use on 4 wire and 5 wire Three phase supplies
Typical applications are for use in Traffic Light Controllers and L.E.D Lighting systems as well as Industrial equipment operating in harsh environments

Specifications Type SAC

Maximum Peak Current (8/20us)		Max Continuous operating Voltage		Clamping Voltage (Max)	Housing
Imax (kA)	**Part Nos**	**Ac Rms** (V)	**Dc** (V)	**Vc** (V)	
10 4 wire	**45/458**	420	500	1100	B2
10 5 Wire	**45/459**	420	500	1100	RS3
25 4 Wire	**45/010**	480	560	1200	B2
25 5 Wire	**45/062**	480	560	1200	RS3

Tyoe SAC 10KA 420 VAC 3 Phase 4 Wire Code 45/458. For Parallel Connection

CONNECTION:
Red= Phase
White=Phase
Blue=Phase
Black=Neutral

Dimensions
OD35 mm
Length 43 mm
Bracket 30mm

Tyoe SAC 25KA 480 VAC 3 Phase 4 Wire Code 45/010. For Parallel Connection

CONNECTION:
Red= Phase
White=Phase
Blue=Phase
Black=Neutral

Dimensions
Length 75 mm
Diameter 44 mm
Stud M8

Tyoe SAC 10KA 420 VAC 3 Phase 5 Wire Code 45/459 For Parallel Connection

CONNECTION:
Red= Phase
White=Phase
Blue=Phase
Black=Neutral
G/Y= Earth

Dimensions
OD35 mm
Length 43 mm
Bracket 30mm

Tyoe SAC 25KA 480 VAC 3 Phase 5Wire Code 45/062 For Parallel Connection

CONNECTION:
Red= Phase
White=Phase
Blue=Phase
Black=Neutral
G/Y= Earth

Dimensions
Length 75 mm
Diameter 44 mm
Stud M8

Surge Arresters Three Phase 4 and 5 wire with Thermal disconnect and Protection Fail Indicator TYPE SAE

BACK TO INDEX

These Surge Arresters are for use in high exposure areas and use multiple 25KA varistors configured for connection to three phase 5 Wire mains supply with earth.
Typical applications are for use in Traffic Light Controllers and L.E.D Lighting systems as well as Industrial equipment operating in harsh environments
These units include thermal cutouts to prevent damage caused by overheating of varistors due to excessive surges and degradation over time as found in harsh environments
Status indicators are included that monitors when the protection is no longer operating and indicates when the unit needs to be replaced.

Specifications Type SAE

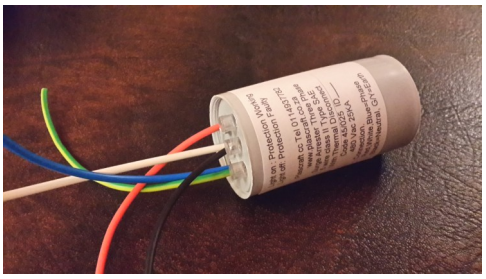
Stock Code	Connection	Max Continuous operating Voltage Ac Rms (V)	Dc (V)	Housing	Clamping Voltage (Max) Vc (V)	Maximum Peak Current (8/20us) Imax (kA)
45/002	Parrallel 4 Wire	480	560	RS3	1200	25 x 3
45/025	Parrallel 5 Wire	480	560	RS3	1200	25 x 4

Tyoe SAE 25KA 480 VAC 3 Phase 4 Wire Code 45/002 For Parallel Connection

CONNECTION:
Red= Phase
White=Phase
Blue=Phase
Black=Neutral

Dimensions
Length 75 mm
Diameter 44 mm
Stud M8

Tyoe SAE 25KA 480 VAC 3 Phase 5 Wire Code 45/025. For Parallel Connection



CONNECTION:
Red= Phase
White=Phase
Blue=Phase
Black=Neutral
G/Y=Earth

Dimensions
Length 75 mm
Diameter 44 mm
Stud M8

SURGE FILTERS METAL BOX TYPE TYPE SFA

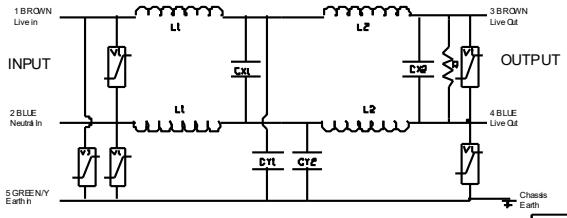
BACK TO INDEX

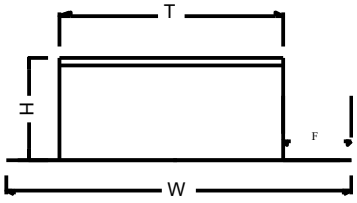
Plascraft Surge -suppression Filters are designed to protect sophisticated electronic and electrical equipment from the spikes and surges of current and voltage overloads and from noise, from the A.C. Mains.

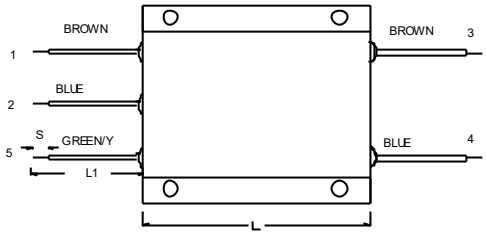
They are used for computers, data processors, word processors, electronic cash registers, process control systems ,laboratory and medical equipment etc.

These filters are supplied as discrete units and are designed to be incorporated into a variety of built-up configurations such as protected mains socket outlets, or protected feed-thru units for permanent connection to the A.C. mains.

The circuit diagram of a typical Plascraft Surge-suppression Filter together with a drawing of the Filter module is given below:-







TECHNICAL DATA

Manufacturing Standard. Manufactured TO BS 613 1977, ieee, std 587 Category B

1. RATED VOLTAGE
250 V.A.C

2 TEMPERATURE RATING :-10 c TO +85 c

3 EARTH LEAKAGE < 3.5ma

4 MAXIMUM IMPULSE CURRENT (8/20) see Dimensions Table

DIMENSIONS

Rated Current Amps	Surge Current K/a	L	W	H	T	F	Housing	Stock Code
5	20	82	73	29	53	9	MB1	45/CL5
5	50	82	73	29	53	9	MB1	45/MH5A
10	20	101	77	31	58	9	MB2	45/CL10
15	20	101	77	31	58	9	MB2	45/CL15
20	20	101	77	31	58	9	MB2	45/CL20
25	20	101	77	31	58	9	MB2	45/CL25
30	20	110	77	35	58	9	MB3	45/CL30
40	30	110	77	35	58	9	MB3	45/CL40

Mounting and Connection :

Internal mounting :The surge filter should be mounted within the product to be protected preferably with the base on the chassis as the unit's earth is connected internally to the base.

External mounting : If it is mounted externally the leads should be connected in such a way that the joins are safe and not exposed. If the surge filter is exposed the Earth wire must be connected to avoid earth leakage currents on the metal housing to comply with safety requirements.

Connection to mains : The brown and blue wires on the side with the green and yellow wire should be connected to the incoming live and neutral respectively and the Green and Yellow wire must be connected to the earth.

Connection to equipment: The brown and blue wire on the other side should be connected to the equipment to be protected. Brown to live and blue to Neutral. The metal housing is earthed and should be connected to the product's earth lead.

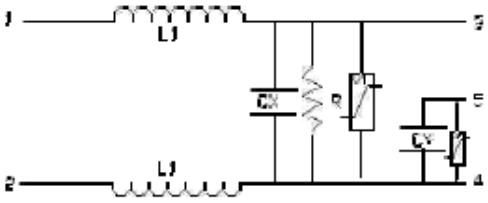
The integral EMI/RFI filter provides high attenuation to interference signals in both common and differential modes.
The design of special Spike-suppression Filters with improved parameters may also be considered

SURGE FILTERS SINGLE SECTION PLASTIC CAN VERSION TYPE SFB

BACK TO INDEX

These Surge-suppression Filters are enclosed in plastic cylindrical containers and are suitable for applications where less stringent requirements are called for than the metal box type

SINGLE PI NETWORK (Typical Circuit)



TECHNICAL DATA

Manufacturing Standard. Manufactured TO BS 613 1977, ieee, std 587 Category B

1. RATED VOLTAGE

250 V.A.C

2 TEMPERATURE RATING :-10 c TO +85 c

3 EARTH LEAKAGE < 3.5ma

4 MAXIMUM IMPULSE CURRENT 20KA (8/20)

5R.F. INTERFERENCE ATTENUATION: See Figure 1

DIMENSIONS

Rated Current Amps	Rated Voltage	Rated Inductance Milli Henries	Earth Leakage Milli Amps	Surge Rating KA	Housing	Stock Code
3	250	.587	.75	20	B2	45/250
3	250	.587	.75	20	RS2 39-51	45/287

SURGE FILTERS DOUBLE SECTION PLASTIC CAN VERSION TYPE SFD

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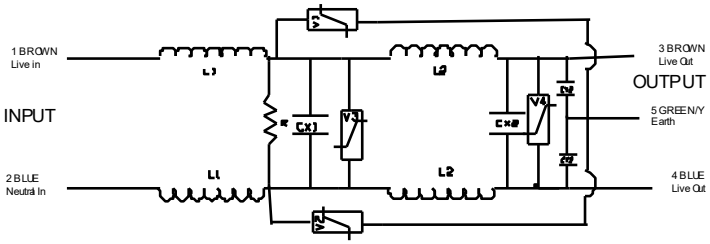
These Surge-suppression Filters are enclosed in plastic cylindrical containers and are suitable for applications where less stringent requirements are called for than the metal box type

DOUBLE SECTION NETWORK (Typical Circuit)



TECHNICAL DATA

Manufacturing Standard. Manufactured TO BS 613 1977, ieee, std 587 Category B

1. RATED VOLTAGE

250 V.A.C

2 TEMPERATURE RATING :-10 c TO +85 c

3 EARTH LEAKAGE < 3.5ma

4 MAXIMUM IMPULSE CURRENT 20KA (8/20)

5R.F. INTERFERENCE ATTENUATION: See Figure 1

DIMENSIONS

Rated Current Amps	Rated AC Voltage	Earth Leakage Milli Amps	Surge Rating KA Tot	Dimensions mm	Housing	Stock Code
10	250	.1.7	40	OD=48,L=86, Stud M8	RS3	45/064
15	250	1.7	40	OD=48,L=86, Stud M8	RS3	45/065
20	250	1.7	40	OD=48,L=86, Stud M8	RS3	45/066
30	250	1.7	40	OD=48,L=86, Stud M8	RS3	45/067

The integral EMI/RFI filter provides high attenuation to interference signals in both common and differential modes.
The design of special Spike-suppression Filters with improved parameters may also be considered

SURGE FILTERS PLASTIC BOX PLUG-IN TYPE SFC

BACK TO INDEX

Plascraft Surge-suppression Filters are designed to protect sophisticated electronic and electrical equipment from the spikes and surges of current and voltage overloads and from noise, from the A.C. Mains.
They are used for computers, data processors, word processors, electronic cash registers, process control systems,laboratory and medical equipment etc.
This version is ideal as an add on Filter for existing equipment where the convenience of being able to plug in is required.

Large Housing

Small Housing

TECHNICAL DATA

Manufacturing Standard. Manufactured TO BS 613 1977, ieee, std 587 Category B

1. RATED VOLTAGE
250 V.A.C
2 TEMPERATURE RATING :-10 c TO +85 c
3 EARTH LEAKAGE < 3.5ma
4 MAXIMUM IMPULSE CURRENT 20KA (8/20)
5R.F. INTERFERENCE ATTENUATION: See Figure 1
6 LED Indication

DIMENSIONS

Rated Current Amps	Housing	Length mm	Width mm	Height	Output Cable Type	Stock Code
5	Small	75	50	30	2.5 Metres IEC Plug	45/582
5	Large	114	75	50	2.5 Metres IEC Plug	45/580
10	Large	114	75	50	3 Meters 3 x IEC plugs	45/581

FIGURE 1. INSERTION LOSS CHARACTERISTICS.

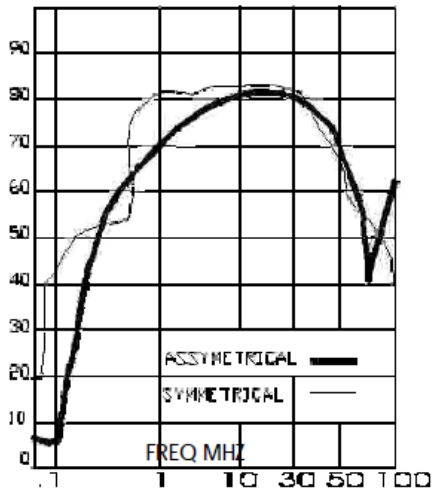
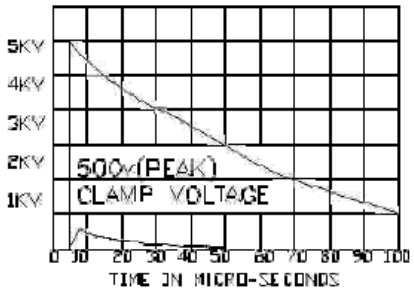


FIGURE 2. IMPULSE TEST.



An impulse of 5 Kilo Volts in 1 Micro-second is slowed down and clamped to a nominal level of 500 Volts, with no overshoot: adequate protection is thus provided.

The integral EMI/RFI filter provides high attenuation to interference signals in both common and differential modes.
The design of special Spike-suppression Filters with improved parameters may also be considered

THERMAL DISCONNECTS TYPE STD

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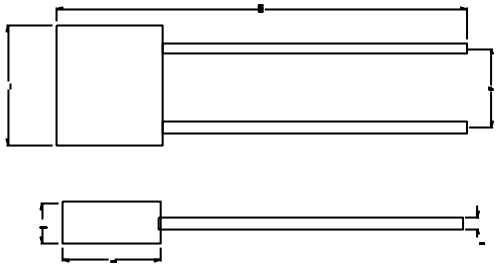
Thermal Disconnects are non-resettable devices used for the thermal protection of Equipment or Components in which, under fault conditions , one or more parts may reach hazardous temperature.



DIMENSIONS

	A +-.5	B+-0.5	C +-0.2	D+-0.05	E+-3	F+-0.5
03/005	8.3	7.5	3.4	1.05	35	5.2
03/002	10.8	11.5	4.8	1.6	50	6.6

SPECIFICATIONS

	Tf Rated Func-tioning Temp.	Fusing Temp	Th	Tm	Ir Rated Current Amps	Ur (Vac) Rated Voltage	In 8/20us 15 times (Ka)	Imax 8/20us (1 Time) (Ka)	
03/005	115	111+-2	85	200	15/16	250	6	12	T115
03/002	115	111+-2	82	200	20	250	15	25	P115

CONTRACT ASSEMBLY :
SURGE PROTECTION PRODUCTS ASSEMBLY COS

BACK TO INDEX

CONTRACT ASSEMBLY:- **Assembly of surge products in plastic housings. We are able to test these items using a variety of specialised insulation , circuit and high voltage testers.**

PACKAGING PAC

BACK TO INDEX

Polybag Packaging.

Polystyrene Packaging

Display Packaging.
Product can be individu-
ally packed
In Polybags with a label
for display

Carton 1 Size 23x15x15cm ,5175cu cm ,193 cartons cu. metre
Carton 2 Size 25x15x25,9375cu. Cm , Max weight 18Kgs
Carton 3 Size 30x21x28, 17640cu.cm. Max weight 18Kgs

Carton Identification.
Plascraft
Customer Name and Address
(If Contents are 1 Item)
Product Type
Stock Code
Product Description .
Quantity.

(If Contents contain more than 1 Item)
Plascraft
Customer Name and Address

Bag Identification
Plascraft. 011-4937782
Product Type
Stock Code
Product Description
Capacitors: Capacitor Type, Value,
Voltage, Tolerance, Lead Spacing

Inductors: Inductance, Current Rating,
Voltage