



Power Supply Systems
SPDs Class I



DEHNbloc®		Red / Line	
Lightning Current Arrester			
<p>For the integration of power supply lines into lightning protection equipotential bonding systems. For the use in the Lightning Protection Zones Concept at the boundaries of LPZ 0_A – 1. German Patent.</p> <p>For the protection of low voltage consumer's installations against surges, even at direct lightning strikes (Overvoltage Category IV according to DIN VDE 0110-1:1997-04). Tested with lightning impulse currents (10/350) in accordance with DIN V ENV 61024-1 (VDE V 0185 Part 100), DIN VDE 0185-103. SPD Class I according to IEC 61643-1:1998-02. SPD Type 1 according to EN 61643-11:2001. Ableiter der Anforderungsklasse B according to E DIN VDE 0675-6:1989-11 and -6/A1:1996-03.</p> <ul style="list-style-type: none"> – Encapsulated, non-exhausting creepage discharge spark gap – "Breakwater Function" allows energy coordination with downstream varistor-type surge arrester, e.g. DEHNguard and/or the equipment to be protected – Low voltage protection level – Quick response – Application also possible upstream the meter due to high insulation resistance – Multifunctional terminals for conductors and busbars – 3-pole version, 1-pole version (up to 100 kA of lightning impulse current loads 10/350 possible depending on the mains type) <p>For further information on use, please see also installation instructions Nos. 1205 (DB 3 255) and 1226 (DB 1 255).</p>			
Technical Data:			
Type		DB 3 255	DB 1 255
Rated voltage (max. continuous operating voltage)	U_c	255 V / 50 Hz	
Follow current extinguishing capability at U_c	I_f	3 kA _{rms}	
Lightning impulse current (10/350)	I_{imp}	100 kA	50 kA
Voltage protection level Lightning impulse sparkover voltage 1.2/50	U_p	≤ 4 kV	
Response time	t_A	≤ 100 ns	
Backup fuse (only required, if not already provided in mains)		160 A gL/gG	
Short-circuit withstand capability with max. backup fuse		50 kA / 50 Hz	
Operating temperature range	θ	– 40° C ... + 80° C	
Cross-sectional area		min. 10 mm ² solid/flexible max. 50 mm ² stranded/35 mm ² flexible	
Insulation resistance	R_{isol}	≥ 10 ³ MΩ	
Mounting on		DIN rail 35 mm in accordance with EN 50022	
Enclosure material		red glass fibre reinforced thermoplastic, UL94-V0	
Degree of protection		IP 20	
Dimension		4 mods., DIN 43880	2 mods., DIN 43880
Approved by		UL, KEMA, VDE	
Test standards		IEC 61643-1:1998-02; EN 61643-11:2001; E DIN VDE 0675-6:1989-11 and -6/A1:1996-03	
DEHNbloc®			
Type		Part No.	
DB 3 255		900 110	
DB 1 255		900 111	

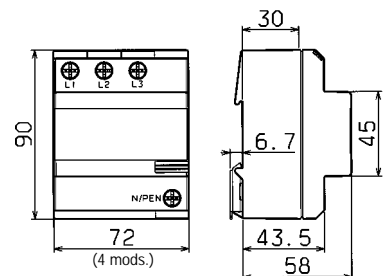
DB 3 255



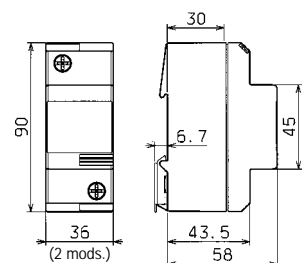
DB 1 255



Dimension drawing DB 3 255



Dimension drawing DB 1 255



Basic circuit diagram DB 3 255

