




TECHNICAL DATA SHEET

Thermolite IceShield S5 green/black

General information

Size range	
• EU	39 - 47
• UK	6 - 12
• US	6 - 14
The testresults in this technical datasheet are performed on size EU 42, UK 8, US 9.	
Weight / pair	
• Safety level: Steel toe cap & midsole	± 100.18 oz
Colors	
	
green - black	

Upper

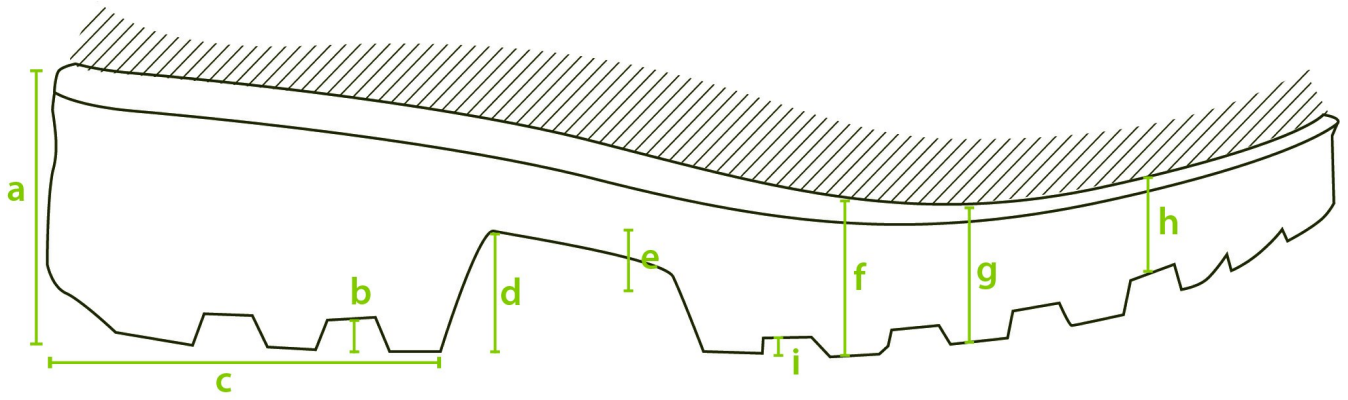
A. Dimensions	
• Height	outer measure: 15.7 in
• Foot length	outer measure: 12.2 in
	inner measure: 11.0 in
B. Thickness	
• Upper edge	0.18 in
• Calf	0.30 - 0.33 in
• Shinbone	0.24 - 0.35 in
• Ankle	0.46 in
• Heel	0.51 - 0.52 in
C. Raw material	
	NEOTANE (proprietary polyurethane compound)
D. Density	
	73.4 - 80.1 oz/gal (U.S.)

E. Tensile strength		
(incl. lining)	1450 ± 290 psi	
F. Elongation		
(incl. lining)	600 +/- 100%	
G. Hardness		
	43 +/- 2 Sh A	
H. Tear strength		
(incl. lining) lbf/in	57.1 ± 11.4 lbf/in	
I. Aging		
(incl. lining)	7 days at 158 °F	14 days at 158 °F
• Tensile strength	1682.4 psi	1305.3 psi
• Elongation	580 ± 20%	600 ± 20%
• Tear strength	65.1 lbf/in	51.4 lbf/in
J. Chemical resistance		
	see detailed list	
K. Environmental temperature		
• Maximum	± 212 °F	
• Minimum	Cold insulation down to -58 °F	

Lining

A. Material	
	PU coating on polyester fabric
B. Seams	
	Welded and knitted seams

Outsole profile



A. Dimensions

• Heel		
• Thickness	(a)	2.2 in
• Profile depth	(b)	0.39 in
• Length	(c)	3.9 in
• Width		3.9 in
• Middle foot		
• Height	(d)	1.1 in
• Ladder anti-slip grips	(e)	0.07 in
• Outsole		
• Thickness	(f)	1.2 in
	(g)	1.2 in
	(h)	0.71 in
• Profile depth	(i)	0.20 in

B. Raw material

NEOTANE (proprietary polyurethane compound)

C. Density

5.5 - 6.0 ppg (imp.)

D. Mechanical characteristics

See upper (E)-(F)-(H)

E. Energy absorption of the seat region

60-70 J (requirement ≥ 20 J)

F. Antistatic

dry: $1 \times 10^8 - 1 \times 10^9$ Ohm

wet: $1 \times 10^7 - 1 \times 10^9$ Ohm

G. Abrasion resistance



0.0031 in³

H. Hardness	
	60 +/- 10 Sh A
I. Footwear slip resistance	
	SR
J. Chemical resistance	
	see detailed list


Safety

	Standard	Required	Type	Result
Toe cap & midsole				
Nail penetration resistance	EN ISO 20344:2022+A1:2024 EN ISO 20345:2022+A1:2024	> 1100 N	Metallic	1503 N
Impact resistance (200J)	EN ISO 20344:2022+A1:2024 EN ISO 20345:2022+A1:2024	> 0.55 in	Metallic	0.57 in
Compression resistance	EN ISO 20344:2022+A1:2024 EN ISO 20345:2022+A1:2024	> 0.55 in	Metallic	0.59 in
Width of toe cap	outer measure: 1.9 in			
Height of toe cap	outer measure: 3.7 in			
Toe cap	Steel			

Certificates

	EN ISO 20344:2022+A1:2024 EN ISO 20345:2022+A1:2024 2501543-02-86
	EN ISO 20345:2011 AB0321/19223-01/E00-00

Accessories

Thermo-moulded footbed		
Two layers		
• Toplayer	woven textile	
• Color	black	
• Thickness	0.03 in	
• Bottom	PU foam	
• Color	black	
• Thickness	0.12 - 0.28 in	
Washable at 86 °F		