

Explanation of Marking Codes Used on European CE Certified PPE Footwear

- EN ISO 20345 SB** Safety footwear. Toe protection tested with 200J impact and 15kN compression force
- EN ISO 20346 PB** Protective footwear. Toe protection tested with 100J impact and 10kN compression force
- EN ISO 20347 OB** Occupational footwear. No toe protection against mechanical hazards provided.
- A** Antistatic: Electrical resistance between 0.1 and 1000MΩ
- AN** Ankle protection: 10J impact with mean transmitted force to be ≤10kN and no single result >15kN
- C** Conductive: Electrical resistance ≤100kΩ
- CI** Insulation against cold: 30 minutes at -17°C, ΔT ≤10°C
- CR** Cut resistant upper: cut resistance index to exceed 2.5
- E** Energy absorption of the seat region: Energy absorbed to be ≥20J
- FO** Fuel oil resistant outsole
- HI** Insulation against heat: 30 minutes at 150°C, ΔT ≤22°C
- HRO** Heat resistant outsole compound: shall withstand 300°C for 60s
- M** Metatarsal protection: 100J impact energy (not EN ISO 20347)
- P** Penetration resistant outsole: Penetration force ≥1100N
- WR** Water resistant footwear (Class I products only)
- WRU** Water resistant upper leather (Class I products only)

In addition there are the following short codes for commonly used combinations

- O1** Upper from material other than all rubber or polymeric + Closed seat region + OB + A + E
- O2** O1 + WRU
- O3** O2 + P + Cleated outsoles
- O4** Upper from all rubber or all polymeric material Closed seat region + OB + A + E
- O5** O4 + P + Cleated outsoles
- OBH** Hybrid occupational footwear
- P1** Upper from material other than all rubber or polymeric + Closed seat region + PB + A + E + FO
- P2** P1 + WRU
- P3** P2 + P + Cleated outsoles
- P4** Upper from all rubber or all polymeric material Closed seat region + PB + A + E + FO
- P5** P4 + P + Cleated outsoles
- PBH** Hybrid protective footwear
- S1** Upper from material other than all rubber or polymeric + Closed seat region + SB + A + E + FO
- S2** S1 + WRU
- S3** S2 + P + Cleated outsoles
- S4** Upper from all rubber or all polymeric material Closed seat region + SB + A + E + FO
- S5** S4 + P + Cleated outsoles
- SBH** Hybrid safety footwear
- SRA** Slip resistance on ceramic tile floor with SLS*
- SRB** Slip resistance on steel floor with glycerol
- SRC** Slip resistance on ceramic tile floor with SLS* and on steel floor with glycerol
- *SLS = Sodium Lauryl Sulphate solution

MARKING ASSOCIATED WITH OTHER FOOTWEAR STANDARDS

FIREFIGHTER PICTOGRAM & TYPE OF PROTECTION



Indicates that footwear complies with the requirements of EN 15090:2012

F

Marking symbols

Footwear type	Symbol	Properties signified
For Type 1	F1A	All normative requirements and requirements for antistatic properties
	F1PA	All normative requirements and requirements for penetration resistance and for antistatic properties
For Type 2	F2A	All normative requirements and requirements for antistatic properties
For Type 3	F3A	All normative requirements and requirements for antistatic properties

MOTORCYCLE PICTOGRAM & LEVEL OF PROTECTION



Indicates that footwear complies with the requirements of EN 13634:2017

EN13634:2017
LEVEL X X X X

1st X	Height of upper
2nd X	Performance level achieved in abrasion resistance testing
3rd X	Performance level achieved in impact cut resistance testing
4th X	Performance level achieved in transverse rigidity of whole footwear testing
Marking codes for optional requirements to be met and claimed are as below and should follow the fourth 'X'	
IPA	Footwear meeting requirements for ankle impact protection
IPS	Footwear meeting requirements for shin impact protection
WR	Footwear meeting requirements for resistance to water penetration
FO	Footwear meeting requirements for resistance to fuel oil
SRA, SRB or SRC	Footwear meeting requirements for slip resistance
B	Footwear meeting requirements for uppers permeable to water vapour
WAD	Footwear meeting requirements for water absorption desorption for insole/insock

HEAT & FLAME PICTOGRAM



Indicates that footwear complies with the requirements of EN ISO 20349-1:2017 or EN ISO 20349-2:2017

Al	Indicates the footwear complies, using aluminium as test metal EN ISO 20349-1
Fe	Indicates the footwear complies, using iron as test metal EN ISO 20349-1
WG	Indicates the footwear complies with requirements defined for welding footwear EN ISO 20349-2

CHEMICAL PICTOGRAM



Indicates that footwear complies with the requirements of EN ISO 13832-3:2018

CHAINSAW PICTOGRAM & CLASS OF PROTECTION



Marked on footwear that complies with the norm EN ISO 17249:2013

Level	Test chain speed m/s
1	20
2	24
3	28

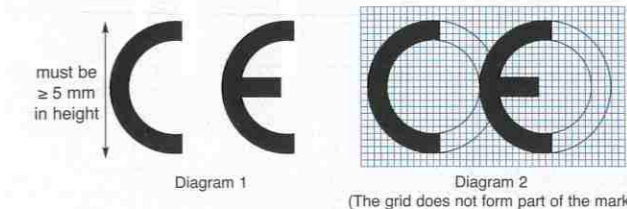
INFORMATION PICTOGRAM



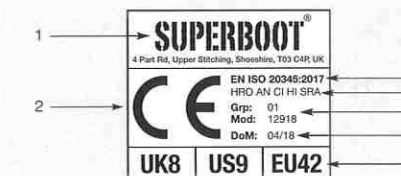
Indicates that the user should see the information supplied by the manufacturer

INFORMATION TO BE MARKED ON THE FOOTWEAR

The marking will need to contain the following information in one form or another.



An example of a possible label is given below:



- 1 Identification of the manufacturer (company name or logo) plus postal address.
- 2 The CE mark, this must have the dimensions specified in Regulation (EU) 2016/425, as given above. For category III PPE the CE symbol should be followed by the four-digit reference number of the Notified Body involved with the Module C2 or Module D production monitoring.
- 3 The number and year of the standard used for certification (e.g. EN ISO 20345:2011).
- 4 The category of protection as defined in the standard (for example S2 HRO AN CI HI SRA). Short codes can be used such as S1, S2 etc. The category of protection positioned adjacent to the standard number.
- 5 The group number, model reference, type, batch or serial number. A unique identifier for this style of footwear, this must be identifiable in the technical file, user information notice and the CE certificate.
- 6 The date of manufacture will need to be in the format defined in the particular product standard.
- 7 The size of the product (can be in any recognised system such as UK, PP etc).
- 8 For footwear providing insulation against electric shock - the serial number and date of manufacture.

The marking should be in a position on the footwear so that it is visible to the end user. The postal address of the manufacturer needs to be specific enough for an item to be delivered by postal services (ie in the UK a postcode and property number). The method used to produce the marking should be sufficiently durable so as to remain legible for the foreseeable useful life of the product. The marking shall be permanently attached to the footwear and may not be attached to a removable component such as a footbed/sock liner.

CLASSIFICATION OF FOOTWEAR

Class	Classification
I	Footwear made from leather and other materials, excluding all-rubber or all-polymeric footwear.
II	All-rubber or all-polymeric footwear.

SATRA also tests general footwear and components, construction products, furniture, floorcoverings, clothing, automotive products and toys.

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