

COMMISSION DECISION
of 17 February 1999
establishing the ecological criteria for the award of the Community eco-label to
footwear

(notified under document number C(1999) 340)

(Text with EEA relevance)

(1999/179/EC)

THE COMMISSION OF THE EUROPEAN COMMUNITIES,
Having regard to the Treaty establishing the European Community,

Having regard to Council Regulation (EEC) No 880/92 of 23 March 1992 on a Community eco-label award scheme⁽¹⁾, and in particular the second subparagraph of Article 5(1) thereof,

Whereas the first subparagraph of Article 5(1) of Regulation (EEC) No 880/92 provides that the conditions for the award of the Community eco-label shall be defined by product group;

Whereas Article 10(2) of Regulation (EEC) No 880/92 states that the environmental performance of a product shall be assessed by reference to the specific criteria for product groups;

Whereas in accordance with Article 6 of Regulation (EEC) No 880/92, the Commission has consulted the principal interest groups within a consultation forum;

Whereas the measures set out in this Decision are in accordance with the opinion of the committee set up pursuant to Article 7 of Regulation (EEC) No 880/92,

HAS ADOPTED THIS DECISION:

Article 1

The product group 'footwear' (hereinafter referred to as 'the product group') shall mean:

'All articles of clothing designed to protect or cover the foot, with a fixed outer sole which comes into contact with the ground'.

Article 2

The environmental performance and the fitness for use of the product group shall be assessed by reference to the specific ecological and fitness for use criteria set out in the Annex.

Article 3

The product group definition and the specific ecological criteria for the product group shall be valid for a period of three years from the first day of the month following the adoption of the criteria.

Article 4

For administrative purposes the product group code No assigned to this product group shall be '017'.

Article 5

This Decision is addressed to the Member States.

Done at Brussels, 17 February 1999.

For the Commission

Ritt BJERREGAARD

Member of the Commission

⁽¹⁾ OJ L 99, 11. 4. 1992, p. 1.

ANNEX

In order to qualify for an eco-label, the product as defined in Article 1 must comply with the criteria of this Annex, with tests carried out on application as indicated in the criteria. Where appropriate, other test methods may be used if their equivalence is accepted by the competent body assessing the application. Where no tests are mentioned, or are mentioned as being for use in verification or monitoring, competent bodies should rely as appropriate on declarations and documentation provided by the applicant and/or independent verifications.

The competent bodies are recommended to take into account the implementation of recognised environmental management schemes, such as EMAS or ISO 14001, when assessing applications and monitoring compliance with the criteria in this Annex.

These criteria aim in particular at limiting the levels of toxic residues and the emissions of volatile organic compounds, and at promoting a more durable product.

The functional unit is one pair of shoes. Requirements are based on shoe size 40 Paris point. For children's shoes the requirements apply for a size 32 Paris point (or the largest size in the case of maximum sizes smaller than 32 Paris point).

ECOLOGICAL CRITERIA

1. Residues in the final product

(a) The average concentration of residues in the final product shall not exceed the following:

- chromium (VI): 10 ppm,
- arsenic: 10 ppm,
- cadmium: 10 ppm,
- lead: 10 ppm.

Test methods (test report required on application)

- Cr (VI): standard EN 420 (note that difficulties in measurement due to interferences may be encountered when analysing certain coloured leathers),
- Cd, Pb, As: analyses by atomic absorption spectroscopy (AAS) following digestion by strong acid.

Sample preparation:

- (1) Separate the upper components from the bottom components,
- (2) grind completely the upper components and the bottom components, keeping both separate,
- (3) analyse a sample of each of these two preparations,
- (4) the concentrations of the above substances in each of these two samples shall not exceed the above values.

(b) The amount of free and partially hydrolysable formaldehyde of the textile components of the footwear shall not exceed 75 ppm and of the leather components shall not exceed 150 ppm.

Test methods (test report required on application)

- textiles: Japan Law 112, SFS 4996 or Preniso 14184-1
- leather: IUC 94.50001 a or DIN 53315

2. Emissions from the production of material

The waste water from leather tanning sites shall be treated, either by an in-house or municipal waste water treatment plant/facility, so as to achieve a reduction of the COD content of at least 75 %.

Test method (test report and appropriate complementary data required on application)

COD: ISO 6060 water quality, determination of chemical oxygen demand

3. Use of harmful substances (up until purchase)

- (a) Pentachlorophenol (PCP) and its salts and esters shall not be used.

Test method (for purposes of verification)

- textiles: gas chromatography (GC) with electron capture detection (ECD), limit value 0,05 ppm
- leather: analyses should be carried out by DIN 53313 with
(a) mass spectrometry (MS) or
(b) electron capture detection (ECD); limit value 5 ppm.

- (b) No azo dyes shall be used that may cleave to any of the following aromatic amines:

4-aminodiphenyl	(92-67-1)
benzidine	(92-87-5)
4-chloro-o-toluidine	(95-69-2)
2-naphthylamine	(91-59-8)
o-amino-azotoluene	(97-56-3)
2-amino-4-nitrotoluene	(99-55-8)
p-chloroaniline	(106-47-8)
2,4-diaminoanisol	(615-05-4)
4,4'-diaminodiphenylmethane	(101-77-9)
3,3'-dichlorobenzidine	(91-94-1)
3,3'-dimethoxybenzidine	(119-90-4)
3,3'-dimethylbenzidine	(119-93-7)
3,3'-dimethyl-4,4'-diaminodiphenylmethane	(838-88-0)
p-cresidine	(120-71-8)
4,4'-methylene-bis-(2-chloraniline)	(101-14-4)
4,4'-oxydianiline	(101-80-4)
4,4'-thiodianiline	(139-65-1)
o-toluidine	(95-53-4)
2,4-diaminotoluene	(95-80-7)
2,4,5-trimethylaniline	(137-17-7)
4-aminoazobenzene	(60-09-3)
o-anisidine	(90-04-0)

Test method (for purposes of verification)

- textiles: German method B-82.02 or equivalent, limit 30 ppm. (Note that false positives are possible for 4-aminoazobenzene and confirmation is therefore recommended),
- leather: standard DIN 53316, limit 30 ppm. (Note that false positives are possible for 4-aminoazobenzene, 4-aminodiphenyl and 2-naphthylamine and confirmation is therefore recommended).

4. Use of volatile organic compounds (VOCs) during final assembly of shoes

The total use of VOCs during final footwear production, for the following categories, shall not exceed on average:

- general sports, children, occupational, men's town, specialist cold: 30 gr VOC/pair,
- casual, women's town: 25 gr VOC/pair,
- fashion, infants, indoor: 20 gr VOC/pair.

VOCs are any organic compound having at 293,15 K a vapour pressure of 0,01 kPa or more, or having a corresponding volatility under the particular conditions of use.

The total use of VOCs during final shoe production shall be calculated as follows:

$$M_{(\text{VOCtotal})} = \Sigma (M_{(\text{adhesives})} \times C_{(\text{VOCa})}) + \Sigma (A_{(\text{finishes})} \times M_{(\text{finishes})} \times C_{(\text{VOCf})})$$

Where:

$M_{(\text{VOCtotal})}$ = the total use of VOCs in the production of the pair of shoes (g),

$M_{(\text{adhesives})}$ = the amount of adhesives ⁽¹⁾ applied to the pair of shoes considered (g),

$C_{(\text{VOCa})}$ = the VOC content of the adhesives applied (index: g VOCs per g adhesive),

$A_{(\text{finishes})}$ = the area of the pair of shoes onto which the finish ⁽²⁾ is applied (m²),

$M_{(\text{finishes})}$ = the amount of finish applied per metre square (g/m²),

$C_{(\text{VOCf})}$ = the VOC content of the finishes applied (index: g VOCs per g finish),

and:

⁽¹⁾ only adhesives with solvents have to be taken into account. Water based and hot melt adhesives are exempted;

⁽²⁾ finishes: base coats, top coats and repair coats, (upper) finish layers of leather, synthetics upper, lining, cotton, etc. only when based on solvents.

Registration of purchased leather, adhesives, finishes and production of footwear over at least the last six months is required.

5. Electric components

The footwear shall not contain any electric or electronic components.

6. Packaging of the final product

(a) Where cardboard boxes are used for the final packaging of footwear, they shall be made from a minimum of 80 % recycled material.

(b) Where plastic bags are used for the final packaging of footwear, they shall be made from recycled material.

CONSUMER INFORMATION

7. User instructions

The following information shall be supplied with the product:

- these shoes have been treated to improve their water resistance. They do not require further treatment. (This criterion is applicable only to footwear that has been water-resistant treated),
- where possible repair your footwear rather than throw them away. This is less damaging to the environment.

FITNESS FOR USE CRITERIA

8. Parameters contributing to durability

Occupational and safety footwear must carry the CE mark (in accordance with Council Directive 89/686/EEC ⁽¹⁾ on the approximation of the laws of the Member States relating to personal protective equipment). All other footwear must meet the requirements indicated in the table below (*test report required on application*). The parameters referred to are measured according to the following test methods:

— uppers flex resistance:	Document CEN/TC 309 N 113
— uppers tear strength:	Document CEN/TC 309 N 115
— uppers bondability:	EN 1392
— outsoles flex resistance:	prEN 12769
— outsoles abrasion resistance:	prEN 12770
— outsoles bondability:	EN 1392
— insoles water absorption and desorption:	prEN 12746
— uppers water resistance:	Document CEN/TC 309 N 121
— outsoles water resistance:	prEN 13072.

⁽¹⁾ OJ L 399, 30. 12. 1989, p. 18.

Parameters contributing to durability

	General sports	Children's	Casual	Men's town	Specialist cold	Women's town	Fashion	Infants	Indoor
Uppers flex resistance: (kc without visible damage)	Dry = 100 Wet = 20	Dry = 100 Wet = 20	Dry = 80 Wet = 20	Dry = 80 Wet = 20	Dry = 100 Wet = 20 -20 °C = 30	Dry = 50 Wet = 10	Dry = 15	Dry = 15	Dry = 15
Uppers tear strength: (Average tear force, N)									
— leather	≥ 80	≥ 60	≥ 60	≥ 60	≥ 60	≥ 40	≥ 30	≥ 30	≥ 30
— other materials	≥ 40	≥ 40	≥ 40	≥ 40	≥ 40	≥ 40	≥ 30	≥ 30	≥ 30
Uppers bondability: (N/mm)	≥ 4,0	≥ 4,0	≥ 3,0	≥ 3,5	≥ 4,0	≥ 3,0	≥ 2,5	≥ 3,0	≥ 2,5
Outsoles flex resistance: Cut growth (mm) Nsc = no spontaneous crack	≤ 4 nsc	≤ 4 nsc	≤ 5 nsc	≤ 6 nsc	≤ 6 nsc at -10 °C	≤ 8 nsc	≤ 12 nsc		≤ 12 nsc
Outsoles abrasion resistance: D ≥ 0,9 g/cm ³ (mm ³) D < 0,9 g/cm ³ (mg)	≤ 200 ≤ 150	≤ 250 ≤ 170	≤ 200 ≤ 150	≤ 350 ≤ 200	≤ 200 ≤ 150	≤ 400 ≤ 250	≤ 450 ≤ 300	≤ 400 ≤ 250	≤ 450 ≤ 300
Outsoles bondability: (N/mm) D ≥ 0,9 g/cm ³ D < 0,9 g/cm ³	≥ 4,0 ≥ 3,0	≥ 4,0 ≥ 3,0	≥ 3,5 ≥ 3,0	≥ 3,5 ≥ 3,0	≥ 3,5 ≥ 3,0	≥ 3,0 ≥ 3,0	≥ 2,5 ≥ 2,5	≥ 3,0 ≥ 3,0	≥ 2,5 ≥ 2,5
Insoles water absorption and desorption: abs (mg/cm ²) des (%)	≥ 90 ≥ 60	≥ 90 ≥ 60	≥ 90 ≥ 60	≥ 90 ≥ 60	≥ 90 ≥ 60	≥ 90 ≥ 60	≥ 90 ≥ 60	≥ 90 ≥ 60	≥ 90 ≥ 60

In addition, specialist cold footwear shall meet the following requirements for water resistance:

- uppers: penetration time ≥ 240 min, absorption < 25 %,
- outsoles: penetration time ≥ 60 min and after two hours water absorption < 20 % (highly water resistant — applicable only to certain soling material).