

PENTLAND BRANDS

Restricted Substances List (RSL)

2025



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OUR BRANDS



ABOUT PENTLAND BRANDS LTD

We're the people behind some of the world's best sports, outdoor and lifestyle brands. Our brands are bold and brave, always in pursuit of better, award-winning results.

We own Speedo, Berghaus, Canterbury of New Zealand, Endura, ellese, Red or Dead, KangaROOS and Mitre. We're also the UK footwear and apparel licensee for Kickers.

Our products are available in over 190 countries, sold either directly or by licensees and distributors.

Pentland Brands requires that its products, and the raw materials used to construct those products, are manufactured with regard for the safety of consumers and factory workers, and with consideration for the wider environment.

This Restricted Substances List (RSL) provides details of chemicals and other potentially harmful substances that are restricted by Pentland Brands, and allowable chemical limits for products placed on the market.

Pentland Brands RSL applies to all materials, components and finished products manufactured and sold under the name of any of the Pentland Brands family of brands, whether sourced directly or by brands' licensee partners, unless communicated otherwise in writing.

All materials, components and finished products manufactured for Pentland Brands must comply with the requirements in this document no later than 90 days after the release date and must also comply with all applicable legislation.

Pentland Brands Approach to Restricted Substances

Pentland Brands requires that its products, and the raw materials used to construct those products, are manufactured with regard for the safety of consumers and factory workers, and with consideration for the wider environment.

We are committed to identifying, reducing, and eliminating harmful and toxic chemicals from its supply chain in order to reduce our overall impact on the environment and improve access to safe and clean water in all the communities in which we operate.

This Restricted Substances List (RSL) provides details of chemicals and other potentially harmful substances that are restricted by Pentland Brands, and allowable chemical limits for products placed on the market.

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Pentland Brands Approach to PFAS

Per- and Polyfluoroalkyl Substances (PFAS) is a group of man-made chemicals (with an estimated 5,000+ chemical compounds) widely used to create water, oil, and stain repellency characteristics in various consumer products. PFAS chemicals are easily transported in the environment and due to their chemical structure, can accumulate and persist for a very long time.

As a result of this environmental impact and the potential for humans and animals to be exposed to PFAS chemicals, certain jurisdictions are in the process of introducing PFAS legislation and reporting requirements.

Pentland Brands are therefore committed to working towards reducing the use of PFAS chemicals in our products and manufacturing processes, with the ultimate aim of eliminating PFAS from our product lines in the future. Pentland Brands are working collaboratively with its suppliers and licensees to ensure they are compliant with applicable PFAS legislation and reporting requirements and working towards ultimately phasing out PFAS use all together.

Further information regarding how this will be implemented will be communicated directly to suppliers and licensees.



ALIGNMENT WITH THE AFIRM RSL

The Apparel and Footwear International RSL Management (AFIRM) Group, is an apparel and footwear industry body whose aim is to reduce the use and impact of harmful substances in apparel and footwear supply chains.

One of its areas of focus, is to create an industry-wide RSL to provide an aligned approach to managing restricted substances across the largely shared global supply chains of member brands.

Based on the collaborative effort of more than 20 brands, the AFIRM RSL reduces the large number of complicated and sometimes contradictory brand RSLs, while simplifying the approach and accelerating efforts to reduce chemical hazards.

Pentland Brands has aligned with the AFIRM RSL (with a couple of additions seen opposite) and suppliers should ensure that all components in Pentland Brands' products are compliant.

The AFIRM RSL is available at:
<https://afirm-group.com/afirm-rsl/>

AFIRM RSL – Pentland Brands modifications

- **Bisphenols: To achieve limits below or equal to California Proposition 65 court settlements. BPA ≤ 1 ppm and BPS 100 ppm.**

AFIRM RSL – Pentland Brands additions

Additions are included for substances not listed on the AFIRM RSL that are restricted by Pentland Brands; see page 5 for more details:

- Antimicrobial guidance
- Substances listed as SVHCs under REACH



PACKAGING

Pentland Brands has adopted the AFIRM Packaging RSL and suppliers should ensure that packaging for all Pentland Brands' products are compliant.

The AFIRM Packaging RSL is available at:
<https://www.afirm-group.com/packaging-restricted-substance-list/>

Table 1a: Pentland Brands modifications

CAS No.	Substance	Limits	Potential uses	Suitable test method	Pentland modification
		Raw material and finished product	Textile processing for apparel and footwear	Sample preparation and measurement	
Bisphenols					
80-05-7	Bisphenol-A (BPA)	Textiles & Leather: 10 ppm Items intended to come in contact with the mouth: 1 ppm Other Materials: 1000 ppm	BPA may be used in the production of epoxy resins, polycarbonate plastics, flame retardants, and PVC. BPS may be used as a substitute for BPA for some specific uses, including in thermal receipt paper. BPS and BPF can be found in polyamide dye-fixing agents and in sulfone- and phenol- based leather synthetic tanning agents. BPA and BPS can be found in recycled polymeric and paper materials due to polycarbonate plastic and thermal receipt paper made with bisphenols entering waste streams. BPA, BPS, and BPB are included on the REACH SVHC list. Additional restrictions on the entire class of bisphenols are expected, with a revised restriction proposal forthcoming in the European Union. Important: Compliance with bisphenol (and other) limits in the AFIRM RSL does not prevent public or private enforcers from asserting that products violate California Proposition 65 warning obligations. AFIRM recommends testing relevant materials for bisphenols according to the Testing Matrix and working with suppliers to minimize residual concentrations or replace them with better alternatives where possible.	Leather: EN ISO 11936:2023 All other materials: Extraction: 1g sample/20 ml THF, sonication for 60 minutes at 60° C, then add methanol or acetonitrile for precipitation prior to analysis with LC/MS Note for textiles: For precipitation, draw the extract to another container and add methanol or acetonitrile. This keeps the extraction process consistent.	≤ 1 ppm or as relevant for California Prop 65 court settlement (check latest with third party lab)
80-09-1	Bisphenol-S (BPS)				100 ppm
77-40-7	Bisphenol-B (BPB)				
620-92-8	Bisphenol-F (BPF)	Textiles: 200 ppm each Leather: 800 ppm each Limits will likely be reduced further in future revisions of the AFIRM RSL based on the best available technology and feasibility within the supply chain. Other materials: 1000 ppm each			

Table 1b: Pentland Brands requirements additional to the AFIRM RSL

Anti-microbials

The use of anti-microbial finishes or components containing anti-microbials is not permitted unless agreed in writing. See Other guidelines and policies section for more details.

Substances of Very High Concern (SVHC)

**The use of any chemicals listed as an SVHC under REACH legislation is not permitted unless agreed in writing. The list of SVHCs can be found here: <https://echa.europa.eu/candidate-list-table>
It must be understood that the list is subject to change and some SVHCs may become the subject of authorisation requirements or more stringent legislation.**



Table 2: Age ranges for interpreting RSL limits

Various countries define the terms “babies,” “children,” and “adults” differently. Based on legislation, the age ranges listed in the table below satisfy the most restrictive global requirements.

	Age Range
Babies	0 – 36 months
Children	36 month – 14 years
Adults	14 years and

Table 3: Agricultural pesticides detailed list

CAS No.	Pesticide name	CAS No.	Pesticide name
93-72-1	2-(2,4,5-trichlorophenoxy) propionic acid, its salts and compounds	51630-58-1	Fenvalerate
93-76-5	2,4,5-T	1336-36-3	
93-72-1	2,4,5-TP	53469-21-9	Halogenated biphenyls, including Polychlorinatedbiphenyl (PCB)
94-75-7	2,4-D	Various	
309-00-2	Aldrine	Various	Halogenated terphenols, including polychlorinated terphenyl (PCT)
86-50-0	Azinophosmethyl	Various	Halogenated naphthalenes, including polychlorinated naphthalenes (PCNs)
2642-71-9	Azinophosethyl	Various	Halogenated diarylalkanes
4824-78-6	Bromophos-ethyl	99688-47-8	Halogenated diphenyl methanes, including Monomethyl-dibromo-diphenyl
2425-06-1	Captafol	81161-70-8	methane, Monomethyl-dichloro-diphenyl methane, and Monomethyl-
63-25-2	Carbaryl	76253-60-6	tetrachloro-diphenyl methane
510-15-6	Chlorbenzilat	76-44-8	Heptachlor
57-74-9	Chlordane	1024-57-3	Heptachloroepoxide
6164-98-3	Chlordimeform	319-84-6	a-Hexachlorocyclohexane with and without Lindane
470-90-6	Chlorfenvinphos	319-85-7	b-Hexachlorocyclohexane with and without Lindane
1897-45-6	Chlorthalonil	319-86-8	g-Hexachlorocyclohexane with and without Lindane
56-72-4	Coumaphos	118-74-1	Hexachlorobenzene
68359-37-5	Cyfluthrin	465-73-6	Isodrine
91465-08-6	Cyhalothrin	4234-79-1	Kelevane
52315-07-8	Cypermethrin	143-50-0	Kepone
78-48-8	S,S,S-Tributyl phosphorotrithioate (Tribufos)	7784-40-9	Lead hydrogen arsenate
52918-63-5	Deltamethrin	58-89-9	Lindane
53-19-0	DDD	121-75-5	Malathione
72-54-8		94-74-6	MCPA
3424-82-6	DDE	94-81-5	MCPB
72-55-9		93-65-2	Mecoprop
50-29-3	DDT	10265-92-6	Metamidophos
789-02-6		72-43-5	Methoxychlor
333-41-5	Diazinone	2385-85-5	Mirex
1085-98-9	Dichlofluanide	6923-22-4	Monocrotophos
120-36-5	Dichloroprop	298-00-0	Parathion-methyl
115-32-2	Dicofol	1825-21-4	Pentachloroanisole
141-66-2	Dicrotophos	7786-34-7	Phosdrin/Mevinphos
60-57-1	Dieldrine	72-56-0	Perthane
60-51-5	Dimethoate	31218-83-4	Propethamphos
88-85-7	Dinoseb, its salts and acetate	41198-08-7	Profenophos
57648-21-2	DTTB (Timiperone)	13593-03-8	Quinalphos
115-29-7	Endosulfan	82-68-8	Quintozene
959-98-8	Endosulfan I (alpha)	8001-50-1	Strobane
33213-65-9	Endosulfan II (beta)	297-78-9	Telodrine
72-20-8	Endrine	8001-35-2	Toxaphene
66230-04-4	Esfenvalerate	731-27-1	Tolyfluanide
106-93-4	Ethylendibromid	1582-09-8	Trifluraline
56-38-2	Ethylparathione		

SUPPLIER'S RESPONSIBILITY

It is the supplier's responsibility to comply with this RSL and all relevant legislation, thereby avoiding the use of harmful or illegal chemicals in the making of Pentland Brands' products. The requirement to comply with this RSL and all relevant legislation is included in, or additional to, all legal partnership agreements relating to the manufacture of Pentland Brands' product lines. Suppliers must take ownership of associated testing and chemical traceability to provide Pentland with compliant materials and product.

Additional requirements

Individual Pentland Brands may have additional requirements relating to certification requirements or substances used in manufacturing their products. Brands will communicate these requirements directly to the supplier and/or licensee partners.



1.

Pentland Brands recommend suppliers to conduct risk-based testing per the testing matrix outlined by AFIRM (on the following slide) to have confidence in the compliance of materials and finished goods.

2.

Pentland Brands expect suppliers to be able to provide evidence that materials, components or finished products supplied comply with the RSL. Responsibility for testing and associated costs lies with the supplier.

Suppliers must therefore declare and have further discussion with Pentland Brands if any material is unable to meet Pentland RSL.

Pentland Brands will also carry out ad-hoc due diligence testing on materials, components or finished product as they see fit. This additional testing will be coordinated and paid for by Pentland.

3.

Pentland Brands will assess any failure against the RSL standards individually and take appropriate action.

In the event of a test failure, suppliers will be required to conduct failure analysis and, where appropriate, provide an action plan to resolve the issue for current and/or future production.

Suppliers may be required to remediate products, remake products or replace affected components at their own cost.

TESTING MATRIX

In the apparel and footwear supply chain, certain types of fibres and materials are more likely to contain restricted substances than others. AFIRM recommend the following approach to testing, giving guidance to suppliers about the likelihood of presence of substances in a certain material. This matrix was developed by AFIRM using knowledge of industry standard RSL testing approaches and their broader understanding of supply chain operations across their brand members.

Chemicals assigned a Level 1 in materials should be viewed as the minimum amount of testing required to satisfy AFIRM member requirements, and chemicals assigned a Level 2 are recommended for additional testing and may be required at brand discretion.



RATING	DESCRIPTION
1	Red indicates higher risk, and that testing is <u>required</u> .
2	Orange indicates a lower risk, and that testing is recommended.
	Blank indicates no risk, that the substance is not anticipated to be present in the material. No testing required.

Testing matrix

Substance	Natural Fibers	Synthetic Fibers	Natural & Synthetic Blends	Synthetic Coated Fabrics	Natural Leather & Fur Skin	Natural Materials	Metals	Other: Porcelain, Ceramic, Glass, Crystal, Etc.	Feathers & Down	Polymers								Coatings & Prints	Glue
										EVA	PU Foams	All other PU & TPU	Rubber Excludes Latex and Silicon Rubbers	Polycarbonate	ABS	PVC	All Other Foams, Plastics & Polymers		
Acetophenone & 2-Phenyl-2-Propanol										2									
Acidic & Alkaline Substances (pH)	1	1	1	1	1														
Alkylphenol (AP) & Alkylphenol Ethoxylates (APEOs), including all isomers	1	1	1	1	1	1			1	1	1	1	1	1	1	1	1	1	1
Azo-amines & Arylamine salts	1A	1A	1A	1A	1A	1A			1A									1	
Bisphenols		1	1	1	1					2	2	2	2	1	2	2	2		
Brominated & Organophosphorus Substances										2B									
Chlorinated Paraffins				2J	1					2	2	1	1	2	2	1	2		
Chlorophenols	2	2	2		2														
Chlorinated Benzenes & Toluenes		2	2	2															
Cyclosiloxanes	2	2	2														2C	2	
Dimethylfumarate (DMFu)					2														
Dyes, Forbidden & Disperse		1A	1A	1A														2	
Dyes, Navy Blue		2	2																
Fluorinated Greenhouse Gases																			
Formaldehyde	1	1	1	2	1	1D						2						1	1

A Level 1 for dyed/colored materials (non-white) only.
B Level 2 only if Flame Retardant use or contamination is suspected or if TPP use suspected in PU,TPU, or other polymeric materials.
C Level 2 for silicone polymers only.

D Level 1 for Wood, Paper, and Straw materials only.
E Level 2 for Wool materials only.
F Level 2 if extractable Chrome above 1 ppm only.
G Copper is exempt from restriction limits in Metal parts.
H Level 2 for plant-based fibers only; N/A for animal-based fibers.

J Level 1 for Cadmium and Lead only; Crystal is exempt for Lead.
K Level 1 for PVC materials only. Otherwise, Level 2.
L Level 2 for Styrene/Butadiene Rubbers (SBRs) only.

M Level 1 if PFAS use or contamination is suspected
N Level 1 if Rubber or black Polymeric materials, otherwise Level 2.
P Level 1 for PU and PVC- based materials only.
Q Level 1 for glues fixed in final product

Testing matrix

Substance	Natural Fibers	Synthetic Fibers	Natural & Synthetic Blends	Synthetic Coated Fabrics	Natural Leather & Fur Skin	Natural Materials	Metals	Other: Porcelain, Ceramic, Glass, Crystal, Etc.	Feathers & Down	Polymers							Coatings & Prints	Glue	
										EVA	PU Foams	All other PU & TPU	Rubber Excludes Latex and Silicon Rubbers	Polycarbonate	ABS	PVC			All Other Foams, Plastics & Polymers
Heavy Metals, Chromium VI	2E	2F			1														
Heavy Metals, Extractable	1	1	1	2	1		2G			2	2	2	2	2	2	2	2		
Heavy Metals, Nickel Release							1												
Heavy Metals, Total	2H		2H	1	2		1	1J		1	1	1	1	1	1	1	1	2	
Monomers: Styrene & Vinyl Chloride				1J								2L		2	1		1K		
N-Nitrosamines											2	2	2						
Organotin Compounds		2	2	1	2						1	1	1		1	1	1	1	
Ortho-phenylphenol (OPP)	2	2	2	2	2												2		
Ozone-depleting Substances																			
Per- & Polyfluoroalkyl Substances (PFAS)	1M																		
Pesticides, Agricultural																			
Phthalates				1						1	1	1	1	2	2	1	1	1	1
Polycyclic Aromatic Hydrocarbons (PAHs)				2						1N	1N	1N	1			1N	1N	1N	1N
Quinoline		2	2																
Solvents / Residuals, DMFa				1							1	1						1P	1P
Solvents / Residuals, DMAC and NMP				1							2	2				2	2	2	
Solvents / Residuals, Formamide										2								2	
UV Absorbers / Stabilizers										2	2	2	2	2	2	2	2		
Volatile Organic Compounds (VOCs)				2						2	2	2	2	2	2	2	2	2	1Q

A Level 1 for dyed/colored materials (non-white) only.
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C Level 2 for silicone polymers only.

D Level 1 for Wood, Paper, and Straw materials only.
E Level 2 for Wool materials only.
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N Level 1 if Rubber or black Polymeric materials, otherwise Level 2.
P Level 1 for PU and PVC- based materials only.
Q Level 1 for glues fixed in final product



MANUFACTURING CHEMISTRY GUIDANCE

To ensure compliance with the RSL and minimise the chemical risks to workers and the environment in manufacturing, it is strongly recommended suppliers make use of the systems outlined on the next page, to screen for compliant formulations.

AFIRM chemical information sheets

AFIRM member brands have produced a comprehensive set of educational materials advising suppliers about best practices for chemical management. Each chemical information sheet covers a chemical or class of chemicals, giving an overview of the substance(s), where they are likely to be found in the material process and how to maintain compliance with the AFIRM RSL. The complete library of chemical information sheets is available on the AFIRM website at <http://afirm-group.com/information-sheets>

For more information on the AFIRM Group visit www.afirm-group.com

ADDITIONAL EXTERNAL RESOURCES TO PROVIDE SUPPLIERS WITH GUIDANCE ON BEST PRACTICE CHEMICAL COMPLIANCE

bluesign®

The bluesign® bluefinder is an online database of bluesign® approved chemicals which can be used to screen for suitable chemistry. Suppliers which are not already a member of the bluesign® system should contact cr@pentland.com for details on how to access bluesign® bluefinder.

For more information visit www.bluesign.com



ZDHC manufacturing Restricted Substances List (MRSL)

Zero Discharge of Hazardous Chemicals (ZDHC) is promoting a harmonised approach to managing chemicals during the processing of raw materials within the apparel and footwear supply chain through their MRSL. Pentland Brands encourages its supply chain to contact their chemical suppliers and communicate the ZDHC MRSL standard to them. Chemical suppliers should be able to confirm which of their products meet this standard.

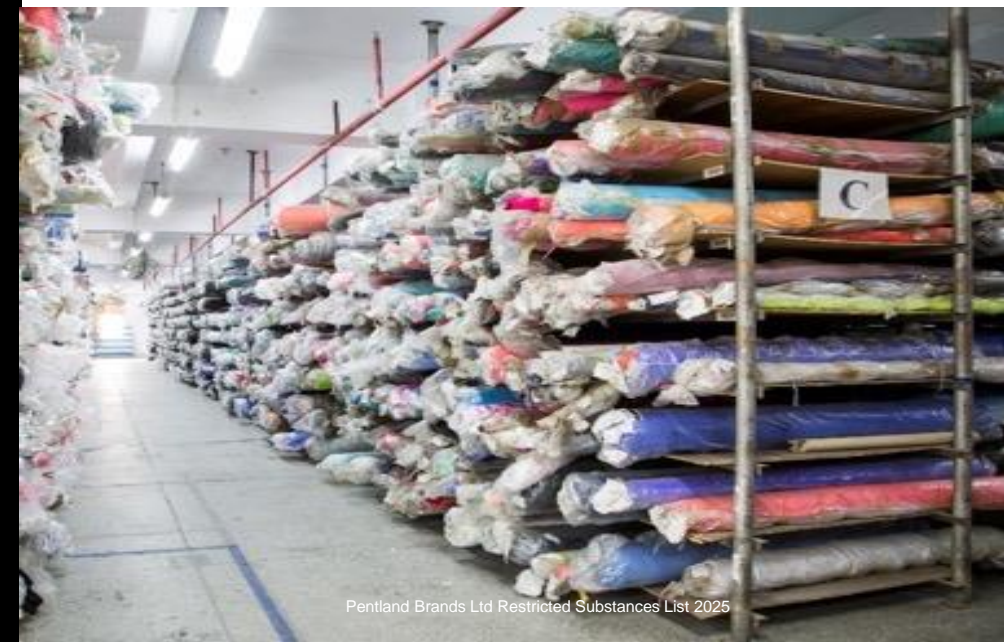
A copy of the most current ZDHC MRSL can be downloaded from the ZDHC website www.roadmaptozero.com



OEKO-TEX®

The OEKO-TEX® Eco-Passport system certifies chemical formulations for compliance against the OEKO-TEX® RSL and MSRL. This certification can be used to screen chemical formulations.

For more information visit www.oeko-tex.com



OTHER GUIDELINES AND POLICIES

Anti-microbial guidelines

Pentland Brands currently restricts the use of anti-microbial technologies; approval for the use must be sought in writing from the Product Compliance team. It applies where a chemical is added to the fabric (as a finish or within the fibre itself) to impart anti-bacterial, anti-microbial or anti-odour properties. It does not apply to fibres which have an inherent anti-odour property such as wool.

The most likely scenarios whereby these chemicals could enter Pentland Brands products are:

- 1) Specified as a performance requirement e.g. anti-odour finishes
- 2) Used to inhibit growth of mould during storage/transportation

The conditions described below must be met prior to the approval of such chemicals for use within Pentland Brands product:

- **Full disclosure of chemistry used**
- **Be proven effective for our product types**
- **No leaching or release of chemicals in order to be effective**
- **Be registered under the EU Biocidal Products Regulation**
- **Meet global legislative standards**
- **Comply with the Pentland Brands Restricted Substances List**
- **Be listed in the bluesign®, bluefinder, or Oeko-tex® list of approved products with biological activity**

Please contact product.compliance@pentland.com for further guidance on the approval process.

Animal based products

There are additional requirements for the use of animal-based products. These are outlined in the Pentland Brands' Ethical materials policy and can be downloaded from [Pentland Brands / Standards, policies and resources](#)

THANK YOU

For further information about Product Compliance at Pentland Brands, contact product.compliance@pentland.com or visit www.pentlandbrands.com

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