

# bluesign® Restricted Substances List (RSL)

## Consumer safety limits

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## 1 Introduction

Product stewardship with respect to consumer safety aspects is difficult to manage in a complex supply chain. Supplier compliance declarations which attest conformity with the brand Restricted Substance List (brand RSL) can be a good way to start. They should be further accompanied by a responsible testing program that monitors reliability of suppliers' declarations.

The BSSL (bluesign® system substances list) specifies consumer safety limits for chemical substances in articles. Due to the quantity and range of listed substances only a comprehensive input stream management together with a network of committed bluesign® SYSTEM PARTNERS (including chemical suppliers) result in a positive list of preferred chemicals (bluesign® FINDER) and can assure best compliance with the BSSL limits.

The RSL at hand is an extract of the BSSL and contains consumer safety limits and recommended testing methods for the most important and legally restricted substances in textile, leather articles and accessories. Brands and retailers can use this RSL as an orientation for the terms and conditions of purchase. Together with a testing matrix the document can also be utilized as a guide for appropriate testing of articles such as textiles. The RSL is revised at least annually in alignment with the BSSL.

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## 2 Definitions and Abbreviations

### 2.1 Accessory

A component of a consumer product which is not classified as textile fabric (e.g. button, label, zipper, etc.).

### 2.2 Article

An object which during production is given a special shape, surface or design, which determines its function to a greater degree than does its chemical composition (fibers, textile fabrics, buttons, zippers, etc.).

### 2.3 BSSL

bluesign® system substances list. A list that specifies consumer safety limits for chemical substances in articles. It also defines usage bans for chemical substances prohibited from the manufacturing of articles.

### 2.4 CAS Number

CAS numbers are unique numerical identifiers for chemical elements, compounds, polymers, biological sequences, mixtures or alloys. Chemical Abstracts Service (CAS), a division of the American Chemical Society, assigns these identifiers to every chemical that has been described in the literature. The intention is to make database searches more convenient, as chemicals often have many names. Almost all molecule databases today allow searching by CAS numbers.

### 2.5 Chemical Substance

A chemical element and its compounds with constant composition and properties. It is defined by the CAS number.

### 2.6 Component

A part of an article that can be distinguished according to the material composition, the functionality and / or the color and is easily, mechanically separated from the other components.

### 2.7 Limit Value

Limit values are defined for single substances or substance groups. The limit value is the maximum amount of a chemical substance or substance group permitted in articles for the usage ranges A, B and C.

#### 2.7.1 Detection Limit (DL)

The lowest quantity of a substance that can be distinguished from the absence of that substance with a stated confidence level.



### **2.7.2 Quantification Limit (QL)**

The lowest analyte concentration that can be quantitatively detected with a stated accuracy and precision.

### **2.7.3 Limitation**

For several substances or substance groups a limitation is defined. For these substances or substance group a usage ban is not given but only a consumer safety limit.

### **2.8 Member**

This term describes a member of a group of restricted substances. It can be a chemical substance, or a subgroup of substances. See also section 2.13.

### **2.9 Mixture**

A chemical product composed of two or more substances. It can be, for example, a colorant or an auxiliary.

### **2.10 Monitoring**

In cases where a limit value is accompanied with the limit type 'monitoring' it should be the goal to be below the defined threshold. Exceeding the limit will not lead to a 'black' rating but to a 'grey' rating. The limit type 'monitoring' can be allocated for different reasons.

- For some chemical substances toxicological and / or ecological properties are not yet well defined. Therefore, the risk assessment is not complete.
- For some substances sufficient information on possible / typical contamination of articles and chemical products is not available now. Those substances are under observation. Exact restrictions will be defined as soon as more information exists.



## 2.11 Sector of Use

The Sector of Use is part of an innovative concept for the assessment of chemical products. bluesign uses an approach similar to the REACH system for risk-based evaluation of chemical substances and transfers it to the evaluation of chemical products. This allows a product, process and industry specific assessment of risks to human and the environment that can be adapted to all kind of industries. Some Sectors of Use are combined to groups. The applied Sectors of Use are

| Sector of Use Group | Sector of Use   |
|---------------------|---|
| Textile             | Fibers / yarns  |
|                     | Textile articles including fabrics, laminates and non-woven fabrics |
|                     | Garments and other finished textile articles                        |
| Down/feather        | Down and feather articles   |
| Leather             | Leather articles  |
| Polymer parts       | Plastic articles  |
|                     | Rubber articles   |
| Metal parts         | Basic metals, including alloys                                      |
|                     | Fabricated metal articles   |

## 2.12 Several

When a substance group is not defined by a single CAS number, the field CAS Number contain the entry "Several". Several does not in every case mean that the whole substance group is restricted (e.g. aldehydes, amines), in case of a restriction on the whole substance group, this is reflected by an entry for the limit or a corresponding comment. For substance groups, especially for big ones, some or all members are listed in Annex I. When group members are listed in Annex I, this is indicated in the comment for the group.

## 2.13 Substance Groups

For better readability and to show the hierarchy of substance groups the RSL lists:

- Main substance groups (**bold, normal letter**)
- Substance groups (**bold, italic letter**)
- Substance subgroups (*italic letter*)
- Single substance (normal letter)



## 2.14 Usage Ban

For several chemical substances or substance groups a usage ban is defined. For these substances or substance groups intentional use in manufacturing of articles is prohibited. This means that chemical products (e.g. colorants or textile auxiliaries) used for manufacturing of articles must not intentionally contain these substances or substance groups.

The aim of a usage ban is to avoid release of harmful substances to workers, the environment and to avoid occurrence in the manufactured article by applying the precautionary principle.

## 2.15 Usage Range

Usage ranges classify consumer goods according to their consumer safety relevance. Three usage ranges (A, B, C) are defined with A being the most stringent category concerning limit values / bans:

- Usage Range A: Next to skin use and baby articles (0 to 3 years)
- Usage Range B: Occasional skin contact
- Usage Range C: No skin contact

Common consumer goods and allocated usage ranges are listed in the separate document 'Usage Ranges'.



### 3 Testing Methods

The testing methods listed in the table in chapter 5 are the recommended ones. The testing method column consists of two entries: sample preparation, e.g. extraction, digestion, derivatization, and the test method, e.g. GC-MS, LC-MS, etc.

Depending on their availability international or national standards are also given for several substances and these methods should be applied. Other accredited methods can only be applied if it can be verified that equivalent results are obtained.

If not stated otherwise all test methods shall define the total content of the substance in the article. High recovery rate and low uncertainty shall be achieved. Robustness of method shall be given. Details of the respective sample preparation methods can be found in the following table.

| Sample preparation                          | Solvent(s)                    | Temperature (°C) | Time (min) | Other requirements                                  |
|---|-------------------------------|------------------|------------|---|
| Extraction with KOH                         | Potassiumhydroxide (1M)       | 90               | 12-15h     | Derivatization with Aceticanhydride                 |
| Extraction with MeOH                        | Methanol                      | 70               | 60         | Ultrasonic bath                                     |
| Extraction with THF                         | Tetrahydrofuran               | 40               | 60         | ---   |
| Extraction with DCM                         | Dichloromethane               | 40               | 60         | Ultrasonic bath                                     |
| Extraction with MTBE                        | Methyl-tert-butyl-ether       | 60               | 60         | Ultrasonic bath                                     |
| Extraction with Water                       | Deionized Water               | ---              | ---        | ---   |
| Extraction with MeOH / Acetonitrile         | Methanol / Acetonitrile (1:1) | 70               | 30         | Ultrasonic bath                                     |
| Extraction with Potassiumcarbonate Solution | Potassiumcarbonate Solution   | room temp.       | 60         | Ultrasonic bath                                     |
| Extraction with THF / Acetone               | Tetrahydrofuran / Acetone     | 60               | 60         | Ultrasonic bath<br>Derivatization with Acetonitrile |
| Extraction with Acetone                     | Acetone                       | 70               | 60         | Ultrasonic bath                                     |
| Extraction with Hexane / Dichloroethane     | Hexane / Dichloroethane       | 70               | 60         | ---   |
| ASE - Accelerated Solvent Extraction        | Acetone / Hexane (1:1)        | 100              | ---        | ---   |
| ASE - Accelerated Solvent Extraction        | Ethylacetate                  | 40               | ---        | ---   |
| Soxhlet Extraction                          | Acetone / Hexane (1:1)        | ---              | 480        | ---   |
| Headspace                                   | ---                           | 120              | 45         | ---   |
| DIN EN ISO 105-E04 (2013)                   | Acidic Sweat Solution         | 37               | 60         | Textile to liquor ratio = 1:50                      |





## 4 Scope and Validity

The document specifies restrictions (limits and bans) for chemical substances in:

- Articles and accessories made for different sectors of use (like textile and leather); see chapter 2.11.

### 4.1 Scope

The limits and restrictions shall be applied for each individual component of an intermediate or finished article. A component is each part of an article that can be distinguished according to the material composition and/or functionality and/or color and is easily mechanically separated from other components.

### 4.2 Validity

This document comes into effect on 1<sup>st</sup> of July 2024. It replaces the bluesign® Restricted Substances List (RSL), version 14.0 from 1<sup>st</sup> of July 2023.

This document is revised annually in line with latest legislation and research. It is supported by stakeholder comments of bluesign® SYSTEM PARTNER experts.

For all bluesign® SYSTEM PARTNERS: Unless otherwise stated, the revised sections will be implemented by 1<sup>st</sup> July 2025 at the latest

## 5 Consumer Safety Limits

This section informs on all consumer safety limits.

In addition to the restrictions and bans for chemical substances mentioned in Section 5.8, the restrictions defined in Sections 5.1 to 5.7 apply.

### 5.1 pH-Value

Test method: ISO 3071 (2020) (non-leather products), ISO 4045 (2018) (leather products).

Range: 4.0 to 7.5 (non-leather products), 3.2 to 4.5 (chrome-tanned leather products), 3.5 to 7.9 (other leather products).

### 5.2 Odor

No unpleasant odor shall be emitted from the products. Test method: SNV 195 651.

### 5.3 Sensitizing Disperse Dyes

Disperse dyes (mainly used in PES dyeing) which are sensitizing and classified with the risk phrase H317 are not allowed for the usage range A.



#### 5.4 Textiles Dyed with Disperse or Metal Complex Dyes

Disperse dyes and metal complex dyes may have a relevant consumer safety risk.

Therefore, special restrictions concerning color fastness to perspiration are defined: for textiles dyed with disperse or metal complex dyes, fastness to perspiration must be at least between 3 and 4. The goal should be  $\geq 4$ . Test method: ISO 105-E04 (2013).

#### 5.5 Color Fastness to Saliva and Perspiration

Testing of color fastness to saliva and perspiration can be relevant for articles with potential risk for mouthing and / or exposure to babies. Colors must be fast to saliva and perspiration. This corresponds to level 5 of the currently valid standard DIN 53160-1 (2010) (test with artificial saliva) and DIN 53160-2 (2010) (test with artificial sweat). The 5-step grey scale and its use for determining changes in color of textiles in color fastness tests are described in ISO 105-A02 (1993). Test methods: § 64 LFGB BVL B 82.10-1 in combination with DIN 53160-1 and -2.

#### 5.6 Articles from recycled material

Textile recycling is an important factor for sustainability, but often a black box regarding the mix of (restricted) chemicals inside.

Instructions regarding the use of recycled materials are given in our guidance documents, the 'Guidance sheet Input stream management of non-chemical raw materials/intermediates at manufacturers' and the 'Guideline Input Stream Management at Manufacturers'.

To enable bluesign® APPROVED articles from recycled materials, bluesign reserves the right to accept in exceptional cases higher limits than given in this document under the precondition of legal compliance, consumer safety and proper input stream management.

#### 5.7 PFAS phase-out

Following the bluesign PFAS phase out program there are specific restrictions and bans for PFAS based chemicals and articles:

- From July 2022 bluesign® FINDER registration of new PFAS containing chemicals was no longer possible.
- By July 2023 all bluesign® APPROVED PFAS containing chemicals were removed from the bluesign® FINDER.
- From July 2023 bluesign® GUIDE registration of new articles that were treated with PFAS containing chemicals was no longer possible
- Certain dyestuff with a CF<sub>3</sub> group that formally fall under the PFAS definition and that were still listed in the bluesign® FINDER is subject to fast-track phase out. By 1<sup>st</sup> of July 2024 affected chemical products are removed from the bluesign® FINDER
- By January 2025 all bluesign® APPROVED articles that were treated with PFAS containing chemicals will be removed from the bluesign® GUIDE
- Exceptions might be possible, for more details see last version of the 'Guidance Sheet PFAS phase out'.



- Residual amounts of CF<sub>3</sub>-group containing dyestuff formulations which article manufacturers may still have in stock by 1<sup>st</sup> of July 2024 may be used up for producing bluesign® APPROVED articles. Latest by 1<sup>st</sup> of January 2026 articles and products that contain dyestuff with CF<sub>3</sub> groups shall not be put on the market labelled as bluesign® APPROVED or bluesign® PRODUCT.

Analytical proof that PFAS chemicals are not included:

At first screening test for total Fluorine via combustion ion chromatography (EN14582 or ASTM 07359; Quantification Limit: 50 mg/kg). Screening test is followed by confirmatory testing on single substances in case of findings. Beside individual substance testing information from the supply chain on possible fluorine compounds shall be gathered.

bluesign follows the PFAS definition indicated in the general EU restriction proposal on PFAS which is based on the OECD definition:

Any substance that contains at least one fully fluorinated methyl (CF<sub>3</sub>-) or methylene (-CF<sub>2</sub>-) carbon atom (without any H/Cl/Br/I attached to it).

A substance that only contains the following structural elements is excluded from the scope of the restriction:

CF<sub>3</sub>-X or X-CF<sub>2</sub>-X', where X = -OR or -NRR' and X' = methyl (-CH<sub>3</sub>), methylene (-CH<sub>2</sub>-), an aromatic group, a carbonyl group (-C(O)-), -OR'', -SR'' or -NR''R'''';

and where R/R'/R''/R'''' is a hydrogen (-H), methyl (-CH<sub>3</sub>), methylene (-CH<sub>2</sub>-), an aromatic group or a carbonyl group (-C(O)-).

This definition might also affect substances that do not fall into the typical application of water/oil/stain repellents.

## 5.8. Restrictions and Bans for Chemical Substances

For easier comprehension and overview, the substances are grouped according to:

- Chemical composition (e.g. amines, isocyanates)
- Functionality (e.g. flame retardants, solvents)
- EHS-properties / risks (e.g. ozone depleting substances)

Some of the substances may be relevant for more than one group; in such cases the substance is listed in the most relevant group. Annex I lists individual substances that belong to substance groups.

Sometimes reference is made to details listed in the BSSL.



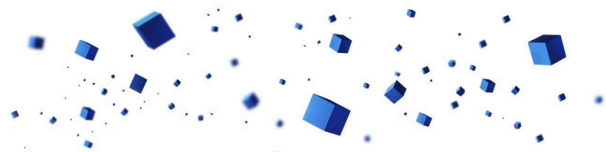
## 6 Restricted substance

### 6.1 Restricted substances

| Chemical Name    | CAS Number | Sector Of Use  | Limit type | A  | B  | C   | Unit  | Test Method  | Comment  |
|------------------|------------|--|------------|----|----|-----|-------|--|--|
| <b>Aldehydes</b> |            |  |            |    |    |     |       |  |  |
| Formaldehyde     | 50-00-0    | Textiles<br>Down/feather<br>Polymer parts<br>Metal parts | Limitation | 15 | 75 | 300 | mg/kg | ISO 14184-1 (2011)   |  |
|                  |            | Leather  | Limitation | 15 | 75 | 300 | mg/kg | EN ISO 17226 (2019) with EN ISO 17226-1 (2021) confirmation method in case of interferences. | Test method: Alternatively EN ISO 17226-1 (2021) can be used on its own. |



| Chemical Name                         | CAS Number | Sector Of Use  | Limit type   | A         | B   | C   | Unit  | Test Method   | Comment  |
|---------------------------------------|------------|--|--|-----------|-----|-----|-------|---|--|
| <b>Alkylphenoethoxylates (APEOs)</b>  |            |  |  |           |     |     |       |   |  |
| <b>Alkylphenoethoxylates (APEOs)</b>  | Several    | All  | Usage ban  |           | 100 |     | mg/kg |   | For sum of all restricted APEO. Goal should be 100 mg/kg for APEOs + APs.<br>Test methods: See NPEO/OPEO.<br>For recycled materials a higher limit up to 500 mg/kg is accepted by Bluesign when it complies with the requirements under REACH. |
| <b>Nonylphenol ethoxylates (NPEO)</b> | Several    | Textiles<br>Down/feather<br>Polymer parts<br>Metal parts | Usage ban  |           | 100 |     | mg/kg | EN ISO 18254-1:2016 with determination of APEO using LC/MS or LC/MS/MS                              | For sum of all allocated Members/Substances.<br>Single Members/Substances listed in the BSSL Annex.<br>(If traces above 10 ppm are detected the source of contamination has to be identified and phased out.)                                  |
|                                       | Several    | Leather  | Usage ban  |           | 100 |     | mg/kg | Sample prep. and analysis using EN ISO 18218-1:2015 with quantification acc. to EN ISO 18254-1:2016 |  |
| <b>Octylphenol ethoxylates (OPEO)</b> | Several    |  | Textiles<br>Down/feather<br>Polymer parts<br>Metal parts | Usage ban |     | 100 |       | mg/kg   |  |



| Chemical Name                          | CAS Number | Sector Of Use                                | Limit type | A | B  | C | Unit  | Test Method  | Comment  |
|--|------------|--|------------|---|----|---|-------|--|--|
| <b>Alkylphenols (APs)</b>              |            |  |            |   |    |   |       |  |  |
| <b>Alkylphenols (APs)</b>              | Several    | All  | Usage ban  |   | 10 |   | mg/kg |  | For sum of all alkylphenols.   |
| <b>Octylphenol (OP), mixed isomers</b> | Several    | Textiles<br>Leather                          | Usage ban  |   | 10 |   | mg/kg | EN ISO 21084 (2019)  | For sum of all allocated Members/Substances.<br>Single Members/Substances listed in the BSSL<br>Annex. |
|  | Several    | Down/feather<br>Polymer parts<br>Metal parts | Usage ban  |   | 10 |   | mg/kg | EN ISO 21084 (2019), modified // 1 g sample / 20 ml THF with Sonication for 60 min at 70°C |  |
| <b>Nonylphenol (NP), mixed isomers</b> | Several    | Textiles<br>Leather                          | Usage ban  |   | 10 |   | mg/kg | EN ISO 21084 (2019)  |  |
|  | Several    | Down/feather<br>Polymer parts<br>Metal parts | Usage ban  |   | 10 |   | mg/kg | EN ISO 21084 (2019), modified // 1 g sample / 20 ml THF with Sonication for 60 min at 70°C |  |

| Chemical Name                            | CAS Number | Sector Of Use             | Limit type | A | B  | C | Unit  | Test Method           | Comment   |
|--|------------|---------------------------|------------|---|----|---|-------|-----------------------|---|
| <b>Amines</b>                            |            |                           |            |   |    |   |       |                       |   |
| <b>Anilines, its salts and compounds</b> | Several    |                           |            |   |    |   |       |                       |   |
| Aniline - free content                   | 62-53-3    | Leather                   | Usage ban  |   | 30 |   | mg/kg | EN ISO 17234-1 (2020) | In case aniline is detected, the test needs to be repeated without addition of sodium dithionite. |
|  |            | Textiles<br>Polymer parts | Usage ban  |   | 30 |   | mg/kg | EN ISO 14362-1 (2017) |   |



| Chemical Name     | CAS Number | Sector Of Use  | Limit type | A | B | C | Unit | Test Method   | Comment  |
|-------------------|------------|--|------------|---|---|---|------|---|--|
| <b>Arylamines</b> |            |  |            |   |   |   |      |   |  |
| <b>Arylamines</b> | Several    | Leather  | Usage ban  |   |   |   |      | EN ISO 17234-1 (2020)<br>EN ISO 17234-2 (2011) // for azo colorants which may release 4-Aminoazobenzene | Usage ban 20 mg/kg for every allocated arylamine and its corresponding salts<br><br>(as substance for example in PU or by reductive cleavage of azo colorants) |
|                   | Several    | Textiles<br>Down/feather<br>Polymer parts<br>Metal parts | Usage ban  |   |   |   |      | EN ISO 14362-1 (2017)<br>EN ISO 14362-3 (2017) // for azo colorants which may release 4-Aminoazobenzene |  |

| Chemical Name                              | CAS Number | Sector Of Use | Limit type | A  | B   | C   | Unit  | Test Method                            | Comment   |
|--|------------|---------------|------------|----|-----|-----|-------|--|---|
| <b>Biocides</b>                            |            |               |            |    |     |     |       |  |   |
| Dimethylfumarate                           | 624-49-7   | All           | Usage ban  |    | 0.1 |     | mg/kg | ISO 16186 (2021)                       |   |
| Pyrithione zinc                            | 13463-41-7 |               | Usage ban  |    | 10  |     | mg/kg | DIN EN 16711-1 (2016) // Total content | Testing: Zn metal content, in case of positive result further testing with CE/ICP-MS. |
| <b><i>o</i>-Phenylphenol and its salts</b> | Several    | Leather       | Limitation | 50 | 100 | 200 | mg/kg | DIN 50009 (2021)                       |   |
|  | Several    | Textiles      | Limitation | 50 |     |     | mg/kg |  |   |

| Chemical Name                            | CAS Number | Sector Of Use | Limit type | A | B   | C | Unit  | Test Method     | Comment   |
|--|------------|---------------|------------|---|-----|---|-------|-----------------|---|
| <b>Chlorinated Benzenes and Toluenes</b> |            |               |            |   |     |   |       |                 |   |
| <b>Chlorinated Benzenes and Toluenes</b> | Several    | All           | Usage ban  |   | 5.0 |   | mg/kg | EN 17137 (2018) | For sum of all allocated chlorinated benzenes and toluenes.<br>Additional regulation for each allocated Member/Substance - Usage ban 1.0 mg/kg. |



| Chemical Name   | CAS Number | Sector Of Use | Limit type | A    | B   | C     | Unit                                       | Test Method                               | Comment                          |
|---|------------|---------------|------------|------|-----|-------|--|---|----------------------------------|
| <b>Chlorinated Phenols</b>                                |            |               |            |      |     |       |  |   |                                  |
| <i>Trichlorophenol, all isomers</i>                       | 25167-82-2 | All           | Usage ban  | 0.05 | 0.5 | 0.5   | mg/kg                                      |   | For sum of all allocated TriCPs. |
| <i>Tetrachlorophenol, its salts and compounds</i>         | 25167-83-3 |               | Usage ban  | 0.05 | 0.5 | 0.5   | mg/kg                                      |   | For sum of all allocated TeCPs.  |
| <i>Pentachlorophenol, its salts, esters and compounds</i> | Several    |               | Usage ban  | 0.05 | 0.5 | 0.5   | mg/kg                                      |   | For sum of all allocated PCPs.   |
| <b>Mono- and Dichlorophenols</b>                          | Several    |               | Usage ban  | 1.0  |     | mg/kg | DIN 50009 (2021)<br>EN ISO 17070 (Leather) | For sum of all allocated Mono- and DiCPs. |                                  |

| Chemical Name                                | CAS Number | Sector Of Use | Limit type | A | B | C | Unit | Test Method      | Comment   |
|--|------------|---------------|------------|---|---|---|------|------------------|---|
| <b>Colorants</b>                             |            |               |            |   |   |   |      |                  |   |
| <b>Colorants with carcinogenic potential</b> | Several    | All           | Usage ban  |   |   |   |      | DIN 54231 (2022) | Usage ban 20 mg/kg for every allocated Member/Substance |
| <b>Colorants with allergenic potential</b>   | Several    |               | Usage ban  |   |   |   |      |                  |   |
| <b>Colorants banned for other reasons</b>    | Several    |               | Usage ban  |   |   |   |      |                  |   |





| Chemical Name                                    | CAS Number | Sector Of Use | Limit type | A | B   | C | Unit  | Test Method | Comment   |
|--|------------|---------------|------------|---|-----|---|-------|-------------|---|
| <b>Dioxins and Furans</b>                        |            |               |            |   |     |   |       |             |   |
| <i>Dioxins and Furans - Group 3</i>              | Several    | All           | Usage ban  |   | 95  |   | µg/kg | EPA 8290A   | For sum of all allocated Members/Substances to Group 3 - official regulation for sum of all allocated Members/Substances to Group 1, 2 and 3 - 100 µg/kg.<br>Single substances listed in Annex. |
| <b><i>Dioxins and Furans - Group 1 and 2</i></b> | Several    |               | Usage ban  |   | 5.0 |   | µg/kg |             | For sum of all allocated Members/Substances to Group 1 and 2.<br>Single substances listed in Annex.   |
| <i>Dioxins and Furans - Group 1</i>              | Several    |               | Usage ban  |   | 1.0 |   | µg/kg |             | For sum of all allocated Members/Substances to Group 1.<br>Single substances listed in Annex.   |
| <b><i>Dioxins and Furans - Group 4 and 5</i></b> | Several    |               | Usage ban  |   | 5.0 |   | µg/kg |             | For sum of all allocated Members/Substances to Group 4 and 5.<br>Single substances listed in Annex.   |
| <i>Dioxins and Furans - Group 4</i>              | Several    |               | Usage ban  |   | 1.0 |   | µg/kg |             | For sum of all allocated Members/Substances to Group 4.<br>Single substances listed in Annex.   |

| Chemical Name          | CAS Number | Sector Of Use | Limit type | A | B | C | Unit | Test Method                                 | Comment   |
|------------------------|------------|---------------|------------|---|---|---|------|---|---|
| <b>Fibers</b>          |            |               |            |   |   |   |      |   |   |
| <b><i>Asbestos</i></b> | Several    | All           | Usage ban  |   |   |   |      | REM/EDX BGI 505-46<br>U.S. EPA/600/R-93/116 | For all allocated Substances/Members.<br>Usage ban // Not detected.<br>Single substances listed in Annex. |



| Chemical Name   | CAS Number | Sector Of Use | Limit type | A | B   | C | Unit  | Test Method           | Comment |
|---|------------|---------------|------------|---|-----|---|-------|-----------------------|---------|
| <b>Flame retardants</b>   |            |               |            |   |     |   |       |                       |         |
| Tetrabromobisphenol A - (TBBP A)                                  | 79-94-7    | All           | Usage ban  |   | 5.0 |   | mg/kg | EN ISO 17881-1 (2016) |         |
| Tetrabromobisphenol A bis(2,3-dibromopropylether)                 | 21850-44-2 |               | Usage ban  |   | 5.0 |   | mg/kg |                       |         |
| Tri(aziridin-1-yl) phosphine oxide - (TEPA)                       | 545-55-1   |               | Usage ban  |   | 5.0 |   | mg/kg |                       |         |
| Bis(2,3-dibromopropyl) phosphate - (BDBPP)                        | 5412-25-9  |               | Usage ban  |   | 5.0 |   | mg/kg | EN ISO 17881-2 (2016) |         |
| Trimethyl phosphate   | 512-56-1   |               | Usage ban  |   | 5.0 |   | mg/kg |                       |         |
| Tri-o-cresyl phosphate  | 78-30-8    |               | Usage ban  |   | 5.0 |   | mg/kg |                       |         |
| Tris(methylphenyl) phosphate                                      | 1330-78-5  |               | Usage ban  |   | 5.0 |   | mg/kg |                       |         |
| Tris(2-chloroethyl) phosphate - (TCEP)                            | 115-96-8   |               | Usage ban  |   | 5.0 |   | mg/kg |                       |         |
| Tris-(2-chloro-1-methylethyl) phosphate - (TCPP)                  | 13674-84-5 |               | Usage ban  |   | 5.0 |   | mg/kg | ISO 17881-2 (2016)    |         |
| Tris-[2-chloro-1-(chloromethyl)ethyl] phosphate - (TDCP or TDCPP) | 13674-87-8 |               | Usage ban  |   | 5.0 |   | mg/kg |                       |         |
| Tris(2,3-dibromopropyl) phosphate - (TRIS)                        | 126-72-7   |               | Usage ban  |   | 5.0 |   | mg/kg |                       |         |
| Trixylyl phosphate - (TXP)  | 25155-23-1 |               | Usage ban  |   | 5.0 |   | mg/kg |                       |         |
| <b>Brominated alkyl alcohols</b>                                  | Several    |               |            |   |     |   |       |                       |         |
| 2,2-Bis(bromomethyl)-1,3-propanediol - (BBMP)                     | 3296-90-0  | All           | Usage ban  |   | 5.0 |   | mg/kg | EN ISO 17881-1 (2016) |         |



| Chemical Name   | CAS Number              | Sector Of Use  | Limit type | A | B   | C | Unit  | Test Method           | Comment  |
|---|-------------------------|--|------------|---|-----|---|-------|-----------------------|--|
| <b>Flame retardants</b>   |                         |  |            |   |     |   |       |                       |  |
| 2,3-Dibromopropan-1-ol - (2,3-DBPA)   | 96-13-9                 |  | Usage ban  |   | 5.0 |   | mg/kg |                       |  |
| 1-Propanol, 2,2-dimethyl-, tribromo deriv.  | 36483-57-5<br>1522-92-5 |  | Usage ban  |   | 5.0 |   | mg/kg |                       |  |
| <b>Chlorinated paraffins, all chain lengths</b>   | Several                 | Textiles<br>Down/feather<br>Polymer parts<br>Metal parts | Usage ban  |   |     |   |       | ISO 22818 (2021)      | Usage ban 5.0 mg/kg for every allocated group.           |
|   | Several                 | Leather  | Usage ban  |   |     |   |       | ISO 18219 (2021)      | Usage ban 100 mg/kg for every allocated group.           |
| <b>Hexabromocyclododecan, all isomers - group for all major diastereoisomers identified</b> | Several                 | All  | Usage ban  |   | 5.0 |   | mg/kg | EN ISO 17881-1 (2016) |  |
| <b>Polybrominated diphenyl ethanes</b>  | Several                 |  |            |   |     |   |       |                       |  |
| Decabromodiphenylethane (DBDPE)   | 84852-53-9              | All  | Usage ban  |   | 5.0 |   | mg/kg | EN ISO 17881-1 (2016) |  |
| <b>Polybrominated diphenyl ethers</b>   | Several                 |  | Usage ban  |   |     |   |       |                       | Usage ban 5.0 mg/kg for every allocated Member/Substance |



| Chemical Name                  | CAS Number | Sector Of Use   | Limit type | A | B   | C | Unit  | Test Method  | Comment |
|--------------------------------|------------|---|------------|---|-----|---|-------|--|---------|
| <b>Glycols</b>                 |            |   |            |   |     |   |       |  |         |
| Bis(2-methoxyethyl) ether      | 111-96-6   | Textiles<br>Down/feather<br>Leather<br>Metal parts<br>Rubber articles | Usage ban  |   | 5.0 |   | mg/kg | GC-MS // Extraction with Methanol                            |         |
|                                |            | Plastic article   | Usage ban  |   | 5.0 |   | mg/kg | GC-MS // 2-Step extraction with Tetrahydrofuran and Methanol |         |
| 2-Ethoxyethanol                | 110-80-5   | Textiles<br>Down/feather<br>Leather<br>Metal parts<br>Rubber articles | Usage ban  |   | 5.0 |   | mg/kg | GC-MS // Extraction with Methanol                            |         |
|                                |            | Plastic article   | Usage ban  |   | 5.0 |   | mg/kg | GC-MS // 2-Step extraction with Tetrahydrofuran and Methanol |         |
| 2-Ethoxyethyl acetate          | 111-15-9   | Textiles<br>Down/feather<br>Leather<br>Metal parts<br>Rubber articles | Usage ban  |   | 5.0 |   | mg/kg | GC-MS // Extraction with Methanol                            |         |
|                                |            | Plastic article   | Usage ban  |   | 5.0 |   | mg/kg | GC-MS // 2-Step extraction with Tetrahydrofuran and Methanol |         |
| Ethylene glycol dimethyl ether | 110-71-4   | Textiles<br>Down/feather<br>Leather<br>Metal parts<br>Rubber articles | Usage ban  |   | 5.0 |   | mg/kg | GC-MS // Extraction with Methanol                            |         |
|                                |            | Plastic article   | Usage ban  |   | 5.0 |   | mg/kg | GC-MS // 2-Step extraction with Tetrahydrofuran and Methanol |         |



| Chemical Name           | CAS Number | Sector Of Use   | Limit type | A | B   | C | Unit  | Test Method  | Comment |
|-------------------------|------------|---|------------|---|-----|---|-------|--|---------|
| <b>Glycols</b>          |            |   |            |   |     |   |       |  |         |
| 2-Methoxyethanol        | 109-86-4   | Textiles<br>Down/feather<br>Leather<br>Metal parts<br>Rubber articles | Usage ban  |   | 5.0 |   | mg/kg | GC-MS // Extraction with Methanol                            |         |
|                         |            | Plastic article   | Usage ban  |   | 5.0 |   | mg/kg | GC-MS // 2-Step extraction with Tetrahydrofuran and Methanol |         |
| 2-Methoxyethyl acetate  | 110-49-6   | Textiles<br>Down/feather<br>Leather<br>Metal parts<br>Rubber articles | Usage ban  |   | 5.0 |   | mg/kg | GC-MS // Extraction with Methanol                            |         |
|                         |            | Plastic article   | Usage ban  |   | 5.0 |   | mg/kg | GC-MS // 2-Step extraction with Tetrahydrofuran and Methanol |         |
| 2-Methoxy-1-propanol    | 1589-47-5  | Textiles<br>Down/feather<br>Leather<br>Metal parts<br>Rubber articles | Usage ban  |   | 5.0 |   | mg/kg | GC-MS // Extraction with Methanol                            |         |
|                         |            | Plastic article   | Usage ban  |   | 5.0 |   | mg/kg | GC-MS // 2-Step extraction with Tetrahydrofuran and Methanol |         |
| 2-Methoxypropyl acetate | 70657-70-4 | Textiles<br>Down/feather<br>Leather<br>Metal parts<br>Rubber articles | Usage ban  |   | 5.0 |   | mg/kg | GC-MS // Extraction with Methanol                            |         |
|                         |            | Plastic article   | Usage ban  |   | 5.0 |   | mg/kg | GC-MS // 2-Step extraction with Tetrahydrofuran and Methanol |         |



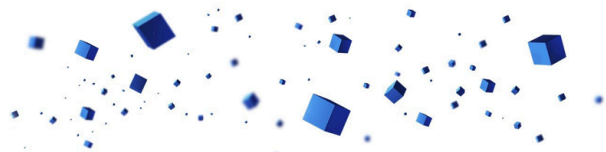
| Chemical Name                     | CAS Number | Sector Of Use   | Limit type | A | B   | C | Unit  | Test Method  | Comment |
|-----------------------------------|------------|---|------------|---|-----|---|-------|--|---------|
| <b>Glycols</b>                    |            |   |            |   |     |   |       |  |         |
| Triethylene glycol dimethyl ether | 112-49-2   | Textiles<br>Down/feather<br>Leather<br>Metal parts<br>Rubber articles | Usage ban  |   | 5.0 |   | mg/kg | GC-MS // Extraction with Methanol                            |         |
|                                   |            | Plastic article   | Usage ban  |   | 5.0 |   | mg/kg | GC-MS // 2-Step extraction with Tetrahydrofuran and Methanol |         |

| Chemical Name   | CAS Number        | Sector Of Use | Limit type | A | B   | C | Unit  | Test Method           | Comment  |
|---|-------------------|---------------|------------|---|-----|---|-------|-----------------------|--|
| <b>Halogenated Biphenyls, halogenated Terphenyls and halogenated Naphthalenes</b> |                   |               |            |   |     |   |       |                       |  |
| <b>Polybrominated Biphenyls</b>   | <b>59536-65-1</b> | All           | Usage ban  |   | 5.0 |   | mg/kg | EN ISO 17881-1 (2016) | For sum of all allocated Members/Substances.             |
| <b>Polychlorinated Biphenyls</b>  | <b>1336-36-3</b>  |               | Usage ban  |   | 1.0 |   | mg/kg | ISO/TR 17881-3 (2018) |  |
| <b>Polychlorinated Terphenyls</b>   | <b>61788-33-8</b> |               | Usage ban  |   | 1.0 |   | mg/kg |                       |  |
| <b>Polybrominated Terphenyls</b>  | Several           |               | Usage ban  |   | 1.0 |   | mg/kg | EN ISO 17881-1 (2016) |  |
| <b>Polychlorinated Naphthalenes</b>   | Several           |               | Usage ban  |   |     |   |       | ISO/TR 17881-3 (2018) | Usage ban 1.0 mg/kg for every allocated Member/Substance |
| <b>Polybrominated Naphthalenes</b>  | Several           |               | Usage ban  |   | 1.0 |   | mg/kg | EN ISO 17881-1 (2016) | For sum of all allocated Members/Substances.             |

| Chemical Name                    | CAS Number | Sector Of Use | Limit type | A | B | C | Unit | Test Method   | Comment   |
|----------------------------------|------------|---------------|------------|---|---|---|------|---|---|
| <b>Halogenated Diarylalkanes</b> |            |               |            |   |   |   |      |   |   |
| <b>Halogenated Diarylalkanes</b> | Several    | All           | Usage ban  |   |   |   |      | GC-MS // Extraction following DIN EN 62321-6 (2016) | Usage ban // 1.0 mg/kg for every allocated Member/Substance |



| Chemical Name      | CAS Number | Sector Of Use | Limit type | A | B   | C | Unit  | Test Method       | Comment  |
|--------------------|------------|---------------|------------|---|-----|---|-------|-------------------|--|
| <b>Isocyanates</b> |            |               |            |   |     |   |       |                   |  |
| <b>Isocyanates</b> | Several    | All           | Limitation |   | 1.0 |   | mg/kg | EN 13130-8 (2004) | Free content applies to sum of all allocated isocyanates |



| Chemical Name                            | CAS Number | Sector Of Use                                | Limit type | A   | B  | C  | Unit  | Test Method   | Comment  |
|--|------------|--|------------|-----|----|----|-------|---|--|
| <b>Metals</b>                            |            |  |            |     |    |    |       |   |  |
| <b>Antimony, its salts and compounds</b> | Several    |  |            |     |    |    |       |   |  |
| Antimony - as content                    | 7440-36-0  | Leather                                      | Limitation | 5   | 10 | 10 | mg/kg | EN ISO 17072-1 (2019) // Acidic sweat solution  | As extractable metal content // Usage as flame retardant: bluesign® CRITERIA for flame retardants have to be followed. |
|  |            | Fibers/yarns                                 | Limitation | 260 |    |    | mg/kg | DIN EN 16711-1 (2016) // Total content  | As total metal content // valid for polyester fibers (also dope dyed), but not for finished polyester textiles.        |
|  |            | Down/feather<br>Polymer parts<br>Metal parts | Limitation | 60  |    |    | mg/kg | EN 71-3 (2019) // Acidic solution migration simulating gastric juices<br>DIN EN ISO 17294-2 (2017)<br>DIN EN ISO 11885 (2009) | As extractable metal content // Usage as flame retardant: bluesign® CRITERIA for flame retardants have to be followed. |
|  |            | Textiles                                     | Limitation | 5   | 10 | 10 | mg/kg | DIN EN 16711-2 (2016) // Acidic sweat solution  |  |
| <b>Arsenic, its salts and compounds</b>  | Several    |  |            |     |    |    |       |   |  |
| Arsenic - as content                     | 7440-38-2  | Textiles                                     | Usage ban  | 10  |    |    | mg/kg | DIN EN 16711-1 (2016) // Total content  | As total metal content .<br>Single substances listed in the BSSL Annex.  |
|  |            | Down/feather                                 |            | 0.2 |    |    | mg/kg | DIN EN 16711-2 (2016) // Acidic sweat solution  | As extractable metal content.<br>Single substances listed in the BSSL Annex.   |
|  |            | Polymer parts                                | Usage ban  | 0.2 |    |    | mg/kg | EN ISO 17072-1 (2019) // Acidic sweat solution  | As extractable metal content .<br>Single substances listed in the BSSL Annex.  |
|  |            | Metal parts                                  |            | 10  |    |    | mg/kg | EN ISO 17072-2 (2019) // Total content  | As total metal content .<br>Single substances listed in the BSSL Annex.  |
| <b>Barium, its salts and compounds</b>   | Several    |  |            |     |    |    |       |   |  |





| Chemical Name  | CAS Number | Sector Of Use                             | Limit type | A | B    | C | Unit  | Test Method   | Comment   |
|--|------------|---|------------|---|------|---|-------|---|---|
| <b>Metals</b>  |            |   |            |   |      |   |       |   |   |
| Barium - as content  | 7440-39-3  | All                                       | Limitation |   | 1000 |   | mg/kg | EN 71-3 (2019) // Acidic solution migration simulating gastric juices<br>DIN EN ISO 17294-2 (2017)<br>DIN EN ISO 11885 (2009) | As extractable metal content.<br>Single substances listed in the BSSL Annex.  |
| <b>Cadmium, its salts and compounds</b>  | Several    |   |            |   |      |   |       |   |   |
| Cadmium - as content   | 7440-43-9  | Textiles<br>Down/feather<br>Polymer parts | Usage ban  |   | 0.1  |   | mg/kg | DIN EN 16711-2 (2016) // Acidic sweat solution  | As extractable metal content.<br>Single substances listed in the BSSL Annex.  |
|  |            | Leather                                   | Usage ban  |   | 40   |   | mg/kg | EN ISO 17072-2 (2019) // Total content  | As total metal content.<br>Single substances listed in the BSSL Annex.  |
|  |            | Textiles<br>Down/feather<br>Polymer parts | Usage ban  |   | 40   |   | mg/kg | DIN EN 16711-1 (2016) // Total content  |   |
|  |            | Metal parts                               | Usage ban  |   | 40   |   | mg/kg |   |   |
|  |            | Leather                                   | Usage ban  |   | 0.1  |   | mg/kg | EN ISO 17072-1 (2019) // Acidic sweat solution  | As extractable metal content.<br>Single substances listed in the BSSL Annex.  |
| <b>Chromium, its salts and compounds - except Chromium VI, its salts and compounds</b> | Several    |   |            |   |      |   |       |   |   |
| Chromium - as content  | 7440-47-3  | Textiles                                  | Limitation |   | 0.5  |   | mg/kg | DIN EN 16711-2 (2016) // Acidic sweat solution  | As extractable metal content // for textiles dyed with chromium containing metal complex dyes A: 1.0 // B: 2.0 // C: 2.0 mg/kg. |



| Chemical Name                               | CAS Number | Sector Of Use                                | Limit type | A   | B   | C   | Unit  | Test Method   | Comment  |
|---|------------|--|------------|-----|-----|-----|-------|---|--|
| <b>Metals</b>                               |            |  |            |     |     |     |       |   |  |
|   |            | Down/feather<br>Polymer parts<br>Metal parts | Limitation | 60  |     |     | mg/kg | EN 71-3 (2019) // Acidic solution migration simulating gastric juices<br>DIN EN ISO 17294-2 (2017)<br>DIN EN ISO 11885 (2009) | As extractable metal content.<br>If products are covered with a metal layer, including a chromium layer, coating must be constantly in good condition.                                 |
| <b>Chromium VI, its salts and compounds</b> | Several    |  |            |     |     |     |       |   |  |
| Chromium VI - as content                    | 18540-29-9 | Leather                                      | Usage ban  | 3.0 |     |     | mg/kg | DIN EN ISO 4044 (2017)<br>EN ISO 17075-1 (2017)<br>EN ISO 17075-2 (2017)  | As extractable metal content.<br>Thermal pre-ageing test required in advance: ISO 10195:2018.<br>Single substances listed in the BSSL Annex.   |
|   |            | Textiles<br>Down/feather<br>Polymer parts    | Usage ban  | 0.5 |     |     | mg/kg | EN ISO 17075-1 (2017)   | As extractable metal content.<br>Single substances listed in the BSSL Annex.   |
|   |            | Metal parts                                  | Usage ban  | 0.5 |     |     | mg/kg | EN 62321-7-1 (2016)   |  |
| <b>Cobalt, its salts and compounds</b>      | Several    |  |            |     |     |     |       |   |  |
| Cobalt - as content                         | 7440-48-4  | Down/feather<br>Polymer parts<br>Metal parts | Limitation | 1.0 | 4.0 | 4.0 | mg/kg | DIN EN 16711-2 (2016) // Acidic sweat solution  | As extractable metal content.  |
|   |            | Leather                                      | Limitation | 1.0 |     |     | mg/kg | EN ISO 17072-1 (2019) // Acidic sweat solution  | As extractable metal content // exception for articles dyed with cobalt containing metal complex dyes A: 1.0 // B: 4.0 // C: 4.0 mg/kg.<br>Single substances listed in the BSSL Annex. |
|   |            | Textiles                                     | Limitation | 1.0 |     |     | mg/kg | DIN EN 16711-2 (2016) // Acidic sweat solution  |  |
| <b>Copper, its salts and compounds</b>      | Several    |  |            |     |     |     |       |   |  |
| Copper - as content                         | 7440-50-8  | Textiles                                     | Limitation | 25  | 50  | 50  | mg/kg | DIN EN 16711-2 (2016) // Acidic sweat solution  | As extractable metal content.  |



| Chemical Name                           | CAS Number | Sector Of Use                             | Limit type | A    | B   | C   | Unit  | Test Method  | Comment  |
|---|------------|---|------------|------|-----|-----|-------|--|--|
| <b>Metals</b>                           |            |   |            |      |     |     |       |  |  |
|   |            | Leather                                   | Limitation | 25   | 50  | 50  | mg/kg | EN ISO 17072-1 (2019) // Acidic sweat solution   |  |
| <b>Lead, its salts and compounds</b>    | Several    |   |            |      |     |     |       |  |  |
| Lead - as content                       | 7439-92-1  | Metal parts                               | Usage ban  | 90   |     |     | mg/kg | DIN EN 16711-1 (2016) // Total content   | As total metal content.<br>Single substances listed in the BSSL Annex.       |
|   |            | Leather                                   | Usage ban  | 40   |     |     | mg/kg | EN ISO 17072-2 (2019) // Total content   |  |
|   |            |   | Usage ban  | 0.2  | 1.0 | 1.0 | mg/kg | EN ISO 17072-1 (2019) // Acidic sweat solution   | As extractable metal content.<br>Single substances listed in the BSSL Annex. |
|   |            | Textiles<br>Down/feather<br>Polymer parts | Usage ban  | 40   |     |     | mg/kg | DIN EN 16711-1 (2016) // Total content   | As total metal content.<br>Single substances listed in the BSSL Annex.       |
|   |            |   | Usage ban  | 0.2  | 1.0 | 1.0 | mg/kg | DIN EN 16711-2 (2016) // Acidic sweat solution   | As extractable metal content.<br>Single substances listed in the BSSL Annex. |
| <b>Mercury, its salts and compounds</b> | Several    |   |            |      |     |     |       |  |  |
| Mercury - as content                    | 7439-97-6  | Metal parts                               | Usage ban  | 60   |     |     | mg/kg | EN 71-3 (2019) // Acidic solution migration simulating gastric juices<br>EN ISO 12846 (2012) | As extractable metal content.  |
|   |            | Leather                                   | Usage ban  | 0.02 |     |     | mg/kg | EN ISO 17072-1 (2019) // Acidic sweat solution   |  |
|   |            | Textiles<br>Down/feather<br>Polymer parts | Usage ban  | 0.02 |     |     | mg/kg | DIN EN 16711-2 (2016) // Acidic sweat solution   |  |
| <b>Nickel, its salts and compounds</b>  | Several    |   |            |      |     |     |       |  |  |



| Chemical Name       | CAS Number | Sector Of Use                | Limit type | A   | B   | C | Unit                     | Test Method   | Comment   |
|---------------------|------------|------------------------------|------------|-----|-----|---|--------------------------|---|---|
| <b>Metals</b>       |            |                              |            |     |     |   |                          |   |   |
| Nickel - as content | 7440-02-0  | Down/feather<br>Leather      | Limitation | 1.0 |     |   | mg/kg                    | EN ISO 17072-1 (2019) // Acidic<br>sweat solution           | As extractable metal content // exception for<br>articles dyed with nickel containing metal<br>complex dyes A: 1.0 // B: 4.0 // C: 4.0 mg/kg. |
|                     |            | Polymer parts<br>Metal parts | Usage ban  | 0.5 | 0.5 |   | µg/cm <sup>2</sup> /week | EN 12472 (2020)<br>EN 1811 (2011) + A1 (2015) //<br>Release | Usage ban for A and B // Release // as metal<br>content.  |
|                     |            | Textiles                     | Limitation | 1.0 |     |   | mg/kg                    | DIN EN 16711-2 (2016) // Acidic<br>sweat solution           | As extractable metal content // exception for<br>articles dyed with nickel containing metal<br>complex dyes A: 1.0 // B: 4.0 // C: 4.0 mg/kg. |

| Chemical Name   | CAS Number | Sector Of Use | Limit type | A   | B | C | Unit  | Test Method            | Comment |
|-----------------|------------|---------------|------------|-----|---|---|-------|------------------------|---------|
| <b>Monomers</b> |            |               |            |     |   |   |       |                        |         |
| Acrylamide      | 79-06-1    | All           | Usage ban  | 1.0 |   |   | mg/kg | CEN/TS 13130-10 (2005) |         |



| Chemical Name                    | CAS Number | Sector Of Use | Limit type  | A         | B   | C   | Unit  | Test Method  | Comment  |
|----------------------------------|------------|---------------|---|-----------|-----|-----|-------|--|--|
| <b>Other Chemical Substances</b> |            |               |   |           |     |     |       |  |  |
| Acetophenone                     | 98-86-2    | All           | Limitation  | 20        |     |     | mg/kg | GC-MS // Extraction with Methanol  | Not allowed for bluesign® APPROVED chemicals, however the usage on-site is tolerated, if no feasible alternative for foaming is available.<br><br>Proof that consumer safety limit for ADCA is kept via finished article testing (e.g. footwear sole). |
| Azodicarbonamide - (ADCA)        | 123-77-3   |               | Usage ban   | 100       | 200 | 200 | mg/kg | GC-MS // Solvent extraction<br>LC-MS // Solvent extraction<br>LC-DAD // Solvent extraction |  |
| Benzyl chloride                  | 100-44-7   |               | Usage ban   | 1.0       |     |     | mg/kg | GC-MS // Extraction with Dichloromethane   |  |
| Bisphenol A                      | 80-05-7    |               | Usage ban   | 1.0       | 10  | 10  | mg/kg | LC-MS // LC-MS/MS // LC-PDA // Extraction with Methanol or Methanol: Tetrahydrofuran (1:1) |  |
| Bisphenol AF                     | 1478-61-1  |               | Usage ban   | 100       |     |     | mg/kg |  | Articles need to comply latest 01 July 2025.   |
| Bisphenol F                      | 620-92-8   |               | Limitation  | 100       |     |     | mg/kg | LC-MS // LC-MS/MS // LC-PDA // Extraction with Methanol or Methanol: Tetrahydrofuran (1:1) | Reporting limit: 10 ppm.<br>Specific limit for leather tanning and textile aftertreatment: 500 ppm.<br>Articles need to comply latest 01 July 2025   |
| Bisphenol S                      | 80-09-1    |               | Usage ban   | 100       |     |     | mg/kg | LC-MS // LC-MS/MS // LC-PDA // Extraction with Methanol or Methanol: Tetrahydrofuran (1:1) | Reporting limit: 10 ppm.<br>Specific limit for leather tanning and textile aftertreatment: 500 ppm.<br>Articles need to comply latest 01 July 2025.  |
| Formamide                        | 75-12-7    |               | Textiles  | Usage ban | 50  | 50  | 200   | mg/kg  | EN 17131 (2019)  |
|                                  |            |               | Down/feather<br>Leather<br>Polymer parts<br>Metal parts | Usage ban | 50  | 50  | 200   | mg/kg  | ISO 16189 (2021)   |



| Chemical Name                              | CAS Number       | Sector Of Use | Limit type | A  | B  | C   | Unit  | Test Method  | Comment  |
|--|------------------|---------------|------------|----|----|-----|-------|--|--|
| <b>Other Chemical Substances</b>           |                  |               |            |    |    |     |       |  |  |
| Isoquinoline                               | 119-65-3         | All           | Usage ban  | 50 |    |     | mg/kg | LC-MS/MS // Extraction with Methanol<br>LC-DAD // Extraction with Tetrahydrofuran<br>LC-MS/MS // Extraction with Tetrahydrofuran<br>LC-DAD // Extraction with Methanol |  |
| Phenol                                     | 108-95-2         |               | Limitation | 20 | 50 | 100 | mg/kg | GC-MS // Extraction with Methanol<br>LC-MS // Extraction with Methanol   |  |
| 2-Phenyl-2-propanol                        | 617-94-7         |               | Limitation | 10 | 50 | 50  | mg/kg | GC-MS // Extraction with Methanol  |  |
| Quinoline                                  | 91-22-5          |               | Usage ban  | 50 |    |     | mg/kg | LC-MS/MS // Extraction with Methanol<br>LC-DAD // Extraction with Tetrahydrofuran<br>LC-MS/MS // Extraction with Tetrahydrofuran<br>LC-DAD // Extraction with Methanol |  |
| <b>Cresol, all isomers</b>                 | <b>1319-77-3</b> |               | Usage ban  |    |    |     |       | BVL B 82.02-8 (2001) // Extraction with Potassium hydroxide<br>DIN EN ISO 17070 (2015) // Extraction with Potassium hydroxide  | Usage ban 10 mg/kg for each isomer             |
| o-Cresol                                   | 95-48-7          |               | Usage ban  | 10 |    |     | mg/kg |  |  |
| m-Cresol                                   | 108-39-4         |               | Usage ban  | 10 |    |     | mg/kg |  |  |
| p-Cresol                                   | 106-44-5         |               | Usage ban  | 10 |    |     | mg/kg |  |  |
| <b>Siloxanes</b>                           | Several          |               | Usage ban  |    |    |     |       | GC // With reference to TEGEWA method (2021)   | Usage ban for every allocated Member/Substance |
| D4-Siloxane (Octamethylcyclotetrasiloxane) | 556-67-2         |               | Usage ban  | 30 |    |     | mg/kg |  |  |



| Chemical Name                                  | CAS Number | Sector Of Use | Limit type | A | B   | C | Unit  | Test Method | Comment |
|--|------------|---------------|------------|---|-----|---|-------|-------------|---------|
| <b>Other Chemical Substances</b>               |            |               |            |   |     |   |       |             |         |
| D5-Siloxane<br>(Decamethylcyclopentasiloxane)  | 541-02-6   |               | Usage ban  |   | 200 |   | mg/kg |             |         |
| D6-Siloxane<br>(Dodecamethylcyclohexasiloxane) | 540-97-6   |               | Usage ban  |   | 200 |   | mg/kg |             |         |

| Chemical Name   | CAS Number | Sector Of Use | Limit type | A | B | C | Unit  | Test Method        | Comment   |
|---|------------|---------------|------------|---|---|---|---|--------------------|---|
| <b>Ozone Depleting Substances (according to Regulation (EC) No 1005/2009)</b> |            |               |            |   |   |   |   |                    |   |
| <b>Ozone Depleting Substances (according to Regulation (EC) No 1005/2009)</b> | Several    | All           | Usage ban  |   |   |   |   | GC-MS // Headspace | Usage ban for direct use in manufacturing of articles // 0.1 mg/kg for every allocated Member/Substance |
| <b>Ozone depleting substances (CFCs) class I</b>                              | Several    |               | Usage ban  |   |   |   | Usage ban for direct use in manufacturing of articles // 0.1 mg/kg for every allocated Member/Substance |                    |   |
| <b>Ozone depleting substances (CFCs) class II</b>                             | Several    |               | Usage ban  |   |   |   | Single substances listed in Annex   |                    |   |

| Chemical Name     | CAS Number | Sector Of Use | Limit type | A | B   | C | Unit  | Test Method  | Comment   |
|-------------------|------------|---------------|------------|---|-----|---|-------|--|---|
| <b>Pesticides</b> |            |               |            |   |     |   |       |  |   |
| <b>Pesticides</b> | Several    | All           | Limitation |   | 0.5 |   | mg/kg | GC-MS // ASE with Acetone/Hexane<br>LC-MS // ASE with Acetone/Hexane<br>GC-MS // Soxhlet Extraction with Acetone/Hexane<br>LC-MS // Soxhlet Extraction with Acetone/Hexane | Applies to total sum of all allocated members/substances.<br>Single substances listed in Annex. |



| Chemical Name   | CAS Number | Sector Of Use  | Limit type | A | B   | C | Unit  | Test Method  | Comment  |
|---|------------|--|------------|---|-----|---|-------|--|--|
| <b>PFAS (Poly- and perfluoroalkyl substances)</b>   |            |  |            |   |     |   |       |  |  |
| <b>PFAS (Poly- and perfluoroalkyl substances)</b>   | Several    | All  | Usage ban  |   | 50  |   | mg/kg | EN 14582 (total fluorine)<br>ASTM 07359 (total fluorine) | Limit refers to total fluorine content. Exceptions might be possible for specific uses, see "Guidance Sheet PFAS phase out" and PFAS statement in section 5.6. Articles need to comply latest 01 January 2025. |
| Reaction mass of 2,2,3,3,5,5,6,6-octafluoro-4-(1,1,1,2,3,3,3-heptafluoropropan-2-yl)morpholine and 2,2,3,3,5,5,6,6-octafluoro-4-(heptafluoropropyl)morpholine |            | Leather  | Usage ban  |   | 100 |   | µg/kg | EN ISO 23702-1 (2023)                                    |  |
|   |            | Textiles<br>Down/feather<br>Polymer parts<br>Metal parts | Usage ban  |   | 100 |   | µg/kg | CEN/TS 15968 (2010)<br>prEN 17681-1:2023                 |  |
| <b>Perfluorohexane sulfonic acid and its derivatives</b>  | Several    | All  | Usage ban  |   |     |   |       |  | Single substances listed in Annex.   |
| <i>Perfluorohexane sulfonic acid and its salts</i>  | Several    | Leather  | Usage ban  |   | 20  |   | µg/kg | EN ISO 23702-1 (2023)                                    |  |
|   | Several    | Textiles<br>Down/feather<br>Polymer parts<br>Metal parts | Usage ban  |   | 20  |   | µg/kg | CEN/TS 15968 (2010)<br>prEN 17681-1:2023                 |  |
| <i>Perfluorohexane sulfon amides</i>  | Several    |  | Usage ban  |   | 20  |   | µg/kg |  |  |
|   | Several    | Leather  | Usage ban  |   | 20  |   | µg/kg | EN ISO 23702-1 (2023)                                    |  |
| <i>Perfluorohexane sulfon amidoethanols</i>   | Several    | Textiles<br>Down/feather<br>Polymer parts<br>Metal parts | Usage ban  |   | 20  |   | µg/kg | CEN/TS 15968 (2010)<br>prEN 17681-1:2023                 |  |
|   | Several    | Leather  | Usage ban  |   | 20  |   | µg/kg | EN ISO 23702-1 (2023)                                    |  |





| Chemical Name   | CAS Number | Sector Of Use  | Limit type | A   | B   | C                 | Unit              | Test Method                              | Comment  |
|---|------------|--|------------|-----|-----|-------------------|-------------------|--|--|
| <b>PFAS (Poly- and perfluoroalkyl substances)</b>               |            |  |            |     |     |                   |                   |  |  |
| <i>Perfluorohexane sulfon amidoethyl (meth)acrylates</i>        | Several    | Textiles<br>Down/feather<br>Polymer parts<br>Metal parts | Usage ban  |     | 20  |                   | µg/kg             | CEN/TS 15968 (2010)<br>prEN 17681-1:2023 |  |
|   | Several    | Leather  | Usage ban  |     | 20  |                   | µg/kg             | EN ISO 23702-1 (2023)                    |  |
| <i>Perfluorohexane sulfon halides</i>                           | Several    | Textiles<br>Down/feather<br>Polymer parts<br>Metal parts | Usage ban  |     | 20  |                   | µg/kg             | CEN/TS 15968 (2010)<br>prEN 17681-1:2023 |  |
|   | Several    | Leather  | Usage ban  |     | 20  |                   | µg/kg             | EN ISO 23702-1 (2023)                    |  |
| <i>Perfluorohexane sulfon polymers</i>                          | Several    | Textiles<br>Down/feather<br>Polymer parts<br>Metal parts | Usage ban  |     | 20  |                   | µg/kg             | CEN/TS 15968 (2010)<br>prEN 17681-1:2023 |  |
|   | Several    | Leather  | Usage ban  |     | 20  |                   | µg/kg             | EN ISO 23702-1 (2023)                    |  |
| Several   | Usage ban  |  |            | 1.0 |     | µg/m <sup>2</sup> |                   |  |  |
| <b><i>Perfluorooctane sulfonic acid and its derivatives</i></b> | Several    | Textiles<br>Down/feather<br>Polymer parts<br>Metal parts | Usage ban  |     | 1.0 |                   | µg/m <sup>2</sup> | CEN/TS 15968 (2010)<br>prEN 17681-1:2023 |  |
| <b><i>Perfluorohexanoic acid and its salts</i></b>              | Several    | Leather  | Usage ban  |     | 25  |                   | µg/kg             | EN ISO 23702-1 (2023)                    | Usage ban<br>Single substances listed in Annex |
|   | Several    | Textiles<br>Down/feather<br>Polymer parts<br>Metal parts | Usage ban  |     | 25  |                   | µg/kg             | CEN/TS 15968 (2010)<br>prEN 17681-1:2023 |  |
| <b><i>Perfluoroheptanoic acid and its salts</i></b>             | Several    |  | Usage ban  |     | 50  |                   | µg/kg             |  |  |
|   | Several    | Usage ban  |            | 50  |     | µg/kg             |                   |  |  |



| Chemical Name   | CAS Number | Sector Of Use  | Limit type | A | B    | C | Unit  | Test Method                              | Comment   |
|---|------------|--|------------|---|------|---|-------|--|---|
| <b>PFAS (Poly- and perfluoroalkyl substances)</b>           |            |  |            |   |      |   |       |  |   |
| <b>Perfluorooctanoic acid and its salts</b>                 | Several    | Leather  | Usage ban  |   | 25   |   | µg/kg | EN ISO 23702-1 (2023)                    | Usage ban   |
|   | Several    | Textiles<br>Down/feather<br>Polymer parts<br>Metal parts | Usage ban  |   | 25   |   | µg/kg | CEN/TS 15968 (2010)<br>prEN 17681-1:2023 | Single substances listed in Annex   |
| <b>Perfluorocarboxylic acids (C9-C14) and its salts</b>     | Several    | Leather  | Usage ban  |   | 25   |   | µg/kg | EN ISO 23702-1 (2023)                    | For sum of all allocated Members/Substances.                                  |
|   | Several    | Textiles<br>Down/feather<br>Polymer parts<br>Metal parts | Usage ban  |   | 25   |   | µg/kg | CEN/TS 15968 (2010)<br>prEN 17681-1:2023 |   |
| <b>Perfluorohexanoic acid related substances</b>            | Several    | Leather  | Usage ban  |   | 1000 |   | µg/kg | EN ISO 23702-1 (2023)                    | Usage ban<br>Single substances listed in Annex                                |
|   | Several    | Textiles<br>Down/feather<br>Polymer parts<br>Metal parts | Usage ban  |   | 1000 |   | µg/kg | CEN/TS 15968 (2010)<br>prEN 17681-1:2023 |   |
| <b>Perfluorooctanoic acid related substances</b>            | Several    | Leather  | Usage ban  |   | 1000 |   | µg/kg | EN ISO 23702-1 (2023)                    | For the sum of PFOA-related substances.<br>Single substances listed in Annex. |
|   | Several    | Textiles   | Usage ban  |   | 1000 |   | µg/kg | CEN/TS 15968 (2010)<br>prEN 17681-1:2023 |   |
| <b>Perfluorocarboxylic acid (C9-C14) related substances</b> | Several    | Down/feather<br>Polymer parts<br>Metal parts             | Usage ban  |   | 260  |   | µg/kg |  |   |
|   | Several    | Leather  | Usage ban  |   | 260  |   | µg/kg | EN ISO 23702-1 (2023)                    |   |



| Chemical Name               | CAS Number | Sector Of Use   | Limit type | A | B | C | Unit | Test Method                               | Comment   |
|-----------------------------|------------|---|------------|---|---|---|------|---|---|
| <b>Plasticizers</b>         |            |   |            |   |   |   |      |   |   |
| <b>Phthalic acid esters</b> | Several    | Textiles  | Usage ban  |   |   |   |      | CPSC-CH-C1001-09.4<br>EN ISO 14389 (2014) | Usage ban 50 mg/kg for every allocated Member/Substance |
|                             | Several    | Down/feather<br>Leather<br>Polymer parts<br>Metal parts | Usage ban  |   |   |   |      | CPSC-CH-C1001-09.4                        |   |

| Chemical Name                           | CAS Number | Sector Of Use | Limit type | A   | B   | C   | Unit  | Test Method  | Comment   |
|---|------------|---------------|------------|-----|-----|-----|-------|--------------|---|
| <b>Polyaromatic hydrocarbons (PAHs)</b> |            |               |            |     |     |     |       |              |   |
| <b>Polyaromatic hydrocarbons (PAHs)</b> | Several    | All           | Usage ban  | 10  |     |     | mg/kg | AfPS GS 2019 | For sum of all allocated PAHs.<br>Alternative test methods: EN17132 or ISO 16190. |
| Benzo(a)pyrene                          | 50-32-8    |               | Usage ban  | 0.2 |     |     | mg/kg |              |   |
| Benzo(e)pyrene                          | 192-97-2   |               | Usage ban  | 0.5 | 1.0 | 1.0 | mg/kg |              |   |
| Benzo(a)anthracene                      | 56-55-3    |               | Usage ban  | 0.5 | 1.0 | 1.0 | mg/kg |              |   |
| Benzo(b)fluoranthene                    | 205-99-2   |               | Usage ban  | 0.5 | 1.0 | 1.0 | mg/kg |              |   |
| Benzo(j)fluoranthene                    | 205-82-3   |               | Usage ban  | 0.5 | 1.0 | 1.0 | mg/kg |              |   |
| Benzo(k)fluoranthene                    | 207-08-9   |               | Usage ban  | 0.5 | 1.0 | 1.0 | mg/kg |              |   |
| Chrysene                                | 218-01-9   |               | Usage ban  | 0.5 | 1.0 | 1.0 | mg/kg |              |   |
| Dibenzo(a,h)anthrene                    | 53-70-3    |               | Usage ban  | 0.5 | 1.0 | 1.0 | mg/kg |              |   |



| Chemical Name      | CAS Number | Sector Of Use | Limit type | A | B | C | Unit | Test Method   | Comment   |
|--------------------|------------|---------------|------------|---|---|---|------|---|---|
| <b>Polymers</b>    |            |               |            |   |   |   |      |   |   |
| Polyvinyl chloride | 9002-86-2  | All           | Usage ban  |   |   |   |      | Total chlorine (EN 14582) // FTIR<br>(when chlorine detected) | Usage ban for usage range A and B - Not detected // for usage range C: for special applications bluesign technologies has the right to make an individual decision. |



| Chemical Name                  | CAS Number | Sector Of Use                                | Limit type | A | B   | C | Unit  | Test Method         | Comment   |
|--------------------------------|------------|--|------------|---|-----|---|-------|---------------------|---|
| <b>Solvents</b>                |            |  |            |   |     |   |       |                     |   |
| Benzene                        | 71-43-2    | All  | Usage ban  |   | 5.0 |   | mg/kg | VDA 278 (2011)      | Exception is valid for chemicals used in paint stripping process in closed systems  |
| 1,2-Dichloroethane             | 107-06-2   |  | Usage ban  |   | 1.0 |   | mg/kg | GC-MS // Headspace  |   |
| Dichloromethane                | 75-09-2    |  | Usage ban  |   | 5.0 |   | mg/kg |                     |   |
| N,N-Dimethylacetamide - (DMAc) | 127-19-5   | Down/feather<br>Polymer parts<br>Metal parts | Usage ban  |   | 5.0 |   | mg/kg | ISO 16189 (2021)    | <p>Exceptions defined:</p> <p>Articles produced by solvent coating, lamination or fiber manufacturing - A/B/C 50 mg/kg.</p> <p>As residual fiber solvent in elastane and PAN fibers with Monitoring status - A: 10 mg/kg, B/C: 50 mg/kg.</p> <p>Aramid fibers: For special applications bluesign technologies has the right to make an individual decision.</p> |
|                                |            | Leather                                      | Usage ban  |   | 5.0 |   | mg/kg | EN ISO 19070 (2016) |   |
|                                |            | Textiles                                     | Usage ban  |   | 5.0 |   | mg/kg | EN 17131 (2019)     |   |
| N,N-Dimethylformamide - (DMF)  | 68-12-2    | Down/feather<br>Polymer parts<br>Metal parts | Usage ban  |   | 5.0 |   | mg/kg | ISO 16189 (2021)    |   |
|                                |            | Leather                                      | Usage ban  |   | 5.0 |   | mg/kg | EN ISO 19070 (2016) |   |



| Chemical Name                 | CAS Number | Sector Of Use                                | Limit type | A   | B  | C   | Unit  | Test Method         | Comment  |
|-------------------------------|------------|--|------------|-----|----|-----|-------|---------------------|--|
| <b>Solvents</b>               |            |  |            |     |    |     |       |                     |  |
|                               |            | Textiles                                     | Usage ban  | 5.0 |    |     | mg/kg | EN 17131 (2019)     | Exceptions: Specific limits are defined for articles produced by lamination and fiber manufacturing - A/B/C = 50 mg/kg or by solvent coating, A/B/C = 50/50/250 mg/kg. PAN fibers: For special applications Bluesign has the right to make individual decisions. |
|                               |            |  | Usage ban  | 10  | 10 | 100 | mg/kg |                     |  |
| N-Ethyl-2-pyrrolidone - (NEP) | 2687-91-4  | Leather                                      | Usage ban  | 10  | 10 | 100 | mg/kg | EN ISO 19070 (2016) |  |
|                               |            | Down/feather<br>Polymer parts<br>Metal parts | Usage ban  | 10  | 10 | 100 | mg/kg | ISO 16189 (2021)    |  |
|                               |            |  |            |     |    |     |       |                     |  |
| N-Methylpyrrolidone - (NMP)   | 872-50-4   | Textiles                                     | Usage ban  | 10  | 10 | 100 | mg/kg | EN 17131 (2019)     | Exception is valid for Aramid fibers: for special applications bluesign technologies has the right to make an individual decision  |
|                               |            | Leather                                      | Usage ban  | 10  | 10 | 100 | mg/kg | EN ISO 19070 (2016) |  |
|                               |            | Down/feather<br>Polymer parts<br>Metal parts | Usage ban  | 10  | 10 | 100 | mg/kg | ISO 16189 (2021)    |  |
| Tetrachloroethylene           | 127-18-4   | All  | Usage ban  | 1.0 |    |     | mg/kg | GC-MS // Headspace  | Exception is valid for articles produced by dry cleaning process. Limit when used as solvent in dry cleaning: 10 mg/kg.  |
| Toluene                       | 108-88-3   |  | Usage ban  | 10  | 50 | 50  | mg/kg |                     | Exception valid for solvent coating, laminating and painting/lacquering.   |
| Trichloroethylene             | 79-01-6    |  | Usage ban  | 5.0 |    |     | mg/kg |                     |  |



| Chemical Name                     | CAS Number              | Sector Of Use | Limit type | A  | B   | C   | Unit  | Test Method | Comment  |
|-----------------------------------|-------------------------|---------------|------------|----|-----|-----|-------|-------------|--|
| <b>Solvents</b>                   |                         |               |            |    |     |     |       |             |  |
| <i><b>Xylene, all isomers</b></i> | <i><b>1330-20-7</b></i> |               | Usage ban  | 50 | 100 | 100 | mg/kg |             | For sum of all isomers.<br>Usage ban not valid for solvent coating,<br>laminating and painting/lacquering.<br>Limits valid for all articles. |



| Chemical Name                           | CAS Number | Sector Of Use | Limit type | A | B   | C | Unit  | Test Method                                      | Comment |
|---|------------|---------------|------------|---|-----|---|-------|--|---------|
| <b>Tin-organic Compounds</b>            |            |               |            |   |     |   |       |  |         |
| <b>Methyltin compounds</b>              | Several    |               |            |   |     |   |       |  |         |
| <i>Monomethyltin compounds - (MMT)</i>  | Several    | All           | Usage ban  |   | 1.0 |   | mg/kg | CEN ISO/TS 16179 (2012)<br>EN ISO 22744-1 (2020) |         |
| <i>Dimethyltin compounds - (DMT)</i>    | Several    |               | Usage ban  |   | 0.5 |   | mg/kg |  |         |
| <i>Trimethyltin compounds - (TMT)</i>   | Several    |               | Usage ban  |   | 0.5 |   | mg/kg |  |         |
| <b>Ethyltin compounds</b>               | Several    |               |            |   |     |   |       |  |         |
| <i>Tetraethyltin compounds - (TeET)</i> | Several    | All           | Usage ban  |   | 1.0 |   | mg/kg | CEN ISO/TS 16179 (2012)<br>EN ISO 22744-1 (2020) |         |
| <b>Propyltin compounds</b>              | Several    |               |            |   |     |   |       |  |         |
| <i>Dipropyltin compounds - (DPT)</i>    | Several    | All           | Usage ban  |   | 1.0 |   | mg/kg | CEN ISO/TS 16179 (2012)<br>EN ISO 22744-1 (2020) |         |
| <i>Tripropyltin compounds - (TPT)</i>   | Several    |               | Usage ban  |   | 0.5 |   | mg/kg |  |         |
| <b>Butyltin compounds</b>               | Several    |               |            |   |     |   |       |  |         |
| <i>Monobutyltin compounds - (MBT)</i>   | Several    | All           | Usage ban  |   | 1.0 |   | mg/kg | CEN ISO/TS 16179 (2012)<br>EN ISO 22744-1 (2020) |         |
| <i>Dibutyltin compounds - (DBT)</i>     | Several    |               | Usage ban  |   | 1.0 |   | mg/kg |  |         |
| <i>Tributyltin compounds - (TBT)</i>    | Several    |               | Usage ban  |   | 0.5 |   | mg/kg |  |         |
| <i>Tetrabutyltin compounds - (TeBT)</i> | Several    |               | Usage ban  |   | 0.5 |   | mg/kg |  |         |





| Chemical Name                               | CAS Number | Sector Of Use | Limit type | A | B   | C | Unit  | Test Method                                      | Comment |
|---|------------|---------------|------------|---|-----|---|-------|--|---------|
| <b>Tin-organic Compounds</b>                |            |               |            |   |     |   |       |  |         |
| <b>Hexyltin compounds</b>                   | Several    |               |            |   |     |   |       |  |         |
| <i>Tricyclohexyltin compounds - (TCyHT)</i> | Several    | All           | Usage ban  |   | 0.5 |   | mg/kg | CEN ISO/TS 16179 (2012)<br>EN ISO 22744-1 (2020) |         |
| <b>Octyltin compounds</b>                   | Several    |               |            |   |     |   |       |  |         |
| <i>Monooctyltin compounds - (MOT)</i>       | Several    | All           | Usage ban  |   | 1.0 |   | mg/kg | CEN ISO/TS 16179 (2012)<br>EN ISO 22744-1 (2020) |         |
| <i>Diocyltin compounds - (DOT)</i>          | Several    |               | Usage ban  |   | 1.0 |   | mg/kg |  |         |
| <i>Triocyltin compounds - (TOT)</i>         | Several    |               | Usage ban  |   | 0.5 |   | mg/kg |  |         |
| <i>Tetraocyltin compounds - (TeOT)</i>      | Several    |               | Usage ban  |   | 0.5 |   | mg/kg |  |         |
| <b>Phenyltin compounds</b>                  | Several    |               |            |   |     |   |       |  |         |
| <i>Monophenyltin compounds - (MPhT)</i>     | Several    | All           | Usage ban  |   | 1.0 |   | mg/kg | CEN ISO/TS 16179 (2012)<br>EN ISO 22744-1 (2020) |         |
| <i>Diphenyltin compounds - (DPhT)</i>       | Several    |               | Usage ban  |   | 1.0 |   | mg/kg |  |         |
| <i>Triphenyltin compounds - (TPhT)</i>      | Several    |               | Usage ban  |   | 0.5 |   | mg/kg |  |         |



| Chemical Name         | CAS Number | Sector Of Use | Limit type | A | B    | C | Unit  | Test Method   | Comment                                      |
|-----------------------|------------|---------------|------------|---|------|---|-------|---|--|
| <b>UV stabilizers</b> |            |               |            |   |      |   |       |   |  |
| UV-320                | 3846-71-7  | All           | Usage ban  |   | 1000 |   | mg/kg | ISO 24040 // Extraction with Tetrahydrofuran // GC-MS |  |
| UV-326                | 3896-11-5  |               | Usage ban  |   | 1000 |   | mg/kg |   | Articles need to comply latest 01 July 2026. |
| UV-327                | 3864-99-1  |               | Usage ban  |   | 1000 |   | mg/kg |   |  |
| UV-328                | 25973-55-1 |               | Usage ban  |   | 1000 |   | mg/kg |   |  |
| UV-329                | 3147-75-9  |               | Usage ban  |   | 1000 |   | mg/kg |   | Articles need to comply latest 01 July 2026. |
| UV-350                | 36437-37-3 |               | Usage ban  |   | 1000 |   | mg/kg |   |  |



## 6 Annex I Compilation of Individual Substances

The tables from Annex I list individual substances that belong to the following substance groups:

- Arylamines
- Biocides
- Chlorinated Benzenes and Toluenes
- Chlorinated Phenols
- Colorants
- Dioxins and Furans
- Fibers
- Flame Retardants
- Halogenated Diarylalkanes
- Isocyanates
- Pesticides
- PFAS (Poly- and perfluoroalkyl substances)
- Plasticizers
- Polyaromatic hydrocarbons (PAHs)

are listed

Limit values and test methods for the substance groups are provided in section 5.2.



| Chemical Name  | CAS Number  |
|--|-------------|
| <b>Arylamines</b>  |             |
| <i>o</i> -Aminoazotoluene and its salts                  | Several     |
| <i>o</i> -Aminoazotoluene                                | 97-56-3     |
| <i>p</i> -Aminoazobenzene and its salts                  | Several     |
| <i>p</i> -Aminoazobenzene                                | 60-09-3     |
| <i>4</i> -Aminobiphenyl and its salts                    | Several     |
| <i>4</i> -Aminobiphenyl                                  | 92-67-1     |
| <i>6</i> -Amino-2-ethoxynaphthalene and its salts        | Several     |
| <i>6</i> -Amino-2-ethoxynaphthalene                      | 293733-21-8 |
| <i>4</i> -Amino-3-fluorophenol and its salts             | Several     |
| <i>4</i> -Amino-3-fluorophenol                           | 399-95-1    |
| <i>4</i> -Chloroaniline and its salts                    | Several     |
| <i>4</i> -Chloroaniline                                  | 106-47-8    |
| <i>2,4</i> -Diaminoanisole and its salts                 | Several     |
| <i>2,4</i> -Diaminoanisole                               | 615-05-4    |
| <i>2,4</i> -Diaminoanisole sulphate                      | 39156-41-7  |
| <i>4,4'</i> -Diaminodiphenylmethane and its salts        | Several     |
| <i>4,4'</i> -Diaminodiphenylmethane                      | 101-77-9    |
| <i>2,4</i> -Diaminotoluene and its salts                 | Several     |
| <i>2,4</i> -Diaminotoluene                               | 95-80-7     |
| <i>4,4'</i> -Methylenebis-(2-chloraniline) and its salts | Several     |
| <i>4,4'</i> -Methylenebis-(2-chloraniline)               | 101-14-4    |
| <i>2</i> -Naphthylamine and its salts                    | Several     |
| <i>2</i> -Naphthylamine                                  | 91-59-8     |
| <i>2</i> -Naphthylammonium acetate                       | 553-00-4    |

| Chemical Name                                | CAS Number |
|--|------------|
| <b>Anisidines and its salts</b>              |            |
| Several                                      |            |
| Anisidine ( <i>o</i> -, <i>p</i> -isomers)   | 29191-52-4 |
| <i>2</i> -Anisidine and its salts            |            |
| Several                                      |            |
| <i>2</i> -Anisidine                          | 90-04-0    |
| <b>Benzidines and its salts</b>              |            |
| Several                                      |            |
| <i>Benzidine and its salts</i>               |            |
| Several                                      |            |
| Benzidine                                    | 92-87-5    |
| Benzidine dihydrochloride                    | 531-85-1   |
| Benzidine, sulfate (1:1)                     | 531-86-2   |
| Benzidine, sulfate                           | 21136-70-9 |
| Benzidine acetate                            | 36341-27-2 |
| <i>3,3'</i> -Dimethylbenzidine and its salts |            |
| Several                                      |            |
| <i>3,3'</i> -Dimethylbenzidine               | 119-93-7   |
| <i>3,3'</i> -Dichlorobenzidine and its salts |            |
| Several                                      |            |
| <i>3,3'</i> -Dichlorobenzidine               | 91-94-1    |
| <i>o</i> -Dianisidines and its salts         |            |
| Several                                      |            |
| <i>3,3'</i> -Dimethoxybenzidine              | 119-90-4   |
| <b>Dianilines and its salts</b>              |            |
| Several                                      |            |
| <i>4,4'</i> -Oxydianiline and its salts      |            |
| Several                                      |            |
| <i>4,4'</i> -Oxydianiline                    | 101-80-4   |
| <i>4,4'</i> -Thiodianiline and its salts     |            |
| Several                                      |            |
| <i>4,4'</i> -Thiodianiline                   | 139-65-1   |
| <b>Toluidines and its salts</b>              |            |
| Several                                      |            |
| <i>p</i> -Cresidine and its salts            |            |
| Several                                      |            |
| <i>p</i> -Cresidine                          | 120-71-8   |



| Chemical Name                                       | CAS Number |
|---|------------|
| <i>m</i> -Toluidine and its salts                   | Several    |
| m-Toluidine   | 108-44-1   |
| <i>o</i> -Toluidine and its salts                   | Several    |
| o-Toluidine   | 95-53-4    |
| <i>p</i> -Toluidine and its salts                   | Several    |
| p-Toluidine   | 106-49-0   |
| 4,4'-Methylenedi- <i>o</i> -toluidine and its salts | Several    |
| 4,4'-Methylenedi- <i>o</i> -toluidine               | 838-88-0   |
| <b>Nitrotoluidines and its salts</b>                | Several    |
| 2-Amino-4-nitrotoluene and its salts                | Several    |
| 2-Amino-4-nitrotoluene                              | 99-55-8    |
| <b>Chlorotoluidines and its salts</b>               | Several    |
| 4-Chloro-2-toluidine and its salts                  | Several    |
| 4-Chloro-2-toluidine                                | 95-69-2    |
| 4-Chloro-2-toluidine hydrochloride                  | 3165-93-3  |
| <b>Trimethylanilines and its salts</b>              | Several    |
| 2,4,5-Trimethylaniline and its salts                | Several    |
| 2,4,5-Trimethylaniline                              | 137-17-7   |
| 2,4,5-Trimethylaniline hydrochloride                | 21436-97-5 |
| <b>Xylidines and its salts</b>                      | Several    |
| 2,4-Xylidine and its salts                          | Several    |
| 2,4-Xylidine  | 95-68-1    |
| 2,6-Xylidine and its salts                          | Several    |
| 2,6-Xylidine  | 87-62-7    |

| Chemical Name                              | CAS Number |
|--|------------|
| <b>Biocides</b>                            |            |
| <b><i>o</i>-Phenylphenol and its salts</b> | Several    |
| <i>o</i> -Phenylphenol                     | 90-43-7    |
| Chemical Name                              | CAS Number |
| <b>Chlorinated Benzenes and Toluenes</b>   |            |
| <b>Chlorinated Benzenes</b>                | Several    |
| Monochlorobenzene                          | 108-90-7   |
| Pentachlorobenzene                         | 608-93-5   |
| Hexachlorobenzene                          | 118-74-1   |
| <i>Dichlorobenzenes, all isomers</i>       | Several    |
| 1,2-Dichlorobenzene                        | 95-50-1    |
| 1,3-Dichlorobenzene                        | 541-73-1   |
| 1,4-Dichlorobenzene                        | 106-46-7   |
| <i>Trichlorobenzenes, all isomers</i>      | Several    |
| 1,2,3-Trichlorobenzene                     | 87-61-6    |
| 1,2,4-Trichlorobenzene                     | 120-82-1   |
| 1,3,5-Trichlorobenzene                     | 108-70-3   |
| <i>Tetrachlorobenzenes, all isomers</i>    | Several    |
| 1,2,3,4-Tetrachlorobenzene                 | 634-66-2   |
| 1,2,3,5-Tetrachlorobenzene                 | 634-90-2   |
| 1,2,4,5-Tetrachlorobenzene                 | 95-94-3    |
| <b>Chlorinated Toluenes</b>                | Several    |
| Pentachlorotoluene                         | 877-11-2   |
| Chlorotoluene, unspecified mixture         | 25168-05-2 |
| <i>Monochlorotoluenes, all isomers</i>     | Several    |



| Chemical Name                           | CAS Number |
|---|------------|
| 2-Chlorotoluene                         | 95-49-8    |
| 3-Chlorotoluene                         | 108-41-8   |
| 4-Chlorotoluene                         | 106-43-4   |
| <i>Dichlorotoluenes, all isomers</i>    | Several    |
| 2,3-Dichlorotoluene                     | 32768-54-0 |
| 2,4-Dichlorotoluene                     | 95-73-8    |
| 2,5-Dichlorotoluene                     | 19398-61-9 |
| 2,6-Dichlorotoluene                     | 118-69-4   |
| 3,4-Dichlorotoluene                     | 95-75-0    |
| 3,5-Dichlorotoluene                     | 25186-47-4 |
| <i>Trichlorotoluenes, all isomers</i>   | Several    |
| 2,3,4-Trichlorotoluene                  | 7359-72-0  |
| 2,3,6-Trichlorotoluene                  | 2077-46-5  |
| 2,4,5-Trichlorotoluene                  | 6639-30-1  |
| 2,4,6-Trichlorotoluene                  | 23749-65-7 |
| 3,4,5-Trichlorotoluene                  | 21472-86-6 |
| a,a,a-Trichlorotoluene                  | 98-07-7    |
| <i>Tetrachlorotoluenes, all isomers</i> | Several    |
| 2,3,4,5-Tetrachlorotoluene              | 1006-32-2  |
| 2,3,5,6-Tetrachlorotoluene              | 1006-31-1  |
| 2,3,4,6-Tetrachlorotoluene              | 875-40-1   |
| a,a,a,4-Tetrachlorotoluene              | 5216-25-1  |
| a,a,a,2-Tetrachlorotoluene              | 2136-89-2  |
| Chemical Name                           | CAS Number |
| <b>Chlorinated Phenols</b>              |            |

| Chemical Name   | CAS Number |
|---|------------|
| <i>Trichlorophenol, all isomers</i>                       | 25167-82-2 |
| 2,3,4-Trichlorophenol                                     | 15950-66-0 |
| 2,3,5-Trichlorophenol                                     | 933-78-8   |
| 2,3,6-Trichlorophenol                                     | 933-75-5   |
| 2,4,5-Trichlorophenol                                     | 95-95-4    |
| 2,4,6-Trichlorophenol                                     | 88-06-2    |
| 3,4,5-Trichlorophenol                                     | 609-19-8   |
| <i>Tetrachlorophenol, its salts and compounds</i>         | 25167-83-3 |
| 2,3,4,5-Tetrachlorophenol                                 | 4901-51-3  |
| 2,3,4,6-Tetrachlorophenol                                 | 58-90-2    |
| 2,3,5,6-Tetrachlorophenol                                 | 935-95-5   |
| <i>Pentachlorophenol, its salts, esters and compounds</i> | Several    |
| Pentachlorophenol   | 87-86-5    |
| <b>Mono- and Dichlorophenols</b>                          | Several    |
| <i>Monochlorophenols, all isomers</i>                     | 25167-80-0 |
| 2-Chlorophenol  | 95-57-8    |
| 3-Chlorophenol  | 108-43-0   |
| 4-Chlorophenol  | 106-48-9   |
| <i>Dichlorophenols, all isomers</i>                       | 25167-81-1 |
| 2,3-Dichlorophenol  | 576-24-9   |
| 2,4-Dichlorophenol  | 120-83-2   |
| 2,5-Dichlorophenol  | 583-78-8   |
| 2,6-Dichlorophenol  | 87-65-0    |
| 3,4-Dichlorophenol  | 95-77-2    |
| 3,5-Dichlorophenol  | 591-35-5   |



| Chemical Name  | CAS Number |
|--|------------|
| <b>Colorants</b>   |            |
| <b>Colorants with carcinogenic potential</b>   | Several    |
| Acid Red 26  | 3761-53-3  |
| Leucomalachite green   | 129-73-7   |
| Basic Red 9  | 569-61-9   |
| Basic Violet 14  | 632-99-5   |
| Direct Black 38  | 1937-37-7  |
| Direct Blue 6  | 2602-46-2  |
| Direct Brown 95  | 16071-86-6 |
| Direct Red 28  | 573-58-0   |
| Disperse Blue 1  | 2475-45-8  |
| Disperse Orange 11   | 82-28-0    |
| Disperse Yellow 3  | 2832-40-8  |
| Pigment Yellow 34  | 1344-37-2  |
| Pigment Red 104  | 12656-85-8 |
| Solvent Red 80   | 6358-53-8  |
| Solvent Violet 8 - with $\geq 0.1\%$ of Michler's ketone (EC No. 202-027-5) or Michler's base (EC No. 202-959-2) | 561-41-1   |
| Solvent Yellow 2   | 60-11-7    |
| <b>Basic Green 4 - (Malachite Green)</b>   | Several    |
| Malachite green  | 10309-95-2 |
| Malachite green chloride   | 569-64-2   |
| Malachite green oxalate  | 2437-29-8  |
| <b>Colorants with allergenic potential</b>   | Several    |
| Disperse Blue 3  | 2475-46-9  |

| Chemical Name                   | CAS Number               |
|---------------------------------|--------------------------|
| Disperse Blue 7                 | 3179-90-6                |
| Disperse Blue 26                | 3860-63-7                |
| Disperse Blue 102               | 12222-97-8               |
| Disperse Blue 106               | 12223-01-7               |
| Disperse Blue 124               | 61951-51-7<br>15141-18-1 |
| Disperse Brown 1                | 23355-64-8               |
| Disperse Orange 1               | 2581-69-3                |
| Disperse Orange 3               | 730-40-5                 |
| Disperse Red 1                  | 2872-52-8                |
| Disperse Red 11                 | 2872-48-2                |
| Disperse Red 17                 | 3179-89-3                |
| Disperse Yellow 1               | 119-15-3                 |
| Disperse Yellow 9               | 6373-73-5                |
| Disperse Yellow 39              | 12236-29-2               |
| Disperse Yellow 49              | 54824-37-2               |
| Solvent Yellow 14               | 842-07-9                 |
| <b>Disperse Blue 35</b>         | Several                  |
| Disperse Blue 35 [1]            | 12222-75-2               |
| Disperse Blue 35 [2]            | 56524-77-7               |
| Disperse Blue 35 B              | 56524-76-6               |
| <b>Disperse Orange 37/59/76</b> | Several                  |
| Disperse Orange 37/59/76 [1]    | 12223-33-5               |
| Disperse Orange 37/59/76 [2]    | 13301-61-6               |
| Disperse Orange 37/59/76 [3]    | 51811-42-8               |



| Chemical Name  | CAS Number  |
|--|-------------|
| <b>Colorants banned for other reasons</b>  | Several     |
| Acid Orange 24   | 1320-07-6   |
| Acid Violet 49   | 1694-09-3   |
| Basic Blue 26 - with $\geq 0.1\%$ of Michler's ketone (EC No. 202-027-5) or Michler's base (EC No. 202-959-2)  | 2580-56-5   |
| Basic Violet 1   | 8004-87-3   |
| Direct Black 91  | 6739-62-4   |
| Direct Blue 76   | 16143-79-6  |
| Direct Blue 218  | 28407-37-6  |
| Direct Yellow 1  | 6472-91-9   |
| Disperse Yellow 23   | 6250-23-3   |
| Disperse Orange 149  | 85136-74-9  |
| Solvent Blue 4   | 6786-83-0   |
| <b>Basic Violet 3</b>  | Several     |
| Basic Violet 3 [1]   | 548-62-9    |
| Basic Violet 3 [2]   | 603-48-5    |
| Basic Violet 3 [3]   | 14426-25-6  |
| Basic Violet 3 - with $\geq 0.1\%$ of Michler's ketone (EC No. 202-027-5) or Michler's base (EC No. 202-959-2)   | 548-62-9    |
| <i>Navy Blue: A mixture of: disodium (6-(4-anisidino)-3-sulfonato-2-(3,5-dinitro-2-oxidophenylazo)-1-naphtholato)(1-(5-chloro-2-oxidophenylazo)-2-naphtholato)chromate(1-); trisodium bis(6-(4-anisidino)-3-sulfonato-2-(3,5-dinitro-2-oxidophenylazo)-1-naphtholato)chromat</i> | Several     |
| Disodium (6-(4-anisidino)-3-sulfonato-2-(3,5-dinitro-2-oxidophenylazo)-1-naphtholato)(1-(5-chloro-2-oxidophenylazo)-2-naphtholato)chromate(1-)   | 118685-33-9 |
| Trisodium bis(6-(4-anisidino)-3-sulfonato-2-(3,5-dinitro-2-oxidophenylazo)-1-naphtholato)chromat   |             |

| Chemical Name                              | CAS Number |
|--|------------|
| <b>Dioxins and Furans</b>                  |            |
| <i>Dioxins and Furans - Group 3</i>        | Several    |
| 1,2,3,4,6,7,8-Heptachlorodibenzo-p-dioxin  | 35822-46-9 |
| 1,2,3,4,6,7,8,9-Octachlorodibenzo-p-dioxin | 3268-87-9  |
| 1,2,3,4,6,7,8-Heptachlorodibenzofuran      | 67562-39-4 |
| 1,2,3,4,7,8,9-Heptachlorodibenzofuran      | 55673-89-7 |
| 1,2,3,4,6,7,8,9-Octachlorodibenzofuran     | 39001-02-0 |
| <b>Dioxins and Furans - Group 1 and 2</b>  | Several    |
| <i>Dioxins and Furans - Group 1</i>        | Several    |
| 2,3,7,8-Tetrachlorodibenzo-p-dioxin        | 1746-01-6  |
| 1,2,3,7,8-Pentachlorodibenzo-p-dioxin      | 40321-76-4 |
| 2,3,7,8-Tetrachlorodibenzofuran            | 51207-31-9 |
| 2,3,4,7,8-Pentachlorodibenzofuran          | 57117-31-4 |
| <i>Dioxins and Furans - Group 2</i>        | Several    |
| 1,2,3,4,7,8-Hexachlorodibenzo-p-dioxin     | 39227-28-6 |
| 1,2,3,6,7,8-Hexachlorodibenzo-p-dioxin     | 57653-85-7 |
| 1,2,3,7,8,9-Hexachlorodibenzo-p-dioxin     | 19408-74-3 |
| 1,2,3,7,8-Pentachlorodibenzofuran          | 57117-41-6 |
| 1,2,3,4,7,8-Hexachlorodibenzofuran         | 70648-26-9 |
| 1,2,3,6,7,8-Hexachlorodibenzofuran         | 57117-44-9 |
| 1,2,3,7,8,9-Hexachlorodibenzofuran         | 72918-21-9 |
| 2,3,4,6,7,8-Hexachlorodibenzofuran         | 60851-34-5 |
| <b>Dioxins and Furans - Group 4 and 5</b>  | Several    |
| <i>Dioxins and Furans - Group 4</i>        | Several    |
| 2,3,7,8-Tetrabromodibenzo-p-dioxin         | 50585-41-6 |





| Chemical Name                                   | CAS Number                |
|---|---------------------------|
| 1,2,3,7,8-Pentabromodibenzo-p-dioxin            | 109333-34-8               |
| 2,3,7,8-Tetrabromodibenzofuran                  | 67733-57-7                |
| 2,3,4,7,8-Pentabromodibenzofuran                | 131166-92-2               |
| <i>Dioxins and Furans - Group 5</i>             | Several                   |
| 1,2,3,4,7,8-Hexabromodibenzo-p-dioxin           | 110999-44-5               |
| 1,2,3,6,7,8-Hexabromodibenzo-p-dioxin           | 110999-45-6               |
| 1,2,3,7,8,9-Hexabromodibenzo-p-dioxin           | 110999-46-7               |
| 1,2,3,7,8-Pentabromodibenzofuran                | 107555-93-1               |
| Chemical Name                                   | CAS Number                |
| <b>Fibers</b>                                   |                           |
| <b>Asbestos</b>                                 | Several                   |
| Actinolite                                      | 77536-66-4                |
| Amosite   | 12172-73-5                |
| Anthophyllite                                   | 77536-67-5                |
| Chrysotile                                      | 12001-29-5<br>132207-32-0 |
| Crocidolite                                     | 12001-28-4                |
| Tremolite                                       | 77536-68-6                |
| Chemical Name                                   | CAS Number                |
| <b>Flame retardants</b>                         |                           |
| <b>Chlorinated paraffins, all chain lengths</b> | Several                   |
| Paraffin wax, chlorinated                       | 63449-39-8                |
| Paraffin, C10-C13, chlorinated - (SCCP)         | 85535-84-8                |
| Paraffin, C18-C28, chlorinated - (LCCP)         | 85535-86-0                |
| Paraffin, C14-C17, chlorinated - (MCCP)         | 85535-85-9                |

| Chemical Name   | CAS Number  |
|---|-------------|
| <b>Hexabromocyclododecan, all isomers - group for all major diastereoisomers identified</b> | Several     |
| Hexabromocyclododecane  | 25637-99-4  |
| 1,2,5,6,9,10-Hexabromocyclododecane   | 3194-55-6   |
| α-Hexabromocyclododecane  | 134237-50-6 |
| β-Hexabromocyclododecane  | 134237-51-7 |
| μ-Hexabromocyclododecane  | 134237-52-8 |
| <b>Polybrominated diphenyl ethers</b>   | Several     |
| Decabromodiphenyl ether - (DecaBDE)   | 1163-19-5   |
| <i>Monobromodiphenyl ether - (MonoBDE)</i>  | Several     |
| 2-Bromodiphenyl ether   | 7025-06-1   |
| 3-Bromodiphenyl ether   | 6876-00-2   |
| 4-Bromodiphenyl ether   | 101-55-3    |
| <i>Tribromodiphenyl ether - (TriBDE)</i>  | 49690-94-0  |
| <i>Tetrabromodiphenyl ether - (TetraBDE)</i>  | 40088-47-9  |
| <i>Pentabromodiphenyl ether - (PentaBDE)</i>  | 32534-81-9  |
| <i>Hexabromodiphenyl ether - (HexaBDE)</i>  | 36483-60-0  |
| <i>Heptabromodiphenyl ether - (HeptaBDE)</i>  | 68928-80-3  |
| <i>Octabromodiphenyl ether - (OctaBDE)</i>  | 32536-52-0  |
| <i>Nonabromodiphenyl ether - (NonaBDE)</i>  | 63936-56-1  |
| Chemical Name   | CAS Number  |
| <b>Halogenated Diarylalkanes</b>  |             |
| <b>Monomethyl-dibromo-diphenyl methane</b>  | 99688-47-8  |
| <b>Monomethyl-dichloro-diphenyl methane</b>   | 81161-70-8  |
| <b>Monomethyl-tetrachloro-diphenyl methane</b>  | 76253-60-6  |



| Chemical Name   | CAS Number |
|---|------------|
| <b>Isocyanates</b>  |            |
| 1,3-Bis(isocyanatomethyl)benzene  | 3634-83-1  |
| Hexamethylene-di-isocyanate   | 822-06-0   |
| Isophorone-di-isocyanate  | 4098-71-9  |
| Tetramethylxylene-di-isocyanate   | 2778-42-9  |
| 2,4,6-Trimethyl-1,3-phenylene diisocyanate                                    | 16959-10-7 |
| <b>Diphenylmethane-di-isocyanates</b>   | Several    |
| Diphenylmethane-4,4-di-isocyanate   | 101-68-8   |
| Diphenylmethane-2,2-di-isocyanate   | 2536-05-2  |
| Diphenylmethane-2,4-di-isocyanate   | 5873-54-1  |
| Methylenediphenyl diisocyanate - mixed isomers                                | 26447-40-5 |
| <b>Toluene-di-isocyanates</b>   | Several    |
| Toluene-2,4-di-isocyanate   | 584-84-9   |
| Toluene-2,6-di-isocyanate   | 91-08-7    |
| Chemical Name   | CAS Number |
| <b>Ozone Depleting Substances (according to Regulation (EC) No 1005/2009)</b> |            |
| <b>Ozone depleting substances (CFCs) class I</b>                              | Several    |
| Trichlorofluoromethane - (CFC-11)   | 75-69-4    |
| Dichlorodifluoromethane - (CFC-12)  | 75-71-8    |
| 1,1,2-Trichloro-1,2,2-trifluoroethane - (CFC-113)                             | 76-13-1    |
| 1,1,1-Trichloro-2,2,2-trifluoroethane - (CFC-113a)                            | 354-58-5   |
| 1,2-Dichloro-1,1,2,2-tetrafluoroethane - (CFC-114)                            | 76-14-2    |
| 1,1-Dichloro-1,2,2,2-tetrafluoroethane - (CFC-114a)                           | 374-07-2   |
| Monochloropentafluoroethane - (CFC-115)                                       | 76-15-3    |
| Bromochlorodifluoromethane - (Halon-1211)                                     | 353-59-3   |

| Chemical Name  | CAS Number |
|--|------------|
| Bromotrifluoromethane - (Halon-1301)                       | 75-63-8    |
| Dibromotetrafluoroethane - (Halon-2402)                    | 124-73-2   |
| Chlorotrifluoromethane - (CFC-13)                          | 75-72-9    |
| Pentachlorofluoroethane - (CFC-111)                        | 354-56-3   |
| 1,1,2,2-Tetrachloro-1,2-difluoroethane - (CFC-112)         | 76-12-0    |
| 1,1,1,2-Tetrachlorodifluoroethane - (CFC-112a)             | 76-11-9    |
| Heptachlorofluoropropane - (CFC-211)                       | 422-78-6   |
| Hexachlorodifluoropropane - (CFC-212)                      | 3182-26-1  |
| Pentachlorotrifluoropropane - (CFC-213)                    | 2354-06-5  |
| Tetrachlorotetrafluoropropane - (CFC-214)                  | 29255-31-0 |
| 1,1,1,3-Tetrachloro-2,2,3,3-tetrafluoropropane - (CFC-214) | 2268-46-4  |
| 1,1,3-Trichloropentafluoropropane                          | 76-17-5    |
| 1,2,3-Trichloropentafluoropropane - (CFC-215)              | 1652-81-9  |
| 1,1,1-Trichloropentafluoropropane                          | 4259-43-2  |
| 1,2,2-Trichloropentafluoropropane                          | 1599-41-3  |
| Dichlorohexafluoropropane - (CFC-216)                      | 661-97-2   |
| 1,3-dichloro-1,1,2,2,3,3-hexafluoropropane - (CFC-216ca)   | 662-01-1   |
| Monochloroheptafluoropropane - (CFC-217)                   | 422-86-6   |
| 2-Chloro-1,1,1,2,3,3,3-heptafluoropropane - (CFC-217ba)    | 76-18-6    |
| Carbon tetrachloride - (CTC)                               | 56-23-5    |
| Methyl bromide   | 74-83-9    |
| Dibromofluoromethane - (HBFC-21 B2)                        | 1868-53-7  |
| Bromodifluoromethane - (HBFC-22 B1)                        | 1511-62-2  |
| Bromofluoromethane - (HBFC-31 B1)                          | 373-52-4   |
| Tetrabromofluoroethane - (HBFC-121 B4)                     | 353-93-5   |



| Chemical Name  | CAS Number  |
|--|-------------|
| Tribromodifluoroethane - (HBFC-122 B3)                         | 353-97-9    |
| 1,2-Dibromo-1,1,2-trifluoroethane - (HBFC-123 B2 / Halon 2302) | 354-04-1    |
| Bromotetrafluoroethane - (HBFC-124 B1)                         | 354-07-4    |
| Tribromofluoroethane - (HBFC-131 B3)                           | 172912-75-3 |
| 1,2-Dibromo-1,1-difluoroethane - (HBFC-132 B2)                 | 75-82-1     |
| Bromotrifluoroethane - (HBFC-133 B1)                           |             |
| 1-Bromo-2,2,2-trifluoroethane - (HBFC-133a B1)                 | 421-06-7    |
| 1,2-Dibromofluoroethane - (HBFC-141 B2)                        | 358-97-4    |
| 2-Bromo-1-1-difluoroethane - (HBFC-142 B1)                     | 359-07-9    |
| 1-Bromo-2-fluoroethane - (HBFC-151 B1)                         | 762-49-2    |
| Hexabromofluoropropane - (HBFC-221 B6)                         |             |
| Pentabromodifluoropropane - (HBFC-222 B5)                      |             |
| Tetrabromotrifluoropropane - (HBFC-223 B4)                     |             |
| Tribromotetrafluoropropane - (HBFC-224 B3)                     | 666-48-8    |
| Dibromopentafluoropropane - (HBFC-225 B2)                      | 431-78-7    |
| Bromohexafluoropropane - (HBFC-226 B1)                         | 2252-79-1   |
| Pentabromofluoropropane - (HBFC-231 B5)                        |             |
| Tetrabromodifluoropropane - (HBFC-232 B4)                      | 148875-98-3 |
| Tribromotrifluoropropane - (HBFC-233 B3)                       | 431-48-1    |
| Dibromotetrafluoropropane - (HBFC-234 B2)                      | 460-86-6    |
| Bromopentafluoropropane - (HBFC-235 B1)                        | 460-88-8    |
| Tetrabromofluoropropane - (HBFC-241 B4)                        |             |
| Tribromodifluoropropane - (HBFC-242 B3)                        | 666-25-1    |
| Dibromotrifluoropropane - (HBFC-243 B2)                        | 460-60-6    |
| Bromotetrafluoropropane - (HBFC-244 B1)                        | 460-67-3    |
| Tribromofluoropropane - (HBFC-251 B1)                          | 75372-14-4  |

| Chemical Name                                     | CAS Number |
|---|------------|
| Dibromodifluoropropane - (HBFC-252 B2)            | 51584-25-9 |
| 3-Bromo-1,1,1-trifluoropropane - (HBFC-253 B1)    | 460-32-2   |
| 1,2-Dibromo-3-fluoropropane - (HBFC-261 B2)       | 453-00-9   |
| Monobromodifluoropropane - (HBFC-262 B1)          | 461-49-4   |
| 1-Bromo-2-fluoropropane - (HBFC-271 B1)           | 1871-72-3  |
| Chlorobromomethane - (BCM / Halon-1011)           | 74-97-5    |
| <b>Ozone depleting substances (CFCs) class II</b> | Several    |
| 1-Bromopropane - (HBC 280 B1 / n-PB)              | 106-94-5   |
| Bromoethane - (HBC 160 B1 / EtBr)                 | 74-96-4    |
| Trifluoroiodomethane - (FIC 013 I1 / TFIM)        | 2314-97-8  |
| Methyl chloride - (HCC 040 / MC)                  | 74-87-3    |
| Dichlorofluoromethane - (HCFC-21)                 | 75-43-4    |
| Monochlorodifluoromethane - (HCFC-22)             | 75-45-6    |
| Monochlorofluoromethane - (HCFC-31)               | 593-70-4   |
| 1,1,2,2-Tetrachloro-1-fluoroethane - (HCFC-121)   | 354-14-3   |
| 1,1,1,2-Tetrachloro-2-fluoroethane - (HCFC-121a)  | 354-11-0   |
| Trichlorodifluoroethane - (HCFC-122)              | 354-21-2   |
| Dichlorotrifluoroethane - (HCFC-123)              | 306-83-2   |
| 1,2-Dichloro-1,1,2-trifluoroethane - (HCFC-123a)  | 354-23-4   |
| Monochlorotetrafluoroethane - (HCFC-124)          | 2837-89-0  |
| 1-Chloro-1,1,2,2-tetrafluoroethane - (HCFC-124a)  | 354-25-6   |
| Trichlorofluoroethane - (HCFC-131)                | 359-28-4   |
| 1,2-Dichloro-1,2-difluoroethane - (HCFC-132)      | 431-06-1   |
| 1,2-Dichloro-1,1-difluoroethane - (HCFC-132b)     | 1649-08-7  |
| Monochlorotrifluoroethane - (HCFC-133)            | 1330-45-6  |



| Chemical Name   | CAS Number  |
|---|-------------|
| 2-Chloro-1,1,1-trifluoroethane - (HCFC-133a)              | 75-88-7     |
| 1,2-Dichloro-1-fluoroethane - (HCFC-141)                  | 430-57-9    |
| Dichlorofluoroethane - (HCFC-141b)                        | 1717-00-6   |
| Chlorodifluoroethane - (HCFC-142)                         |             |
| Monochlorodifluoroethane - (HCFC-142b)                    | 75-68-3     |
| Chlorofluoroethane - (HCFC-151)                           |             |
| 1-Chloro-1-fluoroethane - (HCFC-151a)                     | 1615-75-4   |
| Hexachlorofluoropropane - (HCFC-221)                      | 29470-94-8  |
| Pentachlorodifluoropropane - (HCFC-222)                   | 134237-36-8 |
| 1,1,1,3,3-Pentachloro-2,2-difluoropropane - (HCFC-222c)   | 422-49-1    |
| Tetrachlorotrifluoropropane - (HCFC-223)                  | 29470-95-9  |
| 1,1,3,3-Tetrachloro-1,2,2-trifluoropropane - (HCFC-223ca) | 422-52-6    |
| Trichlorotetrafluoropropane - (HCFC-224)                  | 127564-91-4 |
| 1,3,3-Trichloro-1,1,2,2-tetrafluoropropane - (HCFC-224ca) | 422-54-8    |
| Dichloropentafluoropropane - (HCFC-225)                   |             |
| Dichloropentafluoropropane - (HCFC-225ca)                 | 422-56-0    |
| Dichloropentafluoropropane - (HCFC-225cb)                 | 507-55-1    |
| Chloro-1,1,2,2,3,3-hexafluoropropane - (HCFC-226cb)       | 422-55-9    |
| Monochlorohexafluoropropane - (HCFC-226)                  | 28987-04-4  |
| 2-Chloro-1,1,1,3,3,3-hexafluoropropane - (HCFC-226da)     | 431-87-8    |
| Pentachlorofluoropropane - (HCFC-231)                     | 421-94-3    |
| 1,1,3,3-Tetrachloro-2,2-difluoropropane - (HCFC-232ca)    | 1112-14-7   |
| 1,1,3-Trichloro-1,2,2-trifluoropropane - (HCFC-233cb)     | 421-99-8    |
| Tetrachlorodifluoropropane - (HCFC-232)                   | 460-89-9    |
| Trichlorotrifluoropropane - (HCFC-233)                    | 7125-84-0   |

| Chemical Name  | CAS Number                |
|--|---------------------------|
| Dichlorotetrafluoropropane - (HCFC-234)              | 127564-83-4               |
| 1-Chloro-1,2,2,3,3-pentafluoropropane - (HCFC-235ca) | 679-99-2                  |
| Monochloropentafluoropropane - (HCFC-235)            | 460-92-4                  |
| Tetrachlorofluoropropane - (HCFC-241)                | 134190-49-1               |
| Trichlorodifluoropropane - (HCFC-242)                | 127564-90-3               |
| Dichlorotrifluoropropane - (HCFC-243)                | 116890-51-8               |
| Monochlorotetrafluoropropane - (HCFC-244)            | 134190-50-4               |
| Trichloromonofluoropropane - (HCFC-251)              | 134190-51-5               |
| Dichlorodifluoropropane - (HCFC-252)                 | 134190-52-6               |
| Monochlorotrifluoropropane - (HCFC-253)              | 134237-44-8<br>26588-23-8 |
| 3-Chloro-1,1,1-trifluoropropane - (HCFC-253fb)       | 460-35-5                  |
| Dichlorofluoropropane - (HCFC-261)                   | 420-97-3                  |
| 1-Chloro-2,2-difluoropropane - (HCFC-262ca)          | 420-99-5                  |
| 2-Chloro-2-fluoropropane - (HCFC-271b)               | 420-44-0                  |
| Monochlorodifluoropropane - (HCFC-262)               | 421-02-3                  |
| Monochlorofluoropropane - (HCFC-271)                 | 430-55-7                  |
| Chemical Name  | CAS Number                |
| Pesticides   |                           |
| Aldrin   | 309-00-2                  |
| Azinphos methyl                                      | 86-50-0                   |
| Azinphos-ethyl                                       | 2642-71-9                 |
| Bromophos-ethyl                                      | 4824-78-6                 |
| Captafol   | 2425-06-1                 |
| Carbaryl   | 63-25-2                   |



| Chemical Name   | CAS Number                 |
|---|----------------------------|
| Chlordane   | 57-74-9                    |
| Chlordecone   | 143-50-0                   |
| Chlordimeform   | 6164-98-3                  |
| Chlorfenvinphos   | 470-90-6                   |
| Chlorobenzilate   | 510-15-6                   |
| Clothianidin  | 210880-92-5                |
| Coumaphos   | 56-72-4                    |
| Cyfluthrin  | 68359-37-5<br>1820573-27-0 |
| Cyhalothrin, lambda   | 91465-08-6                 |
| Cypermethrin  | 52315-07-8                 |
| Deltamethrin  | 52918-63-5                 |
| Diazinon  | 333-41-5                   |
| o,p'-Dichlorodiphenyl-dichloroethane  | 53-19-0                    |
| p,p'-Dichlorodiphenyldichloroethane   | 72-54-8                    |
| o,p'-Dichlorodiphenyl-dichloroethylene  | 3424-82-6                  |
| p,p'-Dichlorodiphenyl-dichloroethylene  | 72-55-9                    |
| o,p'-Dichlorodiphenyl-trichloroethane and its isomers - preparations containing DDT and its isomers | 789-02-6                   |
| p,p'-Dichlorodiphenyl-trichloroethane and its isomers - preparations containing DDT and its isomers | 50-29-3                    |
| Dichlorprop   | 120-36-5                   |
| Dicrotophos   | 141-66-2                   |
| Dieldrin  | 60-57-1                    |
| Dimethoate  | 60-51-5                    |
| Dinotefuran   | 165252-70-0                |

| Chemical Name      | CAS Number                 |
|--------------------|----------------------------|
| Endosulfan, alpha  | 959-98-8                   |
| Endosulfan, beta   | 33213-65-9                 |
| Endrin             | 72-20-8                    |
| Esfenvalerate      | 66230-04-4                 |
| Ethyl parathion    | 56-38-2                    |
| Fenvalerate        | 51630-58-1                 |
| Heptachlor         | 76-44-8                    |
| Heptachlor epoxide | 1024-57-3                  |
| Imidacloprid (ISO) | 138261-41-3<br>105827-78-9 |
| Isodrin            | 465-73-6                   |
| Kelevan            | 4234-79-1                  |
| Malathion          | 121-75-5                   |
| MCPA               | 94-74-6                    |
| MCPB               | 94-81-5                    |
| Mecoprop           | 93-65-2                    |
| Methamidophos      | 10265-92-6                 |
| Methoxychlor       | 72-43-5                    |
| Methyl parathion   | 298-00-0                   |
| Mevinophos         | 7786-34-7                  |
| Mirex              | 2385-85-5                  |
| Monocrotophos      | 6923-22-4                  |
| Perthane           | 72-56-0                    |
| Phosphamidon       | 13171-21-6                 |
| Profenophos        | 41198-08-7                 |



| Chemical Name   | CAS Number  |
|---|-------------|
| Propetamphos  | 31218-83-4  |
| Quinalphos  | 13593-03-8  |
| Strobane  | 8001-50-1   |
| Telodrin  | 297-78-9    |
| Thiacloprid   | 111988-49-9 |
| Thiamethoxam  | 153719-23-4 |
| Toxaphene   | 8001-35-2   |
| Tribufos (DEF)  | 78-48-8     |
| Trifluralin - containing < 0.5 ppm NPDA                                   | 1582-09-8   |
| <b>Acetamiprid, its salts, esters and compounds</b>                       | Several     |
| Acetamiprid (ISO)   | 135410-20-7 |
| Acetamiprid [2]   | 160430-64-8 |
| <b>2,4-Dichlorophenoxyacetic acid, its salts, esters and compounds</b>    | Several     |
| 2,4-Dichlorophenoxy acetic acid   | 94-75-7     |
| <b>Dinoseb, its salts, esters and acetate</b>                             | Several     |
| Dinoseb   | 88-85-7     |
| <b>Hexachlorocyclohexane, all isomers</b>                                 | 608-73-1    |
| Lindane (ISO)   | 58-89-9     |
| <b>Nitenpyram, its salts, esters and compounds</b>                        | Several     |
| Nitenpyram [1]  | 150824-47-8 |
| Nitenpyram [2]  | 120738-89-8 |
| <b>2,4,5-Trichlorophenoxyacetic acid, its salts, esters and compounds</b> | Several     |
| 2,4,5-Trichlorophenoxy acetic acid  | 93-76-5     |

| Chemical Name  | CAS Number |
|--|------------|
| <b>PFAS (Poly- and perfluoroalkyl substances)</b>  |            |
| <b>Perfluorooctane sulfonic acid and its derivatives</b>   | Several    |
| <i>Perfluorooctane sulfonic acid and its salts</i>   | Several    |
| Diethanolamine perfluorooctane sulfonate   | 70225-14-8 |
| Ammonium perfluorooctane sulfonate   | 29081-56-9 |
| Lithium perfluorooctane sulfonate  | 29457-72-5 |
| Perfluorooctane sulfonic acid  | 1763-23-1  |
| Perfluorooctane sulfonate  | 45298-90-6 |
| Potassium heptadecafluoro-octane-1-sulphonate  | 2795-39-3  |
| <i>Perfluorooctane sulfon amides</i>   | Several    |
| Perfluorooctane sulfonamide  | 754-91-6   |
| Heptadecafluoro-N-methyloctane sulfonamide   | 31506-32-8 |
| <i>Perfluorooctane sulfon amidoethanols</i>  | Several    |
| Heptadecafluoro-N-methyloctane sulfonamideethanol  | 24448-09-7 |
| 1-Octanesulfonamide, N-ethyl-1,1,2,2,3,3,4,4,5,5,6,6,7,7,8,8,8-heptadecafluoro-                    | 4151-50-2  |
| 1-Octanesulfonamide, N-ethyl-1,1,2,2,3,3,4,4,5,5,6,6,7,7,8,8,8-heptadecafluoro-N-(2-hydroxyethyl)- | 1691-99-2  |
| <i>Perfluorooctane sulfon amidoethyl (meth)acrylates</i>   | Several    |
| <i>Perfluorooctane sulfon halides</i>  | Several    |
| 1-Octanesulfonyl fluoride, 1,1,2,2,3,3,4,4,5,5,6,6,7,7,8,8,8-heptadecafluoro-                      | 307-35-7   |
| <i>Perfluorooctane sulfon polymers</i>   | Several    |
| <b>Perfluorohexanoic acid and its salts</b>  | Several    |
| Perfluorohexanoic acid - (PFHxA)   | 307-24-4   |
| <b>Perfluoroheptanoic acid and its salts</b>   | Several    |
| Perfluoroheptanoic acid  | 375-85-9   |



| Chemical Name  | CAS Number |
|--|------------|
| Potassium perfluoroheptanoate  | 21049-36-5 |
| <b>Perfluorooctanoic acid and its salts</b>                                      | Several    |
| Perfluorooctanoic acid - (PFOA)  | 335-67-1   |
| Ammonium pentadecafluoro octanoate   | 3825-26-1  |
| Octanoic acid, 2,2,3,3,4,4,5,5,6,6,7,7,8,8,8-pentadecafluoro-, sodium salt (1:1) | 335-95-5   |
| Potassium perfluorooctanoate   | 2395-00-8  |
| <b>Perfluorooctanoic acid related substances</b>                                 | Several    |
| Methyl perfluorooctanoate  | 376-27-2   |
| Ethyl perfluorooctanoate   | 3108-24-5  |
| <b>Perfluorooctylethyl alcohols</b>  | Several    |
| 8:2 Fluorotelomer alcohols (8:2 FTOH)  | 678-39-7   |
| <b>Perfluorooctylethyl olefins</b>   | Several    |
| Perfluorooctylethene   | 21652-58-4 |
| <b>Perfluorooctylethyl halides</b>   | Several    |
| Heptadecafluoro-1-iodooctane   | 507-63-1   |
| 1H,1H,2H,2H-Perfluorodecyl iodide  | 2043-53-0  |
| Pentadecafluorooctyl fluoride  | 335-66-0   |
| <b>Perfluorooctylethyl acrylate or methacrylate</b>                              | Several    |
| <b>Perfluorooctylethyl polymers</b>  | Several    |
| <b>Perfluorocarboxylic acid (C9-C14) related substances</b>                      | Several    |
| <b>Perfluorodecanoic acid related substances</b>                                 | Several    |
| 10:2 Fluorotelomer alcohol - (10:2 FTOH)   | 865-86-1   |
| Chemical Name  | CAS Number |
| <b>Plasticizers</b>  |            |
| <b>Phthalic acid esters</b>  | Several    |

| Chemical Name  | CAS Number  |
|--|-------------|
| Bis-(2-methoxyethyl) phthalate - (DMEP)  | 117-82-8    |
| Butylbenzyl phthalate - (BBP)  | 85-68-7     |
| Dimethyl phthalate - (DMP)   | 131-11-3    |
| Diethyl phthalate - (DEP)  | 84-66-2     |
| Di-n-propyl phthalate - (DPRP)   | 131-16-8    |
| Dibutyl phthalate - (DBP)  | 84-74-2     |
| Di-iso-butyl phthalate - (DIBP)  | 84-69-5     |
| Di-n-pentyl phthalate - (DnPP)   | 131-18-0    |
| Di-iso-pentyl phthalate - (DIPP)   | 605-50-5    |
| n-Pentyl-isopentyl phthalate   | 776297-69-9 |
| Di-n-hexyl phthalate - (DnHP)  | 84-75-3     |
| Di-cyclohexyl phthalate - (DCHP)   | 84-61-7     |
| Di-iso-hexyl phthalate - (DIHxP)   | 71850-09-4  |
| Di-n-octyl phthalate - (DnOP)  | 117-84-0    |
| Di-iso-octyl phthalate - (DIOP)  | 27554-26-3  |
| Diethylhexyl phthalate - (DEHP)  | 117-81-7    |
| Dinonyl phthalate - (DNP)  | 84-76-4     |
| <i>1,2-Benzenedicarboxylic acid, di-C6-8-branched alkylesters, C7-rich</i>                             | 71888-89-6  |
| <i>1,2-Benzenedicarboxylic acid, benzyl C7-9-branched and linear alkyl esters</i>                      | 68515-40-2  |
| <i>1,2-Benzenedicarboxylic acid, di-C7-11-branched and linear alkylesters</i>                          | 68515-42-4  |
| <i>1,2-Benzenedicarboxylic acid, dipentylester, branched and linear</i>                                | 84777-06-0  |
| <i>1,2-Benzenedicarboxylic acid, dihexyl ester, branched and linear</i>                                | 68515-50-4  |
| <i>1,2-Benzenedicarboxylic acid, di-C6-10-alkyl esters or mixed decyl and hexyl and octyl diesters</i> | Several     |



| Chemical Name  | CAS Number |
|--|------------|
| 1,2-Benzenedicarboxylic acid, di-C6-10-alkyl esters                    | 68515-51-5 |
| 1,2-Benzenedicarboxylic acid, mixed decyl and hexyl and octyl diesters | 68648-93-1 |
| <i>Di-iso-nonyl phthalate - (DINP)</i>                                 | Several    |
| Di-iso-nonyl phthalate - iso & n-Butene based                          | 68515-48-0 |
| <i>Di-iso-decyl phthalate - (DIDP)</i>                                 | Several    |
| Di-iso-decyl phthalate [1]   | 26761-40-0 |
| Di-iso-decyl phthalate [2]   | 68515-49-1 |
| Chemical Name  | CAS Number |
| Polyaromatic hydrocarbons (PAHs)                                       |            |
| Dibenzo[def,p]chrysene   | 191-30-0   |
| Acenaphthene   | 83-32-9    |
| Acenaphthylene   | 208-96-8   |
| Anthracene   | 120-12-7   |
| Benzo[ <i>rst</i> ]pentaphene  | 189-55-9   |
| Benzo[ghi]perylene   | 191-24-2   |
| Cyclopenta[ <i>c,d</i> ]pyrene   | 27208-37-3 |
| Dibenzo[ <i>b,def</i> ]chrysene  | 189-64-0   |
| Fluoranthene   | 206-44-0   |
| Fluorene   | 86-73-7    |
| Indeno(1,2,3- <i>cd</i> ) pyrene                                       | 193-39-5   |
| Naphthalene  | 91-20-3    |
| Naphtho[1,2,3,4- <i>def</i> ]chrysene                                  | 192-65-4   |
| Phenanthrene   | 85-01-8    |
| Pyrene   | 129-00-0   |
| Methylpyrene, 1-   | 2381-21-7  |