

## List of declarable substances (status April 2013)

Code	Substance/substance group	CAS No.	Typical applications	Limit value (% w/w)	Reference of the limit value	Special legal requirements
<b>Electrical and electronic components; metal, glass and ceramic parts</b>						
100	Arsenic Arsenic compounds	7440-38-2	Lead and copper alloys, metal adhesives, soft solders, glasses, semiconductors	0.1	Application	
200	Beryllium Beryllium compounds	7440-41-7	Contact and spring materials, copper alloys, high-temperature materials, ceramics, glasses	0.1	Application	
300	Lead Lead compounds	7439-92-1	Solders, hybrid circuits, ceramics, glasses	0.1	Homogeneous material	RoHS
400	Cadmium Cadmium compounds	7440-43-9	Contact coatings, hard and soft solders, glasses	0.1	Homogeneous material	RoHS
500	Chromium (VI) compounds		Anti-corrosion coatings	0.1	Homogeneous material	RoHS
600	Mercury Mercury compounds	7439-97-6	Discharge lamps, relays, switches	0.1	Homogeneous material	RoHS
700	Polybrominated biphenyls (PBBs)		Flame-protected plastics in components and printed circuit boards	0.1	Homogeneous material	RoHS
800	Polybrominated diphenylethers (PBDEs), in particular - Pentabromodiphenylether (PentaBDE) - Octabromodiphenylether (OctaBDE) - Decabromodiphenylether (DecaBDE)	32534-81-9 32536-52-0 1163-19-5	Flame-protected plastics in components and printed circuit boards	0.1	Homogeneous material	RoHS
900	Radioactive substances		Measuring devices, dischargers	Intentionally added	Application	

Plastics and rubber parts, wire insulation, coats of lacquer						
700	Polybrominated biphenyls (PBBs)		Flame-protected plastics	0.1	Homogeneous material	RoHS
800	Polybrominated diphenylethers (PBDEs), in particular - Pentabromodiphenylether (PentaBDE) - Octabromodiphenylether (OctaBDE) - Decabromodiphenylether (DecaBDE)	32534-81-9 32536-52-0 1163-19-5	Flame-protected plastics	0.1	Homogeneous material	RoHS
1000	Hexabromocyclododecane (HBCCD), including all major diastereoisomers: - Alpha-HBCCD - Beta-HBCCD - Gamma-HBCCD	25637-99-4 3194-55-6 (134237-50-6) (134237-51-7) (134237-52-8)	Flame-protected plastics	0.1	Article	REACH
1100	Other brominated flame retardants than PBBs, PBDEs and HBCCD		Flame-protected plastics	0.1	Application	
1200	Antimony trioxide	1309-64-4	Flame-protected plastics containing brominated flame retardants, laser-writable plastics	0.1	Application	
1300	Dibutyl phthalate (DBP)	84-74-2	Plasticized plastics, particularly PVC	0.1	Article	REACH
1400	Diisobutyl phthalate (DIBP)	84-69-5	Plasticized plastics, particularly PVC	0.1	Article	REACH
1500	Bis(2-ethylhexyl)phthalate (di-ethylhexylphthalate, DEHP)	117-81-7	Plasticized plastics, particularly PVC	0.1	Article	REACH
1600	Benzyl butyl phthalate (BBP)	85-68-7	Plasticized plastics, particularly PVC	0.1	Article	REACH
1610	1,2-Benzenedicarboxylic acid, di-C7-11-branched and linear alkyl esters (di[heptyl, nonyl, undecyl] phthalate, DHNUP)	68515-42-4	Plasticized plastics, particularly PVC	0.1	Article	

1620	1,2-Benzenedicarboxylic acid, di-C6-8-branched alkyl esters, C7-rich (diisooheptyl phthalate, DIHP)	71888-89-6	Plasticized plastics, particularly PVC	0.1	Article	
1650	Bis(2-methoxyethyl)phthalate	117-82-8	Plasticized plastics, particularly PVC	0.1	Article	
1700	Short-chain chlorinated paraffins (C10-C13) Other chlorinated paraffins		Plasticized and flame-protected plastics, rubber and sealing compounds	0.1	Article	REACH
1800	Tris(2-chloroethyl)phosphate (TCEP)	115-96-8	Plasticized and flame-protected plastics, flame-protected paints and varnishes	0.1	Article	REACH
1900	Polycyclic aromatic hydrocarbons (PAHs, creosote)		Plasticized or dyed plastics, rubber-like materials	0.02	Application	
<b>Dyed or stabilized plastics, coats of lacquer, enamels and related materials</b>						
2000	Lead chromate	7758-97-6	Pigmented paints and varnishes, anti-corrosion coatings	0.1	Article	REACH
2100	Lead chromate molybdate sulfate red (C.I. Pigment Red 104)	12656-85-8	Pigmented plastics and paints	0.1	Article	REACH
2200	Lead sulfochromate yellow (C.I. Pigment Yellow 34)	1344-37-2	Pigmented plastics and paints	0.1	Article	REACH
300	Other Lead compounds		Pigmented plastics and other materials, stabilized plastics (in particular PVC)	0.1	Homogeneous material	RoHS
400	Cadmium compounds		Pigmented plastics and other materials, stabilized plastics (in particular PVC)	0.01	Homogeneous material	RoHS
500	Chromium (VI) compounds		Pigmented plastics and other materials	0.1	Homogeneous material	RoHS
2300	Azo colourants and azo dyes which can form carcinogenic aromatic amines		Dyed plastics, textiles and leather articles	0.1	Application	
2350	Bis(tributyltin)oxide	56-35-9	Antifouling paints for ships and cooling towers	0.1	Article	

<b>Insulating materials</b>						
2400	Asbestos	1332-21-4	Insulating materials in buildings, industrial systems and appliances	0.1	Application	
2500	Man-made vitreous (silicate) fibres with random orientation with oxides of sodium, potassium, calcium, magnesium and barium content > 18 % by mass		Insulating materials in buildings, industrial systems and appliances	0.1	Application	
2600	Aluminosilicate, refractory ceramic fibres		High-temperature insulating materials in buildings, industrial systems and appliances	0.1	Article	REACH
2700	Zirconia aluminosilicate, refractory ceramic fibres		High-temperature insulating materials in buildings, industrial systems and appliances	0.1	Article	REACH
<b>Other materials (e.g. wood)</b>						
2750	Acrylamide	79-06-1	Grouting	0.1	Application	
100	Arsenic compounds		Biocide-treated wood	0.1	Application	
2800	Formaldehyde	50-00-0	Wooden materials	0.1 ml/m <sup>3</sup>	Application	
2900	Pentachlorophenol (PCP) Pentachlorophenol, sodium salt Other PCP salts and compounds	87-86-5 131-52-2	Fungicide-treated wood, textiles and leather articles	0.0005	Application	
2350	Bis(tributyltin)oxide	56-35-9	Fungicide-treated wood, textiles and leather articles	0.1	Article	
2950	Bis(2methoxyethyl)ether	111-96-6	Elektrolytes in lithium batteries, solvent in printing inks and sealants	0.1	Article	
<b>Coolants, insulating gases and liquids, fire extinguishing agents</b>						
3000	CFCs and halons		Aerosols, coolants, fire extinguishing agents, insulating foams	1.0	Application	
3100	HCFCs		Coolants	1.0	Application	
3200	FCs		Coolants, fire extinguishing agents	1.0	Application	
3300	HFCs		Coolants, insulating foams	1.0	Application	

3400	HBrFCs (C1 bis C3)		Fire extinguishing agents	1.0	Application	
3500	Sulfur hexafluoride (SF6)	2551-62-4	Insulating and quenching gas in electrotechnical systems, appliances and components	0.1	Application	
3600	Polychlorinated biphenyls (PCBs) Polychlorinated terphenyls (PCTs) Polychlorinated naphthalenes (PCNs)		Insulating agents in transformers, hydraulic fluids, heat transmission fluids	0.005	Application	
3700	Perfluorooctane sulfonic acid and its metal salts, halides, amides, and other derivatives including polymers (perfluorooctane sulfonates, PFOS)		Fire-fighting foams	0.1	Application	
<b>Packaging</b>						
3800	Cobalt(II) chloride	7646-79-9	Blue silica gel in desiccant bags (package insert)	0.1	Article	REACH
3900	Boric acid	10043-35-3 11113-50-1	Flame retardant in wood, paper, cotton and other plant-derived materials	0.1	Article	
4000	Disodium tetraborate, anhydrous	1330-43-4	Flame retardant in wood, paper, cotton and other plant-derived materials	0.1	Article	
4100	Tetraboron disodium heptaoxide, hydrate	12267-73-1	Flame retardant in wood, paper, cotton and other plant-derived materials	0.1	Article	
4200	Lead, cadmium, hexavalent chromium, mercury		Packaging and packaging components	0.01 (total)	Application	

Explanatory notes:

Reference of the limit value:

- “Application” means that the limit value of the substance refers to the material or part where this substance is contained to achieve an intended functionality, as exemplarily given by the typical applications.
- “Article” means that the limit value refers to the supplied article (device, component or product part) as a whole.
- “Homogeneous material” is defined as material that cannot be mechanically disjointed into different materials. The term "homogeneous" means "of uniform composition throughout". Examples of homogeneous materials are individual types of plastics, ceramics, glass, metals, alloys, resins and coatings.