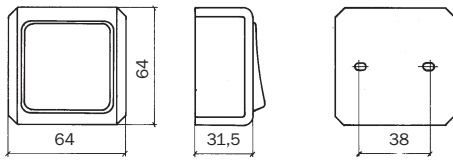
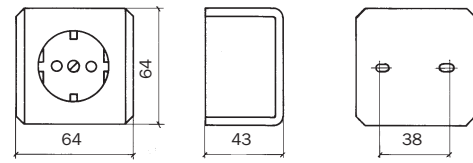


SURFACE-MOUNTED RANGES

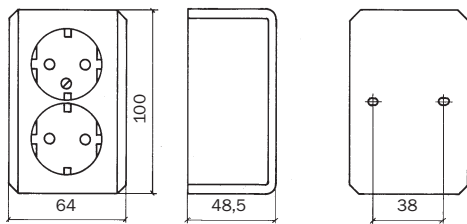
Surface-mounted range



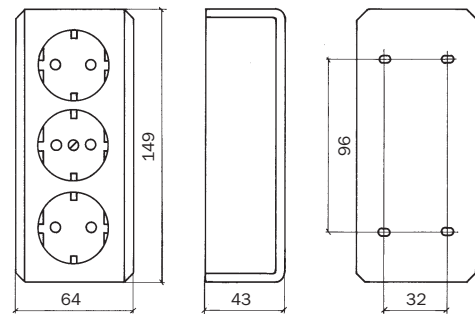
Surface-mounted rocker switch and push-button with corresponding base plate of self-extinguishing material.



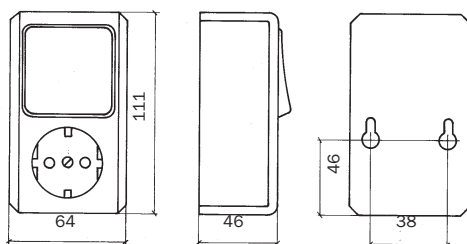
SCHUKO® socket-outlet with corresponding base plate of self-extinguishing material.



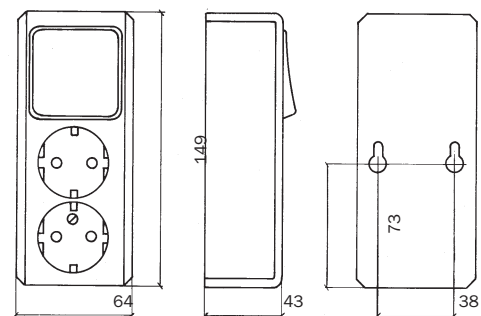
Surface-mounted SCHUKO® double socket-outlet with corresponding base plate of self-extinguishing material.



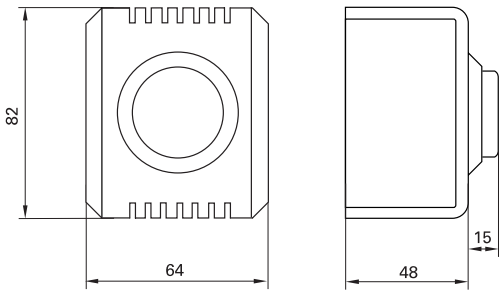
Surface-mounted SCHUKO® triple socket-outlet with corresponding base plate of self-extinguishing material.



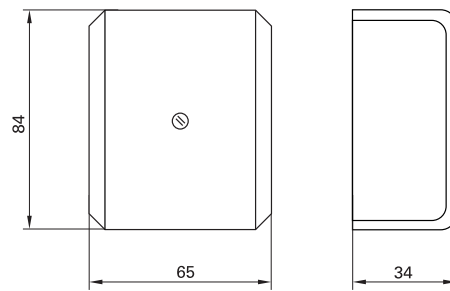
Surface-mounted SCHUKO® socket-outlet/two-way switch with corresponding base plate of self-extinguishing material.



Surface-mounted SCHUKO® double socket-outlet/two-way switch with corresponding base plate of self-extinguishing material.

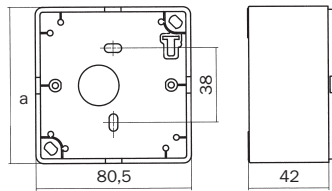


Surface-mounted dimmer
Art. no. 5734.., 5716..



Surface-mounted junction box
Art. no. 5230

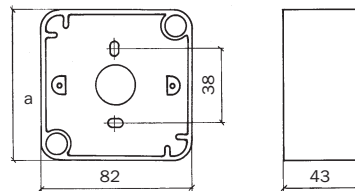
Surface-mounted housing for M-SMART, ARTEC, M1, OCTOCOLOR



Combinations

	1-gang	2-gang	3-gang
M-SMART, ARTEC, M1 OCTOCOLOR	a=80.5	a=151.5	a=222.9
Art. no.	5121..	5122..	5123..

Surface-mounted housing for ATELIER range

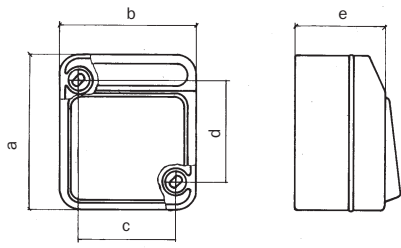


Combinations

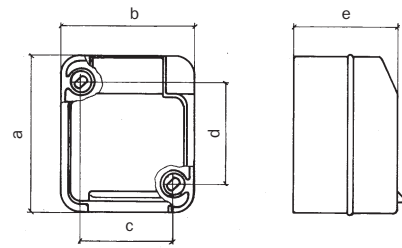
	1-gang	2-gang	3-gang
ATELIER	a=82	a=153.2	a=223.8
Art. no.	5111..	5112..	5113..

SURFACE-MOUNTED RANGES

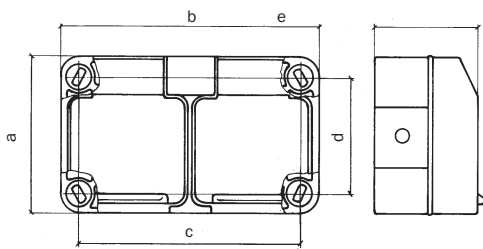
AQUASTAR, IMPACT-RESISTANT and AGRAR



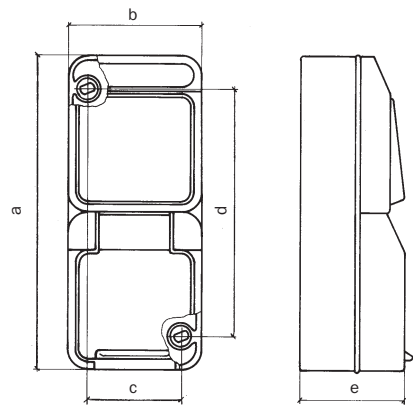
Rocker switches and rocker buttons



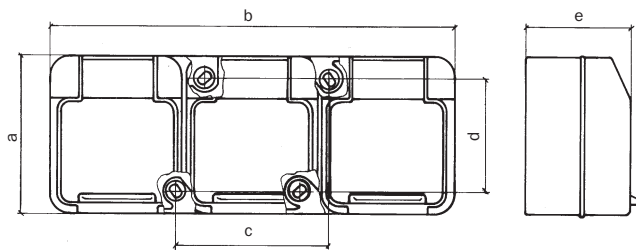
1-gang SCHUKO® socket-outlet



SCHUKO® double socket-outlet



Combination SCHUKO® socket-outlet/two-way switch



SCHUKO® triple socket-outlet

Dimensions in mm	Switches					1-gang socket-outlet					2-gang socket-outlet					3-gang socket-outlet					2-gang combination				
	a	b	c	d	e	a	b	c	d	e	a	b	c	d	e	a	b	c	d	e	a	b	c	d	e
AQUASTAR	83	73	50	53,5	49	83	73	50	55	57	83	141	115	60	55	83	220	65	58	57	167	73	50	128,5	57
IMPACT-RESISTANT blue	86	71	50	58	55	86	71	50	58	55	86	140	115	60	55	86	213	192	58	55	172	71	50	144	55
AGRAR green	86	71	50	58	55	86	71	50	58	55						86	213	192	58	55					

IMPACT-RESISTANT

Resistance of polycarbonate, the material used for the impact-resistant range.

Polycarbonate is resistant to mineral acids up to high concentrations, also many organic acids, oxidation and reducing agents, neutral and acidic saline solutions, many fats, waxes and oils, saturated aliphatic and cycloaliphatic hydrocarbons and alcohol, with the exception of methylated alcohol. In the list which follows, its resistance to chemicals and various other products is summarised. These statements apply at room temperature and are based on a six month submersion in the agents concerned. Other conditions may produce other results. The list does not claim to be comprehensive. Further agents can be covered on request.

! The specifications are compiled from data sheets provided by the manufacturers of the materials, and also from specialist literature in the plastics field. The resistance is dependent on

- Concentration of the chemicals
- Compounds of several chemicals
- Exposure time
- Exposure temperature
- Mechanical strain

A binding statement can therefore only be made following practice-based testing.

Legend

- + resistant
- 0 semi-resistant
- not resistant

Chemicals

- Acetaldehyde
- + Acetic acid, up to 10%
- Acetone
- + Acetylene
- Acrylonitrile
- + Alum
- + Aluminium chloride *
- + Aluminium sulphate*
- Ammonia
- Ammonia water
- + Ammonium chloride*
- Ammonium fluoride*
- + Ammonium nitrate*
- + Ammonium sulphate*
- Ammonium sulphide*
- Amyl acetate
- + Antimony chloride*
- + Arsenic acid, 20%
- Benzene
- + Benzine (cleaning benzene, free of aromatic compounds)
- Benzoic acid
- Benzyl alcohol
- + Borax*
- + Boric acid
- Bromine
- + Butane (liquid and gaseous)
- Butyl acetate
- + Butyl alcohol
- Butyric acid
- + Calcium chloride*
- + Calcium hypochloride
- + Calcium nitrate*
- + Calcium soap grease, pure
- Carbon disulphide
- + Carbon monoxide
- + Carbonic acid, wet
- Caustic potash solution
- Caustic soda solution
- + Chlorinated lime solution, 2% in water
- 0 Chlorine gas, dry
- Chlorine gas, wet
- + Chrome alum*
- + Chromic acid, 20% in water
- + Citric acid, 10%
- + Coal gas
- + Copper chloride*
- + Copper sulphate*
- Cresol
- Diethyl ether
- + Diethylene glycol
- + Diglycol acid, saturated in water
- Dimethylformamide
- Dioxane

- 0 Dipyl 5,3
- + Ethyl alcohol, 96% pure
- Ethyl bromide
- Ethylamine
- Ethylene chlorhydrin
- Ethylene chloride
- + Ethylene glycol
- + Fluorosilicic acid, 30%
- 0 Formic acid, 30%
- 0 Glycerine
- + Glycol
- + Heptane
- + Hexane
- + Hydrochloric acid, 20%
- Hydrochloric acid, concentrated
- + Hydrofluoric acid, 5%
- + Hydrogen peroxide, 30%
- + Hydrosulphide
- Iodine
- + Iron (II) sulphate
- + Iron (III) chloride*
- + Lactic acid, 10% solution in water
- + Manganese sulphate*
- + Mercury chloride, saturated
- Methacrylic acid methyl ester
- + Methane
- Methanol
- Methyl amine
- Methylene chloride
- 0 Milk of lime, 30% suspension in water
- + Nitric acid, 10%
- 0 Nitric acid, 10-20%
- Nitric acid, 20%
- Nitrobenzene
- Nitrous gases, dry
- + Oxalic acid, 10% in water
- + Ozone
- 0 Paraffin
- Perchlorethylene
- + Perhydrol, 30%
- 0 Petroleum ether (hydrocarbon mixture)
- Phenyl ether alcohol
- + Phosphoric acid, concentrated
- Phosphorus trichloride
- Phosphoryl chloride
- + Potassium bichromate*
- + Potassium bromide*
- + Potassium carbonate*
- + Potassium chloride*
- Potassium cyanide
- + Potassium metabisulphate, 4% in water
- + Potassium nitrate*
- + Potassium perchlorate, 10% in

- water
- + Potassium permanganate, 10% in water
- + Potassium persulphate, 10% in water
- + Potassium sulphate*
- + Potassium-aluminium-alum*
- + Propane gas
- + Propyl alcohol
- + Propionic acid, 20%
- + Recorcinol solution, 1%
- + Sodium bicarbonate*
- + Sodium bisulphite*
- + Sodium carbonate*
- + Sodium chlorate*
- + Sodium chloride*
- + Sodium hypochloride, 0.5 % solution in water
- + Sodium sulphate*
- + Sodium sulphate*
- 0 Sodium sulphide*
- + Spirit, pure
- Styrene
- + Sublimate*
- + Sulphur
- 0 Sulphur dioxide
- + Sulphuric acid, 50%
- 0 Sulphuric acid, 70%
- Sulphuric acid, concentrated
- Sulphurous acid, 10%
- Sulphuryl chloride
- + Tartaric acid, 10%
- Tetrachloroethane
- 0 Tetraethyl lead, 10% in petrol
- Tetrahydrofuran
- Tetralin
- Toluene
- 0 Trichloro acetic acid, 10%
- Trichloroethylene
- + Urea*
- Xylene
- + Zinc chloride*
- + Zinc oxide
- + Zinc sulphate*

Disinfectants

- + Buraton
- + Chloramine
- Chloroform
- + Cutasept
- + Foramin, 10%
- + Hydrogen peroxide, 30%
- + Incidin® Plus/Perfekt
- + Kodan spray
- + Lysoform, 2%
- + P3-Duolith
- Phenol
- 0 Sagrotan®, 5%
- + Spirit, pure

Washing, cleaning and rinsing agents

- + Ajax®
- Calgonit D®, DM, DA, R
- Calgonit dishwashing agent®
- + Calgonit rinsing aid®
- + Calgonit S®, 1%
- + Curd soap
- + Dor®
- + Fewa®
- + Into window cleaner®
- + Natril®
- 0 Omo®
- P 3 Asepto®
- + Parifex®, 2%
- 0 Persil®
- + Prii®
- + Rej®
- + Sidolin®
- + Soft soap
- 0 Somat W® 731
- + Suwa®

Technical oils and lubricants

- + Aral BG® 58
- + Baysilon® silicon oils
- + BP Energol EM 100®
- + BP Energol HL 100®
- + BP H LR 65®
- Brake fluid (ATE)
- + Burnishing oil Brunofix®
- + Calcium soap grease

- Camphor oil
- + Colza oil
- Cutting oil
- 0 Diesel oil
- + Esso Estic 42-45®
- + Fish oil
- 0 Heating oil
- + Hydraulic oil Cac HLP 16
- 0 Jet fuel JP 4(kp 97-209° C)
- + Mobil Special Oil 10 W 30®
- + Molikote®
- + Nato turbine oil 0-250
- + Paraffin oil
- + Shell Spirax 90 EP®
- 0 Shell Tellus 11-33®
- + Shell Tellus 33®
- + Silicone oil
- 0 Turpentine oil
- + Texaco Regal Oil BRUO®
- + Texaco Regal Oil CRUO®
- + Turbo oil 29
- 0 Valvoline WA 4-7
- 0 Varnish
- + White spirit

Adhesive and sealing agents

- 0 All-purpose adhesive
- + Cellux adhesive foils®
- + Gypsum
- + Perbunan C®
- + Terostat®
- + Tesamoll®
- + Sellotape®

Miscellaneous

- + Basilit® UAK, 20%, in water (wood preservative)
- + Battery acid (H2SO4 , approx. 35%)
- + Beef tallow
- + Butter / buttermilk
- + Castor oil
- + Cement, dry
- Cement, mixed
- + Chromoxide green (grinding paste)
- + Cleaning benzene
- + Edible vinegar
- + Exhaust gases, acidic
- + Final photo developing agent, concentration for use
- + Floor polish
- + Freon® TF, (blowing agent)
- + Freon® T-WD 602 (blowing agent)
- + Frigen®113, R 113 (blowing agent)
- + Kaltron® 113 MDR (blowing agent)
- Kerosene (aviation fuel)
- + Marlon®, 1% (wetting agent)
- Metasystox®, 0.5% (pesticide)
- + Nekal BX®, 2% (wetting agent)
- + Neutol photo developing agent, concentration for use
- + Oleic acid, concentrated
- + Orthozid® 50, 0.5% (pesticide)
- 0 Petrol, normal
- Petrol, super
- + Polyamide
- + Polyethylene
- + Polyvinyl chloride
- 0 Polyvinyl chloride, containing plasticiser
- 0 Pork lard
- + Sea water
- Shell IP 4 (fuel)
- 0 Soap suds
- + Starch
- 0 Tanigan® CLS, 30%
- 0 Tanigan® CV
- Tannic acid
- + Test petrol
- + Vegetable oils

*saturated solution in water

AGRAR

Resistance of polyamide, the material used for the AGRAR range

In the list which follows, the resistance of polyamide to chemicals and various other products is summarised. These statements apply at room temperature and are based on a six month submersion in the agents concerned. Other conditions may produce other results. The list does not claim to be comprehensive. Information concerning further agents upon request.

! The specifications are compiled from data sheets provided by the manufacturers of the materials, and also from specialist literature in the plastics field. The resistance is dependent on the

- Concentration of the chemicals
- Compounds of several chemicals
- Exposure time
- Exposure temperature
- Mechanical strain

A binding statement can therefore only be made following practice-based testing.

Legend

- + resistant
- 0 semi-resistant
- not resistant

Chemicals

- 0 Acetaldehyde
- 0 Acetic acid, 10%
- + Acetic acid, 5%
- Acetic acid, 90%
- + Acetone
- + Acetylene
- 0 Air, liquid
- 0 Allyl alcohol
- + Aluminium hydroxide
- Aluminium sulphate*
- + Ammonia water
- + Ammonia, 20%, fluid, up to 60 °C
- + Ammonia, technically pure 20%
- + Ammonium nitrate*
- + Ammonium sulphate*
- + Amyl acetate
- 0 Aniline
- 0 Anodising baths
- Antimony trichloride
- + Apple juice
- + Aromatic hydrocarbons
- + Asphalt
- + Baysilon silicon oils
- + Beef tallow
- + Beer
- 0 Benzaldehyde
- + Benzene
- 0 Benzoic acid
- 0 Benzyl alcohol
- + Bitumen
- 0 Boric acid
- + Brake fluid
- Bromine solution in water
- Bromine vapours
- + Butane (liquid or gaseous)
- + Butter
- + Butyl acetate
- + Butyl alcohol
- + Butylene glycol
- 0 Butyric acid
- + Calcium chloride*
- + Calcium hydroxide*
- + Calcium nitrate*
- + Camphor
- + Carbolineum
- + Carbon disulphide
- + Carbon monoxide
- + Carbon tetrachloride
- + Carbonic acid, wet
- + Casein
- + Castor oil
- + Caustic potash solution
- + Caustic soda solution
- + Cellulose lacquers
- + Chlorinated lime paste
- Chloroacetic acid
- + Chlorobenzene
- + Chlorofluorocarbons (e.g. Freon 12)
- 0 Chloroform
- Chromic acid, 20% in water
- 0 Citric acid, 10%
- + Citric acid, aqueous
- + Cleaning agent (manual or spray cleaning)
- + Cleaning benzene

- + Cobalt salts, aqueous
- + Cognac, 38 %
- + Concrete
- 0 Coolants
- 0 Copper sulphate*
- Cresols
- + Crude oil
- + Crude oil, natural gas
- + Cutting oil
- + Cyclohexane
- + Cyclohexanol
- + Cyclohexanone
- + Decalcifier
- + Decalin (decahydronaphthalene)
- De-icing salt and solutions
- + Developer
- + Dibutyl phtalate (softener)
- + Diesel fuel as per DIN 51 601
- 0 Diethyl ether
- 0 Diethylene glycol
- + Dimethyl formamide
- + Dioxane
- + Diphyl 5,3
- + Disinfectant, active chlorine
- + Disinfectant, alcohols
- + Disinfectant, aldehyde
- 0 Disinfectant, phenols
- + Disinfectant, quaternary ammonium compound
- + Disinfection process, phys.: Boil 0.5% soda, HDH, VDV, vapour circulation process radiation 2.5 mRad, 6 hours
- + Edible oils
- 0 Electroplating baths
- + Engine oils
- 0 Ether
- + Ethereal oils
- + Ethyl alcohol, 40%
- 0 Ethyl alcohol, 96% pure
- 0 Ethyl glycol
- + Ethylene chloride
- + Exhaust gases
- + Fatty acids
- + Fertiliser
- + Floor polish
- Fluorine
- + Formaline 10%
- 0 Formic acid, <10 %
- + Fruit juices
- + Fruit juices
- + Fruit syrup (raspberry)
- + Fuels
- + Gas sterilisation
- + Gear oil
- + Gelatins and glue
- + Glycerine
- 0 Glycol
- 0 Glysantine 30%
- + Grapefruit juice
- + Greases and waxes, lubricants, edible fats, silicone greases
- + Gypsum
- 0 Hair dyes
- + Heating oil EL as per DIN 51 603
- + Heptane

- + Hexane
- 0 Humic acid
- + Hydraulic oils H and HL as per DIN 51 524
- Hydrobromic acid
- Hydrochloric acid
- Hydrogen chloride gas
- + Hydrogen gas
- Hydrogen iodide
- Hydrogen peroxide, 30%
- + Hydrogen peroxide, aqueous 0.5%
- + Hydrogen phosphide
- + Hydrogen sulphide
- + Impregnating oil
- + Incidin® Plus/Perfekt
- + Inert gases
- + Ink, tusche
- Iodine in alcohol (iodine tincture)
- + Iron (II) sulphate
- + Iron (III) chloride*
- + Isopropyl alcohol
- + Juniper
- 0 Ketones
- + Lactic acid**
- Lithium salts
- + Lubricating grease R2 Darina
- + Lubricating greases
- + Lubricating oils HD
- 0 Lubricating oils without HD
- + Magnesium chloride*
- + Magnesium sulphate*
- 0 Maleic acid
- + Malic acid
- + Malt
- Manganese salts, aqueous 10%
- + Margarine
- + Mercury
- + Mercury (II) chloride, aqueous
- + Methane
- + Methanol, technically pure
- + Methyl amine
- + Methyl ethyl ketone
- + Methylene chloride
- + Milk
- Mixed acids
- + Molasses
- + Mortar, cement
- + Mould fungi
- + Naphtha
- + Naphthaline
- Naphthols
- 0 Nickel baths
- 0 Nickel salts
- Nitric acid, 10%
- Nitric acid, 10% - 20%
- 0 Nitrobenzene
- 0 Nitrocellulose lacquer
- 0 Nitrogen oxides
- Nitrohydrochloric acid
- 0 Nitromethane
- 0 Nitrous gases, dry
- + Oils, ethereal, plant
- + Oleic acid
- Oleum
- + Orange juice
- 0 Oxalic acid**
- + Oxygen
- Oxygen, liquid
- 0 Ozone
- + Paint
- + Palmitic acid
- + Paraffin
- + Paraffin oil
- + Paraffins, oils
- 0 Perchloroethylene
- + Perfume, containing alcohol
- +/- Perhydrol (see hydrogen peroxide)
- 0 Persil
- + Petrol
- + Petrol
- + Petrol, premium
- + Petroleum ether (hydrocarbon mixture)
- Phenol
- 0 Phenyl ether alcohol
- + Phosphates, aqueous 10%
- Phosphoric acid
- + Photo emulsion, developer, fixing baths
- + Polyamide
- + Polyester resins
- + Polyethylene
- + Pork lard
- 0 Potassium bichromate*
- Potassium bromide*
- 0 Potassium carbonate*
- + Potassium chloride*
- + Potassium hydroxide
- + Potassium nitrate*
- + Potassium sulphate*
- + Premium petrol
- + Propane gas
- + Propanol
- Propionic acid
- + Protein solution
- + Pyridine
- 0 Pyruvic acid, aqueous
- + Refrigerator oil
- Resorcin and mixtures
- 0 Resorcinol solution, 1%
- + Salad oil
- + Salicylic acid
- + Sea water
- + Silicone oil
- + Silicone oil emulsion
- + Soap, diluted solution
- + Sodium bicarbonate**
- + Sodium bicarbonate, saturated solution in water
- Sodium bisulphate*
- Sodium bisulphate**
- + Sodium carbonate*
- + Sodium carbonate**
- + Sodium carbonate**
- 0 Sodium chlorate
- 0 Sodium chlorate**
- 0 Sodium chloride*
- + Sodium hydroxide
- Sodium hypochloride, 0.5% solution in water
- Sodium hypochlorite, 10%
- Sodium hypochlorite solution, 12.56% chlorine
- + Sodium salts
- + Sodium sulphate*
- + Sodium sulphide**
- + Soil, acidic or alkaline
- Soldering fluid
- + Soluble glass
- + Solvent for paint
- 0 Spirit, pure
- 0 Steam
- + Stearic acid, stearates
- + Stove enamel
- + Styrene
- 0 Suds
- + Sulphur
- + Sulphur dioxide
- Sulphuric acid
- 0 Sulphurous acid, 10%
- + Tall oil
- + Tallow
- + Tar
- + Tartaric acid, 10%
- + Terpine oil
- + Tetrahydrofuran
- + Tetralin
- 0 Tin (II) salts of mineral acids
- + Toluene
- + Town gas
- + Transformer oils
- 0 Trichloroacetic acid
- + Trichloroethane
- 0 Trichloroethylene
- Uranium fluorides
- + Urea*
- + Urine
- + Vaseline
- + Vegetable oils
- + Vodka
- + Water
- + Wine, brandy
- + Wines
- + Xylene
- + Yeast and molasses
- 0 Zinc chloride, aqueous 10%
- Zinc rhodanide, bromide, iodide, nitrate 30%
- + Zinc sulphate*

*saturated solution in water
** 10% solution in water