

ANNEX III - Nature of special risks attributed to dangerous substances and preparations

Source: COM(93)638. This COM was published by the Commission of the European Community. It is the consolidated version (1967 - 1993) of the Directive 67/548/EEC on classification, labelling and packaging of dangerous substances

R 1 Explosive when dry.	R 35 Causes severe burns.
R 2 Risk of explosion by shock, friction, fire or other sources of ignition.	R 36 Irritating to eyes.
R 3 Extreme risk of explosion by shock, friction, fire or other sources of ignition.	R 37 Irritating to respiratory system.
R 4 Forms very sensitive explosive metallic compounds.	R 38 Irritating to skin.
R 5 Heating may cause an explosion.	R 39 Danger of very serious irreversible effects.
R 6 Explosive with or without contact with air.	R 40 Limited evidence of a carcinogenic effect
R 7 May cause fire.	R 41 Risk of serious damage to eyes.
R 8 Contact with combustible material may cause fire.	R 42 May cause sensitization by inhalation.
R 9 Explosive when mixed with combustible material.	R 43 May cause sensitization by skin contact.
R 10 Flammable.	R 44 Risk of explosion if heated under confinement.
R 11 Highly flammable.	R 45 May cause cancer.
R 12 Extremely flammable.	R 46 May cause heritable genetic damage.
R 13 No phrase prescribed	R 47 No phrase prescribed
R 14 Reacts violently with water.	R 48 Danger of serious damage to health by prolonged exposure.
R 15 Contact with water liberates extremely flammable gases.	R 49 May cause cancer by inhalation.
R 16 Explosive when mixed with oxidizing substances.	R 50 Very toxic to aquatic organisms.
R 17 Spontaneously flammable in air.	R 51 Toxic to aquatic organisms.
R 18 In use, may form flammable/explosive vapour-air mixture.	R 52 Harmful to aquatic organisms.
R 19 May form explosive peroxides.	R 53 May cause long-term adverse effects in the aquatic environment.
R 20 Harmful by inhalation.	R 54 Toxic to flora.
R 21 Harmful in contact with skin.	R 55 Toxic to fauna.
R 22 Harmful if swallowed.	R 56 Toxic to soil organisms.
R 23 Toxic by inhalation.	R 57 Toxic to bees.
R 24 Toxic in contact with skin.	R 58 May cause long-term adverse effects in the environment.
R 25 Toxic if swallowed.	R 59 Dangerous for the ozone layer.
R 26 Very toxic by inhalation.	R 60 May impair fertility.
R 27 Very toxic in contact with skin.	R 61 May cause harm to the unborn child.
R 28 Very toxic if swallowed.	R 62 Possible risk of impaired fertility.
R 29 Contact with water liberates toxic gas.	R 63 Possible risk of harm to the unborn child.
R 30 Can become highly flammable in use.	R 64 May cause harm to breastfed babies.
R 31 Contact with acids liberates toxic gas.	R 65 Harmful: may cause lung damage if swallowed
R 32 Contact with acids liberates very toxic gas.	R 66 Repeated exposure may cause skin dryness or cracking
R 33 Danger of cumulative effects.	R 67 Vapours may cause drowsiness or dizziness
R 34 Causes burns.	R 68 Possible risks of irreversible effects.

[Risk phrase added by Directive 96/54/EC published in OJ L248, 30.09.1996]

R66 „Repeated exposure may cause skin dryness or cracking“ and

R67 „Vapours may cause drowsiness or dizziness“

[Risk phrases added by Directive 98/98/EC published in OJ L355, 30.12.1998]

R68 Possible risks of irreversible effects.

[Risk phrase used to be R40. Changed by Directive 2001/59/EC]