cobalt oxide

IDENTIFICATION NUMBERS

- **CAS:** 1307-96-6
- **EC/EINECS:** 215-154-6

MORE INFORMATION

- **Molecular Formula:** CoO
- **Synonyms:** OXIDO DE COBALTO (II)

⚠ **Black list — Substances particularly hazardous to the environment or health**

CLASSIFICATION AND LABELLING (Regulation 1272/2008)

Symbols



GHS07

Acute toxicity (oral, dermal, inhalation



GHS09

Hazardous to the aquatic environment

Signal word: **Warning**

H Phrases

H302 : Harmful if swallowed

Acute Tox. (Cat. 4 *) : Acute toxicity

H317 : May cause an allergic skin reaction

Skin Sens. (Cat. 1) : Respiratory/skin sensitization

H400 : Very toxic to aquatic life

Aquatic Acute (Cat. 1) : Hazardous to the aquatic environment

H410 : Very toxic to aquatic life with long lasting effects

Aquatic Chronic (Cat. 1) : Hazardous to the aquatic environment

Labelling

Concentration	Labelling
C >= 2,5 %	N; R50-53
0,25 % <= C < 2,5 %	N; R51-53
0,025 % <= C < 0,25 %	R52-53
	M=10

Specific health risks

Carcinogens (other sources)

Substances classified as carcinogens or mutagens Category 3 under the Dangerous Preparations Directive criteria (pre-CLP). Substances with limited evidence or indications of carcinogenicity or mutagenicity.

CATEGORY

CP

SOURCE

CP65

According to IARC

Substances classified as carcinogens or mutagens Category 2 under the CLP Regulation (GHS), bearing H351 and/or H341 phrases. These are substances suspected of causing cancer or heritable genetic mutations in humans.

IARC GROUP

Grupo 2B

IARC VOLUME

(VOL. 52; 1991)

Biological Exposure Indices (BEI)

Biological limit values (VLB) published by the Spanish National Institute of Safety and Health at Work (INSST). Reference values for assessing the risk of chemical agents by measuring them or their metabolites in biological matrices (blood, urine, exhaled air) of exposed workers.

BIOLOGICAL EXPOSURE INDICES

Biological indicator	BEI	Sampling time	Notes
Cobalto en orina	15 µg/l	Final de la semana laboral (1)	F
Cobalto en sangre	1 µg/l	Final de la semana laboral (1)	F

Occupational Exposure Limits (OEL)

Daily exposure limit values (VLA-ED) published by the Spanish National Institute of Safety and Health at Work (INSST). They represent the average concentration of a chemical agent in the worker's breathing zone, measured or calculated in a time-weighted manner for an 8-hour daily working period. (https://www.insst.es/valores-limites-de-exposicion)

OCCUPATIONAL EXPOSURE LIMITS

State / Form	TWA (ppm)	TWA (mg/m³)	STEL (ppm)	STEL (mg/m³)	Notes
—	—	0.02	—	—	VLB, Sen

Sensitisers

Substances with skin or respiratory sensitisation potential

Restriction/prohibition regulations

REACH sensitisers

Substances identified as respiratory or skin sensitisers under the REACH Regulation. Includes substances that, without necessarily having a CLP classification, have been assessed by ECHA as potentially allergenic in occupational exposure contexts.

Major accident hazards (Seveso)

Hazardous substances listed in Annex I of the Seveso III Directive (Directive 2012/18/EU), transposed in Spain by Royal Decree 840/2015. Their presence in industrial establishments in quantities equal to or above established thresholds triggers obligations to implement major accident risk control measures.

Substances under PACT evaluation

Substances under active regulatory monitoring through ECHA's PACT (Public Activities Coordination Tool). Allows tracking which regulatory authorities are examining a substance and what potential regulatory actions are being considered (restriction, SVHC identification, harmonised classification, etc.).