PurityCult



COPPER BASED CHEMICALS FOR INDUSTRIAL APPLICATIONS

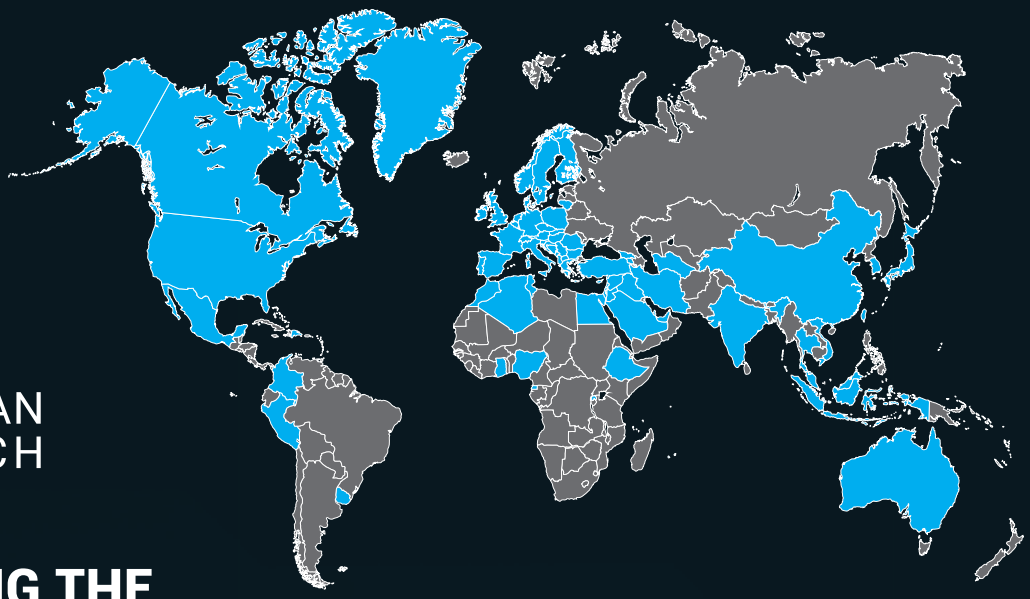
manica®

YOUR PARTNER FOR THE FUTURE

Manica has a long experience and reliable prospectives to guarantee confidence also for the future. For what concerns **copper sulphate**, Manica is leader in the European and Worldwide markets thanks to the **highest quality of its products**.

Purity is the value that guides us, in the choice of the raw materials, in the production process, in transparency with the entire supply chain.





ITALIAN TOUCH

BRINGING THE ITALIAN TOUCH ALL OVER THE WORLD

1948
OVER 75 YEARS OF EXPERIENCE

10
DIFFERENT GRADES OF COPPER SULPHATE

3
PRODUCTION PLANTS

LARGE AND DEDICATED PRODUCTION CAPACITY

Due to our extensive experience in the **production of copper-based compounds**, we are able to develope dedicated taillor made products.

The production know how spreads from Copper Sulphate production in various types of crystals and microcrystals to development of formulated ready to use products in agriculture in the forms of wettable granules, wettable powder and concentrated suspension.

We are committed in **managing the complete production process** from the **R&D** laboratory to the **packaging** of new copper-based products.
Moreover, using **dedicated production lines** reduces the risk of cross contamination with other active ingredients.



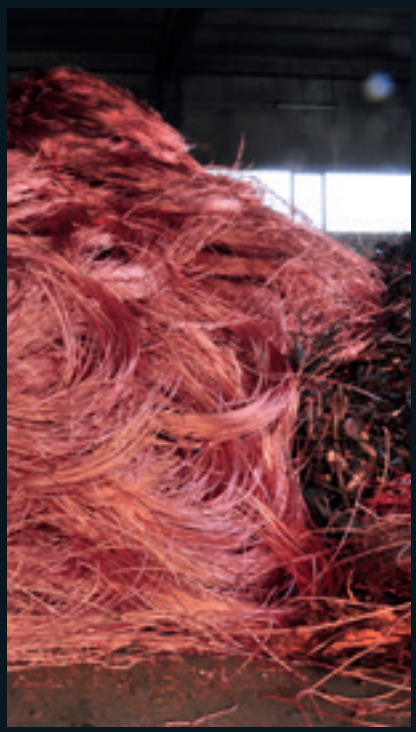

MANY FORMULATIONS
BASIC CHEMICALS INDUSTRY
R&D LABORATORY

PURE RAW MATERIAL

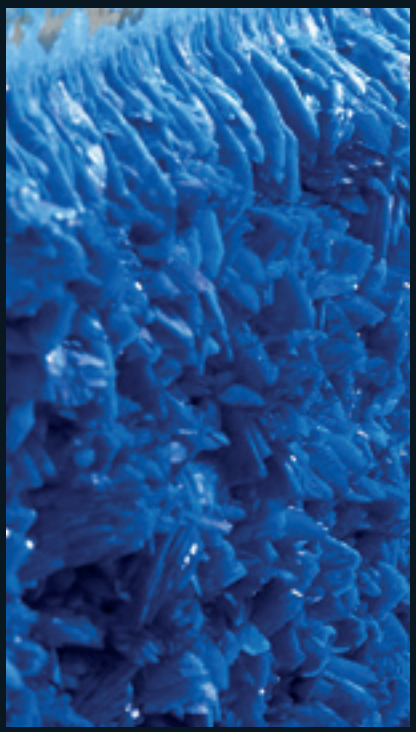
We convert **copper-metal - 100% Italian and regenerated** - into active ingredients that we then transform into copper-based products. The raw material comes from selected recovered metal from other industries, **is pure**, **uniform**, **free of contaminants**, **of high quality**, and has already lived at least one previous life. This **reduces mining exploitation**, eliminates **transportation** over very long distances, and gives the metal a second life.

ecovadis
Business Sustainability Ratings

Ecovadis is a guarantee of the company's commitment and reliability along the entire supply and production chain.








100% ITALIAN
RIGENERATED®
COPPER
SUSTAINABILITY
LOW CONTAMINANTS
INCOMING CONTROL

EFFICIENT SOLUTIONS FOR MANY APPLICATIONS

ANIMAL FEED

The Animal Feed specification distinguishes itself on the market by the highest purity, homogeneity, flowing and quality constancy. A permanent renewal of the strict certifications together with the lowest undesirable impurities is our constant aim.

AGRICULTURE

Starting from Copper Sulphate and Copper Oxychloride, we have a complete range of the most important copper based fungicides. The latter are registered in Italy and in the main international agricultural markets.

FERTILIZERS

Copper Sulphate is used as a micro-element for the production of special fertilizers.









MINING

Copper Sulphate is highly used in the flotation process.



PIGMENT

Copper Suphate is an important element used in the textile, paint and many others pigment industries.

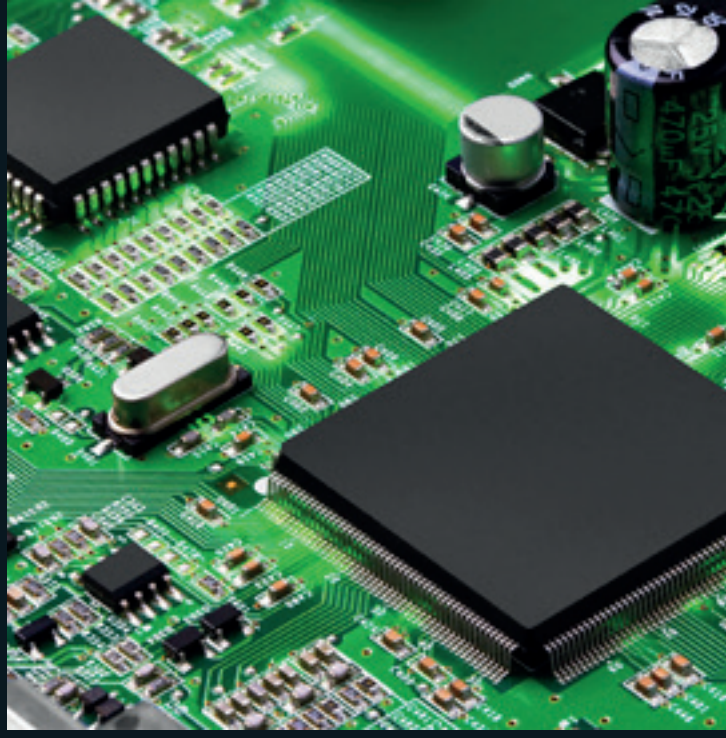


MIRROR AND GLASS

Copper Sulphate is used in the mirror and glass industry where the highest quality is requested.

PCB

The specific quality of Copper Sulphate “Snow HPG” High Purity Grade microcrystals is the best solution for this application.



GALVANO INDUSTRY

Copper Sulphate is used in the plating industry in various applications like: automotive, plumbing, packing, accessories supporting also the chromium plating.



WELDING WIRE

Copper Sulphate is used to copper plate steel in the welding wire industry.





CATALYST

Copper Sulphate is used as chimical catalyzers.



BUILDING

Copper Sulphate is used in the production of the materials needed for the construction and isolation industry.



PHARMACEUTICAL AND NUTRICEUTICALS

Copper Sulphate “Snow HPG” High Purity Grade microcrystals is the most suitable for these applications, as requested by international standards.

OUR RANGE OF COPPER SULPHATE



COPPER SULPHATE
PENTAHYDRATE 98/99%
“BIG”
LARGE CRYSTALS

CAS 7758-99-8



COPPER SULPHATE
PENTAHYDRATE 98/99%
“GRAIN”
MEDIUM CRYSTALS

CAS 7758-99-8



COPPER SULPHATE
PENTAHYDRATE 98/99%
“MINUTE”
SMALL CRYSTALS

CAS 7758-99-8



COPPER SULPHATE
PENTAHYDRATE MIN. 99,5%
“SNOW H.P.G.” HIGH PURITY GRADE
MICROCRYSTALS

CAS 7758-99-8

$CuSO_4 \cdot 5H_2O$



COPPER SULPHATE
PENTAHYDRATE 98/99%
“SNOW FFG” FREE FLOWING GRADE
MICROCRYSTALS

CAS 7758-99-8



COPPER SULPHATE
PENTAHYDRATE 98/99%
“SNOW FOR ANIMAL FEED INDUSTRY”
FREE FLOWING GRADE - MICROCRYSTALS

CAS 7758-99-8



COPPER SULPHATE
PENTAHYDRATE 98/99%
“SNOW BLUE STAR” TECHNICAL GRADE
MICROCRYSTALS

CAS 7758-99-8



COPPER SULPHATE
PENTAHYDRATE 99/100%
“SNOW TECHNICAL GRADE”
MICROCRYSTALS

CAS 7758-99-8

TECHNICAL COPPER OXYCHLORIDE

(also known as TBCC)



Copper Oxychloride plays an **essential role in various applications** sucha as a fungicide, fertilizer, animal feed and other chemical industries.
The effectiveness of this copper salt is tested and endorsed by its widespread use throughout the world. Manica's Copper Oxychloride is recognized worldwide as a high quality product with stable granulometry.

The extreme attention in the use of high-quality Copper Metal from approved suppliers guarantees a uniform product with very **low impurities**, **like Cadmium**, **Chrome and Lead**. It is **synthesized directly from copper metal** in two dedicated production lines, one located in Italy and one located in Spain.

CAS No.: 1332-40-7 or 1332-65-6



THE HIGHEST COPPER CONCENTRATION



Low contaminants production.
Plants in Italy and Spain.

[Cu] = 57% or 59%



MAIN APPLICATIONS

- **PIGMENT**
- **AGRICULTURE**
- **FERTILIZER**
- **ANIMAL FEED**

TECHNICAL BORDEAUX MIXTURE

Bordeaux Mixture is highly used as an **active ingredient for Plant Protection Products** and is constantly growing woldwide. The slow release of Copper Ions and high fixation properties makes it attractive for applications in the **agriculture industry**.

Bordeaux Mixture is obtained by mixing **Copper Sulphate Pentahdyrate with lime** in order to have a final product with a neutral pH.

This is also used in the construction **building sector** for its anti-molding properties.

CAS No.: 8011-63-0





NEUTRALIZED COPPER SULPHATE



Ideal for producing WG/WP and SC formulations.

[Cu] = 27%

MAIN APPLICATIONS

AGRICULTURE

BUILDING INSULATION

ANTI HUMIDITY

COPPER SULPHATE HIGH PURITY BIO GRADE

Manica produces **Copper Sulphate Pentahydrate min. 99,9% "Snow High Purity Bio Grade"** microcrystals and has registered it for the uses that fall under **PT2 of the European Biocide Regulation** No. 528/2012 and further updates.
BIO GRADE has an **exclusive specification** with very **low impurities** which has been **approved by the ECHA**.



Alguinet is a ready to use algaecide for controlling algae growth and preventing the green water phenomenon. It's registered in some European country.

CAS No.: 7758-99-8







THE UNBEATABLE BIOCIDE

Against the development
of algae and bacteria.
Surface materials disinfection.

MAIN APPLICATIONS

AQUARIUMS, POND AND WATER TREATMENT

SWIMMING POOLS

DISINFECTION OF SURFACES FUNCTIONAL COATING

COPPER SULPHATE MONOHYDRATE “SNOW”

The concentration of copper metal in **copper sulfate monohydrate** is minimum at 35.2 percent.
It is obtained from the dehydration of copper sulfate pentahydrate and does **not cake and there is no anti-caking agent added**.
It is suitable for **chemical processes** that require **no anti-caking and higher copper concentration**.
Mainly used in the production of fertilizers, in the electroplating industry, in the treatment of glass surfaces and in the production of special paints.

CAS No. 10257-54-2 (Echa list number 600-326-9)





HIGH COPPER CONCENTRATION WITHOUT CAKING PROBLEMS



Snow formulation.

[Cu] = 35,2%

MAIN APPLICATIONS

FERTILIZERS

PIGMENT

MIRROR AND GLASS

TAILOR MADE CHEMISTRY

The efficiency of the Research and Development department enables Manica to **develop highly innovative copper-based products which meet individual partner needs**.
We can develop and produce formulations from other companies as well as "tailor made" products for our customers.

BLUGEL

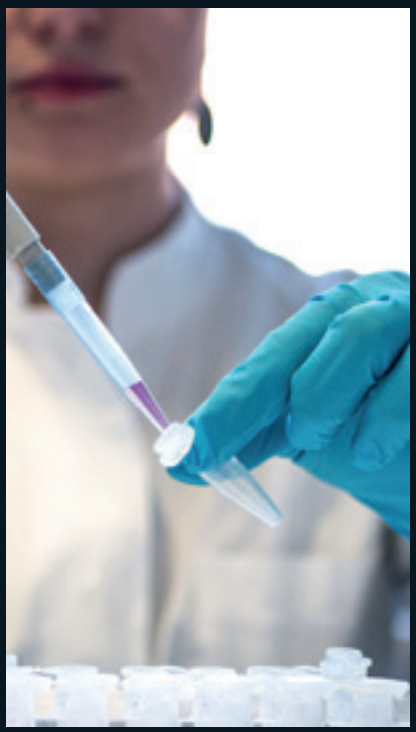
A SPECIFICALLY DESIGNED PRODUCT

The copper sulphate in electrodes is employed to measure the corrosion potential of underground tank or natural gas pipelines. This product is designed to replace the traditional copper sulfate solution.
The **Gel form of Blugel allows a longer life of the reference electrode**, reducing the problem of leakage and ensuring a reference system always efficient even after many years.











CERTIFICATIONS

UNI EN ISO 14001:2015
UNI EN ISO 9001:2015
UNI EN ISO 45001:2018

FAMI QS

ITALIAN TOUCH

FERRICOM

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