

### **Patient Information**

## Cobalt

# Your TRUE TEST<sup>®</sup> indicates that you have a contact allergy to cobalt.

Cobalt in contact with your skin may result in dermatitis. Brief or occasional contact may not pose a problem.

Cobalt is a silvery metal with many properties similar to those of iron and nickel and is often combined with other metals to make metal alloys.

#### Where is cobalt found?

Cobalt is found in many metal-plated objects including buckles, buttons, snaps, zippers, coins, costume jewelry, tools, utensils, instruments, keys and electronic recording tapes. It is used to provide blue, green and yellow colors to ceramics, pottery, glass and paints and is employed as dryers in oil based paints, lacquers, varnishes, printing inks and enamels. Further cobalt is used as pigments in light brown hair dyes and makeup, is sometimes used in blue tattoos, may be found in solid soaps and is present in vitamin B12.

Cobalt can be used in joint replacements and in dental appliances.

Major industrial use of cobalt is in alloys or as a binder of tungsten in hard metal. Cobalt is present in magnets, welding rods (also in the smoke) and welding stainless steel.

Industrial exposure to cobalt can also arise from cement, glass, lubricating oils and animal feeds. It is used in the rubber tire industry, as an oxidizing agent in automobile exhaust controls and as catalyst or accelerator for the production of terephthalate, polyester and acrylate plastics.



#### How to avoid cobalt

Cobalt is often included in nickel-plated objects. Only wear clothing with non-metallic objects. When direct contact with the skin substitute with plastic, stainless steel, sterling silver, gold or platinum.

Metallic items that are difficult to avoid such as keys may be coated with several layers of clear nail polish or polyurethane lacquer. Larger objects can be covered with plastic, for example for hairdressers and textile workers who use metal tools throughout the day. If possible select scissors and tools with handles of plastic, wood or high quality stainless steel.

Use only ingredient-labeled cosmetics, soaps, antiperspirants, and hair dyes that do not list cobalt on the label.

Reactions to metal instruments used by dentists and physicians are unlikely because skin contact is too brief. Reactions to metal dental appliances and orthopedic implants are rare.

Avoid work exposure from metallic dust and cobalt etching, metal salts of electroplating, wet cement and wet alkaline clay containing cobalt, paints, lacquers, varnishes, printing inks, and animal feed enriched with cobalt salts. If possible avoid wet work since moisture increases the penetration of cobalt into the skin. If you suspect that you are being exposed to this allergen at work, consult your employer regarding Material Safety Data Sheets.

Inform your healthcare providers that you are allergic to cobalt.





#### What to look for Synonyms for cobalt

- $\circ$  Cobalt blue
- Cobalt chloride
- Cobaltous chloride
- Cobaltous chloride hexahydrate
- Cobalt dichloride
- Cobalt (II) chloride hexahydrate

The list may not be complete.

When purchasing products which may come in contact with your skin, check the list of ingredients for any of the names listed above. If in doubt contact your pharmacist or physician.

This information does not substitute the information given by your health care providers and can only be seen as a supplement.

