

DESCRIPTION:

HoldTight® 102 is an additive that **prevents flash rusting** of wet abrasive- and water-blasted iron and steel surfaces and of dry-blasted surfaces in a pressurized wash down. It effectively removes **all salts**, including chlorides, sulfates, phosphates, nitrates, etc., and other contaminants, including **oil, grease, and blast residues**. **It is approved by most major coating suppliers for use with most coatings:** see *Representative Compatibility Chart* or contact *HoldTight Solutions Inc.*, for references.

PRINCIPAL CHARACTERISTICS:

Soluble in water • **Non-hazardous** • **Non-Toxic** • **Biodegradable** • **Phosphate and acid-free** • **Non-flammable** • With no rain, temperature above 40°F, rusting will be prevented for about **48 hours, often longer** • Raises pH of blasting water to help compensate for acidic sand • Colorless • **Leaves no residue** • Surface salts, including **chlorides, undetectable** after proper use • Product chemistry approved by the FDA for **food grade service** under 21 Code of Federal Regulations 178.3400

BASIC DATA:

Mass Density Approximately 62.43 lb/cu. ft. (1g/cm³) • Minimum Time before coating Priming should be done as soon as possible, before flash rust appears and after the surface is dry. Some primers (consult manufacturer's instructions) can be applied when the surface is still damp, provided it is free from visible droplets or running water, but a dry substrate is always preferred. • Typical Time before coating ("the window") 48 hours, or longer with favorable weather conditions -- no rain, temperature above 40°F • Shelf Life 3 years stored in cool & dry place. Do not store below 24°F to avoid freezing. (See *MSDS for more detail*.)

INSTRUCTIONS FOR USE:

HoldTight®102 is typically used in both blast water and wash down water. (See *note on water below*.) It is **diluted with water 50-250:1**, depending on the application, humidity, and level of surface contamination. It is rarely necessary to dilute it less than 50 to one and frequently possible to dilute it much more. 100:1 is the most common dilution ratio. (See: "*FAQ: mix ratios*" and "*Coverage memos*.) In some cases it may be used only in the wash down: after ultra high pressure (UHP) water blasting or after dry blasting. (See *our separate bulletin on UHP water jetting*.) **UHP users should always consult their equipment manufacturer concerning the use of HoldTight®102 or any other additives in their equipment.**

In high humidity environments with highly contaminated substrates (e.g., steel plate used in ocean service or exposed to "dirty" air), 50:1 may be necessary for both cycles. With low humidity and a relatively clean surface, 100:1 dilution on the blast cycle and 100:1 on the wash down should be satisfactory. Until a job begins, **assume an average of 100 to one** for all the water you plan to use. If testing various dilutions of **HoldTight®102** is not practical and if contamination or humidity is high, **50:1 is the "fail safe" dilution** for both cycles. **In wash downs: always use HoldTight®102;** never dilute more than 100:1 on wash down; and use **HoldTight®102-treated** water at 1-3 g.p.m. (3.8-11.4 L.p.m.), at no less than 500 p.s.i. (34 bars). For degreasing applications, a 50:1 dilution is generally recommended, but higher concentrations (e.g., 25:1) may be necessary in some cases.

NOTE: Water that contains a high concentration of salts, carbonates and/or bicarbonates (i.e., "hard water"), or other contaminants may interfere with the performance of **HoldTight® 102**. Hard water may also be a problem for some equipment. Consult the manufacturer. In most localities, water treatment on site is accessible and inexpensive. Industrial or plant water is often a problem, so should be avoided. In a few areas, even potable ("drinking") water may also be a problem. In most cases "bad" water can be corrected easily and inexpensively. Call our technical service staff if you have any concerns or questions about water. If you follow these instructions and **HoldTight®102** is not working as you expect, it is probable that you have a water problem: Call our staff immediately.

Avoid "pooling" of 102-treated water: on flat areas, excess water should be blown away with oil-free compressed air.

Though you will usually have a 48-hour or longer rust-free window, it is good practice to prime as soon as possible after the surface is completely dry and before flash rust appears.

SAFETY PRECAUTIONS:

Wear eye protection when handling this or similar products. In case 102 gets into eyes, flush with water for 5-10 minutes. See a doctor if irritation persists. Inhalation of vapor of **undiluted** 102 may be harmful to some individuals.

This information is, to the best of our knowledge, correct at the date of printing. Always consults HoldTight Solutions Inc., for the latest changes.

Since conditions of application and service, including equipment used, are beyond our control, we accept no liability on the basis of the information and suggestions here or elsewhere. 060109

