



Frequently Asked Questions

Guns

Are CorrosionX and CorrosionX - CLP the same thing?

Yes. The only difference is the packaging. When we were "discovered" by the shooting public and press, we received a lot of feedback that shooters would like the option of a non-aerosol dropper bottle (so they could carry it easily in their field jackets, packs and/or have an applicator where they could apply a drop or two on a patch, lubricate the slide on an automatic or semi-automatic firearm, etc.). So, we gave them one. It's just a matter of personal preference for which application type you prefer.

Does CorrosionX Bore Cleaner remove powder, copper and lead deposits in guns? Yes. It works amazingly well as a cleaner. In fact, feel free to try any gun solvent out there and try to get your weapon as clean as possible. Then spray the barrel with CorrosionX - Bore Cleaner, wait about 10 minutes, and you'll remove all kinds of additional fouling.

Even though CorrosionX has an extremely low solvent content (4 %), with polar bonding CorrosionX penetrates moisture, rust and fouling to contact the clean, bare metal. It penetrates the asperities (microscopic hills and valleys) undercutting all impurities so they can be easily removed with a patch. The resulting CorrosionX fluid thin-film coating (FTFC) keeps lead and copper particles, gunpowder residue, primer salts, etc. unable to contact (and therefore can't bake onto) the weapon's internals. This greatly reduces fouling and allows for huge increases in the number of rounds fired before cleaning is required.

Also, CorrosionX - CLP provides roughly double the lubricity of even PTFE (polytetrafluoroethylene)-fortified lubricants, and it absolutely shuts down the corrosion process. No more worries about rust when you put up a weapon in the offseason, no more worries about rain if you hunt outdoors. Even sweat (e.g. rusty fingerprint marks) is no longer a problem. Just wipe down the exterior of the weapon with a very light coating of CorrosionX for Guns.

Reels

Are CorrosionX and ReelX the same thing?

ReelX, with CorrosionX inside, is a fortified formulation of CorrosionX with a time and lab proven friction modifying, extreme pressure lubricant package. ReelX lubricates and protects expensive reels by preventing corrosion and reducing wear providing longer casts, less jams and unsurpassed long-term protection even in the harshest salty environments. Specifically designed for fishing reels, ReelX provides long-term lubrication despite the dynamic forces encountered within fishing reels, won't harm monofilament and with CorrosionX inside it is incomparable in its effectiveness to prevent corrosion on the dissimilar metals often used in reels. ReelX technology chemically reacts with surface metals and oxides and harnesses the triboenergy (heat energy from friction) to protect wear surfaces. The result is a chemically modified surface with an ultra-low coefficient of friction (approximately 0.40); perhaps the lowest on the market. Penn Fishing Tackle Manufacturing Co., Bauer Premium Fly Reels, Inc., Shimano, Accurate Fishing Products, Zebco and other major manufacturers have all switched to ReelX at the factory to protect and lubricate the reels they manufacture.

CorrosionX

Can you paint over CorrosionX?

No, it must be removed. If painting is in the plan; CorrosionX should be applied after the painting is completed. If you must paint a CorrosionX treated surface, a good solvent degreaser such as kerosene, naphtha and paint thinner will remove it. Turpentine and orange-based cleaners do an effective job as well. For larger areas, a steam cleaner fortified with an alkaline cleaner, such as Corrosion Technologies Xtreme Clean™, works extremely well.

Is CorrosionX good for use outdoors?

Yes, it is excellent for outdoor uses in many applications. CorrosionX is a dielectric (up to 30,000 volts), thin-film lubricant, moisture-displacer and corrosion inhibitor. Depending on the environment, CorrosionX is great for electrical and electronic applications, such as circuit boxes, extension cords, entry keypads, locks, lighting, string lights, electrical plugs, timers, pool equipment, etc. Where longer-term protection is needed in harsher conditions, it is often better to use a high-build coating such as CorrosionX Heavy Duty. CorrosionX is great for monthly wipe downs on wrought iron fences, hurricane fences, fence and gate hardware and stainless grills.

What will CorrosionX harm?

Not much. The rule of thumb is that if petroleum oils do not affect the surface, CorrosionX won't either. It is hydrocarbon-based, with a very low solvent content, and we advise customers to keep it off LCD panels and membrane switches (certain silicone rubbers may be affected.) Some membrane switches like those found on soft touch pads used in inexpensive calculators may separate and become disabled. It's really slick so, for obvious reasons, we caution users to not apply to friction-operated devices (e.g. belts, clutches, brakes, etc.).

What's the difference between CorrosionX Aviation (blue label) and CorrosionX (red label)?

CorrosionX Aviation is labeled specifically for aircraft applications. Crucially, it meets the requirements of Naval Aviation military specification MIL-PRF-81309H—for which it has been qualified by the US Department of Defense (DoD). Third-party testing has verified that CorrosionX Aviation meets both Type II (general purpose) and Type IV (advanced corrosion preventive compound) grades.

CorrosionX's labelling addresses a broader range of industrial needs, including corrosion prevention, lubrication, penetration, and electronics applications. It is qualified to military specification MIL-PRF-16173E, a DoD standard for corrosion preventative compounds with low-VOC, solvent-cutback formulations. Third-party testing has verified that CorrosionX meets Class II requirements across three grades: Grade 2 (soft film), Grade 3 (water-displacing soft film), and Grade 5 (low-pressure steam removable film).

Can CorrosionX be used on Air Conditioning equipment?

CorrosionX should definitely be used in most, if not all, outdoor electronic and electrical applications. It provides excellent protection for the electrical connections and provides unsurpassed corrosion control on the exposed metal surfaces. In fact, it is recommended, and used, by York for use on cooling fins on the coils. At less than .5 mils (70 microns), CorrosionX protects the multi-metal systems, preventing corrosion and electrolysis, while minimally affecting heat transfer.

Will CorrosionX remove rust?

CorrosionX is not a rust remover but it is a rust killer and will facilitate its removal. CorrosionX is a fluid thin-film coating which, over time, penetrates and undercuts thin existing rust. What doesn't just fall off can more easily be removed with a plastic scouring pad. The non-corrosive CorrosionX formula is actually better than rust removers which are all acids in one form or another. Rust removers actually remove metal oxides (rust) and surface metal leaving behind a surface ready to rust some more. If a surface has un-sound, scaling rust; it has to be removed either physically with a hammer or chemically with a rust remover and then, after rinsing and drying, the reactive metal surface should be treated with CorrosionX or painted.

Are there any harmful ingredients in CorrosionX?

The Safety Data Sheet (SDS) for CorrosionX provides information on the physical and health hazards of CorrosionX. CorrosionX contains oils which can be harmful upon ingestion and, as such, it is classified as an aspiration hazard. CorrosionX is non-irritating to skin and eyes although good practice suggests that it should be rinsed off skin and out of eye should contact occur. Aerosol CorrosionX has different health and physical hazards as it contains flammable propellants and is packaged in a pressurized container.

Can I use CorrosionX on circuit boards?

CorrosionX is perfect for electronic applications including circuit boards for protection of exposed metals in corrosive environments. Widely used in the treatment of military and personal aircraft avionics; CorrosionX effectively displaces moisture and kills corrosion without disassembly. On circuit boards, it stops corrosion and eliminates moisture issues often restoring them to full functionality.

Will CorrosionX harm painted surfaces?

No, CorrosionX is harmless to most intact painted surfaces.

How much should I use?

CorrosionX is tested by an independent laboratory as effective in preventing corrosion at .3-.5 mils (about 70 microns) and should be used sparingly. It should be applied just to the point of runoff and over-application does not increase the effectiveness.

Why does CorrosionX seem to “fizz up” when I use it?

CorrosionX aerosols contain propellants which begin to vapo off immediately upon application. The bubbles form (fizz) as the propellant evaporates and the Fluid Thin Film Coating (FTFC™) forms.

Which package is better: dropper, aerosol, trigger spray or bulk?

CorrosionX comes in a variety of packages to meet the various user's needs. It is available in a small package with a fine applicator tip (4 fl oz CorrosionX for Guns), two sizes of aerosols (6 oz Aerosol toolbox and 16 oz Aerosol shop sizes), 16 fl oz trigger spray bottle and bulk sizes ranging from 1 gallon to 330-gallon tote tanks. Convenience (toolboxes, field jackets, packs), application requirements (dropper-bottle, aerosol spray, high-volume misting), storage requirements, cost and environmental considerations are typically considered when evaluating the right package to go with. Aerosols deliver product with a light conical fan spray and can be fitted with a precision extension tube for pinpoint applications and hard to reach areas.

Does CorrosionX leave a sticky residue?

It does not. CorrosionX is a non-hardening, thin-film corrosion inhibitor which leaves a slightly oily film that does not pick up dust or dirt. As properly applied, a slight film should be detectable when dragging your finger across the surface. CorrosionX HD is a heavier film (like very light grease) and may pick up contaminants such as dust, dirt, fibers, etc. in heavy conditions.

Is spraying, misting, dipping, wiping or brushing the best way to apply CorrosionX? Just as with packaging, the best application method is defined by the user. Spraying a small to medium surface is quite easy with a trigger sprayer. An airless paint sprayer, pump-up sprayer or shop air pressurized system is great for larger areas like structural components of aircraft. Remote control hobbyists commonly employ dipping or immersion while aircraft treatment centers typically use the Handi-Spray systems. Small items, such as guns and knives, just need a good wipe with a cloth just as do stainless rails, tuna towers on boats, etc.

How long will CorrosionX last on the shelf?

Corrosion Technologies warrant all products as free from defect and workmanship for 2 years in unopened containers. CorrosionX does not thicken, harden, drop out, separate or otherwise expire so the shelf-life really is indefinite if stored in tightly closed containers. For aerosols, after 3 years, propellant loss can result in the cannot spraying but aerosols, as long as they remain sprayable, also have no expiration or shelf life. We still have several 10-year old cans that still spray.

How often should I use CorrosionX?

CorrosionX should be reapplied when the level of rust protection and/or lubrication becomes insufficient. Obviously, that really depends on the application and the conditions in which it is used. In more demanding, unprotected harsh environments it may need to be applied on a monthly basis. When used indoors like on machined parts or garage door springs, it may only need to be applied every 6 months. For treating structural component of aircraft; aircraft treatment centers service on a two-year basis. Generally speaking, the harder the use the more often the need.

Is CorrosionX flammable?

No, the flash point of CorrosionX is greater than 143°C / 290°F based on Cleveland Open Cup testing. Under current OSHA hazard classification criteria, this is a non-flammable material.

Similarly, for International and domestic transport, CorrosionX is not classified by the Department of Transportation (DOT) as a flammable hazardous material. CorrosionX aerosol is classified by OSHA and DOT as a flammable aerosol based on the hydrocarbon propellant which results in the flash point, flame extension and Burnback properties. CorrosionX aerosol should not be sprayed onto hot surfaces or into sparks or open flames. Cans should be stored out of direct sunlight in areas protected from excessive temperatures (122°F/50°C). The labels carry the following hazard statement: Extremely flammable aerosol, contains gas under pressure; may explode if heated. as well as the precautionary statements: Pressurized container: Do not pierce or burn, even after use. Store in a well-ventilated place. Protect from sunlight. Do not expose to temperatures exceeding 122°F/50°C. Keep away from heat, hot surfaces, sparks and open flames - No smoking. Do not spray on an open flame or other ignition source. CorrosionX aerosol is a NFPA 30 B – Category 3 Aerosol for storage purposes.

Can I remove CX once it's applied?

Yes, a good solvent degreaser such as kerosene, naphtha and paint thinner will remove it. Turpentine and orange-based cleaners do an effective job as well. For larger areas, a steam cleaner fortified with an alkaline cleaner, such as Corrosion Technologies Xtreme Clean™, works well. MEK and Acetone work very well and should be used with caution per the label and SDS.

Is CorrosionX better than products with PTFE (polytetrafluoroethylene) in them?

PTFE fortified products are slick, as are graphite and molybdenum disulfide ("moly") fortified products. Other than modifying friction (making them slick); they do not provide significant wear reduction or extreme pressure properties. CorrosionX is an effective lubricant but for slickness, ReelX and SpeedX are formulated with extreme pressure additives which react with surface metals and oxides and harness the triboenergy (heat energy from friction) to protect wear surfaces. The result is a chemically modified surface with an ultra-low coefficient of friction (approximately 0.40), lower than PTFE and perhaps the lowest on the market.

Can I use CorrosionX in locks and padlocks?

Absolutely! This is probably one of the best uses for CorrosionX. It is great for treating new locks and it frees up seized locks in minutes. It prevents freeze-ups in winter and lasts longer than any other product we are aware of. Graphite is commonly used for locks but is useless as a penetrant and doesn't work as well.

Why doesn't CorrosionX interfere with electrical connections?

CorrosionX will not interfere with electronic or electrical components as it has extremely high dielectric strength; every batch is tested to resist breakdown (conduct electricity) up to 30,000 volts. CX can actually enhance circuitry by both lubricating switches and removing light corrosion at the same time.

What is polar bonding?

Batteries and magnets have poles with positive and negative electrical charges. Similarly, the surface of metals, at the microscopic level, has positive and negative electrical charges. The chemistries in CorrosionX have a strong electrochemical attraction to the positive and negative charges on the unprotected metal surfaces. It is this chemical attraction that makes CorrosionX so effective in displacing moisture and in bonding to the metal to provide protection in adverse environments. Polar bonding is the electrostatic attraction of the CorrosionX technology to metal surfaces.

Why does CorrosionX penetrate so efficiently?

CorrosionX is designed to penetrate into areas with tight tolerances such as around bolts, rivets, etc. Every batch of CorrosionX is tested to ensure tight physical properties which enable the product to move through tight spaces, a process known as capillary action. Metal surfaces under a microscope appear as "asperities," or surface roughness that appear to be similar to hills and valleys. Even tightly mated metal surfaces have microscopic channels (capillaries) between them and it is through these microscopic voids that properly engineered products can travel. CorrosionX spreads until it reaches its minimum film thickness and, in the process, seized parts are lubricated and freed up.

Are there extreme pressure additives in CorrosionX?

CorrosionX is a fully fortified light-duty, ISO viscosity grade 10 weight, petroleum-based R & O (rust and oxidation) and AW (anti-wear) lubricant. CorrosionX would not be appropriate for use where EP (extreme pressure) performance is required, such as in open or enclosed gear boxes. CorrosionX maintains effective hydrodynamic lubrication and anti-wear protection under light to moderate loads at temperatures above its pour point of -22°F / -30°C and up to 200°F / 94°C. ReelX and SpeedX, are extreme-pressure fortified for certain extreme pressure applications.

Does CorrosionX actually stop rust/corrosion?

Yes, CorrosionX interrupts the corrosion process. In order for corrosion to occur, we have to have a reactive metal surface (like iron or aluminum), conductive water with electrolyte (salt) and oxygen. CorrosionX interrupts the corrosion process in several ways including displacing moisture, blocking oxygen and with additives that make the metal less susceptible to corrosion. With rust and oxidation inhibitors protecting the metal and CorrosionX unsurpassed ability to form a moisture and oxygen resistant film; corrosion rates are drastically reduced; for all intents and purposes, eliminated. Because, once metal has oxidized (rusted) it cannot be easily transformed back to its non-oxidized state.

How does CorrosionX compare with wax coatings?

CorrosionX is a time-tested fluid thin-film corrosion prevention compound (CPC). Wax CPCs can effectively prevent rust and oxidation but are typically heavier, higher build coatings which add weight and require more product per treated square foot. Wax coatings require air cure, become thin and ineffective at higher temperatures and are not self-healing. CorrosionX remains fluid so it self-repairs due to its penetrating and fluid film forming properties. Where a wax coating is desired, use Corrosion Technologies, MaxWax™ with vapor phase corrosion inhibitor inside.

Is CorrosionX like WD-40?

Would you use cooking oil to lubricate your tractor? Of course not! It would oxidize and break down, losing its functional properties and eventually cause more harm than good. While WD-40 is a good water displacer (Note WD in WD-40) and light lubricant, it is not a fully additivized oil. CorrosionX is a proprietary, fully formulated penetrant, water-displacer, lubricant and corrosion inhibitor with additives that prevent oxidation and wear all with unsurpassed, independently tested and verified, rust and corrosion killing properties. Lab testing and customer experience prove that CorrosionX will penetrate and protect better and last longer.

Where should I use CorrosionX?

Any place, indoors or outdoors, which needs protection from the elements as well as light lubrication should be treated with CorrosionX. Anything that slides, twists, turns and squeaks can be treated with CorrosionX. Anything that rusts can be treated as well. Use CorrosionX for electrical and electronic applications such as circuit panels, wiring, switches, battery terminals, fuse holders as well as locks, garage door openers (springs and rollers), rollers under sliding doors (spray it through the adjustment

access holes onto the rollers); any place you want lubrication and multi-metal corrosion protection.

Can CorrosionX be sprayed inside electric motors?

Yes, CorrosionX can be sprayed into non-arching, AC electric motors. CorrosionX will not interfere with electronic or electrical components as it has extremely high dielectric strength; every batch is tested to resist breakdown (conduct electricity) up to 30,000 volts. CX is a great lube and moisture displacer for electric motors.

What is the environmental impact of CorrosionX?

Non-aerosol formulations of CorrosionX contain 0 % (0 grams/liter) volatile organic compounds (VOCs) and comply with all US and Canada VOC regulations.

What is the maximum operating temperature for CorrosionX?

CorrosionX is an organic coating. Well-cured organic coatings can be maintained at temperatures up to 260°C / 500°F. Vegetable oils are used to season "Dutch Ovens" and cast-iron skillets. Petroleum oils lubricate combustion engines and bearings at elevated temperatures. The flash point of CorrosionX is greater than 93°C / 290°F based on Cleveland Open Cup testing. The Autoignition temperature of petroleum oil is commonly >270°C / >518°F. Organic coatings oxidize from oils to waxes to carbon as temperature and duration increase. Volatile components come off and can ignite if allowed to concentrate within their flammable range. As the coating transitions, lubrication and corrosion protection performance, change as well.

CorrosionX is best applied at typical ambient temperatures. For safety and optimum lubrication and corrosion protection, CorrosionX should not be applied onto hot surfaces; the maximum application temperature should be under 143°C / 200°F. Similarly, it should not be sprayed into sparks or open flames. CorrosionX enjoys a long history of successful high-temp applications in marine, aviation, automotive and mining industries, to name a few. The maximum operating temperature for an organic coating is very application specific and depends on a multitude of factors. Applications requiring maximum operating temperatures above 121°C / 250°F should consider cure time, ventilation, duration, ignition sources and reapplication frequency, at a minimum.

When do I use CorrosionX vs. CorrosionX HD?

CorrosionX Heavy Duty is a higher-built, heavier-duty version of CorrosionX which provides outstanding long-term waterproofing and corrosion protection in moderate to severe environmental elements, like salt spray. CorrosionX HD is ideal for boat trailers, long-term metals storage, farm and construction equipment storage and marine applications where CorrosionX might require more frequent applications. CorrosionX HD's thicker coating can be visible so it may be less suited for aesthetic uses. Its non-hardening film can transfer if you touch it or brush against it.