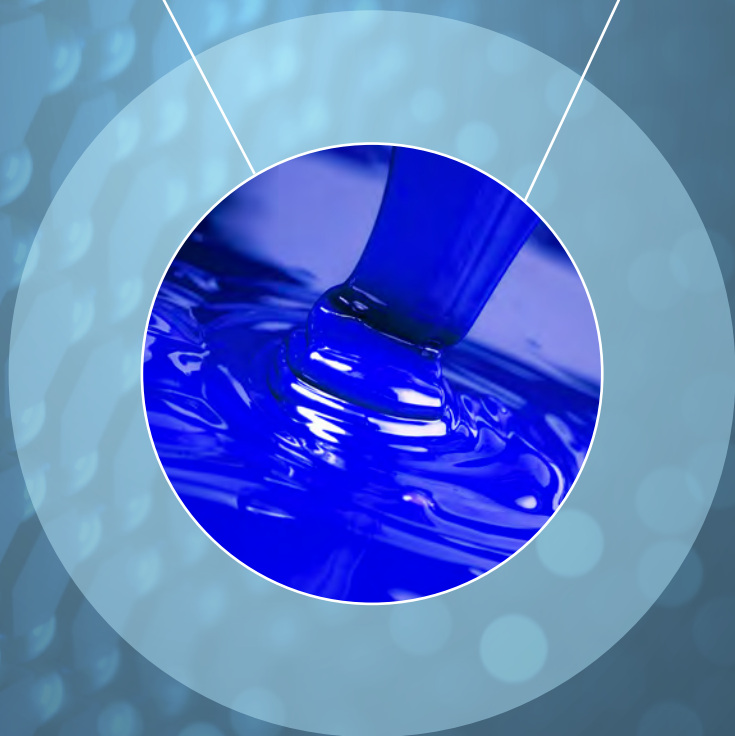


**BUCKMAN  
PAINT AND COATINGS  
PRODUCT OVERVIEW**





## BARIUM BASED MULTI-FUNCTIONAL POWDERS

### Corrosion Inhibitors

The use level of Buckman's Barium powdered corrosion control products is dependent upon the amount of corrosion protection required and the resin utilized. In industrial applications where there is relatively good control over surface preparation and paint application, levels as low as 2% by weight (0.25 lb./US gal) may be used. In consumer and industrial coatings, we recommend that levels between 5% and 10% by weight (0.5 - 1.0 lb./US gal) be evaluated. Heavy-duty industrial maintenance coatings usually contain 10% - 20% by weight (1 - 2 lb./US gal); however, some systems (i.e. bridge coatings) may require 30% by weight (3 lb./US gal) or more to give optimum performance. In all cases, accelerated and exterior testing should be performed to ensure adequate corrosion protection.

### Flash Rust Inhibitors

#### Busan® 11-M1

Busan 11-M1 is the commercial form of modified barium metaborate monohydrate and our flagship product for the control of flash rust. It is 90+% active calculated as  $BaB_2O_4 \cdot H_2O$ . Due to its multifunctional properties, 11-M1 is the product of choice for a wide range of coatings applications including its use for the prevention of flash rusting. Flash rusting and corrosion undercutting of water-thinned paint films on iron surfaces are caused by the electrochemical decomposition of that steel surface. Flash rusting is that rust-colored spotting which occurs as the iron is solubilized and bleeds through that water-thinned paint film. The steel simply corrodes because of the flow of electric currents that occur as the pure iron reverts to its more stable compounds: ferric hydroxide, hydrated ferric oxides and ferric oxides. Due to its alkaline nature, Busan 11-M1 neutralizes the galvanic cell thereby preventing the formation of ferric oxides. When Busan 11-M1 is formulated into inorganic zinc-rich coatings, the product can reduce the rate at which zinc metal is converted to zinc oxide, thus, improving the coating's performance. Formulated in this manner, Busan 11-M1 can inhibit the "white rusting" typical of zinc-rich systems. For use over galvanized metal and steel, we recommend that Busan 11-M1 be evaluated at levels of 0.5% - 1.0% of the total formula weight.

### Tannin Stain Blockers

Buckman's barium metaborate powdered products are frequently used as tannin stain blockers in latex and alkyd primers and topcoats. For tannin stain blocking, Buckman BMB's should be evaluated at levels between 3% and 10% by weight (0.3 - 1.0 lb./US gal.) Buckman stain blockers function by their alkaline chemistry neutralizing, at the coating interface, leaching tannic and other organic stain producing chemicals

### UV Light Stabilizers

Barium metaborate is resistant to ultraviolet radiation and as such can act as UV stabilizer in coatings and plastics such as polyvinyl chloride. Barium based products function by absorbing the UV radiation and preventing the formation of free radicals thereby preventing the actinic degradation of the polymer. Ultraviolet light stabilization can be achieved in most coating formulations when utilizing BMB's at levels of 0.2% based on total formula weight.

### Barium Metaborate Based Powders

Product	Particle Size-micron	Oil Absorption	%Use Level 1	Refractive Index
Busan 11-M1	7-10	27	1-10	
Busan 11-M2	7-10	27	2-10	1.55 - 1.60
Butrol 9140	1.5 - 4	28	2-10	
Butrol 22	7-10	27	2-10	
Butrol 23	7-10	27	7-10	

1 based on total formulation

## CALCIUM BASED MULTI-FUNCTIONAL POWDERS

### Butrol® 9102 \*

Butrol 9102 is a greener corrosion inhibitor, free from lead, chrome, and barium metal containing pigments. Butrol 9102 is an off-white, slightly soluble pigment (0.4%) suitable for use in coatings, caulks, sealants, and adhesives. Butrol 9102 is easily cowels ground when dispersed with proper wetting agents. Butrol 9102 can provide excellent corrosion protection in water and solvent based resin systems, and its performance can be increased by adding 1 - 2% Butrol 9102 by formula weight into the topcoat with the primer already containing 3 - 7% Butrol 9102. Additional performance has been observed in accelerated corrosion testing when blending Butrol 9102 with zinc oxide four parts to one by weight.

### Calcium Metaborate Based Powders

Product	Particle Size	Oil Absorption	% Use Level1	Refractive Index
Butrol 9102 *	7-10	25	2-10	

## Mold Inhibitors

### Busan® 1192D

Busan 1192D is a 40% active highly effective, film preservative, chlorothalonil dispersion for use in water-based coatings. An extremely low-water solubility helps ensure that Busan 1192D stays in the paint film to provide long-term protection against disfigurement caused by fungi. Busan 1192D may be used at levels between 1.0% - 2.5% based on total weight of the coating.

## Package Preservatives

### Busan 94 NA

Busan 94 NA is a 20 % active 2,2-Dibromo-3-nitrilopropionamide. water-soluble microbicide that is effective in the control of bacteria in water-based paint and coatings systems. Busan 94 provides quick action against troublesome bacteria. Busan 94 was formulated to reduce microbiological contamination in raw materials and aqueous paints and coatings, polymers, slurries, adhesives, latex and resin emulsions, caulk, and formulating water, along with specialty industrial products including inks, polishes, waxes, detergents, and cleansers. To reduce microbiological contamination, add Busan 94 to the material or product at a concentration of 0.0025% to 0.20% by weight.

### Busan 110

Busan 110 is a nonoxidizing biocide with a long history of solving microbiological problems in industrial water systems. The product is 10 % active based on methylene bis (thio - cyanate). Busan 110 provides a quick kill of troublesome organisms and rapidly hydrolyzes to biodegradable products. Busan 110 is especially effective in controlling the growth of bacteria and fungi in systems operated at pH levels up to 8.0. Busan 110 is easily dispersible in water and soluble in many hydrocarbons.

### Busan 1058

Busan 1058 is a 24% clear to amber solution of Tetrahydro-3,5-dimethyl-2H-1,3,5-thiadiazine-2-thione. The product is an effective preservative for pigment slurries of high or low viscosity suspension, including those based on aluminum silicate (clay), calcium carbonate, and titanium dioxide. Busan 1058 is composed of substances that have been allowed by the U.S. Food and Drug Administration for use in the manufacture of coated and uncoated paper and paperboard intended for food contact applications under 21 CFR § 176.230 and 176.300. Busan 1058 has been tested against a large number of microorganisms, including those most frequently isolated from microbiologically contaminated or deteriorated pigment slurries. It should be used at levels of 0.04% - 0.45% based on total weight of the formulation.

### Busan 1078

Busan 1078 is a colorless to pail blue liquid microbicide recommended for control of bacteria and fungi in water-based paints, adhesives, polishes, coatings, coating components and other additives in several industries. Busan 1078 is 1.15% active 5-Chloro-2-Methyl-4-isothiazolin-3-one and 0.30 % active 2-Methyl-4-isothiazolin-3-one. The product should be added early in the manufacturing process to prevent any unknown contaminants from becoming a potential problem and at a point that will assure uniform mixing. Busan 1078 microbicide is recommended as an in-container preservative for the control of bacteria and fungi in water soluble and water-dispersed adhesives or tackifiers such as animal glues, vegetable glues, natural rubber lattices, polyvinyl acetate, styrene-butadiene, and acrylic lattices. Busan 1078 microbicide is recommended as a preservative for tackifiers derived from resin and hydrocarbon resins. To ensure uniform mixing, add Busan 1078 microbicide to latex or solutions slowly with agitation.

### **Busan® 1144**

Busan 1144 is a 10% active water-based formulation of 2-Bromo-2-nitropropane-1,3-diol, commonly referred to as bronopol or BNPD. Busan 1144 is particularly recommended for the preservation of starch, pigment and mineral slurries, adhesives, coatings, and other emulsion systems. This product is water soluble, effective in both acidic and alkaline systems, and relatively odorless. The following limitation applies to 176.170: for use as an antimicrobial/preservative in pigment, filler slurries, starch sizing solutions, and latex coatings at levels not to exceed 0.01% (0.1% as Busan 1144) by weight of those components. Busan 1144 may be used alone or in combination with other Buckman biocides and/or dispersants.

### **Busan 1264 NA**

Busan 1264 NA is a 19.8% formaldehyde free aqueous solution of 1,2-benzisothiazoline-3(2H)-one. The product effectively controls bacteria in water-based products such as latex coatings, emulsions, lattices, water-based slurries, photographic emulsions, metalworking, and oil drilling fluids. The product displays excellent compatibility and effectiveness over a wide pH range. Typical use levels range from 0.05% - 0.25% based on the total weight of the composition or formulation. The active ingredient, 1,2-benzisothiazoline-3(2H)-one, has excellent heat stability up to 150°C.

### **Busan 1317**

Busan 1317 is a non-formaldehyde, 50% active Glutaraldehyde, broad-spectrum microbicide that is effective in a wide range of applications, including water-based coatings and adhesives, as well as pigment and filler slurries. Busan 1317 can be used alone or as a synergist with other Buckman microbicides. The quick-kill mode of action allows this product to be used as a sanitizer where contamination and clean-up conditions need to be addressed. The product use levels range from 0.02% - 0.20%, based on total water weight in the formulation.

## **Dispersants**

### **Busperse® 39**

Busperse 39 is a zero VOC 40% active greener alternative dispersing agent for water-based systems that is low odor and approved under FDA (21 CFR) § 176.170. Busperse 39 is a highly effective sodium polyacrylate dispersant for use in water-based coatings, tint pastes, adhesives, caulks, grouts, and sealants. Busperse 39 has been shown to minimize flocculation and has less of an adverse effect on in-can corrosion versus other sodium polyacrylates. Busperse 39 use levels range from 0.3 - 1.2% based upon the total formula weight. Difficult-to-grind pigments such as carbon black, organic reds, yellows, and oranges may require an additional 2 - 4% on pigment weight to achieve a finer grind while eliminating agglomeration. Busperse 39 has been proven to work well with reactive and functional pigments used for corrosion protection and flame retardancy.

### **Busperse 47**

Busperse 47 is a 100% solid, zero VOC, nonionic dispersant, primarily composed of dimethylamides of unsaturated fatty acids used for solvent-based coatings. Use levels for Busperse 47 range from 0.2 - 0.5% based on total formula weight. Busperse 47 has shown the ability to aid in dispersing difficult to grind pigments, such as organic reds, yellows, and oranges as well as various black pigments. The nonionic nature of Busperse 47 makes it compatible in a wide range of coatings vehicles allowing for ease of formulation. Busperse 47 is soluble in many organic solvents, both polar and nonpolar. Busperse 47 can also aid in viscosity reduction. For optimum viscosity reduction, it may be necessary to add Busperse 47 to both the grind portion and the letdown. Viscosity reductions of 5 - 10 seconds #2 Zahn in various coatings have been observed especially in polyesters and epoxies.

### **Busperse 229**

Busperse 229 is an organic dispersant designed to minimize the problems of blistering and adhesion loss and at the same time act as a pigment dispersant and wetting agent. The amount of Busperse 229 required for both pigment dispersing and improved blister resistance will range from 0.3% - 0.75%, based on total weight of the paint. The effectiveness of Busperse 229 is attributed to its ability to allow better wetting of the substrate by the binder, reducing moisture permeability of the paint film.

### **BSI® 850**

BSI 850 is a 30% active sodium polymethacrylate acid dispersant that is thermally stable. BSI 850 is designed to provide excellent dispersion capabilities with inorganic, organic and filler pigments imparting high gloss and excellent color acceptance. BSI 850 is recommended for acrylic emulsions (flat, satin and high gloss), styrenated and vinyl acrylics suggested at levels of 0.50 - 1.2% based on the total pigment weight. BSI 850 performs exceptionally well with reactive pigments and should be used at use levels of 0.8 - 1.2% based on the total formula weight and level of reactive pigment such as zinc, Busan® 11-M1, Butrol® 9102, and zinc phosphate. Like Triton X-100 BSI 850 is listed under FDA clearance 21 CFR § 176.180.

## Flocculants

### Bubreak® 401

Bubreak 401 is a concentrated liquid, highly cationic polymer that can be used as a flocculant or coagulant in effluent treatment programs. Bubreak 401 can be used in waste minimization programs for water-based paints, adhesives, or similar water-based systems. A 10% (by weight) solution of Bubreak 401 should be made prior to application of this product. This product is readily soluble in water and this reduction allows the polymer to “unwind” to provide better flocculating properties. Use levels of this solution will vary from 0.01% to 2.0%, based on weight of the material to be treated.

## Heavy Metal Precipitants

### Bufloc® 528

Bufloc 528 is a heavy metal precipitant used to remove metals from wastewater streams. It is particularly useful in the treatment of wastewater from paint production. The product is effective over a wide pH range and, when used as recommended, provides nearly complete precipitation of metals, even in the presence of other chelating or sequestering agents. The sludge cake produced from its use as a heavy metal precipitant is compact, highly insoluble, and easily dewatered. The weight of Bufloc 528 equivalent to a unit weight of metal ion is approximately equal to 358 times the metal ion valence divided by the atomic weight of the metal. The recommended dosage for complete precipitation of a metal is 10% to 30% in excess of the stoichiometric equivalent. For example, the equivalent for Cu+2 is 11.3 parts by weight of Bufloc 528 per 1.0 part of Cu+2, but about 13 parts of Bufloc 528 would be needed for complete precipitation.

### Bufloc 590

Bufloc 590 is a high-molecular weight, medium charge density, liquid cationic polymer. Bufloc 590 is a water-in-oil emulsion that dissolves readily in water under normal make-down conditions. The initial concentration should be 1.0% or less. Further dilution to 0.1% or less prior to feeding to the system can be beneficial. Clean water at ambient temperature will ensure maximum performance by the product. Bufloc 590 can be used in both acidic and alkaline systems and should be metered to the system by use of a corrosion resistant, positive displacement pump. Bufloc 590 is also effective in solids-liquid separation processes. Bufloc 590 can increase the cake solids while lowering the total suspended solids in the effluent.

### Busperse® ES-13

Busperse ES-13 is a proprietary blend of high-performance demulsifier and surfactants. Chemistry works to improve solids removal including heavy metal precipitation. Aids in resolution of stabilized emulsions. Busperse ES-13 is an effective solution for fats oils and greases. Product has demonstrated impressive results with regards to scavenging H<sub>2</sub>S and NH<sub>4</sub>. The pH is 13 but will not add to corrosion potential to most metals due to its filming attributes. Exception is aluminum.

## Defoamers

### Bubreak 456

Bubreak 456 is a zero VOC 100% active glycol concentrate for use in solving water-based coating, adhesive, and slurry foam problems. It provides efficient foam control in a variety of situations, including acidic or alkaline systems. Bubreak 456 is effective in reducing entrained air and foam that can develop during both manufacture and application of the coating product. Bubreak 456 is composed of substances that have been allowed under 21 CFR § 176.210 of the U.S. Food and Drug Administration regulations. Bubreak 456 can be added to the grind paste at 0.5 - 2.5% or the letdown to reduce foam in the final coating and/or during the application of the coating. For best results, add the concentrated Bubreak 456 to water at a final concentration of around 10%.

### Bubreak 4127

Bubreak 4127 is a unique and highly effective defoamer and antifoam that helps decrease foam and bubbles that occur during paint and coating making process with high speed cowles, sandmill, ball mill, and horizontal milling that occurs during manufacture and during paint application. Bubreak 4127 can be used with numerous polymers, pHs, and temperatures but it is suggested that lab testing be conducted to ensure the most effective use levels. Bubreak 4127 can be used at levels of 0.15 - 0.25% by total weight in the grind phase and 0.15 - 0.175 of the total weight in the letdown portion of the manufacturing process. Bubreak 4127 can be post added to coatings requiring foam prevention during application with a spray gun, roller, or paint brush.

### **Bubreak® 4253**

Bubreak 4253 is an effective product in controlling foam, entrained air, and related problems in water-based coating and ink systems. Bubreak 4253 is a water-based fatty alcohol, oil-free product containing active ingredients known to control foam in a wide variety of coating and ink manufacture and application situations. Bubreak 4253 can work in both acidic and alkaline coating systems within a temperature range not to exceed 125°F. As an oil-free product, Bubreak 4253 contains no materials related to the formation of chlorinated dioxins (TCDDs).

### **Bubreak 4405**

Bubreak 4405 is a 100% actives mixture of materials effective in the prevention or control of foam and entrained air in manufactured products. Bubreak 4405 contains high-grade oil and other unique actives which control foam. Bubreak 4405 can work in both acidic and alkaline systems and over a wide temperature range. Bubreak 4405 is composed of substances that have been allowed for use under 21 CFR § 176.170 of the United States Food and Drug Administration regulations. Use levels vary widely depending on production method of the coating, adhesive, slurry or wax being manufactured; however, 0.2 - 0.5% based upon the total formula weight will be helpful starting use levels when determining the best and most efficacious use level for the manufactured product.

### **Bubreak 4418**

Bubreak 4418 is a concentrated foam control and defoamer product that is effective in the prevention or control of foam and entrained air in industrial water-based coating, slurry, and tint paste systems. Bubreak 4418 contains no oils, no amides, waxes, silicones, or silicas. Bubreak 4418 is effective in both acidic and alkaline coating systems and over a wide temperature range. The proven and effective active ingredients in Bubreak 4418 work in many different water-based systems. Bubreak 4418 is composed of substances allowed under 21 CFR § 176.200 of the United States Food and Drug Administration regulations. Using Bubreak 4418 should be conducted as follows: 0.2 - 0.4% Bubreak 4418 used in the grind portion of the coating, slurries, or tint paste. An additional 0.1 - 0.2% by total formula weight of Bubreak 4418 can be used in the letdown to help minimize any foam or bubbles caused during application.

### **Bubreak 4419**

Bubreak 4419 is a zero VOC 100% active glycol concentrate type defoamer that is effective in the prevention or control of surface foam and entrained air in most industrial systems. It functions over a wide pH range and is effective even in extremely alkaline and acidic systems including water-based coatings, adhesives, and similar emulsion-based. The product contains no silicone or silica. Bubreak 4419 is composed of substances approved for use under 21 CFR § 176.200 and 21 CFR § 176.210 of the U.S. Food and Drug Administration regulations. The product has proven effective in a wide range of resins, including acrylics, vinyl acrylics, polyvinyl acetates, and water educible alkyds. Bubreak 4419 may be used at levels as low as 0.2% based on total weight of the formula.

### **Bubreak 4452**

Bubreak 4452 is a zero VOC 100% active, silicone-free, glycol concentrate defoamer. The product was developed to provide excellent utility and persistence when used under extreme conditions such as high sheer and surfactant loading typically encountered in the production of inks and coatings. Bubreak 4452 is composed of substances that have been approved for use in the manufacturer of paper and paperboard under 21 CFR § 176.170 of the U.S. Food and Drug Administration. Excellent foam control can be achieved at a level of 0.03% on total formulation.

### **Bubreak 4466**

Bubreak 4466 is a mixture of materials effective in the prevention or control of foam and entrained air in water based coating, pigment slurry, ink, and adhesive products. Bubreak 4466 contains water, high-grade oil, and other actives to help control foam. Bubreak 4466 can work in both acidic and alkaline systems and over a wide temperature range. Bubreak 4466 is composed of substances that have been allowed for use in production of paper products for food contact uses under 21 CFR § 176.210 of the United States Food and Drug Administration regulations.

### **Bubreak 4528**

Bubreak 4528 is a proprietary, water-based defoamer that is effective in providing excellent defoaming and knockdown. Controls entrained air and surface foam. Bubreak 4528 does not contain any petroleum oils, hydrocarbons, or amides. Bubreak 4528 is Zero VOC.

## **Bubreak 4631**

Bubreak 4631 is next generation 100% active, modified oil defoamer that helps remove entrained air from water-based coatings and concrete admixtures. Bubreak 4631 is a defoamer concentrate for both water-based coating foam and in helping densifying the admixture capabilities specifically designed when adding for self-consolidating type concrete. Bubreak 4631 is a mixture of materials effective in the prevention or control of foam and entrained air in manufactured products. Bubreak 4631 contains high-grade oil and other unique actives which control foam. Bubreak 4631 can work in both acidic and alkaline systems and over a wide temperature range. Bubreak 4631 is composed of substances that have been allowed for use under is allowed under the following FDA (21 CFR) sections :176.170 and 176.180 of the United States Food and Drug Administration regulations.

## **Flame retardants / Smoke Suppressants**

### **Boron Based Products**

Boron compounds were one of the earliest chemicals employed to impart fire resistance. Borates contribute to flame resistance by melting below flaming temperatures and resolidifying in the form of a solid foam (char) that acts as a barrier between the substrate and the flame. Thus, borates will cause a decrease in smoke evolution by forming a strong alkali that degrades cellulose, producing non-volatile carbonaceous materials and decreasing the amount of flammable tars in the burning area. Borates also provide resistance to flameless combustion, referred to as afterglow, particularly in coatings containing halogen compounds or halogenated plastics such as polyvinyl chloride (PVC). The reduced afterglow has an important secondary benefit of reduced toxic fumes. Because of its high fusion temperature and nonvolatility up to temperatures exceeding 1000°C, borates can be used with no danger from the formation of toxic fumes. The limitation of many other borate compounds as fire resistant chemicals is their high solubility in water and consequent leaching.

### **Busan® 11-M1**

Busan 11-M1, barium metaborate, performs well as a flame retardant in both solvent and water-based coatings, especially when containing a halogen donor like chlorinated paraffin. In most formulations, Busan 11-M1 can replace 100% of the antimony trioxide present; however, in certain systems; the two can function synergistically together. Use levels for flame retardancy are 2.0 - 9.0% but will vary depending upon the resin as well as if a halogen donor is used. Mean particle size: 7-10 micron.

### **Bulab® Flamebloc**

Bulab Flamebloc barium metaborate is a white powder fire retardant and smoke suppressant for use in plastics, paints, textiles, rubber compounds, and adhesives. Since it is borate based, Bulab Flamebloc will provide char formation and subsequent smoke suppression. Bulab Flamebloc can be used to impart fire resistance and smoke suppression in a range of applications. Bulab Flamebloc may be used at levels as low as 2 phr. to achieve enhanced char formation. For improved smoke suppression and fire retardance, recommended levels range from 2 to 10 phr. Loading level is dependent upon a number of factors, including resin type, application, plasticizer level, presence of synergists, and desired performance. results, not any one component. Fire retardants require a halogen source in order to perform. In some systems, this is provided by resin system, such as in PVC compounds. Mean particle size: 7-10 micron.

### **Flamebloc® 440**

Bulab Flamebloc 440 barium metaborate is a fire retardant and smoke suppressant for use in paints, textiles, and rubber compounds. Bulab Flamebloc 440 is recommended for applications with stringent smoke requirements. Loading level is dependent on a number of factors including resin type, application, plasticizer level, presence of synergists and desired performance. Mean particle size: 2-4 micron



## Calcium Based Products

### Flamebloc® 381

Bulab Flamebloc 381 calcium metaborate is a fine white powder fire retardant and smoke suppressant for use in plastic, paint, textiles, and rubber compounds. The product contains no lead, barium, or other heavy metals. Since its borate based, Bulab Flamebloc 381 will provide chare formation and subsequent smoke suppression. It performs best when used as a synergist with halogen containing compounds. Mean particle size of 381 is 4.8 micron. Flamebloc 381 can be used at loading levels from 2-10 phr.

### Flamebloc 428

Bulab Flamebloc 428 calcium metaborate is a fine white powder fire retardant and smoke suppressant. In plastics Bulab Flamebloc 428 can be employed as a direct replacement for other borate pigments, including barium and zinc borate. Suggested applications include polyvinyl chloride (PVC), high density polyethylene (HDPE), polyester, and synthetic rubbers (EDPM), SPR, neoprene, etc. Bulab Flamebloc 428 can typically replace between 25% - 50% of antimony trioxide in a formulation without property loss. Recommended loading levels range from 2.0 to 10.0 pfr. Mean particle size: 2 - 4 micron.

## Wood Preservatives

### Busan® 1292

Busan 1292 is a reddish-brown liquid film preservative used in solvent- and waterbased coatings, clear finishes, and wood protective coatings. The product is effective in controlling fungi that cause mold and sapstain. The 23.6% active ingredient in Busan 1292, 1-[[2-(2,4-dichlorophenyl)-4-propyl-1,3-dioxolan-2-yl]-methyl]-1H-1,2,4-triazole, is a new generation coatings fungicide that offers enhanced efficacy and low worker and environmental toxicity in a high-quality formulation. Busan 1292 has shown good performance at levels between 0.2% and 5.0%, based on total weight of the coating. The higher levels are suggested for humid or tropical climates, while lower levels may be sufficient for interior coatings and milder climates.

### Busan 1440

Busan 1440 is a 40% active 3-iodo-2-propynyl-butyl carbamate (IPBC) with broad-spectrum fungicidal activity. Busan 1440, used in solvent and waterborne paints and stains, will inhibit the growth of mildew. Addition should be at the end of the coatings manufacturing process and allowed to mix long enough to be adequately dispersed and should not be added to hot paint. Typical levels for protection against mildew on painted surfaces are 0.25% - 1.2% by weight on wet paint. For adhesives use between 0.05% - 0.625% on wet formulation weight, and in inks this product will generally impart protection when used at levels of 0.05% - 3.0% of active ingredient, based on the formula weight.

### Busan 1498

Busan 1498 is a nonmetallic, 98%-active, 3-iodo-2-propynyl butyl carbamate (IPBC) off-white solid. It is a broad-spectrum fungicide for use in aqueous and solvent-based applications. Inhibits the growth of mildew in solvent based paints and waterborne paints, stains, and latex emulsions. Busan 1498 may also be used to prevent surface mildew growth on plastic items, such as shower curtains, cable and wire insulation, sun umbrellas, polymer furniture, filter medias, polymer components of carpet, etc. Intended plastics include polymers, such as PVC, polyurethanes, elastomers and rubbers, neoprene, styrene compounds, polyolefins, etc. Typical levels for protection against mildew on painted surfaces are 0.1% - 0.5% by weight in wet paint. Use in intended plastics that include polymers, such as PVC, polyurethanes, elastomers and rubbers, neoprene, styrene compounds, polyolefins, etc. use levels of 0.05% - 1.0% by weight of the plastic are generally adequate

## Specialty Products

### Busperse® 2222

Busperse 2222 is an alkaline cleaning product that contains a combination of surfactants and solvents. Busperse 2222 effectively removes grease, oil, sap, mold, and mildew making it an excellent choice for cleaning floors, decks, concrete floors and driveways, and decks.

### Bulab® 600

Bulab 600 is a difunctional tertiary amine catalyst having a minimum assay of 98.5% and is used in two-component epoxies, urethanes and polyurethane foam as a catalyst to decrease the cure time. Bulab 600 helps control cell size in urethane foam. Bulab 600 is soluble in water and, thus, is readily miscible with raw materials typically used in urethane foams and water-based epoxies and urethanes. Bulab 600 can contain up to 0.9% moisture; however, in certain polyurethane manufacturing that is sensitive to trace levels of moisture and requires lower moisture content, Buckman has a special grade of Bulab 600, ATMEDA-HP, which contains only a trace amount of moisture.

## ATMEDA Anhydrous HP

ATMEDA-HP is a difunctional tertiary amine catalyst available for applications with requirements for products having minimum moisture content. Anhydrous TMEDA can be used at levels of 0.5 - 5.0% based on the total curative weight of the polyamide or isocyanate used in epoxies or urethanes respectively. However, higher use levels have shown to equate only to a faster cure versus the uncatalyzed coating.

### **Bulab® 8626**

Bulab 8626 is a unique environmentally responsible blend of wetting, foaming, and crusting agents specifically designed to control fugitive dust emissions. Bulab 8626 is a water-soluble liquid that is miscible in water in all proportions. Bulab 8626 helps control dust when diluted with water to levels of 0.1 - 1.5% of the total water weight used. For best results, continuous feeding is recommended.

### **BRD® 2369**

BRD 2369 is a highly ethoxylated surfactant which helps provide additional pigment wetting with your dispersant which aids in breaking up and separating pigments. Use levels for BRD 2369 for dispersing pigments in the grind portion of coating manufacturing is 0.15-0.30% by total formula weight.

Make **Buckman** a part of the mix...  
In the can, on the job, and on  
the bottom line.

OPTIMIZE  
PRODUCT  
PERFORMANCE

Biocides  
Fungicides  
Corrosion Inhibitors  
Defoamers  
Dispersants  
Flocculants



**Buckman**  <sup>TM</sup>



This is not an offer for sale. The product shown in this literature may not be available for sale and/or available in all geographies where Buckman is represented. The claims made may not have been approved for use in all countries. Buckman assumes no obligation or liability for the information. Please contact your Buckman sales representative for more information.

Seller warrants that this product conforms to its chemical description and is reasonably fit for the purpose referred to in the directions for use when used in accordance with the directions under normal conditions. Buyer assumes the risk of any use contrary to such directions. Seller makes no other warranty or representation of any kind, express or implied, concerning the product, including **NO IMPLIED WARRANTY OF MERCHANTABILITY OR FITNESS OF THE GOODS FOR ANY OTHER PARTICULAR PURPOSE**. No such warranties shall be implied by law and no agent of seller is authorized to alter this warranty in any way except in writing with a specific reference to this warranty. B330H (01/23)

Argentina +54 11 4701-6415; Australia +61 (2) 6923 5888; Belgium +32 9 257 92 11; Brasil +55 (19) 3864-5000; Canada +1 (877) 282-5626; Chile +56-2) 2944-1000; China +86-21) 6921-0188  
India +91) 44-2648 0220; Indonesia +62) 21-2988 8288; Korea +(82) 31-416 8991; Mexico +52 (777) 329 3740; Singapore +(65) 6891 9200; South Africa +27 (31) 736 8800; United States +1 (901) 278-0330

Global Headquarters at 1256 N. McLean Blvd., Memphis, TN 38108, USA

Join the conversation!    

© 2023 Buckman Laboratories International, Inc. All rights reserved.

[buckman.com](http://buckman.com)