



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY  
WASHINGTON, DC 20460

OFFICE OF CHEMICAL SAFETY  
AND POLLUTION PREVENTION

April 12, 2017

Leesha Square  
Regulatory Specialist  
Arch Chemicals, Inc.  
1200 Bluegrass Lakes Parkway  
Alpharetta, GA 30004

Subject: Label Amendment – Updating Storage and Disposal and Adding Metal Working Fluid and Construction Material Uses  
Product Name: Vanquish DOP Antimicrobial  
EPA Registration Number: 1258-1251  
Application Date: 10/31/2016  
Decision Number: 523567

Dear Ms. Square:

The amended label referred to above, submitted in connection with registration under the Federal Insecticide, Fungicide and Rodenticide Act, as amended, is acceptable. This approval does not affect any conditions that were previously imposed on this registration. You continue to be subject to existing conditions on your registration and any deadlines connected with them.

A stamped copy of your labeling is enclosed for your records. This labeling supersedes all previously accepted labeling. You must submit one copy of the final printed labeling before you release the product for shipment with the new labeling. In accordance with 40 CFR 152.130(c), you may distribute or sell this product under the previously approved labeling for 18 months from the date of this letter. After 18 months, you may only distribute or sell this product if it bears this new revised labeling or subsequently approved labeling. "To distribute or sell" is defined under FIFRA section 2(gg) and its implementing regulation at 40 CFR 152.3.

Should you wish to add/retain a reference to the company's website on your label, then please be aware that the website becomes labeling under the Federal Insecticide Fungicide and Rodenticide Act and is subject to review by the Agency. If the website is false or misleading, the product would be misbranded and unlawful to sell or distribute under FIFRA section 12(a)(1)(E). 40 CFR 156.10(a)(5) list examples of statements EPA may consider false or misleading. In addition, regardless of whether a website is referenced on your product's label, claims made on the website may not substantially differ from those claims approved through the registration process. Therefore, should the Agency find or if it is brought to our attention that a website contains false or misleading statements or claims substantially differing from the EPA approved registration, the website will be referred to the EPA's Office of Enforcement and Compliance.

Your release for shipment of the product constitutes acceptance of these conditions. If these conditions are not complied with, the registration will be subject to cancellation in accordance

Page 2 of 2  
EPA Reg. No. 1258-1251  
Decision No. 523567

with FIFRA section 6. If you have any questions, you may contact Aline Heffernan at 703-347-8602 or via email at [heffernan.aline@epa.gov](mailto:heffernan.aline@epa.gov).

Sincerely,

A handwritten signature in black ink, appearing to read "John Hebert", followed by a small "for" in cursive.

John Hebert, Chief  
Regulatory Management Branch I  
Antimicrobials Division (7510P)  
Office of Pesticide Programs

Enclosure: Stamped Label

## **VANQUISH® DOP Antimicrobial**

An Antimicrobial in Plasticizer for Use in the Preservation of Plastics and Rubber Products

### **ACTIVE INGREDIENT:**

N-butyl-1,2-benzisothiazolin-3-one...9.5%  
Inert Ingredients.....90.5%  
Total.....100.0%

EPA Reg. No: 1258-1251

EPA Est. No: [Enter EPA Establishment number]

**KEEP OUT OF REACH OF CHILDREN**

### **WARNING**

SEE FIRST AID & ADDITIONAL PRECAUTIONARY STATEMENTS ON SIDE PANEL

### **MANUFACTURED FOR:**

Arch Chemicals, Inc.  
1200 Bluegrass Lakes Parkway  
Alpharetta, GA 30004

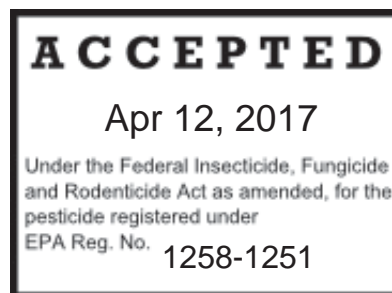
{Made in [Enter country of origin].}

Net Weight: [Enter Net Weight].

### **PRECAUTIONARY STATEMENTS**

#### **HAZARDS TO HUMANS AND DOMESTIC ANIMALS**

**WARNING:** Harmful if absorbed through the skin. Do not get in eyes. Causes eye irritation. Avoid contact with skin. Do not breathe vapors. Use adequate ventilation. If needed, use NIOSH Certified Respirator for organic vapors, mists or fumes. Wash thoroughly after handling and before eating, drinking or using tobacco. Remove and wash contaminated clothing before re-use.



**FIRST AID:**

**If in Eyes:** Hold eye open and rinse slowly and gently with water for 15-20 minutes. Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye. Call a Poison Control Center or doctor for treatment advice.

**If on Skin or Clothing:** Take off contaminated clothing. Rinse skin immediately with plenty of water for 15-20 minutes. Call a Poison Control Center or doctor for treatment advice.

**If Swallowed:** Call a poison control center or doctor immediately for treatment advice. Have person sip a glass of water if able to swallow. Do not induce vomiting unless told to do so by a poison control center or doctor. Do not give anything by mouth to an unconscious person.

**If Inhaled:** Move person to fresh air. If person is not breathing, call 911 or an ambulance, and then give artificial respiration, preferably mouth-to-mouth, if possible. Call a Poison Control Center or doctor for further treatment advice.

Have the product container or label with you when calling a poison control center or doctor, or going for treatment.

**NOTE TO PHYSICIAN:** Probable mucosal damage may contraindicate the use of gastric lavage.

In case of emergency, for additional information call 1-800-654-6911.

**ENVIRONMENTAL HAZARDS:** This pesticide is toxic to fish. Do not discharge effluent containing this product into lakes, ponds, streams, estuaries, oceans or other waters unless in accordance with the requirements of a National Pollutant Discharge Elimination System (NPDES) permit and the permitting authority has been notified in writing prior to discharge. Do not discharge effluent containing this product to sewer systems without previously notifying the local sewage treatment plant authority. For guidance contact your State Water Board or Regional Office of the EPA.

**STORAGE AND DISPOSAL:** Do not contaminate water, food or feed by storage or disposal.

**PESTICIDE STORAGE:** Protect from frost. If frozen, thaw and stir well before use.

**PESTICIDE DISPOSAL:** Pesticide wastes are acutely hazardous. Improper disposal of excess pesticide, spray mixture, or rinsate is a violation of Federal Law. If these wastes cannot be disposed of by use according to label instructions contact your State Pesticide or Environmental Control Agency, or the Hazardous Waste representative at the nearest EPA Regional Office for guidance.

**CONTAINER DISPOSAL:** [For containers = or < 5 gallons.] Nonrefillable container. Do not reuse or refill this container. Offer for recycling if available. Triple rinse as follows: Empty remaining contents into application equipment or a mix tank and drain for 10 seconds after the flow begins to drip. Fill the container ¼ full with water and recap. Shake for 10 seconds. Pour rinsate into application equipment or a mix tank or store rinsate for later use or disposal. Drain for 10 seconds after the flow begins to drip. Repeat this procedure two more times.

**CONTAINER DISPOSAL:** [For containers > 5 gallons] Nonrefillable container. Do not reuse or refill this container. Offer for recycling if available. Triple rinse as follows: Empty remaining contents into application equipment or a mix tank. Fill the container 1/4 full with water. Replace and tighten closures. Tip container on its side and roll it back and forth, ensuring at least one complete revolution, for 30 seconds. Stand the container on its end and tip it back and forth several times. Turn the container over onto its other end and tip it back and forth several times.

Empty the rinsate into application equipment or a mix tank or store rinsate for later use or disposal. Repeat this procedure two more times.

**Container Disposal:** Non-refillable container. Do not reuse or refill this container. Offer for recycling if available. Triple rinse container promptly after emptying. Then offer for recycling or reconditioning or puncture and dispose of in a sanitary landfill, or by other procedures approved by state and local authorities.

**DIRECTIONS FOR USE:** It is a violation of Federal Law to use this product in a manner inconsistent with its labeling.

Many plastics are considered to be resistant to microbial attack, but there are significant exceptions that merit preventative action by the use of antimicrobial additive. Plasticized PVC, poly urethanes and silicones are particularly susceptible. The biodeterioration of products based on these types of plastics can be a serious problem for manufacturers. Failure to add the proper amount of antimicrobial additive can lead to premature product failure due to loss of mechanical strength, flexibility or adhesive strength. Also, adverse aesthetic problems such as musty odor, permanent staining or microbial surface growth can lead to customer complaints.

This product is effective against the microbes which degrade plastic (and plastic additives) or natural rubber and can increase the useful life of plastic articles. This product is effective in most plastics compositions and can be used to preserve such plastics as PVC, polyurethane, silicone, acrylics, and others to produce articles such as:

Shower curtains-coated fabric (e.g. ski wear, raincoats, tents)-floor coverings underlay & mats-vinyl wall coverings-tarpaulins and awnings-roofing membranes-synthetic leather (e.g. sneakers and training shoe uppers)-swimming pool liners, ornamental pond liners-appliance gaskets (e.g. washers, refrigerator)-shoe soles and mid-soles-sealants, caulks, weather stripping & non-food contact adhesives-pet products and general household items (shower curtains, bath mats)-auto parts (e.g. landau tops, door seals, shock absorbers)-foam (e.g. seat cushions, gaskets, insulation)-tubing (e.g. marine hose and sleeving)-electrical & pipe wrap-furniture (e.g. outdoor, leisure, water bed liners).

Do not use this product to treat food/feed or drinking water contact items or toys.

This product has been found to be an effective polymer preservative at concentrations of 0.3% to 10% based on the total weight of the substrate. Typical range of concentrations on which trials can be based, are: Plasticized PVC - 0.3 - 5.0%, Polyurethanes - 0.5 - 5.0%, Silicones - 0.3 - 5.0%, Polyesters - 0.5 to 10%, Acrylics - 0.5 - 10%, Synthetic elastomers such as butadiene-styrene, styrene-isoprene and acrylonitrile-butadiene-styrene - 0.3 - 10%, Natural latex rubber - 0.3 - 5%.

The concentration required to give protection depends on several factors. These include the susceptibility of the system to microbiological degradation, the extent to which microorganisms can gain access, the species involved, pH, temperature, and length of time for which protection is required.

## **INCORPORATION OF THIS PRODUCT INTO POLYMERS**

Do not use for any application involving direct or indirect food contact.

**PVC plastisols:** For addition to PVC plastisols, this product may be added along with the other additives. Use levels should be calculated based upon the total weight of the formulation.

**Cross Linked Polyurethane:** For addition to cross linked polyurethane, this product should be added to the polyol at a concentration that will yield the desired use level in the final product after reaction with the

isocyanate component. This product may also be incorporated at an injection port of a reaction injection molding (RIM) machine.

**Melt Processed Polymers:** For addition to melt processed polymers (PVC, thermoplastic polyurethane, synthetic elastomers and thermoplastic acrylics, etc.) this product may be metered into the melt to yield the desired end use concentration. For example at the injection point in an extrusion system.

**PVC:** This product may be added to the mixed liquid components add to a blend of PVC resin and solids, shear mixed until a dry blend is achieved and then processed through extrusion, calendaring, molding or other system.

**Acrylics:** In addition to the above, this product can be added to the liquid monomers before polymerization or in the case of thermoplastic acrylic This product can be added by direct injection into an extruder or other blender.

**Silicone:** For silicone sealants, This product may be added to the silicone oil before processing, or to the manufacturing vessel before packing off.

**Natural Rubber:** This product can be added to the latex.

#### **<sup>1</sup>PRECAUTIONARY STATEMENTS ON THE OPERATION OF METALWORKING EQUIPMENT WITH MWF CONTAINING VANQUISH DOP ANTIMICROBIAL**

For use in closed metalworking and delivery systems only. Do not permit contact with mixer/loaders or machinists. This product may be used ONLY in enclosed metalworking systems with local exhaust ventilation. This product may NOT be used to preserve metalworking fluids intended for use in machining operations which are not enclosed, even when such operations do not generate significant MWF aerosol. In cases where a central sump is used, this product may NOT be used as a post additive treatment for the metalworking fluid unless all machining operations using this fluid are enclosed, even when the unenclosed equipment is not actively in use.

Do not use this product to treat metalworking fluids that will be resold for use in non-enclosed metal cutting systems

Fluid Concentrate

This product should be added to metalworking fluid concentrates at a level that ensures the final use dilution fluid will contain 260 to 2110 parts per million (ppm) of product (25 to 200 ppm active ingredient).

Use Dilution Fluid

Note that grossly contaminated systems may require mechanical removal of fungal masses, and cleaning of the system before biocide treatment is begun.

**Initial Dose:** For noticeably fouled systems, add 2.22 to 18.66 lbs. (33 to 263.4 fl. oz.) of this product per 1000 gallons of fluid. This will generate a concentration of 25 to 200 ppm active agent.

**Subsequent Dose:** For maintenance of a clean system, add 0.43 to 2.75 lbs. (6.2 to 40.7 fl.oz.) of this product per 1000 gallons of fluid on a periodic basis to maintain microbial control. This quantity will generate a fungicide concentration of 5 to 30 ppm active ingredient. The frequency of maintenance dosing will be affected by the amount of fluid lost to drag out and other displacements, but also by the severity of the contamination, by the system design, by the effectiveness of system filtration, and by other system variables.

## **<sup>1</sup>CONSTRUCTION MATERIALS**

Many building construction materials support the growth of a wide range of bacteria, fungi and algae. The uncontrolled growth of these microorganisms either in the wet or dry stage can lead to aesthetic problems such as odor or surface staining or it can lead to premature product failure. This product has been found to be an effective wet state preservative at concentrations of 0.09% to 0.52%, and an effective dry state preservative at concentrations of 0.76% to 1.14%, based on the total weight of the substrate. Example end use applications are shown below:

For preservation of emulsions, dispersions, slurries, and thickeners including latex emulsions, urethane dispersions, mineral or pigment slurries (such as clay, kaolin, calcium carbonate, and titanium dioxide). For preservation of pulp and paper slurries and for preservation of paper coating compositions, including starch preparations. Add 0.09 – 0.52% of this product. Not for use in food contact paper products or paper coatings.

For preservation of adhesives, tape joint compounds, spackle, stucco, grout, glazing compounds, fillers, sealants, caulks, and weather stripping. Add 0.76 – 1.14% of this product. Not for use in food contact adhesives.

For preservation of manufactured paper and paperboard products such as insulation facing, wallboard facing, stationeries, and paper packaging. Add 0.76 – 1.14% of this product. Not for use in food contact paper products.

For preservation of composites, gypsum, perlite, plaster-like or mineral and cellulose materials. For preservation of ceiling tiles, partitions, dry wall and wallboard. Add 0.76 – 1.14% of this product.

For preservation of coatings. Add 0.76 – 1.14% of this product. Not for marine use.

<sup>1</sup>Not approved for use in California.

The Arch Technical Service Group can provide guidance on the proper use of this product.