



Department of Agriculture
STATE OF HAWAII

LICENSED

PERIOD 2014-2016 LIC. NO. 9203.328

50508

Net Contents: 55 U.S. gal/208.2 L

QUESTAR™ QAC

Quaternary Ammonium Sanitizer

ACTIVE INGREDIENT:

n-Alkyl (50% C ₁₄ , 40% C ₁₂ , 10% C ₁₆)	10.0%
dimethyl benzyl ammonium chloride.....	90.0%
OTHER INGREDIENTS:	100.0%
TOTAL:	

KEEP OUT OF REACH OF CHILDREN DANGER

PRECAUTIONARY STATEMENTS

HAZARDS TO HUMANS AND DOMESTIC ANIMALS

DANGER: CORROSIVE. Causes irreversible eye damage and skin burns. Harmful if absorbed through the skin and/or swallowed. Do not get in eyes, on skin or on clothing. Wear goggles or face shield, protective clothing, and rubber gloves when handling. Wash thoroughly with soap and water after handling and before eating, drinking, chewing gum, using tobacco, or using the toilet. Remove and wash contaminated clothing before reuse.

DO NOT MIX WITH ANYTHING BUT WATER

EPA Reg. No. 1677-43
EPA Est. 1677-IL-2 (J), 1677-TX-1 (D), 1677-GA-1 (M), 1677-CA-1 (S), 1677-MN-1 (P), 70271-CA-2 (A), 1677-CA-2 (R), 1677-WV-1 (V), 5389-NC-1 (G), 303-IN-1 (L).
Superscript refers to first letter of date code.

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 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.
FOR EMERGENCY MEDICAL INFORMATION IN USA OR CANADA, CALL: 1-800-328-0026.
FOR EMERGENCY MEDICAL INFORMATION WORLDWIDE, CALL: 1-651-222-5352 (IN THE USA).
NOTE TO PHYSICIAN: Probable mucosal damage may contraindicate the use of gastric lavage.

ENVIRONMENTAL HAZARDS

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

DIRECTIONS FOR USE

It is a violation of Federal law to use this product in a manner inconsistent with its labeling.
DEODORIZING: To deodorize waste containers and nonfood areas of food processing plants, mix 1 oz. *Questar QAC* per 1 gal. of water. Apply solution with mop, sponge, cloth, or mechanical sprayer to hard surfaces. Allow surfaces to air dry.
GENERAL DISINFECTION: Disinfect previously cleaned hard non-porous surfaces such as walls, floors, sinks, finished woodwork, bathroom fixtures with 1 oz. *Questar QAC* to 2 gal. of water. Thoroughly wet surfaces with mop, sponge, cloth, or coarse spray. Allow surfaces to remain wet for 10 minutes. Allow to air dry.
GENERAL DISINFECTION OF MEAT, POULTRY, AND OTHER FOOD PROCESSING FACILITIES: Prior to disinfection, food products and packaging materials must be removed from the room or carefully protected. For disinfecting previously cleaned non-porous surfaces such as walls, floors, and sinks, apply use solution of 1 oz. per 1 gallon of water (800 ppm) with cloth, mop, sponge, or sprayer. Treated surfaces must remain wet for 10 minutes. Food contact surfaces that have been disinfected must be rinsed thoroughly with potable water.
For sprayer applications, use a coarse spray device. Spray 6-8 inches from the surface, up with a brush, sponge, or cloth. Do not breathe spray.
For use on non-food contact surfaces as a general disinfectant in the brewery industry, use 400 to 800 ppm active quaternary. Follow disinfectant directions above.
FOGGING IN MEAT, POULTRY AND OTHER FOOD PROCESSING FACILITIES: Fogging is to be used as an adjunct to acceptable manual cleaning and disinfecting of room and machine surfaces. Prior to fogging, food products and packaging materials must be removed from the room or carefully protected. After cleaning, fog desired areas using one quart per 1000 cu. ft. of room area with a *Questar QAC* solution containing 1.5 oz. of product per gallon of water (1200 ppm). Wear a dust mist respirator when mixing the use solution and pouring it into the fogging apparatus. Vacate the area of all personnel for a minimum of 2 hours after fogging and a minimum of 4 air exchanges (ACH) per hour in the facility. All food contact surfaces must be sanitized with a *Questar QAC* solution of 200 ppm active quaternary (1/2 oz. per 2 gal.) prior to reuse. Allow food contact surfaces to drain thoroughly before operations are resumed.
NOTE: The fog generated is irritating to the eyes, skin and mucous membranes. Under no circumstances must a room or building be entered by anyone within two hours of the actual fogging and a minimum of 4 air exchanges (ACH) per hour in the facility. If the building must be entered, then the individuals entering the building must wear a self-contained respirator approved by NIOSH/MSHA, goggles, long sleeves, and long pants.
DISINFECTING-POTATO STORAGE AREA AND EQUIPMENT: Remove all potatoes prior to disinfection of potato storage area or equipment. Preclean hard surfaces by removing heavy soil or gross filth. Follow general disinfection (1 oz. per 2 gal.) procedures as outlined above. All treated surfaces must be thoroughly rinsed with potable water prior to reuse.
DISINFECTION – NON-FOOD CONTACT SURFACES: Pre-clean surfaces. Disinfect waterproof work boots, tools, forklifts, and hand trucks with 1 oz. *Questar QAC* diluted in 1 to 2 gal. water (400 - 800 ppm active quaternary). For waterproof tools and tools, thoroughly apply use solution by immersion, foam, or coarse spray. For forklifts and hand trucks, thoroughly apply by coarse spray and foam. Treated surfaces must remain wet for 10 minutes. Allow to air dry.
SANITIZING – NON-POROUS GLOVED HANDS: To prevent cross-contamination into animal areas and the packaging and storage areas of food plants, dip pre-washed (plastic, latex or other synthetic rubber) gloved hands into a suitable clean container that contains enough freshly made sanitizing solution to cover the gloved area. Do not let sanitizing solution come into contact with the exposed skin. Make up the sanitizing solution by adding 1 ounce of this product per 4 gallons of water (or equivalent use dilution) (200 ppm active). Dip (soak) in solution for 60 seconds. NO POTABLE WATER RINSE IS ALLOWED. Change the sanitizing solution in the bath at least daily or when solution appears dirty.
SANITIZING EQUIPMENT-FOOD PROCESSING PLANTS: For sanitization of equipment in food processing plants, remove gross food particles and excess soil by a pre-flush or pre-scrape, wash with a good detergent or compatible cleaner, rinse equipment thoroughly with clear water, then rinse equipment with sanitizing solution of 1 oz. product to 4 gal. of water (200 ppm). All surfaces should be exposed to the sanitizing solution for a period of not less than 1 minute. Allow equipment to drain thoroughly and air dry. *Questar QAC* is an effective food contact surface sanitizer against *Escherichia coli*, *Staphylococcus aureus*, *Listeria monocytogenes*, and *Enterobacter sakazakii*.
ENTRYWAY SANITIZING SYSTEMS (Use not approved in the State of California): To prevent cross-contamination from area to area, set the system to deliver sanitizing solution at 0.5 – 1.5 oz. product per gallon of water (or equivalent use dilution) (400-1200 ppm active quat). The foam (or spray) should cover the entire path of the doorway. Set the system so that a continuous wet blanket of sanitizer solution is delivered to the floor. Do not mix other foam additives to the sanitizing solution.

SHOE BATH SANITIZER DIRECTIONS: To prevent cross-contamination into animal areas, shoe baths containing one inch of freshly made solution should be placed at all entrances to buildings and hatcheries. Sanitize in a solution of 0.25 oz. of *Questar QAC* per 1 gallon of water (or equivalent use dilution) (200 ppm). Scrape waterproof work boots (shoes) and place in solution for 60 seconds prior to entering area. Change the solution in the bath daily or sooner if solution appears diluted or soiled.
SHOE FOAM SANITIZER DIRECTIONS (Use not approved in the State of California): *Questar QAC* can be used to prevent cross-contamination into animal areas and packaging and storage areas of food plants. Apply a foam layer approximately 0.5 to 2 inches thick made from a solution of 1 to 1.5 ounces product per gallon of water (or equivalent use dilution) (800 to 1200 ppm active) at all entrances to buildings, hatcheries, production and packaging rooms by using a foam generating machine or aerator to apply foam layer. Follow the foaming directions as specified by the manufacturer of the foam generator/aerator. Scrape waterproof shoes. Stand and/or walk through foamed area for 60 seconds prior to entering area. Foam area must be washed and replaced daily or when it appears dirty.
ELEVATED TEMPERATURE SANITIZING: For sanitization of equipment in food processing plants, remove gross food particles and excess soil by a pre-flush or pre-scrape, wash with a good detergent or compatible cleaner, rinse equipment thoroughly with clear water, then rinse equipment with a sanitizing solution. At a temperature of 120 deg F, this product is an effective sanitizer for food contact surfaces at 1 ounce product to 10 gallons of water. All surfaces must be exposed to the sanitizing solution for a period of not less than 1 minute. Allow equipment to drain thoroughly.
NOTE: FOR MECHANICAL OPERATIONS prepared use solution may not be reused for sanitizing but may be reused for other purposes such as cleaning.
FOR MANUAL OPERATIONS fresh sanitizing solution should be prepared as soon as they become diluted or soiled.
Questar QAC fulfills the criteria of Appendix F of the Grade "A" Pasteurized Milk Ordinance 1978. Recommendation of the U.S. Public Health Service in water up to 500 ppm of hardness calculated as CaCO₃ when tested by the A.O.A.C. Germicidal and Detergent Sanitizer Official Method.
FOR CONTINUOUS TREATMENT OF MEAT AND POULTRY OR FRUIT AND VEGETABLE CONVEYORS: Remove gross food particles and excess soil by a pre-flush or pre-scrape, wash with a good detergent or compatible cleaner, rinse equipment thoroughly with clear water, then rinse equipment with a sanitizing solution. During processing, apply *Questar QAC* at a 200 ppm quat level to conveyors with *MIKRO MASTER* or other suitable feeding equipment. Controlled volumes of sanitizer are applied to return portion of conveyor through nozzles so located as to permit maximum drainage of sanitizer from equipment and to prevent puddles on top of belt. During interruptions in operation, coarse spray equipment, peelers, collators, slicers and saws with *MIKRO MASTER* dispensed *Questar QAC* solution of 200 ppm quat. Conveyor equipment should be free of product when applying this coarse spray.
SANITIZING SHELL EGGS INTENDED FOR FOOD: To sanitize previously cleaned food-grade eggs in shell egg and egg product processing plants, spray with a solution of 1 oz. product in 4 gal. of warm water (200 ppm quat). The solution should be warmer than the eggs, but not to exceed 130° F. Wet eggs thoroughly and allow to drain. Eggs sanitized with this product shall be subjected to a potable water rinse only if they are broken immediately for use in the manufacture of egg products. Eggs must be reasonably dry before casing or breaking. The solution must not be reused for sanitizing eggs.
Note: Only clean, whole eggs can be used for sanitizing. Dirty, cracked, or punctured eggs cannot be sanitized.

STORAGE & DISPOSAL

DO NOT CONTAMINATE WATER, FOOD OR FEED BY STORAGE OR DISPOSAL.
PESTICIDE STORAGE: Store this product in a cool, dry area, away from direct sunlight and heat.
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 HANDLING: Nonrefillable container. Do not reuse or refill this container. Triple rinse as follows: Fill container ¼ full with water. 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. Follow Pesticide Disposal instructions for rinsate disposal. Repeat procedure two more times. Then offer for recycling or reconditioning. If not available, puncture and dispose in a sanitary landfill.

