

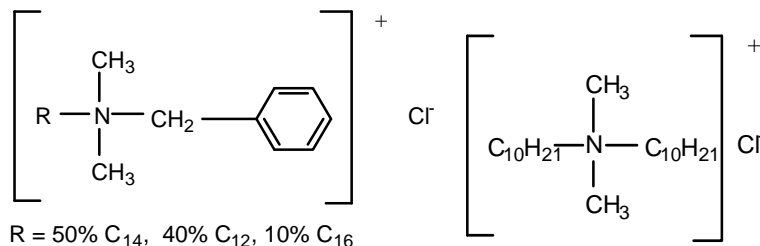
## Product Bulletin

## ANTIMICROBIALS

Product  
Name

### BTC® 1210-80%

Chemical  
Structure



Chemical  
Description/CAS  
Registry No.

n-Alkyl Dimethyl Benzyl Ammonium Chloride (CAS Registry No. 68424-85-1) and  
Didecyl Dimethyl Ammonium Chloride (CAS Registry No. 7173-51-5)

EPA  
Registration No.

1839-191

Applications

**BTC 1210-80% IS A CATIONIC MATERIAL. DO NOT MIX WITH SOAP OR OTHER ANIONIC MATERIALS.** For formulation into antimicrobial products for use in agricultural/farm premises, structures, buildings, and equipment; dairy farm milk handling facilities, equipment, storage rooms, houses and sheds; food processing plant, food handling, food distribution equipment and premises; eating establishment premises and equipment; commercial, institutional, and industrial premises and equipment (floors, walls, storage areas); domestic dwellings, food handling areas, bathroom premises (hard surfaces), indoor premises; and medical, institutional, critical care and non-critical premises and laundry; wood preservative-seasoned wood pressure/thermal and non-pressure treatment (joinery/remedial) treatment and sapstain treatment. For formulation into antimicrobial products for use in air conditioner/refrigeration condensate water systems, air washer and industrial scrubbing systems, once-through and recirculating industrial/commercial cooling water systems, pulp/paper mill water systems, gas/oil drilling muds/packer fluids (terrestrial), gas/oil pipelines maintenance, gas/oil recovery injection water systems, gas/oil fracturing fluid systems and swimming pools. Formulators using this product are responsible for providing data for the EPA registration of their formulated products.

Composition

Active Ingredients, %	
n-Alkyl (50% C <sub>14</sub> , 40% C <sub>12</sub> , 10% C <sub>16</sub> ) Dimethyl Benzyl Ammonium Chloride.....	32
Didecyl Dimethyl Ammonium Chloride.....	48
Inert Ingredients, .....	20
Total, % .....	100

Typical  
Properties

Appearance at 25°C .....	Clear liquid
pH, 10% aqueous .....	7.7
Free amine and amine hydrochloride, % .....	2.0 max
Color, APHA .....	250 max
Viscosity, cps at 25°C .....	262
Pour Point, °C (°F) .....	-16 (3.2)
Flash Point, PMCC, °C (°F) .....	38 (100.3)
Density, g/ml (lbs/U.S. gal) .....	0.90 (7.5)
RVOC, U.S. EPA, % Ethanol .....	11-17
Freeze Point, °C (°F) .....	-31.5 (-24.7)

Environmental  
Effects

BTC products are biodegradable. Additional information is available upon request.

Health Effects

BTC 1210-80% is moderately toxic orally (LD<sub>50</sub> is between 50-500 mg/kg) and corrosive to skin and eyes at 50%.

June 2017  
Supersedes:  
April 2012  
Page 1 of 2

BTC® is a registered trademark of Stepan Company.



## Storage & Handling

Handle liquid BTC products with care; use away from sparks and open flame. Use in well ventilated area. Avoid contact with eyes, nose and skin contact. Gloves, protective clothing, safety goggles and face shield should be worn when handling BTC products. Wash thoroughly after handling material.

Standard Packaging: BTC 1210-80% is available in 55 gallon drums (400 lb, 181 kg), in totes (2204 lbs, 1 MT) and in bulk quantities.

It is recommended that BTC products be stored in sealed containers and kept in a cool, dry place. If material is frozen, it should be heated gently and stirred to ensure it is homogeneous before use.

Bulk Storage Information: BTC quaternaries can be stored in vessels of 316 stainless steel or in fiberglass having a corrosion liner. Contact between quaternaries and anionic materials must be avoided. At use dilution, BTC quaternaries are non-corrosive to most plastics, natural rubber, stainless steel, monel metal, iron, brass, aluminum, lead and tin; however, BTC quaternaries as supplied, may be corrosive to the materials listed above.

Liquid BTC products should be stored at room temperature between 77 - 120°F. An internal hairpin coil of 316 stainless steel with low pressure steam (under 50 psig) should be used if heating is required. Mild agitation is recommended while storing to maintain homogeneity. Pumps, pipes and transfer lines should be 316 stainless steel. Rubber hoses with Teflon cross-linked polyethylene with 316 S.S. fittings are recommended for loading and unloading.

## Workplace Exposure

Occupational exposure can occur primarily through skin contact or via inhalation of vapors and mists. Engineering controls, personal protective equipment, and other workplace practices should be used to control these exposures.

## Clearances

BTC 1210-80% is listed in the following countries; the registration numbers for the active ingredients are included in parentheses United States (TSCA 7173-51-5; 68424-85-1), Australia (AICS 7173-51-5; 68424-85-1); Canada (DSL 7173-51-5; 68424-85-1), Europe (EINECS 230-525-2; 270-325-2), Korea (ECL Serial No. KE-10281; KE-29999), Philippines (PICCS 7173-51-5; 68424-85-1), and China (IECSC 7173-51-5; 68424-85-1), Japan (ENCS 9-1971, 3-2694) and New Zealand (NZIoC 7173-51-5, 68424-85-1).

Residues of BTC 1210-80% are exempted from the requirement of a tolerance under 40 CFR 180.940(a) & (c) when used in an antimicrobial pesticide formulation applied to a food contact surface in public eating establishments, dairies and food processing equipment/utensils.

**It is the responsibility of the formulator to review the chemical control regulations for each country where the end product is intended to be sold or used.**

## Registration

In the U.S., all products used on inanimate surfaces which are sold and claimed to be bacteriostatic, germicidal, algacidal or to kill or inhibit organisms in any way, are required to be registered with the U.S. Environmental Protection Agency. Formulators are responsible for any additional data which may be required by local, state or country agencies.

## Product Stewardship

This product bulletin has been written in accordance with ACC's Product Stewardship guidelines.

## Additional Safety Information

A Safety Data Sheet is available upon request.



The information contained herein is based on the manufacturer's own study and the works of others and is subject to change without prior notice. The information is not intended to be all-inclusive, including as to the manner and conditions of use, handling, storage or disposal or other factors that may involve additional legal, environmental, safety or performance considerations. Nothing contained herein grants or extends a license, express or implied, in connection with any patents issued or pending of the manufacturer or others, or shall be construed as a recommendation to infringe any patents or to violate any applicable laws. STEPAN COMPANY MAKES NO WARRANTY OF MERCHANTABILITY OR OF FITNESS FOR A PARTICULAR USE, AND NO WARRANTY OR GUARANTY OF ANY OTHER KIND, EXPRESS OR IMPLIED, IS MADE, INCLUDING REGARDING PERFORMANCE, SAFETY, SUITABILITY, STABILITY, ACCURACY, COMPLETENESS, ADEQUACY OR OTHERWISE. Stepan Company (and its employees, subsidiaries and affiliates) shall not be liable (regardless of fault) to the vendee, its employees, or any other party in respect of this information, including in respect of its accuracy, completeness, adequacy, furnishing, use, or reliance upon, and the vendee assumes and releases Stepan Company (and its employees, subsidiaries and affiliates) from all liability, whether in tort, contract or otherwise to the fullest extent possible under the relevant law.

**Stepan**   
**Corporate Headquarters**  
**Northfield, Illinois 60093, U.S.A.**  
**Phone: 847-446-7500**  
**Fax: 874-501-2100**  
**Website: [www.stepan.com](http://www.stepan.com)**

For Technical Service Call:  
Stepan North America **+1-800-745-7837**  
Stepan Mexico **+55-11-5089-2208**  
Stepan Quimica **+55-11-5089-2200**  
Stepan Colombia **+571-636-2808**  
Stepan Europe **+33-476-505-160**  
Stepan Asia **+656-879-9855**  
Stepan Philippines **+656-879-9855**

For Customer Service Call:  
Stepan North America **+1-800-457-7673**  
Stepan Mexico **+52-555-533-1967**  
Stepan Quimica **+55-11-5089-2200**  
Stepan Colombia **+57-6-8993125**  
Stepan UK **+44-161-338-5511**  
Stepan France **+33-476-50-51-00**  
Stepan Philippines **+63-2-842-7951**