U.S. Department
of Transportation

**Research and
Special Programs
Administration**

400 Seventh Street, S.W.
Washington, D.C. 20590

JUN 23 1999

Mr. Dana Wm. Somesla
Chem Lab Products, Inc.
5160 East Airport Drive
Ontario, CA 91761-7611

Ref. No. 99-0105

Dear Mr. Somesla:

This is in response to your letter dated April 15, 1999, requesting clarification on the proper classification of your mixture containing 95% trichloroisocyanuric acid and 5% boric acid, which is used as a flame retardant, under the Hazardous Materials Regulations (HMR; Parts 171-180).

Under § 173.22, it is the shipper's responsibility to properly classify and describe a hazardous material. This Office generally does not perform this function. However, we provide assistance when we have the information available. Trichloroisocyanuric acid, dry is listed as a Division 5.1 oxidizing material in the Hazardous Materials Table (HMT) under the HMR. You state that your mixture is produced both in powdered and compressed (tableted) form. Your test data indicates that the mixture does not meet the defining criteria for either a Division 5.1 oxidizing material or a Division 4.1 flammable solid material. Therefore, if your mixture does not meet any other hazard class defining criteria in Part 173, and is not a hazardous waste, hazardous substance, or marine pollutant, it is not subject to the HMR.

I hope this satisfies your inquiry.

Sincerely,

Delmer F. Billings
Chief, Standards Development
Office of Hazardous Materials Standards

990105

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CHEM LAB PRODUCTS, INC.
5160 East Airport Drive
Ontario, California 91761-7611

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Trichloroisocyanuric acid
99-0105

Mr. Edward T. Mazzullo, Director
U.S. Department of Transportation
Room 8102
Office of Hazardous Materials Standards
407th Street, SW
Washington, D.C 20590-0001

April 15, 1999

I am seeking a determination as to the proper shipping classification for ground transportation of a family of products we manufacture. These products are all packaged for and sold in retail establishments. They range in size from 6 ounces to 37½ pounds per unit package. These products are all various size tablets of a blended mixture used for swimming pool chlorination.

The mixture consists of 95% trichloroisocyanuric acid; UN2468, PG II, oxidizer (5.1) and 5% boric acid; a flame retardant. Samples of the product in both its powdered and compressed (tableted) form were tested at a certified laboratory using UN procedures for 5.1 and 4.1 materials. Based on these test results the products are not classified as either a 5.1 or 4.1 material for ground transportation. A copy of the test results is enclosed for your review. It is my understanding that this is what the DOT requires for classification or in this case de-classification of a material for shipping purposes.

In support of this I have found a similar product which has been acknowledged in 49 CFR. Sodium dichloroisocyanurate salt (UN2465) is classified 5.1 in the anhydrous form and unclassified (49 CFR, Chapter 1, 172.102 Special Provisions, Code/Special Provisions #28) in its dihydrate form. According to the manufacturer of these products UN 5.1 Classification testing was used to make this determination. Like our product one form is PG II, 5.1 meaning it increases the burn rate and in another form it no longer causes ignition per the 5.1 Standard.

Although this is not used by the DOT to make determinations, I am also including for reference NFPA data, which looks at the effect of tabletized trichloroisocyanuric acid in a fire situation. The test concludes that tablets may be classified as a Class I Oxidizer (lower risk) from the original Class II of trichloroisocyanuric acid because they actually inhibit the burn rate compared to unfilled packaging materials consisting of plastic bottles and corrugated boxes. This would seem to support the relative safety of these products. Similarly the Sodium dichloroisocyanurate drops from NFPA Class III Oxidizer in its anhydrous form to a Class I it's reasonable to assume that the mixture we produce should be rated like the Sodium dichloroisocyanurate dihydrate, which as previously stated, is shipped as a non-regulated material.

Because of my unfamiliarity with the consequences of this determination request I would appreciate some indication in your response as to what to expect. My present understanding is that this might result in a notice in the Federal Register followed by publication in the Special Provisions of 49 CFR when the next volume is published. This also may actually exceed what will occur. If the only response is a letter from your office then that will at least take care of our immediate needs.

Thank you for your time and consideration. If you have any questions or require additional information please contact me at (909) 390-9912 extension 253.

Yours truly,

Dana Wm. Somesla, Chemist