Potassium bicarbonate (073508) and Sodium bicarbonate (073505) Fact Sheet

Summary

Potassium bicarbonate and sodium bicarbonate are naturally occurring compounds that are not expected to have adverse effects on humans or the environment when used as fungicides. Use of these two compounds in pesticide products may provide an alternative to more toxic fungicides currently on the market.

I. Description of the Active Ingredient

Name of Active Ingredient: Potassium bicarbonate (Carbonic acid, monopotassium salt)
OPP Chemical Code: 073508

Name of Active Ingredient: Sodium bicarbonate (Carbonic acid, monosodium salt; baking soda)
OPP Chemical Code: 073505

These two compounds are found throughout nature in living systems and in non-living environments. They are an integral part of humans, other animals, plants, and virtually all living organisms, and are crucial for normal function. They are also present in soils, water, rocks, and other parts of the environment. They are found in many consumer products.

II. Use Sites, Target Pests, and Application Methods

- Use Sites: All food commodities, turf, flowers, and ornamentals
- Target pests: Fungal diseases of plants
- Application Method: Pesticide products that contain these active ingredients are diluted with water and sprayed on foliage using ground equipment.

III. Assessing Risks to Human Health

No adverse health effects are expected when potassium bicarbonate or sodium bicarbonate are used as pesticides. The compounds are ubiquitous in nature; considered to be "generally recognized as safe" (GRAS) by the Food and Drug Administration; naturally present in human food; widely distributed in commerce; available to the general public for non-pesticidal uses; and required for normal function in human, animal, plant and environmental systems. Potassium bicarbonate and sodium bicarbonate are not associated with adverse effects to humans.

IV. Assessing Risks to the Environment
Potassium bicarbonate and sodium bicarbonate are not associated with adverse effects to the environment.

V. Regulatory Information

These two compounds were registered (licensed for sale) as pesticide active ingredients in December, 1994

Number of products as of October 1999:

Potassium bicarbonate: 3 end use products

Sodium bicarbonate: 0 end use products

VI. Producer Information

Church & Dwight Co., Inc.
Princeton, NJ

VII. Additional Contact Information

Ombudsman, Biopesticides and Pollution Prevention Division (7511P)
Office of Pesticide Programs
Environmental Protection Agency
1200 Pennsylvania Avenue, NW
Washington, D.C. 20460