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PM 21

35896-9

CP Chemicals, Inc.
c/o Linda C. Elliott
Route 1, Box 282
Milledgeville, GA 31632

AUG 13 1986

Gentlemen:

Subject: Amendments: Additional Brand Name,
Formula Change, Revised Labeling
Basic Copper Sulfate
EPA Registration No. 35896-9
Your Submissions Dated July 7, August 4 and 8, 1986

The additional brand name Copper Proud is acceptable and has been included in our records. Labeling must be identical to the basic registration except for the brand name.

The revised formula reducing the amount of copper in the product from 53 percent to 50 percent is acceptable. It is understood that the formula dated June 26, 1986 replaces previously accepted formulas for this product.

Labeling referred to above, submitted in connection with registration under the Federal Insecticide, Fungicide, and Rodenticide Act (FIFRA), is acceptable provided that you:

1. Submit/cite all data required for registration/reregistration of your product under FIFRA section 3(c)(5) when the Agency requires all registrants of similar products to submit such data.
2. Make the labeling changes listed below before releasing the product for shipment bearing amended labeling:
 - a. Modify eye statement to read "Causes substantial but temporary eye injury" and add the required skin sensitization statement from the Standard.
 - b. Delete references pertaining to effluent since this is not a manufacturing-use product. The statements on page 13 of the Standard apply to this product type and use pattern.

90518;Mountfort;MF-9;KEMCO;8/11/86;8/20/86;eq;luf

CONCURRENCES

SYNOPSIS							
ADMINISTRATIVE							
OTHER							

3. Submit one (1) copy of final printed labeling incorporating changes above.

If these conditions are not complied with, the registration will be subject to cancellation in accordance with FIFRA section 6(e). Your release for shipment of the product bearing amended labeling constitutes acceptance of these conditions.

A stamped copy of the labeling is enclosed for your records.

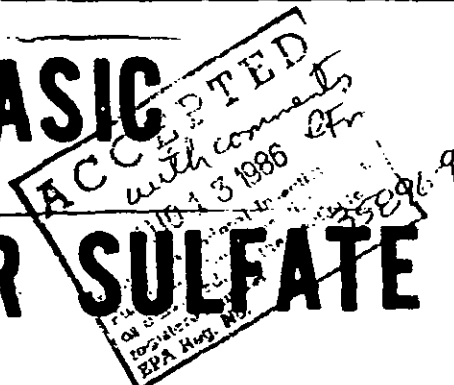
Sincerely yours,

Richard F. Mountfort *RFM*
Product Manager (23)
Fungicide-Herbicide Branch
Registration Division (TS-767C)

Enclosure

BASIC COPPER SULFATE

WETTABLE POWDER
AGRICULTURAL FUNGICIDE



KEEP OUT OF REACH OF CHILDREN

~~AVOID CONTACT~~

SEE BACK PANEL FOR STATEMENT
OF PRACTICAL TREATMENT

ACTIVE INGREDIENT:

Copper (Derived from Basic Copper Sulfate) . . 50.0%

INERT INGREDIENTS: 50.0%

Total 100.0%

BASIC COPPER SULFATE WETTABLE POWDER

PRECAUTIONARY STATEMENTS HAZARDS TO HUMANS AND DOMESTIC ANIMALS

substantial but temporary eye damage
 Causes eye and skin irritation. Do not get in eyes, on skin, or on clothing. Harmful if swallowed. Avoid breathing dust. Protective clothing, including goggles, should be worn. Wash thoroughly with soap and water after handling. Remove contaminated clothing and wash before reuse. Do not apply this product in such a manner as to directly or through drift expose workers or other persons. The area being treated must be vacated by unprotected persons.

PRECAUCION AL USUARIO: Si usted no lee ingles, no use este producto hasta que la etiqueta haya sido explicada ampliamente.

STATEMENT OF PRACTICAL TREATMENT ✓

IF SWALLOWED: Call a physician or Poison Control Center. Drink 1 or 2 glasses of water and induce vomiting by touching the back of throat with finger. Do not induce vomiting or give anything by mouth to an unconscious person.
IF ON SKIN: Wash with plenty of soap and water. Get medical attention.
IF INHALED: Remove victim to fresh air. If not breathing, give artificial respiration, preferably mouth-to-mouth. Get medical attention.
IF IN EYES: Flush with plenty of water. Call a physician.

ENVIRONMENTAL HAZARDS

Do not apply directly to water. Do not contaminate water by cleaning of equipment or disposal of wastes. This pesticide is toxic to fish and aquatic organisms. Do not discharge effluent containing this product into lakes, streams, ponds, estuaries, oceans, or public water unless this product is specifically identified and addressed in an NPDES permit. Do not apply where runoff is likely to occur. Do not apply when weather conditions favor drift from treated areas. Drift and runoff from treated areas may be hazardous to fish and aquatic organisms in adjacent aquatic sites. Do not discharge effluent containing this product into sewer systems without previously notifying the sewage treatment plant authority. For guidance contact your State Water Board or Regional Office of the EPA.

ENDANGERED SPECIES RESTRICTIONS ✓

It is a violation of Federal laws to use any pesticide in a manner that results in the death of an endangered species or adverse modification of their habitat.

The use of this product may pose a hazard to certain Federally designated endangered species known to occur in specific areas within the following counties:

STATE	Species	Bulletin No.	COUNTY
CALIFORNIA	Solano Grass	EPA/ES-85-13	Solano
TENNESSEE	Slackwater Darter	EPA/ES-85-04	Lawrence
			Wayne
			Hancock
	Freshwater Mussels	EPA/ES-85-07	Claiborne
			Hawkins
			Sullivan
ALABAMA	Slackwater Darter	EPA/ES-85-05	Lauderdale
VIRGINIA	Freshwater Mussels	EPA/ES-85-06	Limestone
			Madison
			Grayson
			Smyth
			Scott
			Lee
			Washington

Before using this product in the above counties you must obtain the EPA Bulletin specific to your area. This Bulletin identifies areas within these counties where the use of this pesticide is prohibited, unless specified otherwise. The EPA Bulletin is available from either your County Agricultural Extension Agent, the Endangered Species Specialist in your State Wildlife Agency Headquarters, or the appropriate Regional Office of the U.S. Fish and Wildlife Service.
THIS BULLETIN MUST BE REVIEWED PRIOR TO PESTICIDE USE.

STORAGE AND DISPOSAL ✓

Do not contaminate water, food or feed by storage or disposal. Wastes resulting from the use of this product may be disposed of on site or at an approved waste dump facility.

CONTAINER DISPOSAL: Completely empty bag into application equipment. Then dispose of empty bag in a sanitary landfill or by incineration, or, if allowed by state and local authorities, by burning. If burned, stay out of smoke.

Confidential
+ EP Statement

WARRANTY STATEMENT

Product warranted to meet label specifications. CP CHEMICALS, INC. guarantees shall be limited to the terms of the label, and subject thereto the buyer assumes any risk to persons or property arising out of use or handling not in accordance with label directions and accepts the product on these conditions. Nothing herein should be construed as authorization to practice any unexpired patent.

GENERAL INSTRUCTIONS

(Basic Copper Sulfate) Fungicide-Bactericide will control certain diseases of fruits, nuts, vegetables, field crops, and ornamentals caused by fungi and bacteria. Do not apply (Basic Copper Sulfate) undiluted or apply it to any crop not listed on this label. Do not use with or immediately before or after lime sulfur. Consult your State Agricultural Extension Service or Experiment Station for detailed information about spraying for best results in your local area.

DIRECTIONS FOR USE

It is a violation of Federal law to use this product in a manner inconsistent with its labeling.

SPRAY MIXTURE PREPARATION: Half-fill the spray tank with water. Start agitator and slowly sift in the required amount of (Basic Copper Sulfate). Keep agitator running while adding the remaining water and any other products to the spray tank. Continue agitation until spraying is finished and tank has been emptied.

APPLYING SPRAY MIXTURE: The directions given under each crop are for applying dilute spray mixture unless otherwise shown. The amount of (Basic Copper Sulfate) applied per acre in concentrate and aerial sprays should be the same as the amount applied per acre in dilute sprays. The required amount should be mixed with enough water to thoroughly cover the crop with spray mixture. The volume of water needed will depend upon the spray equipment used and the size of the crop being sprayed. Read the information below about applying dilute, concentrate, and aerial sprays.

APPLYING DILUTE HIGH-VOLUME SPRAYS: On vegetable crops use 25 to 100 gallons of spray mixture per acre; on fruit and nut trees use 400 to 800 gallons per acre. As much as 1500 gallons per acre may be needed for large trees.

APPLYING CONCENTRATE GROUND SPRAYS: On vegetable crops use 5 to 20 gallons of spray mixture per acre; on fruit and nut trees use 25 to 100 gallons per acre.

APPLYING AERIAL SPRAYS: Use 3 to 15 gallons per acre.

RE-ENTRY STATEMENT

Written or oral warnings must be given to workers who are expected to be in a treated area or in an area about to be treated with this product. (Indicate specific oral warnings which inform workers of areas or fields that may not be entered without specific protective clothing, period of time field must be vacated and appropriate actions to take in case of accidental exposure.) When oral warnings are given, warnings shall be given in a language customarily understood by workers. Oral warnings must be given if there is reason to believe that written warnings cannot be understood by workers. Written warnings must include the following information: **WARNING - AVISO.** Area treated with Basic Copper Sulfate on (date of application). Do not enter without appropriate protective clothing until spray has dried. Because certain states may require more restrictive reentry intervals for various crops treated with this product, consult your State Department of Agriculture for further information.

FIELD CROPS

PEANUTS. Leaf Spot (Cercospora). Use 2 to 3 pounds/acre when disease first appears. Use lower (2 pounds) rate on small plants. Repeat at 7 to 14 day intervals.

* Consult your county agricultural extension agent for current state recommendations as to amounts of basic copper sulfate and/or sulfur to be used as spray or dust.

SUGAR BEETS. Downy Mildew. Leaf Spot (Cercospora). Begin when plants are 4 to 6 inches high or when disease appears. Apply 4 pounds/100 gallons as required to cover. Repeat at 7 to 10 day intervals.

TOMACCO. Withers. 1 pound in 10 gallons water/100 sq. ft. plant bed. Begin after sowing seed or when plants emerge. Repeat at 5 to 10 day intervals until infestation.

FRUIT and NUTS

ALMONDS. Shot Hole (Conium blight). Use 4 to 8 pounds/100 gallons as required to cover. (California Dec. 15-Jan. 15). Repeat in spring at bud break and repeat stages. Brown Rot. Use 4 to 10 lb/100 gal at bud break and repeat stages. Late 30-40 lb/acre. Do not spray after 50% bloom or when trees in leaf. OVER-SPRAYING MAY INJURE TENDER FOLIAGE.

APPLES. Anthracnose. Use 3 to 4 pounds/100 gallons. For red varieties apply to leaves before or after harvest. For yellow varieties apply 7 days after harvest and every 2 to 3 weeks as necessary. Brown Rot. Leaf Spot. Use 1 pound plus 2.0 pounds inverted lime/100 gallons. Apply in late cover spray. After Rot. After Rot. After Rot. After Rot. Use 1 lb to 1 1/2 pounds plus 3 to 5 pounds inverted lime/100 gallons. Begin at bud break and repeat through fourth cover spray. After Rot. Use 4 pounds with sulfate spray or 100 gallons of water. Apply after harvest. For blight. 1 lb to 1 1/2 pounds/100 gallons; 2 pounds/acre in concentrate (invert). Begin at 10 percent bloom. Repeat at 5-day intervals until the bloom is over. Scab. 1 lb to 1 1/2 pounds plus 2.0 to 2.5 pounds inverted lime/100 gallons; or 1 pound/100 gallons. Apply at bud break and repeat stages. Leaf Spot. 1 1/4 pounds plus 2.5 pounds inverted lime/100 gallons. NOTE: Apply in late cover spray. Under conditions where copper injury is likely to occur, add additional lime. LIMITS: 32 pounds/acre.

APRICOTS. Shot Hole (Conium blight). Use 4 to 8 pounds/100 gallons with 1 1/2 gallon spreader-sprayer as full dormant spray (California Nov. 15 to Jan. 15). Repeat in red bud stage. Brown Rot. Use 5 pounds/100 gallons at red bud, early bloom and full bloom. LIMITS: 30 to 40 pounds/acre. Do not spray after onset of full during growing season while trees in leaf. Scab. Apply 5 pounds/100 gallons when recommended by State Extension Service Specialists.

AVOCADO. Anthracnose. Blight (Cercospora). Scab. Use 3 pounds/100 gallons. Spray first when blossom buds open. Make 5 applications at four-week intervals. LIMITS: 30 to 40 pounds/acre. Do not spray more than 140 days after bloom.

BLACKBERRIES, BOYSBERRIES, DEWBERRIES, LOGANBERRIES, RASPBERRIES. Leaf Spot and Cane Spot. Use 2 pounds/100 gallons. Spray first when leaf buds swell, again when flowers begin to open. Anthracnose. Use 2 pounds/100 gallons. Spray when leaf buds begin to open, again when flower buds show white. Repeat at 10 to 14 day intervals. Post-harvest, after pruning and following removal of berries and leaves, apply 6 pounds/100 gallons with 1 1/2 gallon spreader-sprayer as full dormant spray. LIMITS: 6 pounds/acre per each application.

CHERRIES (sour). Brown Rot. 3 to 5 pounds/100 gallons. Apply 10 to 15 days before and late bloom stages. Leaf Spot. Use 2 to 3 pounds plus 4.0 pounds of inverted lime/100 gallons. Apply at bud break and 1 or 2 post-harvest applications. Shot Hole. 6 pounds/100 gallons. Apply as a dormant spray. LIMITS: 30 pounds/acre.

CITRUS. Brown Rot. Severe Leaf. Fruit Spot. Apply 1 1/2 to 2 pounds plus 4 pounds inverted lime per 100 gallons. Apply before leaf fall and 11 days after leaf fall. Scab-sprayer may be added. Use lowest rate in California where copper injury may be a factor. Use highest rate elsewhere. LIMITS: 60 pounds/acre per application. Greasy Spot. Anthracnose. Scab. Apply 1 1/2 to 3 pounds/100 gallons in late cover spray before leaf fall; repeat at 45 days later. Same rates apply.

VEGETABLE CROPS

CURRENTS, GOOSEBERRIES, Anthracnose, Leaf Spot. (a) Spray with 1/4 pounds/100 gallon at leaf opening, repeat at 10-14 day intervals; or (b) apply 6 pounds/100 gallons at full bloom, two weeks later, and after harvest. LIMITS: 14 pounds/acre.

GRAPEFRUIT: See Citrus.

GRAPES, Anthracnose. Use 2 1/2 pounds/100 gallons on dormant vines in late spring. Repeat every 10 days-two weeks after leaves form. **Black Rot, Downy Mildew, Bitter Rot.** Use 2 to 3 pounds plus 2 to 6 pounds hydrated lime/100 gallon spray. Apply when first leaves appear; repeat before blossoms open, after petal fall, and every two weeks thereafter. **Sunburn Rot (Botrytis).** Use 2 pounds mixed with 12 1/2 pounds sulfur and zinc sulfate dust/acre; apply at budburst stage, repeat monthly until harvest. **Dead Arm.** Use 3 1/4 pounds plus 18 pounds hydrated lime/100 gallon; apply as soon as green tips show. **Powdery Mildew.** Apply 5 to 6 pounds in 50 to 85 pounds dust/acre when disease appears. LIMITS: All sprays, 8 pounds/acre.

KUMQUAT, LEMON, LIME: See Citrus.

OLIVES, Leaf Spot (Peacock Spot, Cyclospora), 4 to 6 pounds/100 gallon applied in late October. LIMITS: 6 to 12 pounds/acre.

NECTARINES: See Peaches.

ORANGES: See Citrus.

PEACHES, NECTARINES, Bacterial Disease (Fire Blight) of peaches, Leaf Curl, Shot Hole (Peach Blight). Apply dormant spray at 4 pounds/100 gallon during pink or red bud to cocoon stages. Do not apply during blossom period or when trees in leaf. **OVERSPRAYING MAY CAUSE INJURY TO TENDER FOLIAGE.** LIMITS: 16 to 20 pounds/acre.

PEARS, Fire Blight. Apply 1/2 pound/100 gallon at 10% bloom. Repeat every five days or after each rain until end of late bloom. **Leaf Blight, Scab.** Use 1 1/4 pounds plus 2 1/2 pounds hydrated lime/100 gallon spray in first three cover sprays. **Bull-eye Rot.** Apply 3 1/4 pounds plus suitable spray oil before harvest. **DO NOT USE ON ANJOU, COMICE OR SECKEL VARIETIES.** LIMITS PER ACRE: Use 2 pounds for Fire Blight, 6 1/2 pounds preharvest, 20 pounds post harvest.

PECANS, Scab. Apply 2 pounds/100 gallon as foliar spray. Consult current state schedule for timing and limits.

PLUMS, PRUNES, Dormant spray for Brown Rot. Apply 5 pounds plus 1 1/2 gallon spreader/100 gallon in dormant season. LIMITS: 25 pounds/acre. **Black Knot.** Apply 2 to 3 pounds plus 8 to 12 pounds hydrated lime/100 gallon at green tip stage. Repeat at shuckshed and in two cover sprays if disease is serious. **Blossom Blight, Leaf Spot.** Apply 1 1/2 to 2 1/2 pounds plus 6 to 10 pounds hydrated lime/100 gallon; spray just before blossoms open; repeat at shuck shed and again in 2 to 3 weeks. LIMITS: 12 pounds/acre. **OVERSPRAYING MAY INJURE TENDER FOLIAGE OF SOME JAPANESE PLUMS.**

TANGERINE, TANGELO: See Citrus.

STRAWBERRIES, Downy Mildew, Leaf Blight, Scorch or Spot. After leaves form spray 2 1/2 pounds/100 gallon at 10 to 14 day intervals. **Anthracnose.** Use 2 to 3 pounds plus 2 to 3 pounds hydrated lime/100 gallon pre-blossom. Post harvest, spray foliage with 3 pounds plus 6 pounds hydrated lime per 100 gallons. LIMITS: 7 1/2 pounds/acre.

WALNUTS, Blight. Spray pre-bloom at 10% pistillate bloom and in post bloom as needed during growing season. Use 4 to 5 pounds/100 gallon. LIMITS: 45 pounds/acre.

ORNAMENTAL PLANTS and TREES

ASTERS, BEGONIAS, CARNATIONS, CHRYSANTHEMUMS, DAHLIAS, GARDENIAS, GERANIUMS, GLADIOLUS, HOLLYHOCKS, LILIES, MARIGOLDS, NASTURTIUM, PANSIES, PEONIES, PHLOX, ROSES, SNAPDRAGONS, STOCK, SWEET PEAS, TULIPS, VIOLETS and ZINNIA, Anthracnose, Botrytis Blight, Leaf Spots, Downy and Powdery Mildew. Apply 4 pounds/100 gallons. Spray before disease appears. Repeat every 7 to 10 days and after each rain.

ARBOR VITAE, AZALEAS, BOXWOOD, DOGWOODS, IVIES, LILACS, MAPLES, OAKS, PALMS, PINES, RHODODENDRONS and VIRGINIA CREEPER, Anthracnose, Blights, Leaf Spots, Smut (on Palm). Apply 4 pounds/100 gallon. Spray before diseases appear. Repeat every 7 to 10 days and after each rain.

SEED TREATMENT

WHEAT, Stinking Smut (Bunt). Use 2 ounces COPPER PROUD /bushel on spring wheat seed; 3 ounces on winter wheat; and 4 ounces on flinted winter wheat. Apply as a dry mix to seed. **DO NOT USE TREATED SEED FOR FOOD, FEED OR OIL PURPOSES.**

BEANS, Anthracnose, Angular and other Leaf Spots, Downy and Powdery Mildew. Apply 2 to 3 pounds/100 gallons. Start spraying when plants are 5 inches high or when diseases appear. Repeat at 5 to 10 day intervals, as needed.

BEETS, Leaf Blight and Spot, Downy Mildew. Begin sprays of 2 to 3 pounds/100 gallon when diseases appear; repeat every 7 to 10 days. LIMITS: 7 pounds/acre.

BROCCOLI, BRUSSELS SPROUTS, CABBAGE, CAULIFLOWER, Downy Mildew or Leaf Spots. In plant bed spray with 2 to 3 pounds/acre when plants are above ground before diseases appear; repeat in 7 to 10 days as needed. In field use 3 pounds/100 gallon at 7 to 10 day intervals as needed. LIMITS: 6 pounds/acre.

CARROTS, Downy Mildew and Leaf Spots. Apply 1 1/4 pounds plus 2 pounds hydrated lime/100 gallon when disease first appears; repeat every 7 to 10 days gradually increasing to 4 pounds. **COPPER PROUD:** plus 2 pounds hydrated lime/100 gallon. LIMITS: 6 1/2 pounds/acre.

CELERY, Early Blight (Cercospora), Late Blight (Septoria), Leaf Spots. Begin with about 2 pounds/100 gallon in plant bed or field when plants are 6 inches high or disease first appears. Repeat in 5 to 14 days as needed, building up to 5 pounds/100 gallon as plants grow. LIMITS: 3 to 10 pounds/acre.

CUCURBITS (Cantaloupe, Cucumbers, Honeydew Melons, Muskmelons, Pumkin, Squashes, Watermelons), Angular Leaf Spot, Anthracnose, Bacterial Wilt, Downy and Powdery Mildew, Gummy Stem Blight, other Leaf Spots and Scab. Apply 2 to 3 pounds/100 gallon. Start spraying when plants emerge or begin to vine, or before disease appears. Repeat at 7 to 10 day intervals. Spray to protect crop at all stages of development. Ground application of COPPER PROUD after planting and before plant emergence may help decrease infestation of Angular Leaf Spot.

EGGPLANT, Anthracnose, Downy Mildew, Early (Alternaria) Blight, Phomopsis Blight, Leaf Spots. Beginning in plant bed or in field before disease appears, apply 1 1/4 to 3 pounds/100 gallon. Repeat at 7 to 10 day intervals. LIMITS: 6 1/2 pounds/acre.

LETTUCE, Anthracnose, Leaf Spot (Cercospora), Downy Mildew. Spray 1 1/4 to 3 pounds/100 gallon before diseases appear. Repeat at 7 to 10 day intervals. LIMITS: 5 pounds/acre.

ONIONS, Downy Mildew, Leaf Spots. Use 1 1/4 to 3 pounds/100 gallon. Begin as soon as plants grow to 4 to 6 inches; repeat every seven days. LIMITS: 6 1/2 pounds/acre.

PEAS, Downy Mildew, Leaf Spots. Use 1 1/4 to 3 pounds/100 gallon. Begin spraying before disease appears; repeat at 7 to 10 day intervals. LIMITS: 6 pounds/acre.

PEPPERS, Anthracnose, Bacterial Spot, Early and Late Blight, Cercospora Leaf Spot (Fire Eye Spot), Downy Mildew. Spray in plant bed before disease appears. Continue in field at 7 to 10 day intervals, especially during fruiting stage. Use 2 to 4 pounds/100 gallon. LIMITS: 4 to 8 pounds/acre.

POTATOES, Early and Late Blights. Start spraying when plants emerge, repeat at 7 to 10 day intervals every 5 days for severe Late Blight. Use from 2 to 3 pounds to 3 to 5 pounds/100 gallon. LIMITS: 12 pounds/acre, based on plant size and severity of disease.

SEEDLINGS, VEGETABLE: See vegetable seedlings.

SPINACH, Anthracnose, Blue Mold (Downy Mildew), Leaf Spot (Cercospora), White Rust. Use 2 to 3 pounds/100 gallon. Spray before diseases appear. Repeat every 7 to 10 days. LIMIT: 8 pounds/acre.

TOMATOES, Anthracnose, Bacterial Spot, Bacterial Canker (Southwest), Early and Late Blights, Leaf Mold, Nailhead Rust, Septoria and Stemphylium Leaf Spots. Begin protective spray in plant bed or field before diseases appear. Use 2 to 4 pounds/100 gallon, up to 12 pounds/acre limit. Repeat at 4, 7, 10 or 14 day intervals as required.

VEGETABLE SEEDLINGS: To prevent or control damping-off, Apply 4 pounds/100 gallon, 8 pounds/acre, to soil surface on plant beds after emergence. Repeat at 4 to 7 day intervals as required.



CP Chemicals, Inc.

Sewaren, N.J. 07077