

# KZ 20/20

100.0%

## Fungicide/Bactericide

ACTIVE INGREDIENTS Copper Hydroxide\* (CAS No. 20427-59-2) INERT INGREDIENTS:

TOTAL (\*Metallic Copper Equivalent 20%)

(Metallic Zinc Equivalent 20% Derived from Basic Zinc Salts) EPA Reg. No. 7001-7774 EPA Est. No. 10951-CA-5

derstand the label, find someone to explain it to you in detail).

#### By Weight GENERAL INSTRUCTIONS 30.7% 69.3%

The following directions for use are based on general applications. The recommendations of State Agricultural Extension Services should be closely followed as to timing, frequency and number of sprays per season. PHT® KZ 20/20 is adaptable to spraying from aircraft and ground spraying equipment. Depending upon the equipment used and the specific crop, the volume applied per acre will differ. Refer to recommended volume table below.

> Minimum Recommended Spray Volume (Gallons) Per Acre When Apply PHT® KZ 20/20

	Aerial		Ground	
		Dilute	Concentrate	
Citrus	10	800	100 (50 Florida)	
Tree Crops	10	400	50	
Vegetables	3	20		

This product may be reactive on masonry and metal surfaces such as galvanized roofing. Avoid contact with metal surfaces. Do not spray on cars, houses, lawn furniture, or other metallic surfaces.

Agricultural chemicals may perform in an unpredictable manner when tank mixed, especially where several products are involved. Observe the most restrictive of the labeling limitations and precautions of all products used in mixtures. Reduced effect on pests or crop injury may occur. Unless recommended on this label or by a state/local expert, it is advisable to test for compatibility and potential crop injury prior to commercial use of a new tank mix; otherwise, tank mixing should not be undertaken.

Do not apply this product through any irrigation (chemigation) system using aluminum parts or components as damage to the system may occur. Such application is prohibited regardless of whether the irrigation system is flushed with water after use of this product.

Apply this product only through one or more of the following types of systems: sprinkler, including center pivot, lateral move, traveler, big gun or plastic pipe solid set system(s) which contain no aluminum parts or components. Do not apply this product through any other type of irrigation system.

## FIRST AID

Si usted no entiende la etiqueta, busque a alguien para que se la explique a usted en detalle. (If you do not un-

KEEP OUT OF REACH OF CHILDREN

**DANGER - PELIGRO** 

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 SWALLOWED: Call a poison control center or doctor immediately for treatment advice. Have person sip a glass of water if able to swallow. Do not induce vomiting unless told to do so by the poison control center or doctor. Do not give anything by mouth to an unconscious person.

IF ON SKIN OR CLOTHING: Take off contaminated clothing. Rinse skin immediately with plenty of water for 15 to 20 minutes. Call a poison control center or doctor for treatment advice

IF INHALED: Move person to fresh air. If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably mouth-to-mouth, if possible. Call a poison control center or doctor for further treatment advice.

Have the product container or label with you when calling a poison control center or doctor, or going for treatment. You may also contact 1-800-441-3637 for emergency medical treatment information.

NOTE TO PHYSICIAN: Probable mucosal damage may contraindicate use of gastric lavage.

See Label for Additional Precautions and Directions for use.

## PRECAUTIONARY STATEMENTS HAZARDS TO HUMANS AND DOMESTIC ANIMALS **DANGER - PELIGRO**

Corrosive. Causes irreversible eye damage. Harmful if swallowed. Do not get in eyes or on clothing.

## PERSONAL PROTECTIVE EQUIPMENT (PPE)

Some materials that are chemical-resistant to this product are listed below. If you want more options, follow the instructions for category A on an EPA chemical resistance category selection sheet.

### Mixers, loaders, applicators and other handlers must wear:

- Long-sleeved shirt and long pants
- Chemical-resistant gloves made of any waterproof material, such as polyvinyl chloride, nitrile rubber or butyl rubber
- Shoes plus socks
- Protective eyewear, such as goggles or face shield

Discard clothing and other absorbent materials that have been drenched or heavily contaminated with this product's concentrate. Do not reuse them. Follow manufacturer's instructions for cleaning/maintaining PPE. If no such instructions for washables exist, use detergent and hot water. Keep and wash PPE separately from other laundry.

#### USER SAFETY RECOMMENDATIONS

USERS SHOULD: Wash hands before eating, drinking, chewing gum, using tobacco or using the toilet. Remove clothing/PPE immediately if pesticide gets inside. Then wash thoroughly and put on clean clothing. Remove PPE immediately after handling this product. As soon as possible, wash thoroughly and change into clean clothing. Wash the outside of gloves before removing.

## **ENVIRONMENTAL HAZARDS**

This pesticide is toxic to fish and aquatic invertebrates and may contaminate water through runoff.

This product has a potential for runoof for several months or more after application. Poorly draining soils and soils with shallow water tables are more prone to produce runoff that contains this product. Drift and runoff may be hazardous to aquatic organisms in waters adjacent to treated areas

Do not apply directly to water, to areas where surface water is present, or to intertidal areas below the mean high water mark. Do not contaminate water when disposing of equipment washwater or rinsate.

## **DIRECTIONS FOR USE**

It is a violation of Federal Law to use this product in a manner inconsistent with its labeling. Do not apply this product in a way that will contact workers or other persons, either directly or through drift. Only protected handlers may be in the area during application. For any requirements specific to your State or Tribe, consult the State or Tribal agency responsible for pesticide regulation.

## AGRICULTURAL USE REQUIREMENTS

Use this product only in accordance with its labeling and with the Worker Protection Standard, 40 CFR part 170. This Standard contains requirements for protection of agricultural workers on farms, forests, nurseries and greenhouses and handlers of agricultural pesticides. It contains requirements for training, decontamination, notification and emergency assistance. It also contains specific instructions and exceptions pertaining to the statements on this label about personal protective equipment (PPE) and restricted-entry interval. The requirements in this box only apply to uses of this product that are covered by the Worker Protection Standard.

Do not enter or allow worker entry into treated areas during the restricted entry interval (REI) of 48 hours without required PPE.

PPE required for early entry to treated areas that is permitted under the Worker Protection Standard and that involves contact with anything that has been treated, such as plants, soil or water, is:

- Coveralls
- Chemical-resistant gloves made of any waterproof material, such as polyvinyl chloride, nitrile rubber or butyl rubber
- Shoes plus socks Protective eyewear
- Do not use in greenhouses

## **CROP CLASSIFICATION**

CITRUS: Grapefruit, Lemon, Lime, Orange, Tangelo, Tangerine TREE CROPS: Almond, Apricots, Peach, Pear, Nectarine, Walnut

VEGETABLES: Celery

PHT® KZ 20/20 may be applied as an aerial, ground dilute or ground concentrate spray unless specifically directed otherwise by crop.

Under heavy disease pressure or when conditions favor such, use the higher rate and shorter spray intervals specified for each crop. In addition, use the higher rates for large mature tree crops.

The per acre use rate of PHT® KZ 20/20 is applicable for both dilute and concentrate spraying. Consult the PHT® KZ 20/20 label for specific rates and timing of applications by crop.

Complete spray coverage is essential to assure optimum performance from PHT® KZ 20/20. When treating on a concentrate basis or by aerial application, unless you have had specific previous experience, it is advisable to test for compatibility and potential crop injury prior to full scale commercial utilization.

While volume is important in obtaining full spray coverage, often factors such as foliage density, environmental conditions and spray calibrations have a greater impact.

Always be sure that sprayers are calibrated to spray equipment manufacturer's specifications and environmental conditions are within those recommended by state and local regulatory authorities

When mixing, fill spray tank one-half full with water. Add PHT® KZ 20/20 slowly to tank while hydraulic or mechanical agitation is operating and continue filling with water. Spreaders, stickers, insecticides, nutrients, etc. should be added last. If compatibility is in question, use the Compatibility Jar Test before mixing a whole tank.

NOTE: PHT® KZ 20/20 should not be applied in a spray solution having a pH of less than 6.5 as phytotoxicity may occur. Applying PHT® KZ 20/20 in a spray solution having a pH greater than 9.0 may result in reduced levels of disease control.

Environmental conditions such as extended periods of wet weather, acid rain, etc. which alter the pH of the leaf surface may affect the performance of PHT® KZ 20/20 resulting in possible phytotoxicity or loss of effec-

The following specific instructions are based on general application procedures. The recommendations of the State Agricultural Extension Service should be closely followed as to timing, frequency, and number of sprays per season.

## SPRAY DRIFT MANAGEMENT

A variety of factors including weather conditions (e.g., wind direction, wind speed, temperature, relative humidity) and method of applications (e.g., ground, aerial, airblast, chemigation) can influence pesticide drift. The applicator must evaluate all factors and make appropriate adjustments when applying this product.

Droplet Size: Apply only as a medium or coarser spray (ASAE standard 572) or a volume mean diameter of 300 microns or greater for spinning atomizer nozzles.

Wind Speed: Do not apply at wind speeds greater than 15 mph. Only apply this product if the wind direction favors on-target deposition (appox. 3 to 10 mph), and there are no sensitive areas within 250 feet downwind. Temperature Inversions: If applying at wind speeds less than 3 mph, the applicator must determine if a) conditions of temperature inversion exist, or b) stable atmospheric conditions exist at or below nozzle height. Do not make applications into areas of temperature inversions or stable atmospheric conditions.

Other State and Local Requirements: Applicators must follow all state and local pesticide drift requirements regarding application of copper compounds. Where states have more stringent regulations, they must be observed.

Equipment: All aerial and ground application equipment must be properly maintained and calibrated using appropriate carriers or surrogates.

#### Additional requirements for aerial application:

- The boom length must not exceed 75% of the windspan or 90% of the rotor blade diameter.
- Release spray at the lowest height consistent with efficacy and flight safety. Do not release spray at a height greater than 10 feet above the crop canopy unless a greater height is required for aircraft safety.
- When applications are made with a crosswind, the swath must be displaced downwind. The applicator must compensate for this displacement at the up and downwind edge of the application area by adjusting the path of the aircraft upwind.

#### Additional requirements for ground application:

Do not apply with a nozzle height greater than 4 feet above the crop canopy.

CITRUS				
Crop	Disease	Rate (lbs. Product/Acre)	Max. Seasonal Rate (lbs. Product/Acre*)	Use Instructions
Citrus	Brown Rot, Septoria Rot	10-15.75 lbs. (2-3.15 lbs. metallic copper/A)	63 lbs. (12.6 lbs. metallic copper/A)	Use as a dilute, concentrate or aerial spray. Begin applications in fall after first rains and before fruit becomes infected. A second application may be required in January or February following periods of heavy rains. Use the high rate when rainfall is heavy and/or disease pressure is high. Minimum retreatment internal is 7 days.

Adding foliar nutritionals or other products to spray mixtures containing PHT® KZ 20/20 and applying to citrus during the post bloom period when young fruit are present may result in spray burn.

\*\*Maximum separate rate includes all other concert fearbeaths applied to present a product.\*\*

TREE CROPS				
Crop	Disease	Rate (lbs. Product/Acre)	Max. Seasonal Rate (lbs. Product/Acre*)	Use Instructions
Almond	Coryneium Blight, Blossom Brown Rot	15-30 lbs. (3-6 lbs. metallic copper/A)	90 lbs. (18 lbs. metallic copper/A)	Dormant Application: Apply before foliage buds begin to swell. Use high rate when rainfall is heavy and/or disease pressure is high. Minimum retreatment interval is 7 days.
		7.5 lbs. (1.5 lbs. metallic copper/A)		Early Bloom (popcorn) Appli- cation: Apply before full bloom. Minimum retreatment interval is 5 days. NOTE: To avoid plant injury, do not use after full bloom.
	Bacterial Blast (Pseudomonas)	30-40 lbs. (6-8 lbs. metallic copper/A)		Use at dormant to late dormant. Minimum retreatment interval is 7 days.
Apricot	Coryneum Blight (Shot Hole), Blossom Brown Rot	7.5 lbs. (1.5 lbs. metallic copper/A)	90 lbs. (18 lbs. metallic copper/A)	Apply at popcorn to full bloom. Minimum retreatment interval is 5 days. NOTE: To avoid spray injury, do not apply after bloom.
Peach, Nectarine	Leaf Curl, Coryneum Blight (Shot Hole)	20-40 lbs. (4-8 lbs. metallic copper/A)	90 lbs. (18 lbs. metallic copper/A)	Dilute Dormant Application: Apply at leaf fall. Use the high rate when rainfall is heavy and/or disease pressure is high. Minimum retreatment interval is 7 days. Concentrate Dormant Appli- cation: Apply at leaf fall. Use the high rate when rainfall is heavy and/or disease pres- sure is high.
	Brown Rot Blossom Blight	7.5 lbs. (1.5 lbs. metallic copper/A)		Use as a full cover spray at pink bud. Minimum retreatment interval is 5 days. NOTE: Application to trees in stages of development beyond pink bud will result in injury.
	Bacterial Spot	15 lbs. (3 lbs. metallic copper/A)		Dormant Application. Minimum retreatment interval is 7 days.
Pear	Fire Blight	2.5 lbs. (0.5 lbs. metallic copper/A)	80 lbs. (16 lbs. metallic copper/A)	Apply at 5 day intervals throughout bloom period. Minimum retreatment interval is 5 days.
	Pseudomonas Blight	22.5-40 lbs. (4.5-8 lbs. metallic copper/A)		Apply as a dormant applica- tion before spring growth starts. Excessive dosages may cause fruit russet. Use the high rate when rainfall is heavy and/or disease pres- sure is high. Only one treat- ment allowed per season.
Walnut	Walnut Blight	15.75 lbs. (3.15 lbs. metallic copper/A)	126 lbs. (25.2 lbs. metallic copper/A)	Apply first spray at early pre-bloom when catkins are partially expanded. Make three additional applications during bloom and early nutlet stage at 7 to 10 day intervals. Additional applications may be necessary when frequent rainfall occurs. Minimum retreatment interval is 7 days. NOTE: Adequate control may not be obtained when copper tolerant species of Xanthomonas bacteria are present.

<sup>\*</sup>Maximum seasonal rate includes all other copper treatments applied to crops.

	VEGETABLE				
Crop	Disease	Rate (lbs. Product/Acre)	Max. Seasonal Rate (lbs. Product/Acre*)	Use Instructions	
Celery	Early Blight, Late Blight, Bacterial Blight	5 lbs. (1.0 lbs. metallic copper/A)	26.5 lbs. (5.3 lbs. metallic copper/A)	Begin applications as soon as plants are established in the field, repeating at no less than 7 day intervals depending on disease severity and environmental conditions.	

#### \*Maximum seasonal rate includes all other copper treatments applied to crops.

### **GENERAL CHEMIGATION INSTRUCTIONS**

Do not apply this product through any irrigation (chemigation) system using aluminum parts or components as damage to the system may occur. Such application is prohibited regardless of whether the irrigation system is flushed with water after use of this product.

Apply this product only through one or more of the following types of systems: sprinkler, including center pivot, lateral move, traveler, big gun or plastic pipe solid set system(s) which contain no aluminum parts or components.

Do not apply this product through any other type of irrigation system.

Crop injury, lack of effectiveness or illegal pesticide residues in the crop can result from nonuniform distribution of treated water If you have questions about calibration, you should contact State Extension Service specialists, equipment manufacturers or other experts

Do not connect an irrigation system (including greenhouse systems) used for pesticide application to a public water system unless the pesticide label-prescribed safety devices for public water systems are in place.

A person knowledgeable of the chemigation system and responsible for its operation or under the supervision of the responsible person, shall shut the system down and make necessary adjustments should the need arise.

Shut off injection equipment after treatment and continue to operate irrigation system until PHT® KZ 20/20 has been cleared from the last sprinkler head

Posting of areas to be chemigated is required when 1) any part of a treated area is within 300 feet of sensitive areas such as residential areas, labor camps, businesses, day care centers, hospitals, in-patient clinics, nursing homes or any public areas such as schools, parks, playgrounds or other public facilities not including public roads, or 2) when the chemigated area is open to the public such as golf courses or retail greenhouses.

Posting must conform to the following requirements.

Treated areas shall be posted with signs at all usual points of entry and along likely routes of approach from the listed sensitive areas. When there are no usual points of entry, signs must be posted in the corners of the treated areas and in any location affording maximum visibility to sensitive areas. The printed side of the sign should face away from the treated area towards the sensitive area. The signs shall be printed in English. Signs must be posted prior to application and must remain posted until foliage has dried and soil surface water has disappeared. Signs may remain in place indefinitely as long as they are composed of materials to prevent deterioration and maintain legibility for the duration of the posting period.

All words shall consist of letters at least 2 1/2 inches tall, and all letters and the symbol shall be a color which sharply contrasts with their immediate background. At the top of the sign shall be the words KEEP OUT, followed by an octagonal stop sign symbol at least 8 inches in diameter containing the word STOP. Below the symbol shall be the words PESTICIDES IN IRRIGATION WATER WATER

This sign is in addition to any sign posted to comply with the Worker Protection Standard.

## CHEMIGATION SYSTEMS CONNECTED TO **PUBLIC WATER SYSTEMS**

Public water system means a system for the provision to the public of piped water for human consumption if such system has at least 15 service connections or regularly serves an average of at least 25 individuals daily at least 60 days out of the year.

Chemigation systems connected to public water systems must contain a functional, reduced-pressure zone, backflow preventer (RPZ) or the functional equivalent in the water supply line upstream from the point of pesticide introduction. As an option to the RPZ, the water from the public water system should be discharged into the reservoir tank prior to pesticide introduction. There shall be a complete physical break (air gap) between the outlet end of the fill pipe and the top or overflow rim of the reservoir tank of at least twice the inside diameter of the fill pipe.

The pesticide injection pipeline must contain a functional, automatic, quick-closing check valve to prevent the flow of fluid back

The pesticide injection pipeline must contain a functional, normally closed, solenoid-operated valve located on the intake side of the injection pump and connected to the system interlock to prevent fluid from being withdrawn from the supply tank when the irrigation system is either automatically or manually shut down.

The system must contain functional interlocking controls to automatically shut off the pesticide injection pump when the water pump motor stops, or in cases where there is no water pump, when the water pressure decreases to the point where pesticide distribution is adversely affected.

Systems must use a metering pump, such as a positive displacement injection pump (e.g., diaphragm pump) effectively designed and constructed of materials that are compatible with pesticides and capable of being fitted with a system interlock.

Do not apply when wind speed favors drift beyond the area intended for treatment.

NOTE: It must be determined if proper application equipment is available and if waste associated with its use can be properly handled. Agricultural chemicals are often reactive with the materials used in the construction of application equipment, such as aluminum, rubber and some synthetic materials. This factor should be taken into consideration when selecting proper application equipment. It is necessary that all application equipment be thoroughly flushed with clean water after each day's use.

When mixing, fill the nurse tank half full with water, Add PHT® KZ 20/20 slowly to tank while hydraulic or mechanical agitation is operating and continue filling with water. Stickers, spreaders, insecticides, nutrients, etc. should be added last. If compatibility is in question, use the Compatibility Jar Test before mixing a whole tank. Because of the wide variety of possible combinations which can be encountered, observe all precautions and limitations on the label of all products used in mixtures.

PHT® KZ 20/20 should be added through a traveling irrigation system continuously or at the last 30 minutes of solid set irrigation systems. Agitation is recommended. Shut off injection equipment after treatment and continue to operate irrigation system until PHT® KZ 20/20 has been cleared from the last sprinkler head.

### SPRINKLER CHEMIGATION

The system must contain a functional check valve, vacuum relief valve and low pressure drain appropriately located on the irrigation pipeline to prevent water source contamination from backflow.

The pesticide injection pipeline must contain a functional, automatic, quick-closing check valve to prevent the flow of fluid back toward the injection pump.

The pesticide injection pipeline must also contain a functional, normally closed, solenoid-operated valve located on the intake side of the injection pump and connected to the system interlock to prevent fluid from being withdrawn from the supply tank when the irrigation system is either automatically or manually shut down.

The system must contain functional interlocking controls to automatically shut off the pesticide injection pump when the water pump motor stops.

The irrigation line or water pump must include a functional pressure switch which will stop the water pump motor when the water pressure decreases to the point where pesticide distribution is adversely affected.

Systems must use a metering pump, such as a positive displacement injection pump (e.g., diaphragm pump) effectively designed and constructed of materials that are compatible with pesticides and capable of being fitted with a system interlock.

Do not apply when wind speed favors drift beyond the area intended for treatment.

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## STORAGE AND DISPOSAL

Do not contaminate water, food or feed by storage or disposal

PESTICIDE STORAGE: Store in a cool dry place.

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

CONTAINER DISPOSAL: Nonrefillable container. Do not use or refill this container. Completely empty bag into application equipment. Offer for recycling if available, if not, 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.

DISCLAIMER OF WARRANTIES: J.R. Simplot Company warrants that the product conforms to its chemical description and is reasonably fit for the purpose stated on the label only when used in accordance with label directions under normal conditions of reasonably fit for the purpose stated on the label only when used in accordance with label directions under normal conditions use. To the extent consistent with applicable law J.R. SIMPLOT COMPANY MAKES NO OTHER EXPRESS OR IMPLIED WAR-RANTIES EITHER OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR USE. Handling, storage and use of the product by Buyer or User are beyond the control of J.R. Simplot Company and Seller. To the extent consistent with applicable law risks such as crop injury, ineffectiveness or other unintended consequences resulting from, but not limited to, weather or soil conditions, presence of other materials, disease, pest, drift to other crops or property or failure to follow label directions will be assumed by the Buyer or User. To the extent consistent with applicable law, in no case will J.R. Simplot Company or Seller be held liable for consequential, special or indirect damages resulting from the handling, storage or use of this product.

FPA Notif 7-1-12

PRODUCED FOR:



**Net Weight:** 15 lbs. (6.8 Kg.) Lot Number

