

Headland Sulphur

Contains 800 grams per litre (58.8% w/w) elemental sulphur.

A fungicide for the control of powdery mildews in sugar beet, fodder beet, mangels, wheat and barley, swedes, strawberries, and hops, and powdery mildew and scab in apples and pears.

Contains 1,2-Benzisothiazolin-3-one. May produce an allergic reaction.

RISK AND SAFETY INFORMATION

Warning

Causes skin irritation.

Causes serious eye irritation.

Wash hands thoroughly after handling.

Wear protective gloves/protective clothing/eye protection/face protection.

IF ON SKIN: Wash with plenty of soap and water.

IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do.

Continue rinsing.

If skin irritation occurs: Get medical advice/attention.

If eye irritation persists: Get medical advice/attention.



PCS No. 90731

FOR USE ONLY AS AN AGRICULTURAL / HORTICULTURAL FUNGICIDE

Crop	Maximum Individual Dose	Maximum number of Applications	Latest Time of Application
Winter and spring Wheat and barley sugarbeet, swedes	10 l/ha	4 per crop	-
Apple, pear	11 l/ha low volume, 560ml/100 lt high volume	4 per crop	
Hops	11 l/ha low volume, 600ml/100 lt high volume	4 per crop	Prior to the burr stage
Strawberry	600 ml/100 lt high volume	4 per crop	

When applying at high volume the following maximum concentrations must not be exceeded:

Apples and pears – 560 mls/ 100 litres of water

Hops and strawberries – 600 mls / 100 litres of water

CONTENTS: 10 LITRES

Batch number / date of production: see neck of the bottle

Made in the United Kingdom



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DIRECTIONS FOR USE

CAUTIONS

Do not apply Headland Sulphur when the temperature is above 25°C (77°F) or in strong sunlight.

Headland Sulphur is generally non-phytotoxic, but some varieties of apples and pears are 'sulphur shy' and care should be exercised if spraying these varieties (see appropriate section). It may cause taints and processors should be consulted if the crop is to be used for canning, freezing or jam making.

GENERAL INFORMATION

Headland Sulphur is a suspension of finely milled sulphur having particles of an average size of three microns.

As a preventative spray it is particularly effective against powdery mildews on a wide range of crops. It is also effective against scab on apples and pears.

MODE OF ACTION

Headland Sulphur is a preventative fungicide. Best results are achieved by applying a protective cover before infection is established, and maintaining this by regular applications throughout the period during which the crop may be susceptible to infection. Good cover of foliage is essential for maximum disease control. If the disease is already established, the crop should be treated with an eradicant fungicide, after which Headland Sulphur can be used.

CROPS TREATED, DISEASES CONTROLLED, APPLICATION RATES AND TIMING:

SUGAR BEET, FODDER BEET AND MANGOLDS

Powdery mildew of beets and mangolds is a common disease that causes appreciable yield loss. All varieties are susceptible. Mildew is most active in warm settled weather and may occur from late July onwards. Early control is the most important and gives the greatest yield response. Control measures after early September are not usually economic.

Rate of Use

Apply 5 – 10 l/ha in 200-400 litres of water/ha. Use the higher rate when infection pressure is severe.

Timing

In areas where the disease is endemic, start spraying at the end of July and no later than the first week of August. Elsewhere, start spraying when the disease is first seen in the crop. A further application 3 weeks later is usually sufficient but if the weather remains dry and settled during August, reduce the interval to 2 weeks and make a third application.

CEREALS

All cereals are susceptible to powdery mildew. The disease can infect green tissue at any stage of crop growth when weather conditions are warm and settled.

Sulphur can give partial control of mildew on wheat and barley. However, results may be variable and systemic products can be more reliable especially in showery weather. Active, established mildew may not be adequately controlled by sulphur.

Rates of Use

On all cereals, use 5 – 10 l/ha in a minimum of 200 litres of water/ha. Use the higher rate when infection pressure is severe.

Timing:

Winter wheat and winter barley – spray in the autumn as soon as infection is seen and repeat after 10 – 14 days according to disease prevalence. Repeat in the spring as soon as infection is seen on new growth and continue at 10 – 14 day intervals according to disease prevalence until ear emergence. Use the shorter interval if weather conditions favour mildew.

Spring wheat and spring barley – Apply as soon as infection is seen and continue at 10 – 14 day intervals according to disease prevalence until ear emergence. Use the shorter interval if weather conditions favour mildew.

HOPS

Powdery mildew of hops occurs in most seasons from May onwards. It causes lesions on the leaves, young shoots and eventually the burs and cones. A serious infection can cause the crop to be rejected.

Rates of Use

Low volume: Apply 8.0 – 11.0 litres in 350 – 500 litres of water per hectare. The higher rates should be used where the disease is severe or the foliage is dense.

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High volume: 250 – 600 mls per 100 litres water. Apply 1000 – 2250 litres per hectare. The higher rate of sulphur should be used where the disease is severe. The volume of dilute spray mixture should be increased, within the above recommendations as the density and quantity of foliage progresses with the growing period.

Timing

Begin applying in mid May before the disease appears. Repeat the application every 10 to 14 days. If the yard has a severe mildew history use the shorter interval. Application should cease before the burr stage is reached.

SWEDE – POWDERY MILDEW

Headland Sulphur can give moderate control of powdery mildew on swedes. It should be applied only if further root growth is required.

Rate of Use

5.0 – 10.0 litres in at least 200 litres of water per hectare.

Timing

Apply when the disease first appears, and repeat the application two or three weeks later. A third application may be required if settled weather persists. The higher rate should be used where disease risk is high.

APPLES & PEARS – POWDERY MILDEW & SCAB

Rate of Use

High volume – Dilution rate 560 mls per 100 litres of water. Apply 1000 – 2250 litres per hectare.

Low volume – Apply 11.0 litres in 350 – 500 litres of water per hectare.

Timing

For powdery mildew control, the spraying should be at 10-day intervals throughout the period from pink bud until the end of extension growth, particularly at the pre-petal fall period. It is essential to achieve a good fungicide cover over all parts of the tree, especially the growing points. For the control of scab, spray at 10-day intervals, from bud burst until late June.

WARNING

1. The effect of Headland Sulphur on parasites and predators has not been established and safety cannot be assumed
2. Certain varieties of fruit trees and bushes may be damaged by sulphur sprays. The form of the spray, district soil and weather conditions and type of stock all affect the degree of sulphur shyness. The following list includes some varieties likely to be damaged by sulphur but is not necessarily complete.

Beauty of Bath	Lanes Prince Albert	Newton Wonder
Belle de Boskoop	Doyenne du Cornice	Rival
Cox's Orange Pippin	Lord Derby	Stirling Castle

If in doubt as to crop safety treat a small area or a number of plants first.

STRAWBERRY – POWDERY MILDEW

Rate of Use

High volume: Dilution rate 200 – 600 mls per 100 litres of water. Apply 700 – 2250 litres per hectare.

Timing

Apply from just before flowering, and repeat at 10 – 14 day intervals. Post harvest application may be necessary if the disease is severe. If the fruit is to be used for processing, the processors should be consulted before the spray is used.

MIXING

SHAKE THE CONTAINER WELL BEFORE OPENING AND USE.

Place half of the water in the spray tank, add the required amount of Headland Sulphur whilst agitating, then add the remaining water to the correct level. Maintain agitation whilst travelling to work and throughout the spraying operation.

On emptying the container, RINSE THOROUGHLY by using an integrated pressure rinsing device or by manually rinsing three times. Add the washings to the sprayer at the time of filling and dispose of container safely. Do not re-use the container for any purpose.

After spraying empty all filters, spray lines etc., of dilute spray. Wash out the sprayer tank with dilute washing soda solution.

Flush tank with clean water and pump through booms to clean all parts of the sprayer.