



Surround® WP Crop Protectant

Plant surface protection means higher packouts of quality citrus – and a more profitable orchard.

Sunburn and heat stress take a toll on citrus orchards. As part of a planned treatment program, Surround® crop protectant can significantly reduce losses from sunburn and heat stress, resulting in increased fruit quality, greater plant vigour and higher marketable yields (packout). That can add up to greater profitability.

Surround represents a breakthrough opportunity for Plant Surface Protection

Applied before severe summer conditions set in and maintained throughout the hot season, Surround covers plant surfaces with a protective film—a layer of specially engineered and formulated kaolin particles that reflect harmful infrared and ultraviolet radiation.

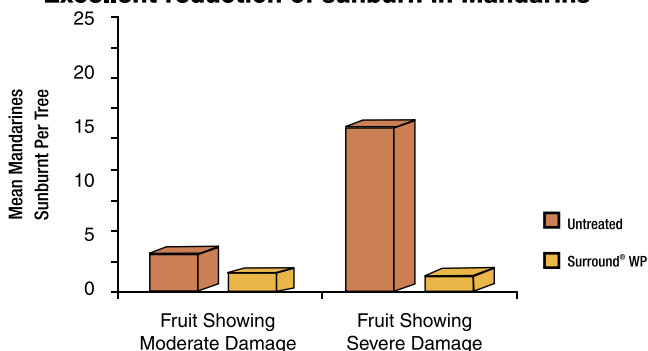


Proven to reduce sunburn damage

The chances of getting sunburn damage increase as air temperatures reach 30°C and above. Some citrus varieties can lose 20% of production to sunburn damage—with even greater losses in times of extreme heat—and that may not count unmarketable produce left unpicked.

that may not count unmarketable produce left unpicked.

Excellent reduction of sunburn in Mandarins



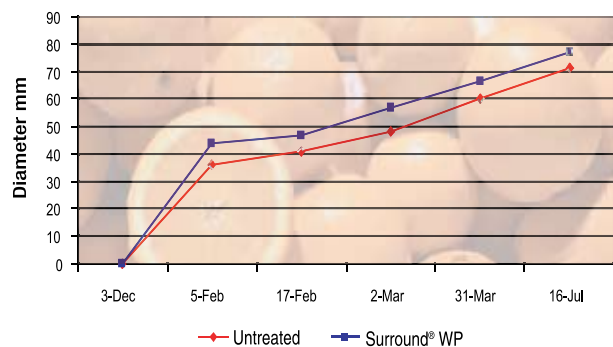
(Data source: 2003/2004 season - Gayndah, Qld. - Variety - Murcott)

Australian growers have successfully used Surround on a variety of fruit and vegetables since 2001.

Engineered particles protect against heat stress

Temperatures higher than around 30°C can both stress the tree and further damage fruit. The worst damage occurs when cooler weather precedes high temperatures and the fruit has not acclimatized. The best way to protect your crop is to protect the fruit with Surround in order to avoid the sudden exposure of fruit to intense heat and solar radiation. The Surround protective particle film layer can reduce plant surface and canopy temperatures by 3°C to 8°C. Local and international trials with Surround have shown increased fruit size and quality, and a positive effect on return blooms, as well as improved foliar flushes on young trees when coverage is maintained over the hot summer months.

Increase in Navel fruit size



(Data source: 2003/2004 season - Cobram, Victoria)

Continued over >

There's nothing like Surround. Surround has superior reflectance of UV and Infrared radiation because of its unique formulation. Based on kaolin—a naturally occurring, inert white mineral used in food and toothpaste—Surround particles are engineered to reflect significantly more of the sun's heat and radiation than any other sunscreen product. The convenient WP formulation provides:

- Easy mixability in water
- Good coverage capacity
- Controlled adhesion to the fruit

Offering all these qualities, Surround represents a real breakthrough in plant surface protection.



When coverage is maintained throughout the hot summer months, Surround® improves foliar flushes in young trees.

Strategic application timing = effective protection

As a planned program, Surround plant surface protection throughout the season gives growers the opportunity to markedly improve quality and quantity.

For best results, apply Surround before heat events to create a protective white barrier film. Maintain coverage throughout the high heat period.

Recommended application rates

See label for details

- Calibrate sprayer and spray according to tree/plant row volume.
- Spray to “near drip” coverage (before the point of runoff).
- Reapply to reestablish coverage after heavy rain, wind, erosion or new growth. (See Figures 1 and 2.)

Figure 1



Well-coated fruit

Figure 2



Needs re-application

Removal of Surround—mandatory directions

Normal water washing in packing or processing should remove Surround WP film from fruit surfaces.

Before purchase and application, make sure that your packing plant can remove the white film residue. AgNova strongly recommends overhead high-pressure water sprays and brushes for this purpose. See Post-harvest Packing and Washing instructions on the label.

Use of Surround in citrus may result in an increase in citrus scale numbers. Monitor scale closely and if necessary use registered scale insecticides according to their label instructions. If scale is of concern and use of insecticides is not desirable, do not use Surround WP.

Important: Always read the label before buying and follow label instructions when using this product.

Surround® Protection you can see. Performance you can trust.

For more information contact your local retailer or visit www.agnova.com.au

AgNova Technologies Pty Ltd
PO Box 590 Eltham, Victoria, Australia 3095



Disclaimer: The information submitted in this publication is based on current AgNova Technologies knowledge and experience. In view of the many factors that may affect its application, this data does not relieve the user from carrying out their own tests. The data does not imply assurance of certain properties or of suitability for a specific purpose. It is the responsibility of the user to ensure that any proprietary rights and existing laws and legislation are observed.

*Surround is a registered Trademark of Novasource

© Copyright AgNova Technologies Pty Ltd 2008. All rights reserved.