Australian Pesticides & Veterinary Medicines Authority

Product Name: IRAZU INSECTICIDE
APVMA Approval No: 64103/155910

Label Name:	IRAZU INSECTICIDE

Signal Headings:	CAUTION KEEP OUT OF REACH OF CHILDREN READ SAFETY DIRECTIONS BEFORE OPENING OR USING

Constituent Statements:	100 g/L CYANTRANILIPROLE

Mode of Action:	GROUP 28 INSECTICIDE

Statement of Claims:	For the control of certain insect pests in Avocados, Macadamias and Mangoes as per the Directions for Use.

Net Contents:	1 - 200 L

Restraints:	This section contains file attachment.

Directions for Use:	This section contains file attachment.

Other Limitations:	

Withholding Periods:	HARVEST: AVOCADO, MACADAMIA, MANGO: DO NOT HARVEST FOR 14 DAYS AFTER APPLICATION. GRAZING: AVOCADO, MACADAMIA, MANGO: DO NOT GRAZE TREATED AREA OR CUT FOR STOCKFEED.

Trade Advice:	EXPORT OF TREATED PRODUCE: Suitable Maximum Residue Limits (MRLs) or import tolerances for produce treated with Irazu insecticide may not be established in some countries. Consult with your exporter or FMC before applying Irazu insecticide to crops from which produce is to be exported.

General Instructions:	This section contains file attachment.

Resistance Warning:	For insecticide resistance management Irazu insecticide is a Group 28 insecticide. Some naturally occurring insect biotypes resistant to Irazu and other Group 28 insecticides may exist through normal genetic variability in any insect population. The resistant individuals can eventually dominate the insect population if Irazu and other Group 28 insecticides are used repeatedly. The effectiveness of Irazu on resistant individuals could be significantly reduced. Since the occurrence of resistant individuals is difficult to detect prior to use FMC accepts no liability for any losses that may result from the failure of Irazu to control resistant insects. Irazu may be subject to specific resistance management strategies. To help prevent the development of resistance to Irazu observe the following instructions: • Use Irazu in accordance with the current Insecticide Resistance Management (IRM) strategy for your region. • Apply Irazu or other Group 28 insecticides using a “window” approach to avoid exposure of consecutive insect pest generations to the same mode of action. Multiple successive applications of Irazu or other Group 28 insecticides are acceptable if they are used to treat a single insect generation. • Following a “window” of Irazu or other Group 28 insecticides, rotate to a “window” of applications of effective insecticides with a different mode of action. • The total exposure period of all “Group 28-active windows” applied throughout the crop cycle (from seedling to harvest) should not exceed 50% of the crop cycle. • Incorporate IPM techniques into the overall pest management program. • Monitor insect populations for loss of field efficacy. For further information contact your farm chemical supplier, consultant, local Department of Agriculture or Primary Industries, or local FMC Representative. For additional information on insect resistance, modes of action and monitoring visit the Insecticide Resistance Action Committee (IRAC) on the web at www.irac-online.org

Precautions:	RE-ENTRY DO NOT allow entry into treated areas until the product has dried, unless wearing cotton overalls buttoned to the neck and wrist (or equivalent clothing) and chemical resistant gloves. Clothing must be laundered after each day’s use. PRECAUTION DO NOT use human flaggers/markers unless they are protected by engineering controls such as vehicles with enclosed cabs.

Protections:	PROTECTION OF HONEY BEES AND OTHER INSECT POLLINATORS Highly toxic to bees. In order to protect insect pollinators, refer to “Directions for Use” for crop specific application restrictions. DO NOT spray where bees from managed hives are known to be foraging. DO NOT allow spray drift to flowering weeds or flowering crops in the vicinity of the treatment area. Before spraying notify beekeepers to move hives to a safe location with an untreated source of nectar and pollen, if there is potential for managed hives to be affected by the spray or spray drift. Risk to bees is reduced by spraying early morning and late evening while bees are not foraging.

	PROTECTION OF WILDLIFE, FISH, CRUSTACEANS AND ENVIRONMENT Very toxic to aquatic life. DO NOT contaminate wetlands or watercourses with the product or used containers.

Storage and Disposal:	Store in the closed, original container in a dry, well-ventilated area, as cool as possible out of direct sunlight. Triple-rinse containers before disposal. Add rinsings to spray tank. DO NOT dispose of undiluted chemicals on site. If recycling, replace cap and return clean containers to recycler or designated collection point. If not recycling, break, crush, or puncture and deliver empty packaging for appropriate disposal at an approved waste management facility. If an approved waste management facility is not available, bury the empty packaging 500 mm below the surface in a disposal pit specifically marked and set up for this purpose clear of waterways, desirable vegetation and tree roots, in compliance with relevant Local, State or Territory government regulations. DO NOT burn empty containers or product.

Safety Directions:	May irritate the eyes. Will irritate the skin. Repeated exposure may cause allergic disorders. Avoid contact with eyes and skin. When opening the container and preparing spray and using the prepared spray, wear cotton overalls buttoned to the neck and wrist (or equivalent clothing) and elbow-length chemical resistant gloves. Wash hands after use. After each day's use, wash gloves and contaminated clothing.

First Aid Instructions:	If poisoning occurs, contact a doctor or Poisons Information Centre. Phone Australia 13 11 26, New Zealand 0800 764 766.

First Aid Warnings:	

RESTRAINTS:
DO NOT apply if heavy rain or storms are forecast within 3 days

SPRAY DRIFT RESTRAINTS
Specific definitions for terms used in this section of the label can be found at apvma.gov.au/spraydrift

DO NOT allow bystanders to come into contact with the spray cloud.

DO NOT apply in a manner that may cause an unacceptable impact to native vegetation, agricultural crops, landscaped gardens and aquaculture production, or cause contamination of plant or livestock commodities, outside the application site from spray drift. The advisory buffer zones in the relevant buffer zone table/s below provide guidance but may not be sufficient in all situations. Wherever possible, correctly use application equipment designed to reduce spray drift and apply when the wind direction is away from these sensitive areas.

DO NOT apply unless the wind speed is between 3 and 20 kilometres per hour at the application site during the time of application.

DO NOT apply if these are surface temperature inversion conditions present at the application site during the time of application. These conditions exist most evenings one to two hours before sunset and persist until one to two hours after sunrise.

DO NOT apply by a boom sprayer unless the following requirements are met:

- Spray droplets not smaller than a MEDIUM spray droplet size category
- Minimum distances between the application site and downward sensitive areas (see 'Mandatory buffer zones' section of the following table titled 'Buffer zones for boom sprayers') are observed.

Buffer zones for boom sprayers

Application rate	**Boom height above the target canopy**	**Mandatory downwind buffer zones (metres)**			
		Natural aquatic areas	**Pollinator areas**	**Vegetation areas**	**Livestock areas**
Up to maximum label rate	**0.5m or lower**	0	0	0	0
	1.0m or lower	15	0	0	20
150 mL/ha or lower	**0.5m or lower**	0	0	0	0
	1.0m or lower	0	0	0	0

DO NOT apply by a vertical sprayer unless the following requirements are met:

- Spray is not directed above the target canopy
- The outside of the sprayer is turned off when turning at the end of rows and when spraying the outer row on each side of the application site.
- For dilute water rates up to the maximum listed for each type of canopy specified, minimum distances between the application site and downwind sensitive areas (see 'Mandatory buffer zones' section of the following table titled 'Buffer zones for vertical sprayers') are observed.

Buffer zones for vertical sprayers

Type of target canopy	**Mandatory downwind buffer zones (metres)**			
	Natural aquatic areas	**Pollinator areas**	**Vegetation areas**	**Livestock areas**
2 metres tall and smaller, maximum dilute water rate 100L/ha	0	0	0	0
Taller than 2 metres (not fully foliated), maximum dilute water rate of 4000 L/ha	25	0	5	20
Taller than 2 metres (fully foliated), maximum dilute water rate of 4000 L/ha	15	0	0	10

DO NOT apply by aircraft unless the following requirements are met:

- Spray droplets not smaller than a MEDIUM spray droplet size category
- For maximum release heights above the target canopy of 3m or 25% of wingspan or 25% of rotor diameter whichever is the greatest, minimum distances between the application site and downwind sensitive areas (see 'Mandatory buffer zones' section of the following table titled 'Buffer zones for aircraft') are observed.

Buffer zones for aircraft

Application rate	**Type of aircraft**	**Mandatory downwind buffer zones (metres)**			
		Natural aquatic areas	**Pollinator areas**	**Vegetation areas**	**Livestock areas**
Up to maximum label rate	**Fixed-wing**	65	0	0	150
	Helicopter	55	0	0	95
150mL/ha or lower	**Fixed-wing**	10	0	0	30
	Helicopter	20	0	0	25

For use in all States where appropriate for the crop and/or insect pest.

TREE CROPS

CROP/ SITUATION	PEST	RATE	CRITICAL COMMENTS
A maximum of two (2) applications are to be applied to any one crop per season. Apply by dilute or concentrate spraying equipment. Apply the same total amount of product to the target crop whether applying this product by dilute or concentrate spraying methods. Refer to Application; Tree crop section of the label. Thorough fruit coverage is essential. Use in accordance with Croplife Insecticide Resistance Management Strategy guidelines			
Avocado	Chewing pests; Avocado leafroller (*Harmona spargotis*) Ectropis looper (*Ectropis savulosa*) Sucking pests; Mango planthopper (*Colgaroides acuminata*) Green planthopper (*Siphanta acuta*)	**Dilute spraying:** 75 mL/100 L (As a guide, apply a minimum of 1.125 L/ha but **DO NOT** apply more than 3 L/ha) **Concentrate spraying is not suitable for these pests.** Refer to Mixing/Application section	Monitor crops for the presence of all pests. Apply Irazu insecticide, once local pest thresholds are reached targeting early developing pest populations so as to optimise efficacy and crop protection. A single application may be suitable where pest pressure is not persistent. Continue to monitor crops and where insect pressure is persistent, apply a second application no less than 14 days after the first. Planthoppers: Do not use for salvage control of high pressure situations. Irazu insecticide will give good suppression of low to moderate pest pressure.
	Sucking pests; Banana spotting bug (*Amblypelta lutescens lutescens*) Fruit spotting bug (*Amblypelta nitida*)	**Dilute spraying:** 75 or 100 mL/100 L (As a guide, apply a minimum of 1.125 or 1.5 L/ha but **DO NOT** apply more than 3 L/ha) **Concentrate spraying is not suitable for these pests.** Refer to Mixing/Application section	Monitor crops for the presence of fruit spotting bug as soon as crop is susceptible. Apply Irazu insecticide, once local pest thresholds are reached and use in conjunction with a season long planned spray program including with alternative mode of action insecticides. Irazu insecticide performs best when applied as two sequential applications on a 14-21 day spray interval targeting early developing insect populations. Use the higher rate where higher insect pressure or significant growth dilution is anticipated. Ensure thorough spray coverage.
Macadamia	Pre-flowering pests Chewing pests; Flower eating caterpillars (*Cryptoblabes hemigypsa*) Macadamia leaf miner (*Acrocercops chionosema*) Sucking pests; Lace bug (*Ulonemia concave*)	**Dilute spraying:** 50 mL/100 L (As a guide, apply a minimum of 750 mL/ha but DO NOT apply more than 3 L/ha) **Concentrate spraying is not suitable for these pests.** Refer to Mixing/Application section	Monitor crops for the presence of all pests. Apply Irazu Insecticide, once local pest thresholds are reached and use in conjunction with a season long planned spray program including with alternative mode of action insecticides. Target early developing pest populations so as to optimise efficacy and crop protection. A single application may be suitable where pest pressure is not persistent. Continue to monitor crops and where insect pressure is persistent, apply a second application no less than 14 days after the first. The target pest stage of *Cryptoblabes hemigypsa* and *Acrocercops chionosema* is the larva. Flower eating caterpillars: Target pre-flowering stage of crop. Lace bug: Effective on nymphs and adults. Target pre-flowering stage of crop.

CROP/ SITUATION	PEST	RATE	CRITICAL COMMENTS
	Post-flowering pests Chewing pests; Macadamia leaf miner (*Acrocercops chionosema*) Macadamia nut borer (*Cryptophlebia ombrodelta*) Macadamia seed weevil (*Kuschelorhynchus macadamiae*)	**Dilute spraying:** 75 mL/100 L (As a guide, apply a minimum of 1.125 L/ha but DO NOT apply more than 3 L/ha) **Concentrate spraying is not suitable for these pests.** Refer to Mixing/Application section	Monitor crops for the presence of all pests. Apply Irazu Insecticide, once local pest thresholds are reached and use in conjunction with a season long planned spray program including with alternative mode of action insecticides. Target early developing pest populations so as to optimise efficacy and crop protection. A single application may be suitable where pest pressure is not persistent. Continue to monitor crops and where insect pressure is persistent, apply a second application no less than 14 days after the first. The target pest stage of *Acrocercops chionosema* and *Cryptophlebia ombrodelta* is the larva. Nut borer: Larvae to be controlled prior to chewing into the nut. Larvae entrenched in nuts will not be controlled. Seed weevil: Target adults when active in orchard. Make the first application at the beginning of nut set when nuts are pea sized. Make the second application a minimum of 10 to 14 days later if required. Larvae developing in nuts will not be controlled. Combine treatments with good farm hygiene (removal of infested nuts from the ground) prior to flowering and nut set. It is recommended that fallen nuts be swept into a windrow and mulched to provide a mechanical control for the larvae/eggs in the nuts in the September to December period. When controlling this pest, consider rotating Irazu Insecticide with Avatar eVo Insecticide from one season to the next as part of an Insecticide Resistance Management Strategy.
	Post-flowering pests Sucking pests; Banana spotting bug (*Amblypelta lutescens lutescens*) Fruit spotting bug (*Amblypelta nitida*)	**Dilute spraying:** 75 or 100 mL/100 L (As a guide, apply a minimum of 1.125 or 1.5 L/ha but DO NOT apply more than 3 L/ha) **Concentrate spraying is not suitable for these pests.** Refer to Mixing/Application section	Monitor crops for the presence of fruit spotting bug as soon as crop is susceptible. Apply Irazu Insecticide, once local pest thresholds are reached and use in conjunction with a season long planned spray program including with alternative mode of action insecticides. Irazu Insecticide performs best when applied as two sequential applications on a 14-21 day spray interval targeting early developing insect populations. Use the higher rate where higher insect pressure or significant growth dilution is anticipated. Ensure thorough spray coverage.

CROP/ SITUATION	PEST	RATE	CRITICAL COMMENTS
Mango	Chewing pests; Mango tip borer (*Penicillaria jocosatrix*) Sucking pests; Mango planthopper (*Colgaroides acuminata*) Rasping pests; Tomato thrips (*Frankliniella schultzei*) Western flower thrips (*Frankliniella occidentalis*)	**Dilute spraying:** 75 mL/100 L (As a guide, apply a minimum of 1.125 L/ha but DO NOT apply more than 3 L/ha) **Concentrate spraying is not suitable for these pests.** Refer to Mixing/Application section	Monitor crops for the presence of all pests. Apply Irazu Insecticide, once local pest thresholds are reached and use in conjunction with a season long planned spray program including with alternative mode of action insecticides. Target early developing pest populations so as to optimise efficacy and crop protection. A single application may be suitable where pest pressure is not persistent. Continue to monitor crops and where insect pressure is persistent, apply a second application no less than 10 - 14 days after the first. Mango tip borer: Large larvae fully entrenched in stems / branches may not be controlled. Do not use for salvage control. Planthoppers: Do not use for salvage control of high pressure situations. Irazu Insecticide will give good suppression of low to moderate pest pressure. Thrips: Preferred spray interval is 14 days. Nymphs are more susceptible than adults. Do not use for salvage control.
	Sucking pests; Banana spotting bug (*Amblypelta lutescens lutescens*) Fruit spotting bug (*Amblypelta nitida*)	**Dilute spraying:** 75 or 100 mL/100 L (As a guide, apply a minimum of 1.125 or 1.5 L/ha but DO NOT apply more than 3 L/ha) **Concentrate spraying is not suitable for these pests.** Refer to Mixing/Application section	Monitor crops for the presence of fruit spotting bug as soon as crop is susceptible. Apply Irazu Insecticide, once local pest thresholds are reached and use in conjunction with a season long planned spray program including with alternative mode of action insecticides. Irazu Insecticide performs best when applied as two sequential applications on a 14-21 day spray interval targeting early developing insect populations. Use the higher rate where higher insect pressure or significant growth dilution is anticipated. Ensure thorough spray coverage.

CROP/ SITUATION	PEST	RATE	CRITICAL COMMENTS
Mangoes	Queensland fruit fly (*Bactrocera tryoni*) Refer to mixing section	Irazu Insecticide is to be applied at 100 mL/ha and tank mixed with an appropriate protein bait (yeast autolysate or hydrolysate protein). For example, if applying the mixture at 15 L/ha, then in 100L water, mix 2L AY50 (protein bait) and 660 mL Irazu Insecticide to produce a **protein bait spray mixture**. <u>Mixing recommendations:</u> (i). 24 hours before making the above mixture, mix Keltrol at 500g/100L water. Keltrol is a xanthum gum powder which thickens water and improves the persistence of the protein bait spray on the plant. (ii). Immediately prior to protein bait spray application to the target crop, mix the protein bait with the pre-mixture of water+Keltrol and then add the Irazu Insecticide. Shake the Irazu Insecticide container well before decanting. Mix and keep well agitated during application.	Apply the protein bait spray mixture as a spot* or band# treatment on the lower canopy of the tree (minimum of 1m above ground) avoiding fruit. **DO NOT** apply directly to fruit. Use application volumes of between 15-30 L/ha. A large droplet size of 4,000 to 6,000 microns (4-6mm) is recommended to optimize duration of bait's attractiveness to flies. Attempt to align protein baits on the eastern or southern side of the tree rows. *Spots should be distributed evenly throughout an orchard to optimize effectiveness. #Apply as a coarse spray in a 30cm wide band to the skirt of the tree. Apply to one side of every row of trees. Initiate bait spray applications once fruit fly adult activity is detected in monitoring traps and fruit is within at least 2 weeks of being targeted by egg laying females. **Repeat bait spray applications on a weekly (7 days) basis** and continue this practice up to 2 weeks after harvest. Frequency of application should increase under conditions of warm wet weather and/or high fruit fly activity. Immediately re-apply bait spray to the trees if washed off by rain or overhead irrigation. **DO NOT** apply more than ten (10) applications per crop per season. Use protein bait sprays in conjunction with other recommended industry fruit fly management practices to effectively protect fruit from fruit fly infestation.
Mangoes are particularly susceptible to blemishes, discolouration or severe spotting (superficial on the skin only) from protein based sprays. The risk of phytotoxicity is increased during hot, dry conditions and re-application of spray to the same location on plants. If using a weekly spray program, alternate tree or crop rows to which the product is applied.			

NOT TO BE USED FOR ANY PURPOSE OR IN ANY MANNER CONTRARY TO THIS LABEL UNLESS AUTHORISED UNDER APPROPRIATE LEGISLATION.

GENERAL INSTRUCTIONS

Irazu insecticide is an anthranilic diamide insecticide in the form of an oil in water emulsion, and is to be mixed with water and applied as a foliar spray. Irazu insecticide is particularly active on both sucking and chewing (Lepidopteran and Coleopteran) insect pests.

Before application monitor insect populations to determine whether or not there is a need for application of Irazu insecticide based on locally determined economic thresholds. More than one treatment of Irazu insecticide may be required to control a population of pests.

Irazu insecticide primarily intoxicates insect pests via ingestion, but may also have some minimal contact activity. Exposure of the pest species typically results in rapid feeding cessation within a few hours of exposure. However, the time to death and economic levels of population control may be 3 to 6 days depending upon the species.

CROP SAFETY

Not all crops within a crop group, and not all varieties, cultivars or hybrids of crops, have been individually tested for crop safety. To test for crop safety, apply the product in accordance with the label instructions to a small area of the target crop to ensure that a phytotoxic response will not occur, especially where the application is a new use of the product by the applicator.

MIXING

The mixing sequence recommended is: water soluble bags, dry flowable or water dispersible granules, wettable powders, water-based suspension concentrates, water soluble concentrates, suspo-emulsions (Irazu), oil-based suspension concentrates, emulsifiable concentrates, adjuvants and surfactants, soluble fertilisers and drift retardants.

Cover sprays

Spray equipment must be clean and free of previous pesticide deposits before applying Irazu insecticide. Fill spray tank to 1/4 to 1/2 full of water. DO NOT use unless the product has been thoroughly mixed immediately before decanting. For pack sizes 20L and smaller, shake the container well immediately before decanting. For pack sizes larger than this, it is recommended that pulsers, or other means of mixing with compressed air or mechanically, are used to ensure the product is mixed and a homogenous formulation is delivered. Measure the amount of Irazu insecticide required for the area to be sprayed. Add Irazu insecticide directly to the spray tank with the agitation engaged. Mix thoroughly to disperse the insecticide. Top up the tank with clean water to the required volume. Once dispersed, the material must be kept in suspension at all times by continuous agitation. Use mechanical or hydraulic means. DO NOT use air agitation, premix or slurry If spray solution is left standing, ensure thorough re-agitation of the spray mix until fully resuspended. DO NOT allow spray mix to sit overnight, as resuspension may be difficult.

Bait sprays-

Irazu Insecticide is to be applied at 100 mL/ha and tank mixed with an appropriate protein bait (yeast autolysate or hydrolysate protein) at the recommended application rate. For example, if applying the mixture at a total volume of 15 L/ha, then in 15L water, mix the recommended rate of protein bait PLUS 100 mL Irazu Insecticide to produce a protein bait spray mixture. Follow the preparation and mixing instructions on the protein bait label for preparation of the spray mixture.

Optional recommendation:

(i). 24 hours before making the above mixture, mix Keltrol at 500g/100L water. Keltrol is a xanthum gum powder which thickens water and improves the persistence of the protein bait spray on the plant.

(ii). Immediately prior to protein bait spray application to the target crop, mix the protein bait with the pre-mixture of water+Keltrol and then add the Irazu®. Shake the Irazu container well before decanting. Mix and keep well agitated during application.

If spray solution is left standing, ensure thorough re-agitation of the spray mix until fully resuspended. **DO NOT** allow spray mix to sit overnight, as resuspension may be difficult.

SURFACTANT/WETTING AGENT
Avocado, Macadamia, Mango
Addition of an adjuvant is NOT required.

ACIDIFICATION OF THE SPRAY TANK
If the pH of the spray tank after all products have been added and mixed is above pH 8, adjust to pH 8 or less using a registered acidifying agent. If the spray tank pH is 8 or less no adjustment of the spray tank pH is necessary. Spray tanks of pH 8 or less can be held for up to 8 hours before spraying. DO NOT store the spray mixture overnight in the spray tank.

INCOMPATIBILITY
Formulations of products are always changing, therefore, it is advisable to test the physical compatibility of desired tank mixes and check for adverse effects like settling out or flocculation. To determine the physical compatibility, add the recommended proportions of the tank mix products to water, mix thoroughly and allow to stand for 20 minutes. If the combination remains mixed, or can be re-mixed readily, it is considered physically compatible. Avoid complex tank mixtures of several products or very concentrated spray mixtures. The crop safety of all potential tank-mixes, including additives and other pesticides, on all crops has not been tested. Before applying any tank-mixture not specifically recommended on this label or other FMC supplemental labelling, the safety to the target crop must be confirmed. To test for crop safety, apply the combination to a small area of the target crop in accordance with the label instructions to ensure that a phytotoxic response will not occur.

APPLICATION
Use enough water to ensure thorough coverage of the crop. Adjust water volumes to crop stage. Droplet VMD should be of MEDIUM spray quality.

Tree crops:
Dilute spraying
• Use a sprayer designed to apply high volumes of water up to the point of run-off and matched to the crop being sprayed.
• Set up and operate the sprayer to achieve even coverage throughout the crop canopy. Apply sufficient water to cover the crop to the point of run-off. Avoid excessive run-off.
• The required volume may be determined by applying different test volumes, using different settings on the sprayer, from industry guidelines or expert advice.
• Add the amount of product specified in the Directions for Use table for each 100 L of water. Spray to the point of run-off.
• The required dilute spray volume will change and the sprayer set up and operation may also need to be changed, as the crop grows.

Concentrate spraying
• Use a sprayer designed and set up for concentrate spraying (that is a sprayer which applies water volumes less than those required to reach the point of run off) and matched to the crop being sprayed.
• Set up and operate the sprayer to achieve even coverage throughout the crop canopy using your chosen water volume.
• Determine an appropriate dilute spray volume (See Dilute Spraying above) for the crop canopy. This is needed to calculate the concentrate mixing rate.
• The mixing rate for concentrate spraying can then be calculated in the following way:
EXAMPLE ONLY
1. Dilute spray volume as determined above: For example 1500 L /ha
2. Your chosen concentrate spray volume: For example 500 L/ha
3. The concentration factor in this example is 3X (i.e. 1500 L ÷ 500 L = 3)
4. If the dilute label rate is 75 mL/100 L, then the concentrate rate becomes 3 x 75, that is 225 mL/100 L of concentrate spray.
* The chosen spray volume, amount of product per 100 L of water, and the sprayer set up and operation may need to be changed as the crop grows. For further information on concentrate spraying, users are advised to consult relevant industry guidelines, undertake appropriate competency training and follow industry Best Practices.
Minimising Spray Drift
The interaction of many equipment and weather-related factors determines the potential for spray drift. The applicator must consider all these factors when making application decisions. The most effective way to reduce drift potential and maintain efficacy is to apply spray droplets no smaller than a medium spray droplet size category.

The best drift management strategy is to apply the largest droplets that provide sufficient coverage and control. APPLYING LARGER DROPLETS REDUCES DRIFT POTENTIAL, BUT WILL NOT MINIMISE DRIFT IF APPLICATIONS ARE MADE IMPROPERLY OR UNDER UNFAVOURABLE ENVIRONMENTAL CONDITIONS. When making applications in hot and dry conditions, set up equipment to produce larger droplets to reduce effects of evaporation.
DO NOT apply when wind speed is less than 3 or more than 20 kilometres per hour at the application site.

Spray Equipment Cleanout
Prior to application, start with clean, well-maintained application equipment. Immediately following application, thoroughly clean all spray equipment to reduce the risk of forming hardened deposits which might become difficult to remove. Drain spray equipment.
Thoroughly rinse sprayer and flush hoses, boom, and nozzles with clean water. Clean all other associated application equipment. Take all necessary safety precautions when cleaning equipment. DO NOT clean near wells, water sources or desirable vegetation. Dispose of waste rinse water in accordance with local regulations.