



The Future of Tree Stock

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New Fire Ant Boundaries For SE QLD

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President's Report

Tom Hennessey - President



Welcome to the second edition of the NEW "Leaflet". I'm sure everyone will agree this new look and layout is a breath of fresh air and gives the industry magazine a much more professional feel. Coupled with the appearance update, "Leaflet" will also over the next six or so months have a significant content upgrade to freshen up a few tired elements of the publication. One of the most significant changes will see the hardcopy magazine move to a more comprehensive bi-monthly instead of a monthly publication.

This will be complemented with a bi-monthly e-newsletter which will be available via email and also the website to ensure members are updated on any topics or issues of relevance. Not only will this arrangement allow for a more detailed hardcopy magazine, but it will also reduce the costs associated with printing a monthly magazine. Congratulations must go to Kerry our Executive Officer for driving this change and modernising a key component of member communication.

Another much needed addition to last month's "Leaflet" was a column from the Horticultural Media Association (HMAQ) President Claire Bickel. For those who don't know, HMAQ is a wonderful network of gardening experts that are incredibly passionate about promoting the benefit of all things plant related. NGIQ has realised that this professional network has been under-utilised in the past and is working hard to improve this relationship for mutual benefit. However, engaging with this group should not end at the association level. There are opportunities for all businesses to utilise the HMAQ network by providing the group with information on new or existing products or services. So why not provide HMAQ with a little insight into what your business is doing in the industry to promote gardening so they can help promote it too.

Hopefully everyone would have seen or heard that nominations for NGIA Awards are now open. The award categories cover a broad range of industry

businesses, products and services so there are potentially opportunities for many members. I understand that it is Spring and everyone is time poor, but if you think there could be an award for you why not submit an application. It would be wonderful to see a strong Queensland contingent. After all this state is the home of superior production nurseries and garden centres.

As I have mentioned previously the Bunnings Cross-Dock system has been an important topic of discussion over the past few months. After the last consultation meeting, Bunnings have now released the final Cross-Dock agreement for signing by suppliers. Most businesses will agree that the revised agreement is more favourable than the initial offering, and as Bunnings have stated on several occasions, the system is not compulsory. For those using the cross-dock system NGIQ would simply suggest that businesses monitor their activity and associated costs to ensure you are being charged correctly for the quantity of freight that you distribute. NGIQ is always happy to receive any feedback on the operations of Cross-Dock so they can be forwarded to Bunnings.

Finally, as many would be aware NGIQ has experienced some significant changes to our revenue streams over the past 18 months. This is primarily due to the major changes being undertaken by the Horticultural Industry Association (HIA) or formally HAL. Unfortunately as a result NGIQ has been forced to make a significant staff restructure to reduce our expenditure. As part of this difficult process the association was forced to make the position occupied by Penny Lester redundant. I would like to thank Penny on behalf of the industry for her service and dedication to the NGIQ and the nursery industry over the past 20 years. These decisions are never easy but the NGIQ board must ensure that our association remains financially viable.

Spring is finally here and I hope everyone enjoys a strong start to this wonderful season.

Crop Nutrition focus for growers

The highly regarded seminar on Crop Nutrition will be delivered in Brisbane on Thursday 29 October. Held in collaboration with Horticulture Innovation Australia (HIA) NGIQ, with support from Garden City Plastics, will host the seminar providing growers with information and knowledge on effective crop nutrition.

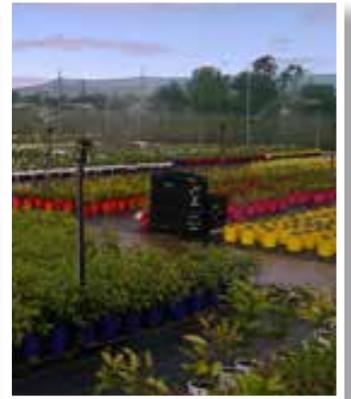
Two of the most experienced and recognised Australian experts in this field will deliver various components during the day. **Geoff Cresswell** will cover the vital aspects of growing media and nutrient relationships plus fertiliser formulations, trace elements and product longevity. **Keith Bodman** will address plant nutrient requirements, water quality, fertiliser application including CRF and liquid formulations in production systems.

Major emphasis will be placed on improving skills for optimal crop nutrition in container production. A number of aspects will be covered in this seminar including:

- Water quality and crop nutrition
- Growing media components and their influence on crop nutrition
- Crop nutrition through liquid formulations:
 - Fertigation types
 - Foliar fertiliser systems
 - Effects on growing media
 - Feeding rates and recipes
 - Leaching & NPK ratios

- Controlled Release Fertilisers (CRFs):
 - Important considerations when using CRFs
 - Using CRFs when staging crops (re-potting)
 - Growing media considerations and interaction with specific ingredients
 - Additives to the growing media enhancing nutrient availability
 - Environmental impacts

The seminar will be delivered by NGIQ and is co-funded by Horticulture Innovation Australia using national Nursery Industry levy and matched funds from the Australian Government. Bookings: NGIQ 07 3277 7900 or email info@ngiq.asn.au



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September Report

Kerry Battersby - NGIQ Executive Officer

There's a lot of hard work behind a successful Spring. Our retailers are putting enormous effort into preparing displays of seasonal specials. Our growers have worked long hours nurturing stock, taking orders and, I hear it's hard keeping up with demand!

Our very own staff at the Nambour office are in the final preparatory stages for the inaugural Brisbane International Garden Show on 8 – 11 October.

One element of this industry that I appreciate is the forward planning involved in operating your businesses. You must plan for next year's production now, and that of the year after. That makes a wise and sustainable business. So, let's talk about the elements that make a successful business. Are your systems and processes in place? Is your financial plan adequate, do you have enough reserves in place to survive, let's say, another, worse GFC? Are you prepared to take on more staff? Is your marketing up-to-scratch? What is your BHAG (big, hairy audacious goal)? Later this year, we'll commence a series of short Business Conversations in our Brisbane office to discuss goal setting,

business skills, new trends, and financial essentials to ensure you are part of a professional, vibrant and proactive industry. Details will be on our Facebook page and website.

Meanwhile, we are planning for our Crop Nutrition Seminar on 29 October, the Annual Dinner on 20 November, the round of Spring Brisbane Trade Days, upcoming visits to Townsville and Cairns, and looking forward to seeing you at Strathpine for the Brisbane International in October. As I said, there's a lot of hard work to a good Spring!

Qld Labour Day public holiday – Monday 5 October, 2015

Plan for next year - The government has announced from 2016, Labour Day public holiday will revert back to the first Monday in May and the Queen's Birthday public holiday on the first Monday in October.

Media Release - Horticulture Innovation Australia

Shaping Australian horticulture's future – Call for Non-Executive Directors
Released - 5th August 2015

Horticulture Innovation Australia, the horticulture sector's new not-for-profit, grower-owned Research and Development Corporation (RDC) for Australia's \$9 billion horticulture industry, is now seeking applications for Non-Executive Directors.

Horticulture Innovation Australia invests more than \$100 million in Research & Development (R&D) and Marketing programs annually and is funded by levies, Commonwealth Government matching funds for R&D, and external co-investment funds.

As of November 2014, Horticulture Innovation Australia replaced its predecessor entity Horticulture Australia Limited (HAL), and is now undertaking a major business transformation to a grower-owned company with a new operating model.

The Constitution of Horticulture Innovation Australia requires four (4) of its nine (9) Directors retire from the Board at its inaugural Annual General Meeting (AGM) on 27 November 2015. Applications are now being sought for the four (4) director vacancies.

Horticulture Innovation Australia Chairman, Mr Selwyn Snell said the call for non-executive directors is about encouraging growers and the wider Australian horticulture to be involved in the future direction of the company.

"This is an opportune time for growers and the entire horticulture community to get involved and shape the future of the sector," Mr Snell said.

"We are working to grow the company to ensure a strong leadership

base and a vibrant and engaged member community that's widely representative of the Australian horticulture sector."

"We encourage interested parties to be part of this process and contribute to the formation of the future leadership of the company."

"Grower members are encouraged to vote for directors at our inaugural AGM on 27 November – your vote is valuable and shows support for your levy investment."

If you are not yet a member of Horticulture Innovation Australia, please contact membership services on 02 8295 2307 or membership@horticulture.com.au.

For further information, contact Mick Hay or Sharon Moloney at Rimfire Resources on 07 3878 3411. For the full advertisement and information pack refer to www.horticulture.com.au/hia-board-of-directors/ and submit all applications to www.rimfireresources.com.au by close of business, Friday 21 August 2015.

For media enquiries, please contact:

Amy Braddon, External Communications Manager
Tel. +61 2 8295 2333 | amy.braddon@horticulture.com.au

Horticulture Innovation Australia Ltd
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The site currently has a full production hydroponic nursery so included with the sale is the following facilities...

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Employee Misconduct – Don't Delay

A Senior Deputy President of Fair Work Commission has ordered a Security Service to reinstate a security guard who was terminated for falling asleep on the job in contravention of his formal fatigue management training. Whilst the Senior Deputy President found that the security worker failed to properly assess his own fitness for work, which was described as “fundamentally inconsistent” with his role as a security guard at a large energy site, the employer’s action of summary dismissal was a “disproportionate response to the employee’s behaviour”.

The Commission decided that the termination was just and reasonable, but it was “harsh” due to the significant delay of almost 6 weeks in the investigation of the incident, which triggered the decision to summarily terminate the guard for serious misconduct.

The facts

Whilst on a night shift, the guard fell asleep and was woken by a plant supervisor. Three weeks later the plant notified the security service of the incident, and the guard was notified in writing some 18 days later alleging serious misconduct and asking for a please explain. The guard was terminated 2 days later.

The Senior Deputy President accepted the guard’s reasons for being tired, and noted that the employee had completed “fit for work” training for managing fatigue and stress only 10 days prior to the incident, and the worker should have properly assessed his fitness for work and taken personal leave if he was unfit for work. The Senior Deputy President agreed that the employer’s standing with the client as a security service provider was undermined by the guard’s behaviour. The guard also knew that sleeping on the job was regarded as one of the most serious offences and would result in dismissal.

Fair Work Commission concluded that the summary dismissal was “harsh” in that it was a disproportionate response to the behaviour, given that the employer had allowed the guard to continue working for almost 6 weeks after the incident without undertaking an investigation and without further complaint from the client.

The Senior Deputy President commented that a sleeping security guard was fundamentally inconsistent with the concept of provision of a security service, and found the termination was not unjust and not unreasonable, but was “harsh” due principally to the delay, and hence reinstatement was appropriate.

The Commission’s order for restoration of lost wages to the date of termination was, however, subject to a 75% reduction to reflect the extent of the guard’s misconduct leading to the termination.

What does this mean for employers?

The key message from this decision is that the employer must not only act swiftly and decisively when dealing with matters of misconduct, but is also obliged to undertake a thorough investigation or review of the circumstances to support any decision to summarily dismiss an employee for misconduct. Failure to carry out these fundamental processes in a timely manner only invites criticism of the employer’s processes with the potential outcome of the employee being reinstated.

Livingstones regularly assists and advises clients on performance management issues to ensure that important decisions and processes will stand up to later scrutiny by a tribunal. Please call us on 07 3833 1200 for further information.

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Laurie Moloney
Director

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www.livingstones.com.au

Laurie has seen the industrial relations and human resource environment evolve with significant changes in legislation, increasing complexity with the need for careful research and detailed preparation for all engagement activities from negotiations to advocacy.

His expertise and no-nonsense common sense approach has earned Laurie a respected role as a sounding board and strategic advisor to senior managers across Australia in every setting from small business to large multinationals. He has a detailed understanding of his clients’ business operations from shop floor to Board room. Many Industry Associations also benefit from Laurie’s advice and representation at both national and individual membership levels.

Laurie works closely with his clients, helping them to effectively engage with their workforce to support their business objectives. Highly developed technical knowledge combines with rapid responses to changes in industrial legislation on issues impacting clients’ operations. His capabilities span every aspect of industrial relations and human resource strategy, workplace regulation and compliance, including drafting policies and enterprise agreements, negotiating, advising, training and coaching.

He has a particular focus with clients on issues relating to what he calls the “employment cycle”, from detailed employment contracts to performance management, terminations and redundancies, which vary according to the clients size & industry.

Laurie has successfully represented clients in Tribunal hearings dealing with award and wages issues, discrimination claims, disputes, modern awards, unfair dismissals, adverse action and test cases across Australia.

“Challenging new issues demand practical, realistic solutions specific to each client’s particular needs and circumstances. My passion lies in taking on the most complex problems and providing clear, straightforward advice and strategies for clients to act on with confidence.”

Qualifications and Memberships

Australian Institute of Company Directors, Institute of Industrial Advocates Queensland, Queensland Industrial Relations Society

Employment & Industrial Relations
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Organisational Advisors & Psychologists

Marketing Briefs

By John Mason and staff of ACS
Distance Education

An interesting area of buying behaviour is on how different colours can influence our moods. Colours are often grouped into either cool or warm colours.

Cool colours – these include blues, purples, violets, and greens.

Warm colours – these include reds, oranges, and yellows.

When used in advertising, signage and product design, warm colours tend to stand out and cool colours tend to disappear into the design. As well as being denoted as warm or cool, different colours are thought to elicit different emotional responses in the observer.

Red – this is a very intense and vibrant colour. Red is the colour of blood, and so is associated with war, strength, and power. It is also associated with strong emotions like love and passion. It is said to increase heart rate and blood pressure. Red is also used for sales signs and online retailers often use red for 'buy it now' type purchases.

Green – this is the colour of grass, tresses and foliage and so it is often associated with nature, growth and fertility. It is also regarded as being a refreshing colour and is linked to money, safety and security. Green is also considered to have healing properties and is often chosen for packaging of medication, vitamin supplements, and health care products.

Extracts from the e-book, Marketing Psychology, by John Mason and Staff of ACS Distance Education.

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The Future of Tree Stock

AS 2303:2015: Tree stock for landscape use

By Dr Anthony Kachenko R&D Team Leader and Portfolio Manager, HIA.

After several years of extensive stakeholder consultation in developing the Australian Standard “AS2303:2015 Tree stock for landscape use”, it was formally published in April 2015. This article provides some information on this Australian Standard.

Why an Australian Standard?

Ultimately, the Australian Standard for Tree Stock aims to contribute to improving the performance of trees in the landscape. It is a national document, developed with support of the nursery industry and main players in the landscape industry, both locally and internationally.

The procedure in developing the Standard has been lengthy, initially starting in 2006 and continuing onto 2010. This first attempt at drafting the document failed due to lack of industry support. In February 2012 a new proposal was submitted to Standards Australia by industry with their support and that of other stakeholders across Australia to reengage in the development of the Australian Standard. This proposal was accepted in May 2012 and delegated to the Standards Australia EV18 Arboriculture Committee. Later that year NGIA was advised that the project would start commencement in March 2013. For the next two years, NGIA oversaw the consultation process internationally. The document was published in April 2015 and is 36 pages in length.

The Standard is a voluntary standard and is not regulatory. It specifies the criteria for the assessment of above and below ground characteristics of tree stock that are to be supplied for landscape use. It covers container grown, containerised, bare rooted and ex ground tree stock and can be applied to all stages of growth. The specifications and criteria set in the Standard apply to all methods of production systems and styles of containers.

How will it be applied?

The Standard is intended for use by suppliers and purchasers of tree stock for landscape use and for those who specify tree stock for landscape use. It is also suitable for use under a third party auditable nursery production best management practice or quality assurance (QA) accreditation program. However, certification is not a requirement of the Standard and the Standard may equally well be applied on a self-assessment basis within a user organisation.

CRITERIA FOR ABOVE-GROUND ASSESSMENT OF TREE STOCK

The following criteria must be adhered to:

- Tree stock shall be true to type.
- Individual tree stock or batches of tree stock per variety shall be clearly labelled with correct botanical nomenclature.
- The height and calliper range shall be recorded.
- Tree stock shall exhibit good health for the time of year, location and stage of growth.
- Difference in crown distribution on opposite sides of the stem axis shall be <20%.
- Tree stock shall be free from significant injury and wounds cracks, fungal fruiting bodies and bleeding areas.
- The calliper at any given point on the stem shall be less than the calliper at any lower point on the stem.
- The diameter of the stem above the branch union shall be greater than the diameter of the branch at the point of attachment.
- Where tree stock has a defined central leader, an apical bud shall be intact and any stem deviation from vertical shall not exceed 15°. Division shall be above any clean stem height requirements.
- Where tree stock has branch dominance, terminal buds shall be intact. The union at any division shall be sound (refer to Section 2.2.9 Included Bark) and any such division shall be above any clean stem height requirements.
- Formative pruning of tree stock shall be in accordance with AS 4373.
- All pruning cuts shall be at the branch collar or a node.
- The diameter of any pruning cut shall not exceed 50% of the stem diameter immediately above the point of pruning.
- If a clean stem is required it shall not exceed 40% of total stem height see.
- The base of the trunk shall be positioned within 10% of the centre of the rootball diameter.
- In grafted tree stock, the graft union shall be sound, and the scion and rootstock shall be compatible for the entire perimeter of the graft.
- The diameter of the scion immediately above the graft shall be within 20% of the diameter of the rootstock immediately below the graft, excluding bark and cleft grafts.

CRITERIA FOR BELOW-GROUND ASSESSMENT OF TREE STOCK

The following criteria must be adhered to:

- Rootball depth in tubes and cells shall exceed their diameter.
- Rootballs in containers shall have a depth not exceeding 660 mm.
- Rootballs of ex-ground tree stock with a size index <1144 shall have a depth not exceeding 850 mm.
- Rootballs of ex-ground tree stock with a size index >1145 shall have a depth <1200 mm.
- Tree stock in containers and ex-ground tree stock shall have a root crown at the uppermost surface of the rootball.
- At the time of dispatch there shall be no evidence of suckering on rootstock.
- On removal of the unsupported rootball from the container, at least 90% of the growing media volume shall remain intact in or around the rootball.
- Circling roots shall not be present in the rootball.
- Woody circling roots shall not be present at the extremity of the rootball.
- Roots, from the point of initiation, shall grow in an outwards (radial) and downwards direction.
- Girdled roots, kinked roots or j-roots shall not be present.
- Tree stock in containers ≤45 L and ex-ground tree stock shall have undergone primary division at least once within the rootball.
- Tree stock in containers >45 L shall have undergone primary division at multiple intervals.

Tree Stock Balance

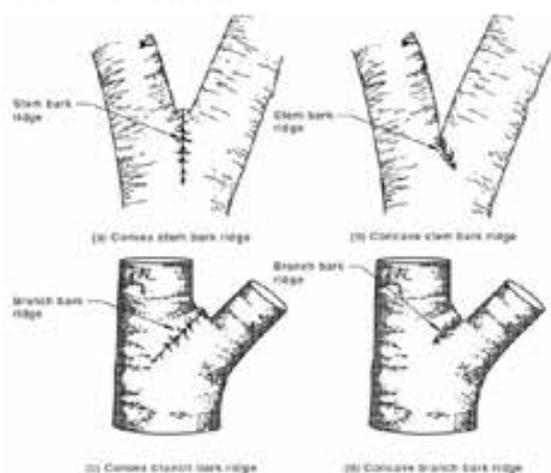
This component of the Standard considers the proportional balance of tree stock grown in containers >20L or ex-ground tree stock with a minimum rootball diameter of >400mm. The calculated size index value of tree stock in containers >20L or ex-ground tree stock with a minimum rootball diameter of 400mm should fall within nominated container volume as set out in Appendix E. However, this should be used for guidance only.

As this stage the Horticulture Innovation Australia Limited (HIA) is seeking Expressions of Interest (EOI) from a suitably experienced service provider to undertake the project to evaluate nursery tree stock balance parameters. The project will commence in July 2015 and conclude in March 2017. This was a requirement of the Standard to address Note 2 under clause 3.2 that indicates:

At the time of publication, industry had committed to undertake further research of tree stock balance parameters across all climatic regions of Australia. This is intended to be completed within two years of publication and the data considered in a review of the Standard at that time.

Included Bark

Included bark shall not be present and the stem bark ridge and branch bark ridge unions shall be convex. Whilst there may be some species which naturally exhibit junctions with included bark which rarely fail, these exceptions should be dealt with on an individual basis and should not compromise the overall aim of eliminating included bark from tree stock.



Self-Supporting

Tree Stock in containers >45L and ex-ground tree stock shall be self-supporting at the time of dispatch. The self-supporting nature of the tree stock needs to be recorded. By way of a definition, self-supporting tree stock means tree stock supporting its above-ground parts in an upright position without movement of <30 degrees from vertical, stem breakage, injury or loosening of roots in growing media.

Testing for Compliance

Tree Stock testing will need to show compliance with the Standard and be demonstrated by at least one of the following methods:

- a) Testing in accordance with appendix A and B prior to dispatch (at dispatch).
- b) Internal nursery production systems that ensure that the tree stock complies with the requirements of this standard.
- c) QA accreditation programs audited by a relevant organisation in order to demonstrate compliance with the best practice tree stock growing process and to enable continued accreditation as a supplier of tree stock grown to this Standard.

Tree Stock tested under options b and c do not need to be tested at dispatch, unless requested by the purchaser.

There are a few different options that you can be used to test tree stock. These are outlined below.

Option A – Investigations at dispatch

It's important to note that Councils will still insist on dispatch inspections. The standard prescribes how these are to occur, from the number of samples through to the testing methodology. Investigative rootball testing is not mandatory at dispatch. An appropriate sampling plan should be in place for this Step to limit the number of items inspected.

An important fact is that it is not a requirement to destroy tree stock at dispatch and your own documentation and relationships will go a long way to curb difficult situations.

Option B – Internal Systems

These programs should be supported by documentation of appropriate production practices where you have carried out inspections throughout production including inspection of the final product. Inspection reports are available.

These could include:

- Existing records/policies/procedures – SOPs
- Photos, batch records
- Appendix C of the standard which includes a checklist that may be followed as part of business operations
- NIASA (refinements are required)
- Nursery standards program (to be considered by industry)

Option C – QA systems

At this stage there are none currently available however this is a great opportunity for the different state NGI's and NGIA to develop an auditing framework. It's also an opportunity for the NGI's and NGIA to develop a module in NIASA and support existing programs as well as to develop guidelines to assist in the interpretation of AS2303.

BRISBANE TRADE DAY

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With over 40 standholders in the one location, you would be crazy not to come!

Book a casual stand for \$180 Inc. GST

The next Brisbane Trade Day is
Wednesday 16 September 2015
Thursday 22 October 2015

Wednesday 18 Nov 2015

Thursday 10 Dec 2015



For more information about
Brisbane Trade Day,

Contact Kathy Millbourn via
Email: info@ngiq.asn.au
Ph: 07 3275 3423

Restricted Area Boundaries changed for Red Imported Fire Ant (PTO for Map)



Changes have been made to the Red Imported Fire Ant Restricted Area to reflect changes to the risk status of suburbs and localities as new infestation is detected or areas are cleared of infestation following completion of all required treatment and surveillance activities.

The following changes come into effect from 31 August 2015:

- **Alberton, Alexandra Hills, Cleveland, Jacobs Well, Jindalee, Karana Downs, Kents Lagoon, Kingsholme, Luscombe, Mount Ommaney, Mt Crosby, Mundoolun, Norwell, Ormeau Hills, Pinjarra Hills, Silverdale, Steiglitz and Woongoolba** which were previously free of restrictions will now move into the low risk restricted area.
- **Cedar Creek, Gilberton and Pimpama** which were previously free of restrictions will now move into the high risk restricted area.

- **Ashwell, Barellan Point, Coleyville, Karalee, North Booval, North Tivoli, Ormeau, Redland Bay, Rosevale, Stapylton, Thornlands, Victoria Point, Westlake and Yatala** will move from the low risk to the high risk restricted area.

An updated Red Imported Fire Ant Restricted Area map, the declaration notice and details about the movement controls within the high and low risk restricted areas is available on the DAF website www.daf.qld.gov.au/fireants

For more information about the changes to the Red Imported Fire Ant Restricted Area, please visit www.daff.qld.gov.au/fireants



Nests

- No obvious entry or exit holes
- Come in various shapes and sizes
- Can be mounds or just some loose soil
- Can be found under and around logs, rocks and garden material

Stings

- Burning, painful and can last up to an hour
- Can form itchy blisters that last up to a week
- May cause an allergic reaction

Ants

- Small 2-6 mm
- Variety of sizes within each nest
- Head and body are coppery-brown, abdomen is darker

Behaviour

- Aggressive, particularly near the nest
- Can inflict a painful sting

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HIGH RISK RESTRICTED AREA

Acacia Ridge	Glen Cairn	Peak Crossing	Waterford West
Algester	Goodna	Pimpama	Westlake
Amberley	Goolman	Priestdale	White Rock
Archerfield	Greenbank	Purga	Willawong
Ashwell	Harrisville	Raceview	Willowbank
Augustine Heights	Heathwood	Redbank	Wishart
Barellan Point	Heritage Park	Redbank Plains	Woodridge
Bellbird Park	Hillcrest	Redland Bay	Wulkuraka
Belmont	Holmview	Regents Park	Yamanto
Berrinba	Inala	Richlands	Yarrabilba
Bethania	Ipswich	Ripley	Yatala
Blackstone	Jeebropilly	Riverhills	
Boronia Heights	Jimboomba	Riverview	
Brookwater	Karalee	Rochedale	
Browns Plains	Karawatha	Rochedale South	
Buccan	Kingston	Rocklea	
Bundamba	Kuraby	Rosevale	
Burbank	Laidley	Rosewood	
Calamvale	Larapinta	Runcorn	
Camira	Leichhardt	Seventeen Mile Rocks	
Carindale	Logan Central	Shailer Park	
Carole Park	Logan Reserve	Sheldon	
Cedar Creek	Logan Village	Slacks Creek	
Cedar Grove	Loganholme	South Maclean	
Chambers Flat	Loganlea	South Ripley	
Churchill	Lower Mount Walker	Spring Mountain	
Coleyville	Lyons	Springfield	
Collingwood Park	Mackenzie	Springfield Central	
Coopers Plains	Mansfield	Springfield Lakes	
Cornubia	Marsden	Springwood	
Crestmead	Meadowbrook	Stapylton	
Daisy Hill	Moggill	Stockleigh	
Darra	Mount Cotton	Stretton	
Deebing Heights	Mount Forbes	Sunmer	
Dinmore	Mount Walker	Sunnybank	
Doolandella	Munruben	Sunnybank Hills	
Drewvale	Mutdapilly	Swanbank	
Durack	New Beith	Tallegalla	
Ebbw Vale	New Chum	Tanah Merah	
Ebenezer	North Booval	Tennyson	
Edens Landing	North Maclean	Thagoona	
Eight Mile Plains	North Tivoli	Thornlands	
Ellen Grove	One Mile	Tivoli	
Flinders View	Ormeau	Underwood	
Forest Hill	Oxley	Undullah	
Forest Lake	Pallara	Victoria Point	
Forestdale	Park Ridge	Wacol	
Gailes	Park Ridge South	Warrill View	
Gilberton	Parkinson	Waterford	

RED IMPORTED

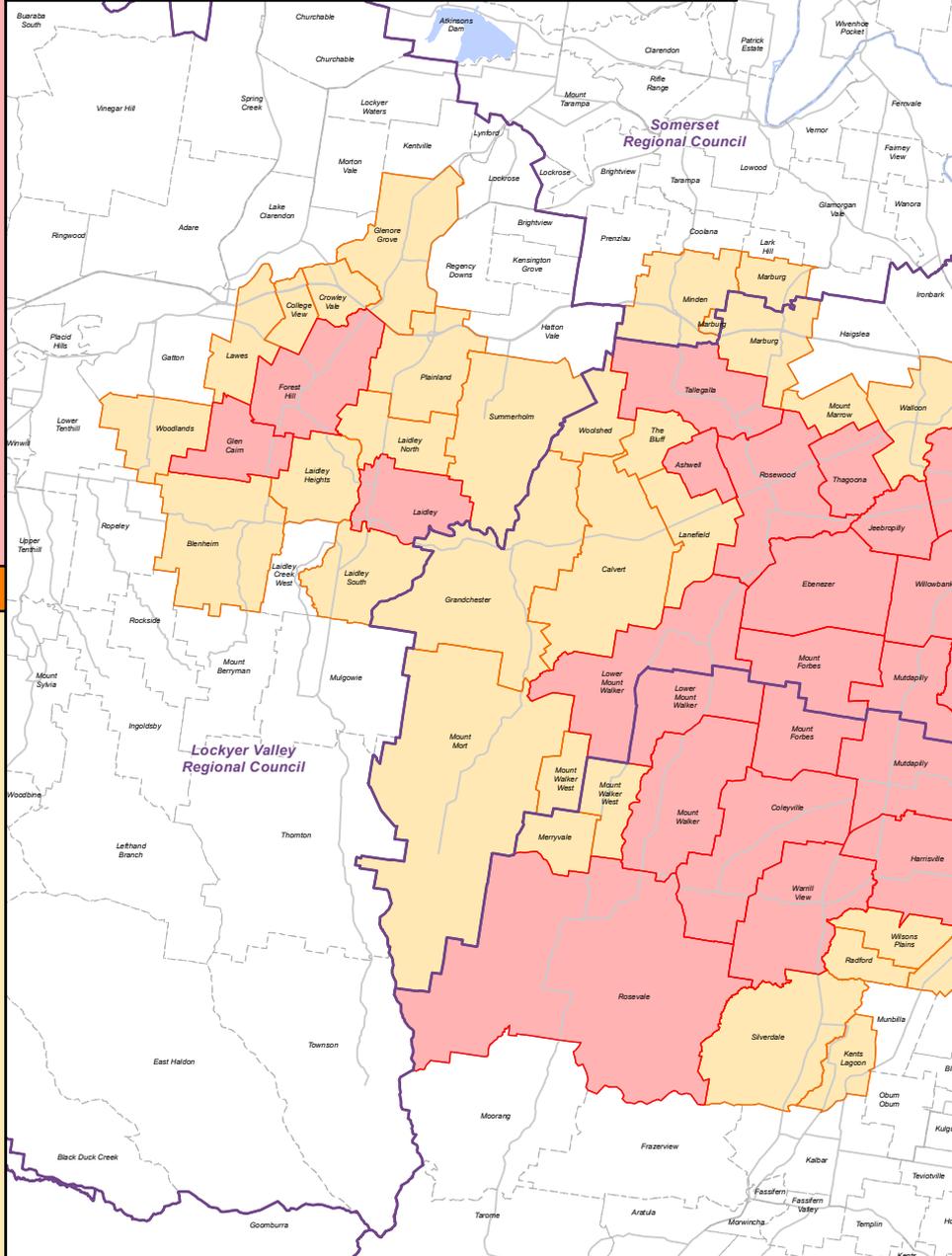
Declaration Notice

(declared under section 49 of the *Plant Protection Regulation 2002*)

The Director-General of the Department of Agriculture and Fisheries declares that the listed suburbs and localities are in either a high risk restricted area or a low risk restricted area.

The declaration comes into effect on 31 August 2015 and revokes and replaces all previous restricted area declaration notices for fire ants in South East Queensland.

The movement restrictions mentioned in sections 51-58 of the *Plant Protection Regulation 2002* apply to high risk and low risk restricted areas.



LOW RISK RESTRICTED AREA

Alberton	Grandchester	Muirlea	Yeerongpilly
Alexandra Hills	Gumdale	Mundoolun	Yeeronga
Anstead	Jacobs Well	Nathan	
Bahrs Scrub	Jamboree Heights	Newtown	
Bannockburn	Jindalee	North Ipswich	
Basin Pocket	Kagaru	Norwell	
Beenleigh	Kairabah	Ormeau Hills	
Belivah	Karana Downs	Pinjarra Hills	
Bellbowrie	Karrabin	Plainland	
Blacksoil	Kents Lagoon	Radford	
Blenheim	Kingsholme	Robertson	
Booval	Laidley Heights	Sadliers Crossing	
Brassall	Laidley North	Salisbury	
Calvert	Laidley South	Sherwood	
Capalaba	Lanefield	Silkstone	
Carbrook	Lawes	Silverdale	
Carina	Limestone Ridges	Sinnamon Park	
Carina Heights	Luscombe	Steiglitz	
Cedar Vale	Macgregor	Summerholm	
Chandler	Marburg	Tamborine	
Chelmer	Merryvale	The Bluff	
Chumar	Middle Park	Tingalpa	
Cleveland	Milora	Upper Mount Gravatt	
Coalfalls	Minden	Walloon	
College View	Moore's Pocket	Washpool	
Corinda	Moorooka	West Ipswich	
Crowley Vale	Mount Crosby	Wilsons Plains	
Eagleby	Mount Gravatt East	Windaroo	
East Ipswich	Mount Marrow	Wolfdene	
Eastern Heights	Mount Mort	Woodend	
Fig Tree Pocket	Mount Ommaney	Woodlands	
Glenore Grove	Mount Walker West	Woolshed	
Graceville	Mount Warren Park	Woongoolba	

Contact the Department of Agriculture and Fisheries for further information

Log on to www.daf.qld.gov.au/fireants or call 13 25 23



Restricted Items

Soil ^{*refer below}	Mulch
Manure	Bark
Hay	Pot plants
Potting media	Turf
Sleepers/logs	Gravels
Poultry litter	

*Soil will require an Inspector's Approval before being moved into an unrestricted area. Log on to www.daf.qld.gov.au/fireants for details.

Requirements for

Commercial operators

Residents

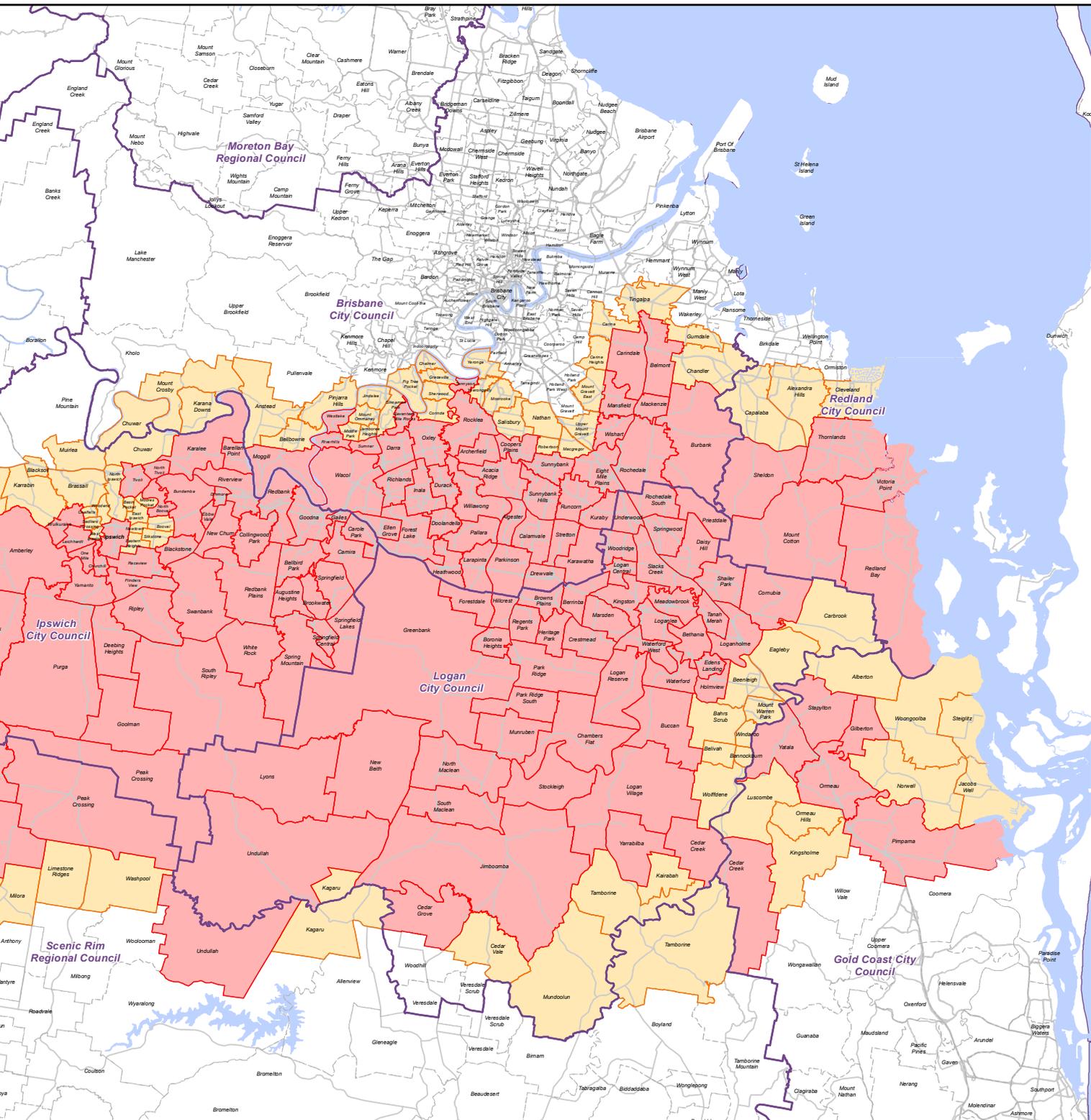
High Risk Restricted Area

In this area movement of Restricted Items must be in accordance with the Risk Management Plan. These items off a property must be transported to a registered fire ant farm. Log on to www.daf.qld.gov.au/fireants

Residents living in this area must not move Restricted Items off their property. Log on to www.daf.qld.gov.au/fireants

Disclaimer: While every care is taken to ensure the accuracy of these data sets, all data custodians and/or the State of Queensland makes no representation, warranties, conditions, or other terms, express or implied, as to the accuracy, completeness, or reliability of the information, or any omissions, damages (including indirect or consequential damage) and costs to which you might incur as a result of the data being inaccurate or incomplete.
Acknowledgements © The State of Queensland - Department of Natural Resources & Mines 2015. © The State of Queensland - Department of Agriculture and Fisheries 2015.

RESTRICTED AREA DECLARATION NOTICE



High Risk Restricted Area (red zone)

Movement of restricted items requires an Approved Risk Management Plan or an Inspector's Approval to move items out of the area. Log on to www.daf.qld.gov.au/fireants for details.

Residents living in this area have several options when moving property. Log on to www.daf.qld.gov.au/fireants for details.

Low Risk Restricted Area (orange zone)

Within this area movement of restricted items is allowed. Movement into the unrestricted area requires an Approved Risk Management Plan or an Inspector's Approval. Log on to www.daf.qld.gov.au/fireants for details.

Residents living in this area have no formal requirements. Please check your yard for fire ants and call 13 25 23 if you think you have found suspect ants.

National Red Imported Fire Ant Eradication Program
Restricted Area Version 53
Effective Date: 31 August 2015

- High Risk Restricted Area
- Low Risk Restricted Area
- Suburb Boundaries
- Local Government Boundaries
- Water Bodies

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Branch Report

Toowoomba

It has been an active month at the Toowoomba branch with our AGM dinner meeting held at Parkhouse Cafe, with all office bearers being re-elected, surprisingly unopposed.

Our August Trade Day was again held in the Springs Garden World car park on a mild and bright morning. It was very successful with 19 stall holders who were supported by a large number of retailers.

This Trade Day draw winners were Pearce's Nursery for a free site at the April 2016 Trade Day, donated by Prime Super.

The retailers draw winners were Hanlou Nursery from Crows Nest winning Decor Products donated by Garden City Plastics, and Chinchilla Garden Centre winning new release Tesselaar Plants from Kingfisher Nursery.

And remember Toowoomba's Carnival of Flowers is on from 18 - 27 September which will be

a spectacular display of gardens, nurseries and plant displays for visitors to see.



Kerry Battersby discuss temperate trees with Malcom and Kay Sypher

(Below) Chris from Kingfisher Nursery helps Shirley from Chinchilla Garden Centre to pack stock



Alwyn Bauman from Border Builders in Goondiwindi is happy with his purchases.

(Far left) Matt from Garden City Plastics supporting the trade day with allied products

(Left) Juanita and Margaret from Springs Garden World conveniently gather stock for the nursery

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Queensland

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www.ngiq.asn.au

Lean Production Principles

Lloyd Russell, TCB Solutions

As we move forward an increasing number of businesses are experiencing strong cash flows with extremely tight margins as part of the normal business cycle. The supply chain is trying to strip out costs at every opportunity and the end user / consumer is putting more thought into purchases.

This raises the question of “how do I become a lean organisation but still deliver to clients / customers”. To answer this question we must first look at our processes and focus on three core areas

1. **Process / production time – The actual amount of time to deliver the output**
 - a. The scheduling of jobs / projects and the communication of this schedule is a critical component of this stage
 - b. Ordering, purchase and delivery of the raw materials is also crucial – Receipt of the correct raw materials on time eliminates external influences
 - c. A systematic flow of production match to adequate resources (equipment, consumables and people) that are well inducted, trained and supervised increases throughput
 - d. Know what is happening at the delivery point end of the process to avoid bottlenecks
2. **Lead and lag times – The amount of time between order / contract to commencement of production and the wait times through the various production stages to client delivery**
 - a. When calculating lead time be very comprehensive
 - i. Understand the pre-sale times and conversion rates – Business development, client liaison, quoting / tendering
 - ii. Sale to production – Contracting the work and receipt of ALL current specifications / instructions
 - iii. Pre-production activity
 - iv. Know the delivery target dates
 - b. When calculating lag time think money in the bank
 - i. Have all of the logistical processes locked down well in advance
 - ii. Understand what is happening at the delivery point and adjust production schedule accordingly
 - iii. Know key dates for deliver as they impact on invoicing
 - iv. Invoice regularly AND accurately PLUS understand your actual average debtor days
3. **Right first time (RFT) – Percentage of work that is completed on time or ahead of schedule and without defects**
 - a. This is just as important at the supplier end as it is through your own business.
 - b. Hold inventory on consignment where possible to ensure you have the correct components on hand BUT at no cost to your business (secure storage and a good inventory system is crucial)
 - c. Regular quality audits linked into the company training program is essential

After the above analysis is complete it is important to be committed to the change process, treat it with respect and adopt a systematic approach to its implementation.

The following principles provide the structure for implementation

1. Specify output value from the customer’s perspective
2. Clearly identify all steps in your processes and production cycles – Eliminate any that do not add value to the output
3. Tighten the sequence of all steps to reduce “down” time
4. Provide additional value to the customer – Not just product / service quality but improved delivery times or a reduction in the logistical costs related to delivery

Constantly review the business processes and production outputs by continually implementing the above four steps until your ultimate value is delivered and all waste is extracted from the business.

About Lloyd Russell, TCB Solutions

Lloyd enjoys a strong background in business efficiency consulting. His experience ranges across both public and private sector industries and provides him with a particular appreciation for the application of business and management systems to achieve both economy and efficiency within the organisation but equally focusing on the qualitative outcomes required for specific policy objectives.



Lloyd applies a holistic and integrated approach when approaching organisational reviews, incorporating the three critical areas of good Corporate Governance, Risk Management, Strategic Development and Operational Planning and Performance Monitoring to ensure that all facets of the organisation are aligned and risks appropriately managed. Lloyd works with family and private companies in the wholesale, manufacturing, building / construction services, mining services and agriculture industries. Contact Lloyd on 0413 549 748 or lloyd@tcbsolutions.com.au www.tcbsolutions.com.au

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Your Association at Work

Summary of major meetings and attendances
by NGIQ Committees, Office Bearers and Staff

- **National Biosecurity Review meeting** held 3 August at NGIQ - Nursery Industry Development Manager John McDonald attends.
- **RIFA authorised Inspection Person course** held 4 August at Redlands Research Station - John McDonald attends.
- **Biosecurity Capability Review Panel meeting** held 5 August at Primary Industries Building - Executive Officer Kerry Battersby and John McDonald attend.
- **Biosecurity Act Implementation Steering Committee meeting** held 7 August at Primary Industries Building - John McDonald attends.
- **Toowoomba Branch AGM** held 12 August in Toowoomba - Kerry Battersby attends.
- **Ergon Energy Saves Plus Workshop** held 13 August at UQ Gatton - Kerry Battersby attends.
- **NGIA - Online Training platform meeting** held 13 August at NGIQ - John McDonald attends.
- **Biosecurity Queensland - RIFA meeting** held 14 August at Primary Industries Building - John McDonald attends.
- **National Project meeting** held 17 August in Sydney - John McDonald attends.
- **Toowoomba Trade Day** held 18 August at Springs Garden World - Kerry Battersby attends.
- **Information Visits** with Biosecurity Queensland held 19 August on-farm - John McDonald attends.
- **NGIQ Board Meeting** held 21 August in NGIQ Boardroom - NGIQ Directors, Kerry Battersby and John McDonald attend.
- **NGIA Teleconference** held 24 August - Kerry Battersby participates.
- **Meeting with Superior Policy Advisors** held 24 August at DAF - Kerry Battersby attends.
- **Growcom Hort. 360 Launch** held 25 August at Lockyer Valley - Kerry Battersby attends.
- **South Brisbane Branch meeting** held 26 August - Kerry Battersby and Member Services Coordinator Kathy Millbourn attend.

**For further information on any of these matters
contact NGIQ on 07 3277 7900.**

Selecting a Centrifugal Pump for Nursery Production Irrigation



(Above) - Steve Hart
(Right) - Lex McMullin

Irrigation pumping can be a significant cost for production nurseries, with many growers often moving water for irrigation a number of times, transferring between storages, pumping through disinfection systems, moving into storage tanks and finally, pressurising for irrigation.

Pump choices can be many and varied, and the decision to purchase should be taken carefully, keeping in mind the life cycle costs of pumping systems. It is generally recognised that the purchase or capital cost makes up just ten percent of the life cycle cost of owning and operating a pump, while the operating cost makes up approximately forty percent. With the increasing costs of fuel and electricity, it is essential to ensure the purchase of the pumping system is undertaken with the assistance of an irrigation professional.

Poor pump selection and installation may lead to poor performance, high energy costs, premature pump performance decline and mechanical seal failure.



When making the decision on which pumping system to purchase, it is important to consider the pumping objective, and focus on the required application, the installation, and the pump operation.

Application: identify the water quality, pressure and flow rate required, lift from the water level of the storage, horsepower requirement, efficiency, and duty point.

Installation: consider the capital cost, operational costs, maintenance costs, size, stability, noise, energy source, access for installation and maintenance, parts, availability, service, backup, reliability, suction pipe configuration, and delivery piping options.

Operation: identify the hours of operation, continuous or intermittent operation, number of starts, data recording, and remote access and control.

The most common pump in operation in production nurseries is a centrifugal pump. Centrifugal pumps are dynamic pumps designed and built to impart energy into the water, to move the liquid and increase its pressure by the use of one or more impellers. Due to their simplicity, efficiency and capital outlay, these pumps are most commonly used in production nurseries to transfer water between storages, and for pressurising irrigation water.

Centrifugal pumps consist of a rotating impeller enclosed within a housing or casing, and are designed to impart energy to the water through centrifugal force. Centrifugal pumps convert energy from an

electric or fuel powered drive motor, into impeller speed and then into velocity and pressure.

Centrifugal pumps may be a single stage, having one flow and pressure generating stage (impeller), or multi-stage having a number of stages (impellers) in the one pump casing. A multi-stage centrifugal pump will contain multiple impellers on a single shaft within the same pump casing, directing the discharge from one impeller to the intake of the next through each stage of the pump. Each individual stage of a multistage centrifugal pump imparts energy to the water to increase pressure, but does not noticeably increase flow. A multi-stage centrifugal pump is generally more economical to operate than a single stage centrifugal pump when high pressures are required within an irrigation system, and are ideally suited to pump from storages that are located above the pump, such as an above ground storage tank (flooded suction).



Centrifugal pumps can often be coupled with a variable frequency drive to improve the performance of the pump in many production nursery situations. A variable frequency, or variable speed drive attached to an irrigation pump varies the frequency of the power supplied to the motor to allow changes in motor speed and therefore pump speed to deliver variable outputs. Variable frequency drives (VFD) provide significant benefits when the pressure and/or flow requirement between individual irrigation blocks/zones varies considerably, or if there is a difference in elevation between irrigation zones. A variable frequency drive can maintain the selected pressure and flow across irrigation zones, deliver reduced operational energy costs, and have a reduced water hammer impact upon starting and stopping, reducing pipe damage.

Technical articles on pumping and irrigation in nursery production can be found by visiting the 'Nursery Production Technical Information Library' page (<http://www.ngiq.asn.au/technical-information/>) on the NGIQ website (<http://www.ngiq.asn.au/>) and typing 'pump' in the 'search downloads' box in the top right of the page.

Steve Hart and Lex McMullin
Farm Management Systems Officers
Nursery & Garden Industry Queensland

Published August 2015



Nursery Industry Development

Minor Use Permits for Nursery Stock (non-food) as at August 2015



John McDonald,
Industry Development
Manager

The following table identifies the Minor Use Permits (MUP's) that are currently in place for nursery stock (non-food). The industry is advised to make sure you download the appropriate MUP from the Technical Information Library (NGIQ Website) or the APVMA website at www.apvma.gov.au click onto **Permits** and then **Search Permits** and type in the permit number at the **PER** window. It is a legal requirement to have a copy of the current Minor Use Permit on hand if using the product under the authority of each relevant permit.

Minor Use Permits are available on the NGIQ website at: <http://www.ngiq.asn.au/technical-information/?category=9>

Table 1: List of Minor Use Permits issued since 2008 for Nursery Stock (non-food): **BLUE text shows changes since last published**

Permit #	Trade Name/Active Ingredient	Pest(s)/Disease(s)/Weed(s)
PER81419	Acrobat + Mancozeb Fungicide	Downy mildew, Alternaria, Anthracnose, & Phytophthora
PER81419	Amistar Fungicide	Downy & Powdery mildew, Grey mould, Rusts and Leaf spots
PER13942	SuSCon Maxi Insecticide	Aphids, Lacebugs, Mealybugs, Leafhoppers, Scales, Psyllids, Ants, Silverleaf & Greenhouse whitefly
PER14769	Applaud Insecticide	Mealybugs, Leafhoppers, Scales, Silverleaf & Greenhouse whitefly
PER13953	Confidor 200 SC	Silverleaf whitefly
PER81419	Various Fungicide products	Myrtle rust
PER12659	Admiral Insecticide	Fungus gnats & Whitefly
PER12029	Avatar Insecticide	Heliothis, Earwig, Light brown apple moth & Weevils
PER12027	Coragen Insecticide	Heliothis, Lightbrown apple moth, Apple looper & Soybean looper.
PER81419	Ridomil Fungicide	Alternaria, Anthracnose, Phytophthora & Septoria leaf spot
PER12662	Nimrod Fungicide	Powdery mildew
PER81419	Switch Fungicide	Rhizoctonia, Sclerotinia, Botrytis, Colletotrichum, Aspergillus
PER81419	Pristine Fungicide	Anthracnose, Botrytis, Leaf spot, Powdery mildew
PER13382	Durivo Insecticide	Lepidoptera including Diamondback Moth, Cabbage White Butterfly, Helicoverpa, Caterpillars, Loopers, Leafhoppers, Aphids, Whitefly, Bugs, Thrips & Leafrollers
PER81419	Blue Shield Copper Fungicide	Alternaria, Colletotrichum, Downy mildew & Myrtle rust
PER13330	Ecocarb	Powdery mildew
PER81331	Movento 240 SC Insecticide	Aphids, Silverleaf whitefly & Scale
PER12982	Dominex Duo Insecticide	Thrips, Aphids, Grasshoppers, Locust, Cutworms & Rutherglen bug
PER12983	Regent Insecticide plus Instar Granular	Ants, Cut worms/wireworms, Earwigs, Fungus gnats/Sciarid flies, Root mealybug, Scarab beetles, Sugar cane weevil borer, Symphylids, Termites and Thrips (larvae in soil).
PER13329	Caltex Summer Spray Oil	Thrips*, Mites, Scale, Aphids and Leafhoppers
PER14399	Barricade Turf Herbicide	Pre-emergent for grass and broad leaf weeds
PER14881	PyGanic Organic Insecticide	Greenhouse thrips, Diamondback and Lightbrown apple moth, Cluster caterpillar and Heliothis
PER14880	Mancozeb Fungicide	Alternaria, Anthracnose, Cercospora, Downy mildew, Grey mould, Leaf spot, Phoma, Rhizoctonia, Rust
PER14879	Proclaim Insecticide	Diamondback moth, loopers, green mirid, mites, cluster caterpillar, Heliothis, lightbrown apple moth
PER80688	Dimethoate Insecticide	Spiraling Whitefly
PER80241	Pegasus, Acramite & Chess Insecticide	Aphids, mites & whiteflies
PER80699	Copper oxychloride, Copper sulfate, Quaternary ammonium and Methylated spirits	Surface disinfestation - General Plant Pathogens

Table 2: List of Minor Use Permits issued prior to 2008 or under emergency plant pest conditions.

Permit #	Active	Pest(s) / Disease(s)
PER13959	Bifenthrin (Brigade) Insecticide	Red Imported Fire Ant
PER13504	Chlorpyrifos Insecticide	Red Imported Fire Ants
PER14623	Bacillus thuringiensis israelensis (VectoBac WG) Insecticide	Fungus gnats and Sciarids
PER15086	Chlorpyrifos Insecticide	Electric ant (Wasmannia auropunctata)
PER15085	Cyfluthrin Insecticide	Electric ant (Wasmannia auropunctata)
PER14106	Paclobutrazol (Payback Plant Growth Regulator)	Excessive plant growth regulation
PER11940	Dimethomorph, azoxystrobin, fosetyl, mancozeb Fungicides	Impatiens Downy mildew
PER12073	Cyfluthrin Insecticide	Red Imported Fire Ant & Tropical Fire Ant / Emergency Use
PER14256	Chlorpyrifos (suSCon Green Soil Insecticide)	Red Imported Fire Ant

For further information contact Industry Development Manager John McDonald on 07 3277 7900 - Managing the national MUP program.



Australian Government
Australian Pesticides and
Veterinary Medicines Authority

CEASE USE: FENTHION

AFFECTED PRODUCTS

FARM AND HOME GARDEN PRODUCTS:

Product name	Product No.	Date to cease use
David Grays Mosquito and Spider Spray Insecticide	51627	15 October 2015
Lebaycid Fruit Fly and Insect Killer	61308	15 October 2015
Tiguvon Spot-on Cattle Lice Insecticide	33520	15 October 2015
*Lebaycid Insecticide Spray	32996	29 October 2015

*See permit PER13840 (WA) and PER13841 (all other states, excluding Tasmania)

PEST BIRD CONTROL AND GENERAL PEST CONTROL:

Product name	Product No.	Date to cease use
Avigrease Pest Bird Eradication Compound	50244	15 October 2015
Avigel Pest Bird Control Agent	52075	15 October 2015
Control-a-Bird Agent	42202	15 October 2015
Amalgamated Pest Control 1% Fenthion Dust	41138	2 November 2015

Products must be used according to existing permits and label conditions.

PRODUCT DISPOSAL

Dispose of unwanted product responsibly, via a licensed waste disposal contractor or facility, such as the industry run stewardship program for the disposal of pesticides:

Chemclear
Phone: 1800 008 182
Register online:
chemclear.com.au

Home owners may be able to access additional disposal options through their local council.

MORE INFORMATION

Contact us for further information, copies of current permits for the use of Lebaycid or to discuss concerns about the supply or use of fenthion after October.

+61 2 6210 4749
www.apvma.gov.au
chemicalreview@apvma.gov.au



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Contact us

Brisbane	(07) 3721 5100	Bundaberg	(07) 4132 7800
Emerald	(07) 4022 6000	Gold Coast	(07) 5570 3099
Kingaroy	(07) 4162 7133	Nambour	(07) 5446 8555
Mareeba	(07) 4092 6391	Toowoomba	(07) 4631 9444
Rockhampton	(07) 4922 6000	Warwick	(07) 4661 9422

Insurance ■ **business** ■ **farm** ■ **strata** ■ **home** ■ **landlord**

wfi.com.au

Good people to know.



To see if our products are right for you, always consider the PDS from the product issuer, WFI (ABN 24 000 036 279 AFSL 241461).

Applications for Membership

Here's a list of businesses that have recently joined NGIQ.

Bamboos Wholesale

1569 Louis Bazzo Drive, Boreen Point 4565
Ph. 07 5485 3510 E: sales@bamboos.com.au

www.bamboos.com.au

Suppliers of top varieties of bamboo direct to the nursery industry, landscapers, commercial growers and private projects/home gardeners throughout Australia.



Brisbane Botanic Gardens

Mt Coot-tha Road, Toowong 4066

Ph. 3178 2671

www.brisbane.qld.gov.au

The Brisbane Botanic Gardens Mount Coot-tha is recognised as Queensland's premier subtropical botanic gardens, displaying distinctly different gardens arranged in thematic and geographical displays. The riverside City Botanic Gardens are Brisbane's original botanic gardens.



Here's the process: we receive an application for membership, any objection to an application can be made in writing to NGIQ by other members, within 21 days of this publication. The new member application is then considered and approved or rejected by the NGIQ Board. This process enables us to ensure our industry Code of Ethics, image and professional standards are well maintained.

Trade Register Updates

Remember, the 2016 Trade Register is being finalised now. Contact NGIQ on 07 3277 7900 if you need to update your listing.

NGIQ

1/250 Orange Grove Road

Salisbury QLD 4107

Ph: 07 3277 7900

Fx: 07 3277 7109

E: info@ngiq.asn.au

W: www.ngiq.asn.au



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Calendar

16 September 2015 (Wed) - Brisbane Trade Day

Brisbane Showgrounds

Contact: Kathy at NGIQ - 07 3275 3423

8-11 October 2015 - Brisbane International Garden Show

Pine Rivers Park, Strathpine

Contact: Marion 07 5441 4655



15 October (Thurs) - AusChem Certificate

Cairns

Contact: Kathy at NGIQ 07 3275 3423

22 October 2015 (Thurs) - Brisbane Trade Day

Brisbane Showgrounds

Contact: Kathy at NGIQ - 07 3275 3423

29 October 2015 (Thurs) - Nursery Crop Nutrition Seminar

Brisbane

Contact: Kathy at NGIQ 07 3275 3423

18 November 2015 (Wed) - Brisbane Trade Day

Brisbane Showgrounds

Contact: Kathy at NGIQ - 07 3275 3423

20 November 2015 (Fri) - NGIQ Annual Dinner

Pullman Hotel, Brisbane

Contact: Kathy at NGIQ - 07 3277 7900

10 December 2015 (Thurs) - Brisbane Trade Day

Brisbane Showgrounds

Contact: Kathy at NGIQ - 07 3275 3423

15 - 17 March 2016 - NGIA National Conference

Adelaide

Contact: NGIA 02 8861 5100

Make sure you mark these dates on your calendar

NEW PRODUCT



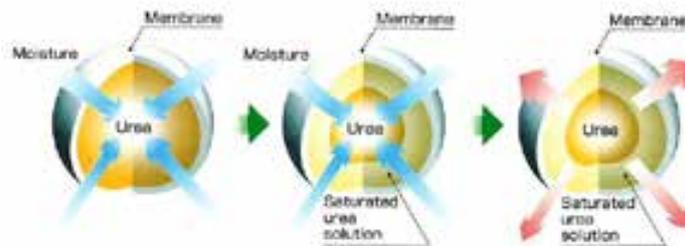
MEISTER

Controlled release Fertiliser (N42:P0:K0)

Key Features:

- ❖ High quality slow release nitrogen 70,100 & 140 day release at 25c
- ❖ Same high quality coating and reliability as Nutricote
- ❖ Soil type, moisture and pH have little impact on release curves
- ❖ Reliable controlled release maximises plants ability to utilise available nitrogen
- ❖ Low environmental impact compared to uncoated nitrogen
- ❖ Uniform white particle size 2.4 – 4ml

Release rates linked with soil temperature:



1. Water absorption -----> 2. Dilution of Urea 3. -----> Leaching via membrane

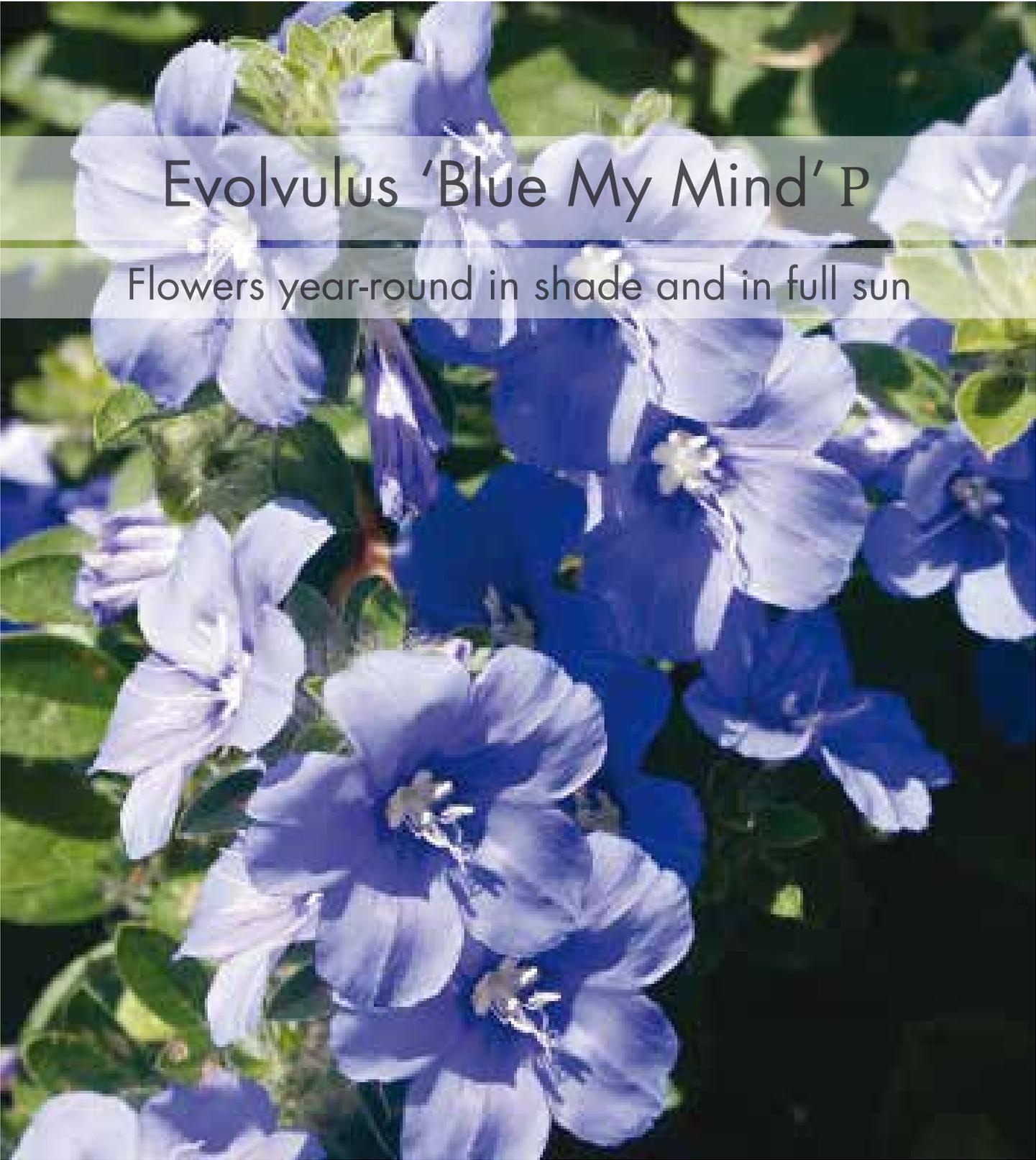
Brand Name	80% Release @ 20c	80% Release @ 25c
Meister - LP 70	100 Days	70 Days
Meister - LP 100	150 Days	100 Days
Meister - LP 140	200 Days	140 Days

Membrane decomposition over time:



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