

FOOD SAFETY BULLETIN





FOOD SAFE PRODUCTS AND SERVICES

- Are your non-food products, equipment and materials FOOD SAFE?
- Are your service suppliers FOOD SAFE and HACCP compliant?

Be sure, be FOOD SAFE

Look for the food safety mark



www.haccp.com.au

Looking for food safe products or services? Call us on 02 9956 6911 or visit the 'Endorsed Suppliers' page on our website.

HACCP AUSTRALIA



Experiences with implementing HACCP based QA Programs in the Horticultural Sector

By Peter J Bryar

Principal, Innovative Horticulture

There are many reasons why organisations implement quality systems. For many it is because the customer requires it. This situation is no different within the horticultural industry. The customers of fruit and vegetable producers - major chain supermarkets, market agents and distributors are insisting that their suppliers implement a HACCP based quality system.

This paper reviews some of the lessons learnt by a number of small, family based fruit and vegetable grower, packer and distribution businesses and their consultant whilst working together through the medium of action research.

Keywords: Quality Systems, Horticulture, Hazard Analysis Critical Control Point (HACCP)

Introduction

Imagine that you are a small, family based, horticultural business. You grow and pack strawberries and have been doing so for the last twenty years on a 3 hectare block just out of Melbourne. Business has been good because of the hard work you and your family has put in.

You can sell just about everything that you can grow and have regular customers such as a major chain supermarket, market agents in Sydney and Brisbane, and you have a stall in the Melbourne Market.

Within the space of a few weeks your business is invited to join the supermarket chain quality system and the market agents are saying that they are having increasing difficulty selling your produce because it is not quality assured. What are you going to do?

You begin to ask yourself a number of questions:

- Why do you need a quality system in the first place when you have been producing top quality produce for years?
- Will a HACCP based quality system work?
- Why won't one system satisfy all customer's requirements?
- What will you get out of it?

Why Do You Need A Quality System?

Anecdotal evidence suggests that there are a number of reasons why fruit and vegetable growers and packers need and are implementing quality systems:

• Food safety concerns are causing retailers, processors, market CONTINUED ON PAGE 3



enMotion the easy way to save money

For greater cost-in-use and improved hygiene, enMotion is quite simply untouchable. This revolutionary automated hand towel dispensing system controls the length and number of sheets dispensed, reduces waste and saves you money. With its innovative 'touchless' technology users only touch the sheet they use reducing the risk of cross-contamination and improving all round hygiene.



Call us today on

1800 143 360

for a free trial of this system

Chem-Pack Supplies

9 Yalgar Road Kirrawee NSW 2232 Australia

Tel. 02 9542 5822 Fax. 02 9542 2899

Email. altro-chempack@bigpond.com

Cost-in-use and Hygiene

are the two major issues in the Washroom and Workplace.

enMotion

is an innovative dispenser which provides the best of both worlds, giving you

greater Contro

in your working environment

agents, exporters and other customers handling fresh fruit and vegetables to implement HACCP based quality systems. This is having a flow-on effect with an increasing number of these strongly suggesting, if not demanding, that growing and packing operations have a HACCP based quality system in place. The reasons for implementing a quality system and even aspiring to formal certification are not unlike those in other sectors involving small businesses in Australia and overseas (Boon & Ram, 1998, p. 21; Brown et al., 1998, p. 273; Bryde & Slocock, 1998, p. 468; Jones et al., 1997, pp. 651-52).

- In some cases quality systems are determining market access.
 No quality system no access (or future access) to a particular market. From the other perspective, quality systems are enabling growers and packers to win and keep profitable markets.
- Quality systems are offering better control of the business throughout the scope of operations resulting in a more consistent quality of produce.
- The customer-supplier relationship is being seen as more important. Suppliers and customers are looking for longer term relationships and see the link that quality systems can provide as being a positive step towards this particularly when they work together to determine produce specifications and delivery schedules.

Will A HACCP Based Quality System Work?

This question requires addressing from two directions. Firstly, will the HACCP based quality system assist the horticulturalist to do the job that is intended – identify, evaluate and control food safety problems? Secondly, will they be able to develop, implement and maintain such a system?

Will HACCP Assist Horticulturalists To Identify, Evaluate And Control Food Safety Problems?

In the first instance, anecdotal evidence strongly suggests that HACCP based quality systems can assist horticulturalists to identify, evaluate and control potential food safety problems.

Quality systems are offering better control of the business throughout the scope of operations resulting in a more consistent quality of produce.

The HACCP method has been applied by a wide range of fruit and vegetable growers, packers and distributors including those working with produce such as table grapes, potatoes, onions, asparagus, strawberries, capsicum and carrots.



Growers and packers have found that HACCP provides them with the wherewithal to look at current operations afresh - to see things from a different perspective. HACCP has prompted questioning as to why certain parts of the operational process are done or not done. Potential food safety problems relating to agricultural chemical residues in the soil and in the produce itself, microbial contamination from water source and physical contamination due to bin and tray cleanliness and harvest techniques have been experienced. The questioning and subsequent problem-solving activities relating to the HACCP method has given 3 horticulturalists a new understanding of what they do and the stimulus to improve their methods. This is resulting in safer and consistently higher quality produce. Importantly, the food safety and quality risks are being addressed prior to potential incidents rather than after the fact. HACCP has indeed increased grower / packer understanding of their processes and facilitated a more effective control of the business.

Will The Small Horticultural Business Be Able To Cope?

The second part of the question is a little more difficult to answer. Much will depend on those factors that many businesses face with any form of quality system (Brown, 1999, pp. 471-472, Brown et al. 1998, pp. 282-284, Brown & van der Wiele, 1995). These include:

- Commitment / involvement.
- Training.
- Allocation of sufficient resources.
- Control of essential processes etc.
- Interpretation of the quality system requirements.

Commitment / Involvement. In my experience, where the small, family based business has demonstrated substantial and ongoing commitment, the success rate of development and implementation of HACCP based quality systems is high. Those businesses which have aspired to go further and seek external recognition e.g. certification to SQF 2000, have achieved their aim. Where such commitment has not been evident, the success rate declines dramatically. Obviously, the less complex the operation and the more simplistic the quality system requirement, the greater the opportunity for success.

Brown (1999, pp. 471-472) suggests that small businesses are strongly influenced by the attitude and values of the manager. If they are positive towards quality there is little scope for employees to avoid being involved. When the enthusiasm and vision of the CONTINUED ON PAGE 5





- Disposable VINYL Clear or Blue
- Disposable LATEX White
- Disposable NITRILE Blue
- Silverlined LATEX with NITRILE Blend
- Yellow or Blue
- Flocklined NITRILE CHEMICAL Gloves Green

To see the full range visit us online







The new **Hygiene** range offers a practical solution to areas where cleanliness is of primary importance.

Not only does the range meet the hygiene criteria set by certain industry guidelines, but is also suitable for most food processing plants,

commercial kitchens, laboratories, or any areas where a high degree of hygiene is paramount.

Them Lighting is proud to have recently been certified as an approved HACCP manufacturer.

Them Lighting Pty Limited trio@hornighteam.cu www.chamlighteam.cu tel: 1300 189965

THORN

manager is obvious to all employees, employee participation can be straightforward and does not pose any major difficulties.

Commitment / involvement must also go beyond the family management team. It is essential that everyone who is employed within the business is involved. We are finding that management can no longer afford to depend on key individuals alone (often themselves) to keep processes in control and work the entire operation. They have had to give up some of the traditional management tasks and place such responsibilities with other members of the full-time and casual staff. Businesses are also becoming more aware that all members of staff have an important role to play in relation to produce quality.



Training. Implementing the HACCP method has resulted in a positive move towards the training and development of employees particularly when they are involved with critical aspects of the businesses' operation. This has included:

- a. agricultural chemical usage.
- b. harvesting techniques and quality control.
- c. grading and packing.

Training is a central element of successful quality management. Training also facilitates practical and thoughtful problem-solving and decision-making on the job, and when supported by management, empowers employees to do the job the way that the management team would do it themselves. This promotes good farm / business practices all round. Small businesses often face a number of problems regarding training. They generally do not have the resources to develop and manage training in their own environments, that is, except for rudimentary on-thejob training. As a result they have to rely on generic external programs or engage an appropriate trainer. Many business managers and employees have difficulties in coping with the training regime. This is often associated with the level of English language skills (in particular writing and interpreting quality system documentation) and then putting the new knowledge into practice. Comments such as 'I haven't been to school for years', 'This looks too hard' and 'It will take such a long time to learn all this' are commonly heard from individuals participating in programs like the SQF 2000 Network Implementation Program. These difficulties are not insurmountable.

HACCP has offered them a degree of security with the knowledge that their produce can meet 'customer requirements' or 'specifications'.

Allocation of Sufficient Resources. Small businesses tend to have difficulties in allocating sufficient resources to develop, implement and manage quality systems. Time is essentially the crucial resource and finding a balance between working in the field or the packing shed and on quality system requirements presents problems for many. Often the horticulturalist falls into the trap of getting behind with their quality system checks and balances. Initially, they may fail to see that internal checking and auditing is as essential to their operations as is soil preparation, planting and harvesting. This can lead them to want to defer upcoming external audits rather than reorganise their daily routine to include quality system tasks.

There is no simple solution for this situation suffice to say that businesses have to be very flexible in their approach to reviewing and rescheduling necessary quality related tasks.

Another major challenge for many small businesses has been the lack of spare capacity with which to plan and change operational processes. Often they have to rely on outside providers for training, advice and other consultancy services. Choosing the right consultant can be a difficult task as the quality of consultants can vary considerably. Unfortunately, poor quality consultants can create more problems than they solve.

Control of Essential Processes etc. HACCP has assisted horticulturalists to better define work roles and responsibilities within their businesses and to delegate them more effectively.

Dependence on key individuals is decreasing as more appropriate training is being provided for others working within critical parts of the operation. Workers are empowered and able to take on greater responsibilities regarding the way they manage their part of the operational process. This has led to improved workplace relations that are based increasingly on mutual respect and trust. Labour turnover for casuals has also reduced in many businesses.

Employees in small businesses are generally able to develop a better appreciation of the entire work process. This gives management a higher degree of flexibility and offers wider employment opportunity. Jobs may be fewer but they have the potential to become involved across the entire operation. Often quality can be readily worked into the daily routine of the business.

There have also been a number of improvements in the way businesses function. Deeper understanding of all work processes have resulted in process improvements. Documentation and CONTINUED ON PAGE 6

better record keeping have ensured that work is completed in a more consistent, productive way. Continuous improvement of processes is becoming a way of life as businesses become more aware of their operations, market and customer requirements.

Sufficient understanding does come with time as the horticulturalist's technical produce knowledge is balanced with increasing practical HACCP application and common sense.

Interpretation of Quality System Requirements. In the first instance, small businesses tend to have difficulties in finding out about their quality system options. Horticulturalists often lack the in depth knowledge or expertise to select an appropriate quality system model let alone interpret quality system requirements. They have to rely on their professional association or community to help them with the first step. Sometimes this help is not forthcoming or it is inappropriate and this can lead to decisions based on 'gut feeling' rather than due process and fact. Once they commence their quality system journey they tend to rely on their quality system trainer or consultant to satisfy their immediate needs. Sufficient understanding does come with time as the horticulturalist's technical produce knowledge is balanced with

Those businesses seeking to achieve certification under banners such as SQF 2000 have found the ongoing relationship with their external quality system auditor invaluable.

Why Won't One System Satisfy Everyone's Requirements?

increasing practical HACCP application and common sense.

This is the most common question that I have been asked by horticulturalists, and disappointingly, I still do not have an appropriate answer.

Multiple Quality Systems

I am yet to be convinced that there is real value in having numerous quality systems in the horticultural industry. There is some merit in each of those systems, however, the situation brings horticulturalists to a state of frustration and exasperation. What system should the horticulturalist implement? Although there is a degree of commonality in some approaches, it becomes clear that one system is not enough if your customer base includes your own stall, market agents and major chain supermarkets.

Perhaps the horticultural industry faces the same dilemma that the Australian automobile industry faced not so long ago, that is, trying to interpret and apply ISO 9001, a generic quality standard. This led to the development of QS-9000, a derivative of ISO 9001 with additional specific to industry related requirements. Suppliers have reaped the benefits from the introduction of common motor industry quality standard.

The horticultural industry is yet to broach this problem. So many systems - so many with common requirements. From the horticulturalists perspective, the sooner the industry adopts a common system, the sooner they can get on with improving the quality and the food safety of their produce.

Certification Issues

Many of the smaller horticulturalists are deciding to develop and implement their HACCP based quality system but not seek certification at this time. This tends to be because of the cost of registration for the certification process and the ongoing audits. One set of certification audit and registration fees seems reasonable enough however the additional costs associated with multiple system external auditing needs to be avoided. It is not unusual for some operations to be audited twice a year for each of an approved supplier system and SQF 2000TM. If they export they may also have AQIS certification assurance or ISO 9002 as well. The ongoing audit costs for small businesses becomes prohibitive.

Will Implementation Of a Quality System Be Worth the Investment and Effort?

The answer to this question is unquestionably yes. Businesses that have had certified quality systems in place for some time perceive greater benefits than those considering implementation or who have recently achieved certification. This is consistent with research conducted by Jones et al. (1997). The real value, although somewhat difficult to quantify at times, lies with the improvements businesses are able to make as their quality systems mature.

The Customer-Supplier Relationship

One of the benefits of implementing quality systems is the opportunity of working closely with customers to determine what needs to be done to satisfy the contractual relationship. This can be the co-development of produce specifications including such things as general appearance criteria, accepted defect





levels and consignment criteria. Regional and adverse seasonal impacts on quality can also be built in. The end result is improved understanding of the growing, packing, storage and distribution processes for both the customer and the supplier.

Many changes have been made as a result of these joint arrangements and these include:

- More realistic and achievable produce specifications.
- Consistent quality produce delivered on time.
- A better appreciation of harvest and potential delivery schedules.
- Improved on-farm and post harvest management practices resulting in longer shelf life for produce.

Improved understanding of each other's needs and expectations has contributed to the development of longer-term business relationships between customer and supplier.

A View Of The Operations From Another Perspective

Many horticulturalists have found that HACCP provides them with the wherewithal to look at their current operations from a fresh perspective. HACCP has promoted a deeper understanding of processes and an appreciation of the risks to food safety and quality of produce. The ongoing review and questioning of operations and the subsequent problemsolving / decision-making activities associated with HACCP has enlightened horticulturalists and given them the stimulus to improve their methods.

A Place In The Market

Perhaps the greatest benefit horticulturalists perceive from their implementation of a HACCP based quality system is that they will have a place in the market. HACCP has offered them a degree

of security with the knowledge that their produce can meet 'customer requirements' or 'specifications'.

Conclusion

HACCP based quality systems are having a positive effect throughout the horticultural industry, however, confusion relating to choice and the requirement for multiple systems is not conducive to rallying support for such inside the farm gate. The first few steps for the horticulturalist are difficult enough without having to face such a predicament.

Peter J Bryar Principal, Innovative Horticulture Peter.Bryar@pjbryar.com

Improving your productivity is a job for SKILLED people.



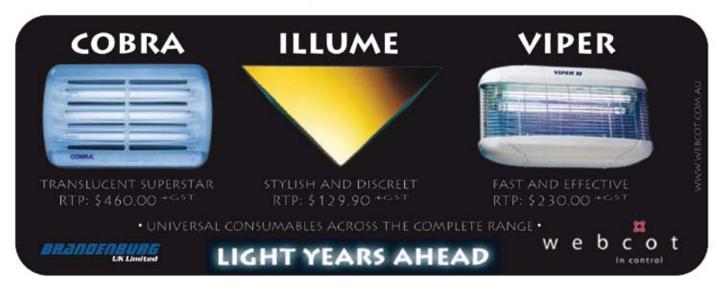
By delivering specialist workforce solutions, SKILLED is committed to helping bus nesses in the food industry become more productive through petter use of one of its greatest assets – people.

Traces & Maintenance, Food & Pharmaccutical, Production, Distribution and Transport. SKLLED's workforce management, training and apprenticeship, OH&S and Riexpertise provide business with flexibility, risk management, reduced workforce related costs and utimately – productivity improvements.

SKILLED is a HACOF Addrectied. Iraining Organisation

1300 366 606 www.skilled.com.au







GM CROPS CAN SAVE US FROM FOOD SHORTAGES

The following article by Bill Emmott was first published in Britain's Daily Telegraph newspaper in April. Since then, Michel Barnier, the French agriculture minister has called for a world forum on the global food crisis suggesting the UN and WTO combine their efforts to give a greater punch to the looming problem of world food shortages. He described the crisis as a vital issue. We better believe it.

For agricultural commodity prices (what we call "food") to have more than doubled in the past three years is an astonishing and worrying turn of events. But in responding to it, we need to understand the true nature of the problem.

And we must recognise that a big part of this problem is our own fault - because of our ill thought-out enthusiasm for using food to fuel cars as well as stomachs; and because of our longer-established but also ill considered opposition to the use of genetic engineering to help us grow more food.

Start with the true nature of the problem of food-price inflation. Most attention has been given to shortages in supply and to the increased appetite in China and India for meat, which requires more grain.

But those explanations are incomplete and misleading. They are incomplete because food-price inflation is not happening in isolation. If it were, we would be seeing new BMWs popping up in farmyards all over Britain.

Cereal farmers are indeed doing well, but livestock farmers are not, and both share a problem common to farmers worldwide: farming needs fertiliser, and fertiliser needs energy, so farmers' input costs have also risen.

Livestock farmers are caught both ways: dearer fuel and feed for their animals. Rising food prices are directly related to an oil price of \$110 a barrel and the inflation in other energy costs, too. High demand for energy partly explains those prices. But so, too, does the reluctance of oil-producing countries to expand their output to meet demand.

The Opec cartel, spurred on by Venezuela and Iran, does not want its windfall to end, and neither does Russia.

Thus Hugo Chávez, supposedly a "Bolivarian Socialist" helping the world's poor, is contributing to a new bout of starvation. If we could get oil supply up and prices down, the food crisis would also fade.

The misleading element of the explanation is the attribution of the boom in food prices to demand for meat in China and India. It is true that, as those countries become more affluent, they are eating more meat. But this is a gradual process.

The immediate issue is that both are suffering from faster inflation, caused by a credit boom. In China, in particular, that credit boom is a result of its efforts to keep its currency artificially cheap. If that policy were to change - as it must, eventually - with a crackdown on domestic inflation, that demand-growth for meat would fade.

In the longer term, it is the self-inflicted wounds that we should be addressing. The surge of subsidies for biofuels, which has persuaded many farmers to switch crops, may prove short-lived, but subsidy schemes tend to be difficult to kill off once in place.

The rational approach would be to abandon trade barriers against the cheaper and less-polluting sources of ethanol in Brazil and elsewhere. But rationality and farming policy rarely go together.

That point can be multiplied a thousand times when it comes to attitudes in Europe to food technology. Every boost in farm productivity has come thanks to technology - from better fertilisers and pesticides to the high-yield rice varieties of India's "green revolution" in the 1960s.

The past decade and a half of scientific discovery has opened up a vista of even greater improvements, yet our reaction has been to reject them all. I refer to genetic science and the ability to modify a plant to make it resistant to pests, to need less fertiliser, as well as many more innovations.

Livestock farmers are caught both ways: dearer fuel and dearer feed.

It is sensible to be cautious about science when it comes to our food. But we have rejected GM foods almost entirely. That rejection has been shared with the European Union, but it cannot be blamed solely on the EU: scares about "Frankenfoods" and the antics of Lord Melchett and Greenpeace are just as responsible.

Europe's unwillingness to accept even a trace of GM products in imported feedstocks forces other countries' farmers to steer clear too. And since the EU is one of the wealthiest regions on the planet, our rejection has set back progress in GM research and development hugely.

This has to change, and urgently. The evidence against genetic modification is as weak as can be. The longer we deny ourselves this technological way to increase food output and reduce the use of fertiliser, the longer the current imbalance between food supply and demand will last.

The era of cheap food does not have to be over. We have it within our power to bring it back. ■



Ultimate Food & Beverage Industry Insert Bearings and Thermoplastic Housings





NBR - AISI 440C Stainless Steel Bearings with Triple Lip Sealing, factory pre-packed with FDA approved Grease.



Fully Stainless Steel Bearings & White Thermoplastic Housings corrosion and rust proof characteristics and the ability to withstand harsh conditions while still maintaining the preciseness of standard insert bearings.

Ultimate Triple Lip Sealing on the Insert Bearing.





Housings have stainless steel bolt hole inserts.

Open and Closed covers available for maximum protection.

Endorsed by HACCP Australia as food safe and appropriate for use in food production and handling areas. Endorsement Certificate # PE-520-BSC-01.

STATE OFFICE PHONE NOS:

NSW (02) 9824 2100 QLD (07) 3866 8333 VIC (03) 9560 3222 TAS (03) 6272 4344 SA (08) 8349 8388 WA (08) 9337 3000 For more details, please visit our website at: www.bsc.com.au

Motion Technology

BEARING & POWER TRANSMISSION SOLUTIONS



THE COMPLIANCE CHALLENGE



All businesses rely on their systems to ensure that everything is done the right way. But unlike other retailers, for anyone in the food industry and the high-profile franchise food chain sector in particular, the consequence of non-compliance with the system far exceeds the consequences in any other area.

While a defective product in a clothing store, or a new car with chipped paintwork, may upset the individual consumer, its not going to end up on the front page. But an outbreak of food poisoning or the even the suggestion of it as being likely can make national headlines for days.

Your Retail Face

Your business depends on creating a consistent customer experience, and the success of your brand relies on delivering what it promises to the customers every time. In the food industry, the reputation id built on the product. The customer expectations often exclude food safety as it seen as a 'given' almost a smuch as a sfe building and utilities. Your customers rely on you to provide food products free from contamination and to the standard you promise every time. A failure to deliver in this area introduces doubt in to what was a given. Brand value and reputation come under huge threat. and that is before the operator faces the legal consequences.

The cost of an incident far exceeds the custom lost to the individual operator.

It's a major challenge for a franchiser to manage the brand and to ensure that the quality and safety of their products. For nonfranchised businesses, managing the locations and ensuring that store management is keeping up standards is just as crucial. Franchisees buy into a brand and expect an appreciating asset... They need to know their investment in the brand is well protected by the custodians. Reducing standards or rogue operators are always a threat

The Brand

Franchisees buy into a brand and expect that their investment will be protected. They don't want a few free-spirited franchisees doing things their own way, and undermining the brand's reputation for food safety. They expect the franchiser to have an effective compliance program to make sure that 'rogue' operators do not devalue the brand.

The cost of an incident far exceeds the custom lost to the individual operator. The brand itself suffers – along with the fortunes of the franchiser, and the other franchisees that do the right thing. They are newsworthy events, and the media makes sure that any lapse is well publicised. This has a major effect on customer loyalty.

Franchisors

The brand is the franchisee's main asset. It's what customers recognize and why franchisees buy into the system. Protecting the brand with a compliance program is protecting their asset and ensuring that it keeps its value. It is important for franchisees to know that they are in a system that insists on compliance across the board. Management and protection of the brand is an obligation the franchiser has to all franchisees in the system. The franchise owners need to know that their investment in the brand is being protected and that there is an ongoing compliance program to ensure that its value is being kept up.

From Business to Franchise

Turning a successful business into a successful franchise depends on the ability to duplicate operations, and to create the consistent customer experience. Businesses turn their years of experience into systems that enable others to replicate their operations, giving the franchisees the best chance of being successful.

The Honeymoon

The franchisee comes on board, with high hopes, energy and enthusiasm. Everyone works hard to get set up and ready for business. The training is done, the fit out complete, the staff hired. The Operations Manual is there, full of information about how things should be done. The big opening, all goes well, and it settles down to business as usual.

The intensive support is wound down and the franchisee flies solo. The flap is over, and so everything will go smoothly from now on. Its just business as usual.

Now we are married....

The area manager makes regular visits, and at first things seem to be going well. There are a few things that are done a bit differently, but the franchisee is happy and reports that business is going well.

A few more months and things are not quite as rosy. There were problems with some of the suppliers, and so they have switched to local ones. The product isn't quite as good, but at least it is delivered on time. Staff are a bit thin on the ground; the owner explains that with sales being a bit down they can't afford the staffing levels in the manual. And they have had to cut down on the product range a bit – just some of less popular lines.

A few more months, and there are real problems. The ways of operating have become even more different to the standards, and are now entrenched. It doesn't look a lot like the franchise should. Sales are down, and the franchisee is not happy.

You've had some rumblings from other franchisees who feel that their business is suffering through association with a poor operator. They have laid out a lot of money, They keep up the brand standards, why should someone else devalue their business? Something needs to be done – but how to start?



Lets make it work.

In hindsight, of course, it is easy to see that it was best not to let the situation develop. But how could it have been avoided?

The area manager visits have a dual role: support and assistance for the franchisee or manager, but also ensuring that the operations and standards are in line with the brand. The roles of 'mentor / business coach' and 'inspector' must be combined to ensure maximum effectiveness and help.

Objectifying the role of inspector helps make the duality of the situation more acceptable for the area manager and the franchisee. By having a formalized process to check compliance, the area manager can make the audit / inspection objective, simply a standard process that has to be done. He is then free to mentor and coach the franchisee on a more individual basis. CONTINUED ON PAGE 12



Pink is the leading hygiene solutions brand you can depend on to deliver comprehensive, customised service.

We can help your business with:

- Sanitary Disposal
- Nappy Disposal
- Infant Changing Tables
- WC & Urinal Sanitisers
- Air Fresheners
- Water Saving Urinal Technology
- Soap Dispensers
- Hand Dryers
- Medical Waste, Sharps
 & Syringe Disposal
- Cigarette Disposal



Pink Hygiene Solutions Phone 1300 73 1234 www.pinkhygiene.com.au



Growth

Franchises start as successful businesses where it is possible for a small team to know everything about the business. Expanding through franchising is based on developing systems, and checking compliance with those systems. Around 10 stores is the crunch point.

Until then it's easy to keep an eye on the individual franchisees and know their operations. But as the franchise expands to 8 or more stores it becomes unmanageable. One area manager is spread too thinly and area mangers do not necessarily have all the food technology skills to handle the risks presented Much of the time is spent on the road, seeing franchisees, solving problems, and gathering lots of data. But what happens to the information? When is it used? When is it analysed to see how to make things better?

At this point paper-based systems start to break down. Even spreadsheets and on line reports don't help. There is a lot of data, a lot of time and effort is spent collecting it, but it's just not usable. And if the data doesn't help, what is the point of collecting it? Putting on more area managers simply adds to the problem: more data but less useful information.

How to automate

Having a computer system to automate the organisation and analysis of data is the solution. But at this stage of expansion many franchises don't wish to invest in expensive systems, equipment and IT staff.

Luckily, broadband has made 'Software as a Service' (SaaS) viable. With SaaS you have access over the Internet to systems

running on servers managed in professional data centres.

This means no software purchase or installation of software is needed. Business users simply login to their website and use the system whenever and wherever they want.

But as the franchise expands to 8 or more stores, it becomes unmanageable.

Using a web-based system to manage a compliance program eliminates the need to spend time choosing and investing in a computer system, and can be fully operational in a few weeks rather than months or years.

Compliance Systems

Shadow QC (Quality Compliance) is a web-based system developed by Shadow Organisation.

John Brooker, a director of Shadow Organisation, said 'We talked to lots of people in franchising, and we realized that they were having major compliance problems. People were stretched trying to oversee more and more locations as they expanded. They needed to automate, and we realized that the system we had developed to manage our own business of shadow shopping was exactly the system the franchises needed to manage compliance.' Ian Winn, General Manager Operations at Sumo Salad says





'We have been using Shadow QC to manage our compliance program. We have found it robust and flexible, and it adds significant value. It simplifies the process of gathering data on franchise performance, and the data is available for everyone to review, including franchisees. It provides consistent reporting across the system which is vital for benchmarking performance.'

Ease of Use

John Brooker explained: 'The ease of use of Shadow QC and its ability to run on handheld devices make it ideal for food standards auditing. It presents your standards and you simply tick the box to indicate if they are met. You also have the ability to schedule actions and set priorities.'

lan Winn continued 'The Blackberry option is ideal for us as it overcomes the problems of paper based systems that are too cumbersome and fraught with data collection issues. Shadow QC allows us to analyse the business across all functions, providing insight into functional issues which may have a significant impact on overall performance.'

HACCP Australia is now utilising the Shadow QC system in their food safety auditing of one of Australia's largest multi-outlet food franchise businesses. Says Clive Withinshaw, a director of HACCP Australia, "We can now gather and manage technical and report data from individual branches quickly and efficiently. This gives our technologists more time to assist store management in improving their performance in operating the food safety systems. Importantly, we are also able to interpret data and trends based on stores, regions, systems, issues or products. Store comparisons and measurements are also very easily handled, allowing the company to recognise many threats before their manifestation as much more serious issues with brand and economic consequences".

Adding Value

When selecting a web-based system it is important to make sure that it adds value to the brand. Having it branded as your own system, so that it appears as part of your own website or Intranet, increases the support services offered to franchisees. Staff and franchisees can move seamlessly between your website and the compliance system with everything branded in the franchise corporate logos and colours.

John Brooker explained: 'Franchisees and staff access Shadow QC through a link on their corporate website or Intranet. When they login, Shadow QC recognizes their sign on and picks up the appropriate 'skin' (the web colours and graphics). Users are not aware that they are leaving their website and coming onto ours because the system looks and feels the same.'

Software as a service means that the hosting and management are provided by the vendor. No software or equipment need be bought by the franchise. All that you need is a connection to the Internet.

The top 10%

Within any business there are star performers and there are problems – operators who don't comply with the brand standards. It's hard to communicate the value of compliance if you can't show that it actually makes a difference. Compliance programs can be linked to results from financial systems, so that links between compliance and performance can be demonstrated.

'Shadow QC can take a data feed from any other system, and



display and analyse that information along with your compliance data. For example, if you wanted to compare stores with the top 10% of sales with the bottom 10% and see what the factors make a difference then that's easy, ' said John Brooker. 'This will benefit business and franchise owners because they will know where to put the effort in to have maximum effect.'

Mutual Benefit

Shadow QC complements your HACCP audit program, by ensuring that your food handling operations are monitored on a day-to-day basis and that any problems are identified and can be acted upon before it damages your business.

The obvious consequences of a compliance failure are penalties and possibly litigation, but the less obvious cost is the loss of customer loyalty and brand value. Your protection is a thorough and systematic approach to food safety, and a compliance system that ensures that it is enforced.

John Brooker is the Managing Director of Shadow Organisation based in Chatswood NSW 02 8448 2090 www.shadowgc.com





Pest control has always been – and will continue to be - a difficult task in the food industry and this is particularly true in Australia, blessed as we are with an abundance of undesirable creatures and ideal conditions for their survival!

Our food industry has very high standards, with most significant food handlers and processors having HACCP based food safety programmes in place and demanding the same of their food and ingredient suppliers. Pest control is an important sub section of all HACCP programmes and, like all HACCP components, has to be managed effectively and safely.

On a continent the size of Australia, with its variety of pests, climate and population density, pest control is not something that can be addressed with a simple formula. Common symptoms might require radically different solutions that have to be applied in strict adherence to food safety and toxicity standards demanded by government and HACCP.

Almost all food businesses sub-contract this service and therefore entrust a third party with an important component of their HACCP programme. While it is sensible to utilise the skills of expert operators in such matters, the overriding responsibility for pest control and it's food safe application rests with the facility's managers. While the operation can be sub-contracted, the same cannot be said of the responsibility that food companies have to the consumers. This being the case, the selection of the right pest controller for a food business is an important decision. In relying on the advice and actions of the contractors, facility managers need assurance that such advice and service is appropriate to the food industry, and does not compromise the HACCP programme in any way

In many parts of the country, the pest control industry is very competitive. In this environment, price is often a driver and, from time to time, the quality of advice, service and training get less than the deserved level of consideration when it comes to contract award.

THE SELECTION

First and foremost, the pest controller must have experience of facilities that operate a HACCP programme. The contractor must

be able to demonstrate expertise in the task, food safety and documentation.

The contractor should have Standard Operating Procedures (SOPs) that address HACCP requirements, food safety training as well as all the documentation that a HACCP programme demands. These forms should complement the HACCP programme of the premises. It might be necessary for the contractor to use the documentation of the food business. This should not present a problem to a qualified and experienced contractor.

Pest Controllers carrying the HACCP Australia Certification Mark are fully equipped to meet the needs of premises operating in accordance with a HACCP based food safety programme.

HACCP Australia endorses a number of pest control companies that provide food safe and HACCP compliance services to the food and beverage industry. In order to receive that certification and endorsement, pest controllers are required to meet a number of standards that have been specifically developed by HACCP Australia. All certfied pest control companies also undergo a full and regular audit process.

The HACCP Australia food safety standard for pest controllers has recently been revised. The standards now require conformance in the following key areas of food safety.

- Chemical Handling and Treatment,
- Site Maps and Monitoring
- Site Specifications
- Pest Sighting and Monitoring
- Service Reports, Recommendations and Housekeeping
- Equipment and Materials
- Good Hygiene Practices and Good Manufacturing Practices
- Training both in pest control and food safety
- Licences and Insurances.

The recent review has seen the standards lifted in certain key areas in order to meet industry expectations and 'World's Best Practice'

This process gives assurance to the industry as to the appropriateness of a pest control organisation. However, there are other courses of action that should be taken. References from

other food companies and, of course referral to your food safety advisor consultants or technologists are other sensible checks.

Materials and chemicals are also important considerations. Pest controllers must use food safe devices and baits. This is especially important in food production zones.

Once satisfied that a potential contractor can comply and really understands the business and food safety – only then should one look at the price!

The pest control industry also has several professional bodies that can act as points of reference for a contractor. Checking registration and the membership criteria might well be of benefit. They can also give good, independent advice as to frequency of routine services in given situations. The Australian Environmental Pest Managers' Association is aware of the specialist needs of the industry and has issued Guidelines and a Code of Practice for Pest Management Professionals working in the Food Industry.

The following pest control companies have been endorsed by HACCP Australia. Organisations carrying HACCP Australia's certification mark have all been assessed in the above areas and found to be compliant with the needs of premises operating in accordance with a HACCP based food safety programme. All such service providers are audited regularly both in terms of internal processes and on-site service delivery in food premises.

ENDORSED PEST CONTROLLERS:

RENTOKIL: Victoria, Tasmania, NSW, Queensland, SA and WA

 $\mbox{\bf ARRESTAPEST}$: Metro and Regional Queensland

CPM: Sydney and Regional NSW

TRAPS PEST CONTROL: Metro and Regional Victoria

CORPORATE PEST MANAGEMENT: Metro and Regional NSW

PESTAWAY: Metro and Regional Victoria

STATEWIDE PEST CONTROL: Metro and Regional Victoria **GOODE PEST CONTROL**: Metro and Regional Queensland

SCIENTIFIC PEST MANAGEMENT: Regional Victoria, SE Queensland,

Metro Sydney NSW and Metro Perth WA

HACCP PEST MANAGEMENT: Metro and Regional NSW

AEROBEAM: Sydney, NSW **STOP CREEP**: Sydney NSW

ANT EATER: Metro Sydney and Regional NSW

ENDORSED PEST CONTROL MATERIAL SUPPLIERS:

BASF AUSTRALIA LTD: Baits and poisons

BELL LABORATORIES INC: Baits, traps and poisons **EKO SOLUTIONS**: Ecomille rodent eradication equipment **INSECT-O-MATIC**: Insect eradication systems and 'cryonite' **PEST FREE AUSTRALIA PTY LTD**: Electronic elimination devices

STARKEY PRODUCTS PTY LTD: Insect control devices

WEBCOT PTY LTD:

Brandenburg flying insect control **WEEPA PRODUCTS PTY LTD**: Weep hole protection devices

(Full contact details can be found on page 31 of this bulletin)

If you need any advice from a food technologist in regard to HACCP pest management protocols, please feel free to call our office on:

02 9956 6911.





SANITARY finish resists mould, mildew and bacterial growth
TOUGH high impact strength
DURABLE chemical and stain resistance
RUST FREE ideal for refurbishment over rusty steel panels





the knowledge to produce solutions





Glasbord with Surfaseal has been specifically designed for interior wall and ceiling panel applications where cleanability, sanitation and abuse resistance are paramount.

Glasbord with Surfaseal – the wall and ceiling frp panel that gives the confidence of knowing that it will stand up under abuse time and time again!

T: 1800 051 100 E: sales@dctech.com.au

V: www.dctech.com.au

Fast and Easy Electronic Measurement of Cooking Oil Quality



Frozen food is "in"

Deep-frying, i.e. cooking food in hot fat, is a popular form of food processing which more than likely has to do with the fact that the food industry offers quality, high standard products which can be frozen and easily cooked in this way, e.g. french fries, fish, meat products coated with breadcrumbs, some vegetarian products. In addition to the long shelf life of these products (frozen goods), they are quickly and hygienically prepared making them suitable for a varied menu.

How to deep-fry

In the deep-frying process, the water contained in the product is used for cooking. The water is vaporised due to the hot oil (typically 170 to 175°C) but is simultaneously bonded by the oil so that it cannot immediately escape to the ambient air. In this way, a type of "vapour baking" takes place. However, the cooking oil used has to be sufficiently fresh, otherwise the deep-fried food would have an unsightly dark brown colouration and substances could be released which are detrimental to flavour and can potentially impact on the health of the consumer. Rapeseed, peanut, or coconut oils, either pure or in mixtures are used as classical cooking substances.

In addition to racidness through oxidation the quality of the oil is influenced by the effect of heat and by the characteristics of the food being deep-fried in it. This is referred to as the thermal oxidative modification of the cooking oil. Scientific research has shown that the so-called polar components (TPM = Total Polar Materials) are a good indicator of the thermal oxidative load of cooking oil. They are also an indication of how "used" the cooking oil is. A high level of polar components indicates that the cooking oil has been used frequently.

Measuring methods

Classically, the polar components are measured using column chromatography. In many countries, it is the reference method used by government research institutes or food laboratories. The different components of cooking oil are separated in a column (pipe shaped glass body) according to the retention

principle. However, the measurement of polar components according to this method is usually limited to laboratories with trained personnel on account of the complexity involved and the experimental set-up. This method is unsuitable for use in industrial kitchens or restaurants. However, polar components can also be measured using a physical parameter: the dialectical constant.

Increasing polar components in cooking oil has the effect of changing the dielectric constant because the "polar components" are aligned in an electrical alternating field. The change in the dielectric constant is measured on a capacitive basis using a special sensor and is converted to the required percentage TPM display variable. In this way, fast electronic measurement of this reading is possible.

Electronic testo 265 oil tester

testo AG has developed a compact, electronic hand-held instrument for daily use. The main part of the instrument is a sensor developed by Testo, which can be immersed directly in the hot cooking oil. After approximately 25 to 30 seconds, the instrument shows the number of polar components directly in the display. The current cooking oil temperature is shown in a second display line. 2 limits, which trigger a light emitting diode whose colours depend on the oil quality, can be set in the



instrument making operation easy for all kitchen staff. If this light emitting diode is green, the cooking oil is fresh; a yellow display indicates that the oil is slightly used; a red display indicates that the oil should be changed soon. Both limit values



(threshold values from green to yellow or yellow to red) can be defined by the user. In this way, anyone can measure cooking oil quality quickly and efficiently.

The testo 265 does not need to be adapted to the cooking oil used, therefore you can use any standard oils and fats. The tester is easy to clean and can be held under running water due to the "TopSafe" protective case. Since the "TopSafe" is resistant to heat, it can even be cleaned in the dishwasher. This is a very useful hygiene feature.

The testo 265 can measure cooking oils in a range from +40 to +200°C. The device has a temperature display which negates the need for the use of a separate thermometer.

For further information on the testo 265 please contact our dedicated team at testo Pty Ltd on (03) 8761 6108 or at info@testo.com.au. ■







A Range of personal hygiene products specifically developed for food handling and manufacturing environments. The Range is designed to:

- · Raise the level of employee compliance with skin hygiene protocols
- Improve skin condition
- Reduce the potential for cross-contamination to safe-levels.

What's more, all products in the Florafree range offer excellent cost-in-use, exceptional performance and are backed-up by an unrivalled package of extensive testing, support, awareness and training manuals.

For more information on how to become part of the Horafree Experience contact: Deb Australia Tolfree 1800 090 330 or visit www.deb.com.au



FOOD SAFE STORAGE AND SERVING SOLUTIONS





- FOOD GRADE COLOUR CODED CRATES Colour coding reduces the risk of cross contamination in your catering areas. 13 to 68 litre available with lids.
- ☐ HIGH TEMPERATURE PLATE COVERS
 Assorted colours, clear salad covers in two sizes.
- HIGH TEMPERATURE MUGS, BOWLS & LIDS Assorted colours, bowls in two sizes, lids flat or dome.
- HI TEMP HEAVY DUTY DIVIDER TRAY Assorted colours.
- COLD DRINK STACKABLE TUMBLER Clear colour two sizes reusable or disposable lids. Also available Sporks and Gelato Spoons in assorted colours.

Aaclaim Quality Sales have been manufacturers and suppliers of catering and commerical cleaning products reusable and disposable for hospitals, age care facilities and the hospitablity industry for over 25 years.



T:02 9525 1049 F:02 9525 9114 E:info@aaclaim.com.au www.aaclaim.com.au



Temperature Monitoring in the Cold Chain

We all know the importance of maintaining food safety and quality as it travels though the supply chain from the farm all the way to the plate.

Managing temperature within the supply chain is necessary in terms of both food safety and quality.

The cold chain is a sequence of operations in the production, distribution, storage and retailing of chilled and frozen foods. It extends from raw material supply, through production, to the presentation of product for final consumption, including the handover of foods between different links in the cold chain, for example from producer to delivery truck, from delivery truck to retailer.

Unfortunately, if there is a failure to maintain correct temperatures in the cold chain, the food manufacturer may be faced with the necessity of recalling products that have had their safety or quality compromised.

Refrigerated storage is a very widely practiced method of controlling microbial growth in foods. Storing foods at a temperature of less than 5°C will slow the growth of many micro organisms sufficiently to extend the shelf life by days or even weeks.

For different products, there will be an optimal temperature for storage, as well a maximum time allowed for storage. The time/ temperature requirements are determined by the potential for contamination with and survival of pathogenic organisms and the potential for subsequent growth and/or toxin production within the food.

As well as controlling microbial growth, storage at low temperatures also helps to minimize changes to the biochemical and physical properties of foods. For example, Vitamin C losses in vegetables can be up to 50% per day at ambient temperatures, but may be reduced to 10% per day when stored at 2°C.

The Australian Food Standards Code requires all potentially hazardous foods to be kept under temperature control.

Temperature control generally means maintaining food at a temperature of 5°C or below or 60°C or above. The Food and Agriculture Organization of the United Nations' Agreement on the International Carriage of Perishable Foodstuffs Act (1987) specifies maximum allowable temperatures during shipping of meats (7°C); meat products, butter (6°C); poultry, milk and dairy (4°C); offal (3°C) and fish (2°C). Monitoring of these foods during transport and storage is important to ensure that these regulatory requirements are met.

Monitoring devices can now communicate temperature and global positioning data in real time using radio frequency identification.

There are a number of different methods for monitoring temperatures in the cold chain, including refrigeration system control and feedback devices, simple temperature gauges, handheld devices such as probes or infrared surface temperature gauges, data loggers and time temperature indicators (TTIs) such as labels or markers that change colour when exposed to a certain temperature. There are even real-time temperature monitoring devices which communicate temperature and global positioning data in real time using radio frequency identification

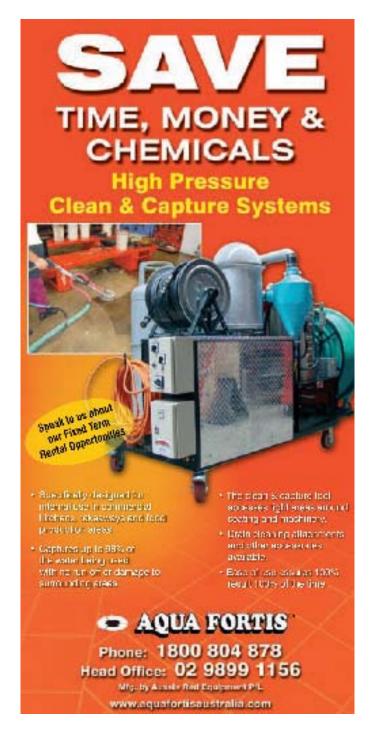
Small and inexpensive data loggers such as these are also ideal for use in the export of fresh seafood to overseas.

tags. These are currently used during international transport of pharmaceutical products.

When choosing a temperature monitoring device for use in cold chain applications, there are a number of guestions to ask: Do we need to measure ambient temperatures and packaging temperatures as well as product temperatures? What is the required temperature range for the instrument? Does the system need to provide a permanent record? Do we need to measure time/temperature combination and if so what frequency of sampling is required? What is the required accuracy? What is the required response time? If electronic, is the battery life suitable? Is water-proofing required? Can the data be imported into commercial data analysis software? Does the system allow ease of calibration? Does the monitoring device need to be re-useable? One food business that uses data loggers to monitor product temperature is Cadbury Schweppes. Their confectionery is transported at the temperature of 15 – 17°C to maintain optimum product quality. The data logger that they use is the 3M TL20. It is attached to a pallet of product before it leaves the Cadbury Schweppes National Distribution Centre in Melbourne, destined for a large customer such as a grocery chain. The receiver is asked to retrieve the data logger and return it to Cadbury Schweppes in a pre-paid postage bag.



After the data is retrieved, the devices are re-programmed and used again. Michael Ratcliffe, National Distribution Manager for confectionery, reports that the data loggers have been an effective method of monitoring the performance of transport



companies, which is particularly important during the summer months for this type of product.

Small and inexpensive data loggers such as these are also ideal for use in the export of fresh seafood to overseas markets. They allow the seafood buyer in the country of destination to access time/temperature data for the products that they have purchased. This gives assurance of quality and conformance to purchase agreements. The **3M TL20** is an economic and efficient data logger. It is extremely cost effective - even if used only once! However, it is re-programmable and can be re-used many times. Its small design, combined with its bright blue colour, make it versatile and easy to locate. There is a 'check' button with indicator light which allows the receiver to easily check for temperature abuse without having to download any data. Other features which make this data logger ideal for exporting include the ability to store shipping information, dual time zone reporting and multiple language options.



In this section are a few food safety and food related news snippets from around the world. Keep up to date with trivia as well as news!

From the UK

Brain Food Manufacturers get accreditation

Croda, the UK Ingredients manufacturer has become one of the first food suppliers to achieve accreditation status with the UK charity 'Food for the Brain Foundation'. Their new labelling scheme recognises products with cognitive benefits. While there are a number of international schemes that address the relationship between various food types and the efficient functioning of the brain, this is the first scheme that links this at the retail and supply level.



The particular products that have won this accreditation for Croda are in their Incromega omega — 3 range. Other accreditations were issued to specialist beverage manufacturer, 'CherryActive' for use of the mark on their 'Montmorency' Cherry Juice Concentrates and Nairn, a Scottish oat biscuit manufacturer.

Patrick Holford, a director of 'Food for the Brain said "Food for the Brain's aim is to promote the link between learning, behaviour, mental health and nutrition," it said. "The Accreditation process has been set up to recognise products that Food for the Brain Foundation certifies as beneficial for brain function."

From China

Beijing goes for the gold on food safety

By John Bagratuni, dpa

Dust may have coloured the hazy Beijing sky yellow, but not the tiniest particle of it is tolerated when it comes to making sure that all Olympic food is safe to eat.

"No dust," insisted one of the lab members at the ultramodern 'Beijing Municipal Centre for Food Safety Monitoring' during a recent media tour, fearing for the institution's accurate results.

Confronted with reports that the U.S. delegation was bringing at least part of its own food to the August 8-24 Beijing Olympics, local officials sent a clear message that a) Chinese food is safe and b) local laws apply in this country.



"We do not encourage athletes to bring their own food, but if they do so, it has to be facilitated according to our rules and regulations," the monitoring centre's spokeswoman Tang Yunhua said.

She said anyone who chose to bring their own food to the Games would have to make sure its legal to import and that it would be under the same scrutiny as local products.

Tang had earlier explained at length that the dim sums, ducks and other local specialities were safe to eat for the more than 10,000 athletes in the Olympic village, but also for the expected 500,000 Olympic visitors in the city and its residents. "It is safe to eat in the streets," said Tang.

Over the past years some food in China was found tainted with insecticides and illegal veterinary drugs, and meat standards were considered by many to bellower than in other countries.



U.S. Olympic authorities became cautious when a caterer for the delegation found a chicken in a supermarket with high steroid levels. Eating this chicken could have caused a positive doping test at the Olympics under the strict reliability programme from the World Anti-Doping Agency - under which every athlete is responsible for everything he or she eats and drinks.

Tang says that food safety, not only at the Olympics but in general, has been top of the agenda for the municipal government in the past six years. Every food producer, every piece of livestock, every number plate of trucks transporting food-related items, every restaurant menu and amount of food consumed there every night is known to local authorities.



From Australia

Australians positive about safety of our food supply

From FSANZ

Almost 65% of Australians felt that food safety was the same or had improved during the previous year, according to the Food Standards Australia New Zealand (FSANZ) Consumer Attitude Survey launched in May.

When launching the survey, FSANZ's Chief Executive Officer, Steve McCutcheon, said that food plays a vital role in our lives and it is important for consumers to feel confident in how it is regulated

"The survey, commissioned by Food Standards Australia New Zealand, gives a good insight into consumer confidence in the Australian and New Zealand food supply as well as food safety and labelling knowledge," Mr. McCutcheon said. "It shows that Australian consumers have positive levels of confidence in the safety of the food supply, with 64.5% saying they felt food safety generally was about the same or had improved during the previous year ago. Food safety concerns ranked twelfth after such issues as drought, household finances, the environment and healthy eating.

"Recognition of, and confidence levels in, those agencies regulating and monitoring the food supply were also high".

"Consumer need for nutritional information on labels and their belief in their ability to make an informed decision about the product from the label were both high. Trust of food labels has room to move.

"The most commonly referred-to label information was the best before/ use by date (73.1%), the amount of fat (61.8%), country of origin (59.1%) and the amount of sugar (56.5%).

The survey reveals that about a third of people believed they had suffered food poisoning in the previous year. "The majority of these people didn't report their illness and only about a tenth thought it had something to do with home cooking," Mr. McCutcheon said.

"Food poisoning such as Salmonella and E. Coli, imported foods and food hygiene were the three key concerns regarding general food issues - Consumer confidence in a safe food supply and their ability to make an informed choice about the food they buy are FSANZ's key priorities," Mr. McCutcheon said.

A copy of The Consumer Attitude Survey can be obtained from the FSANZ website. www.foodstandards.gov.au

From India

The ultimate summit in bottled water is conquered!

The Indian, industrial giant 'Tata Group' that owns diverse and prestigious brands such as the UK's Tetleys Tea , Jaguar and Land Rover has taken 'the high ground' in the battle for pure mountain water with the launch of "Mount Everest Mineral Water." According to their



recent launch information, the water is untouched and unprocessed, and with a 'unique' taste acquired over 20 years of percolation, as it makes its way to the underground aquifer located in the Shivalik range of the Himalayas. Creative label designers from other mountain water bottlers will have to climb to another level to compete with that!





UNDER

PRESSURE to keep things clean?







Cleaning machinery, floors and equipment is an important part of your business. Take the pressure off by turning the pressure up! For great service and advice, terrific value for money, and the best high-pressure cleaning solutions in Australia, think Steamaster.

From food manufacturing to abattoirs, to processing plants, catering companies, wholesale bakeries, and beverage factories, Steamaster pressure cleaners are your first choice for quality.

Find out more at

www.steamaster.com.au or contact us on **02 9796 3433**









✓ odourless

✓ non-irritant

Made in Australia

Made of Pure Water and Negative Flectron lons

New technology from Japan, popular in the USA Available in Australia for the first time

We can do something about our environment. Clean your world with AQUA MAGIC

Aqua Magic Contains

No Chemicals, No Surfactants, No Alechol, No Fruit oils! Just 100% Electrolyzed water.

- ✓ Real Eco-cleaner
 ✓ No Residue
- ✓ No Soap Bubbles
 ✓ No Pollution

Spray & wipe or guick rinsing helps conserve water. Excellent product for waterless car wash

A Truly Different Cleaner

Removes stains and cleans as well as conventional cleaners, leaves no residue. Totally safe and gentle

▼ Disinfects & Deodorises ▼ Prevents oxidation

Non-toxic, ideal for food preparation areas. Safe for paby's, gets and chemically sensitive people

Retail: The Water Shop 425 Miller Street Cammeray NSW 2082 | 02 99565677

Distributor and Retailers Wanted

WONDER TECH - 7/410 Pittwater Road North Manly Wholesale enquiries: Neo Kuroda M: 0418 621 829 Tel: 02 9453 4800 / E-mail: info@wonder-tech.com

www.wonder-tech.com





FACTERIA OF THE WEEK

Campylobacter is a common bacterial infection that causes abdominal pain and diarrhoea. In Australia and many other developed countries, it is the second most common form of food poisoning. Campylobacter gastroenteritis is a type of food poisoning caused by the bacteria Campylobacter jejuni and Campylobacter coli. known simply as Campylobacter. Sensitive population groups such as children and the elderly are more susceptible to Campylobacter infections and the symptoms are usually more serious although it can harm anyone regardless of age or fitness,

The most common symptoms of Campylobacter infection are diarrhoea (often very severe), fever, stomach cramps, nausea and vomiting.

The bacteria is found to have a long gestation period before the onset of illness. It is most commonly takes between two and five days before one becomes ill. This can sometimes make tracking and elimination of the cause quite difficult. Furthermore, the time span allows for significant intermediate spread of the disease.

Complications can include meningitis, urinary tract infections, and possibly reactive arthritis (rare and almost always short-term) and occasionally Guillain-Barre syndrome, an unusual type of paralysis. While most people who contract campylobacteriosis recover completely within 2 to 5 days, some Campylobacter infections can be fatal, resulting in a number of deaths each year.

Digestion is the by far the most common way of contracting infection. The Campylobacter bacteria are most commonly found in animals such as poultry, birds, cattle and household pets. Campylobacter bacteria are often present in uncooked meats, particularly poultry and a lack of adequate cooking is the most common reason for illness. Incorrect pastuerisation also presents a high risk as does cross contamination between cooked and uncooked meats.

Sufferers from Campylobacter infection have the bacteria in their faeces and this emphasises the need for the implementation of hygiene policies, especially hand washing, in food and beverage handling facilities. This is especially important as humans and animals can carry Campylobacter in their faeces without displaying any symptoms.

Campylobacter infection must be reported to a doctor immediately to ensure appropriate treatment and further advice in halting the spread of the disease.

Child care workers and health care workers with Campylobacter infection must not work until symptoms have stopped.

Remember food handlers who suffer this or any food bourne illness need a medical certificate prior to returning to work.



Fax: +61 3 9318 0851

Email: vet-ag@vet-ag.com.au

www.deflecta.com.hk



Enmin Electromechanical Motor Screener

FMS modhines offer high efficiency screening due to the screen deck being design to operate in the horizontal plane, enabling true aperture sizes The conveying process is accorate and controlled, whils) the design permits rapid change of screen panels without tools for cleaning.

Our new range envires the lowest root, "as idel very end accuracy of construction. However, if your recuirements are unique we'll custom design and manufacture to all if your needs and industry."

With over 25 years experience, we ofter support that's second to none.

Visit our welt site today to view our product range or give us a cell on 139 775

COLON E OUI P M E N T

Head Office 12 Kingslay Diose Townille VIC 8178 App. 15. Talk 2054 Schol 8088 on 1800 180 579 Fayn 2054 Schol 8268

www.enmin.com.au











The Agri-Food Industry Skills Council

The Agri-Food Industry represents the broad interests of all agri-food industry sectors through its 14 member board and five industry standing committees. The Agri-Food Industry Skills Council was established in May 2004 as an Industry Skills Council to provide accurate industry intelligence on current and future skill needs and training requirements. It is a private sector company with an industry-led board and whose funding is principally provided by the Australian Government through the Department of Education, Employment and Workplace Relations.

Have a look at their activity on:

http://www.agrifoodskills.net.au

Sea Food Services Australia

Fish around in this 'big pond'! – A good site to 'net' some interesting info on the industry. A lot of good data, details of standards and a good fish name service too. Really useful links will give you access to everything you might ever want to know about seafood.

http://www.seafoodservices.com.au/

FOOD PROCESSING - WF On line

Westwick Farrow, the publishers of "What's New in Food Technology" run this site. It has a very current 'News' section as well carrying promotional information on new products and services. The 'Tech Papers' section is a particularly useful reference site too. It does require registration for access to certain articles which is easy enough. Others are freely provided. Recommended.

http://www.foodprocessing.com.au/

YouTube

Entertainment, time wasting and keeping up with today's young are the most common reasons for whiling away time at this site. Why not try and give your visits some credence by extending the rationale to research, education and planning!! Type 'Food Safety', 'Food Poisoning' or just 'Food Horrors' in their search device and see where you go. All in the name of science! You can even hear the All Blacks account of their last meal before the '95 RWC final!





PROFESSIONAL HACCP CLEANING SERVICES



• FOOD & BEVERAGE INDUSTRIES (Production, Manufacturing, Commercial, Retail)

• HOSPITALITY INDUSTRIES

(Hotels, Restaurants, Clubs, Pubs)

MEDICAL SECTOR

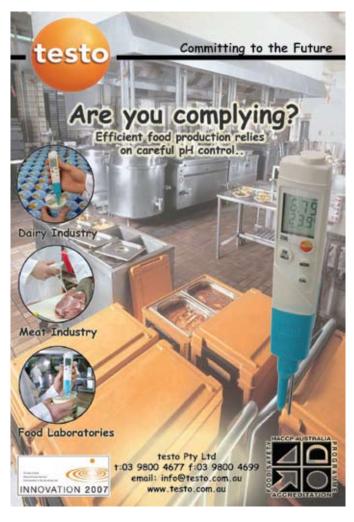
(Hospitals, Nursing Homes, Pharmaceutical)

• TRANSPORT & STORAGE INDUSTRIES

(Warehouse, Packing, Distribution)

Contact Serge for a free, no obligation assessment of your HACCP cleaning requirements.

Phone: **02 9993 0562** • Mobile: **0420 976 075** Email: serge@challengerservices.com.au



ESTABLISHED 1969 A DIVISION OF EIGHT AWAY FTY ITD ABN 18006 770 971

Australia's largest electric fly killers and insect trap manufacturers

FLY TRAP 80 PATENT PENDING



DECORE



SHATTERPROOF TUBES



Why take the risk with your reputation, your lood quality and your customers safety?



46 Achievement Way "Enterprise Park". Wangara Western Australia 6005 Telophono: 61/8/9302/2038

61.8 9302 2138 Facsimile: Email: Starkey@finet.net.au. www.starkey.finet.net.au Website:

DOOR SYSTEMS

A company of Albany International Corp.



Albany Door Systems manufacture a range of High Speed Rapid Roll Doors. These products efficiently control temperature, dust, noise, wind and improve productivity.

Sales and Service across Australia

Call toll free 1300 666 232

Are you protected



dry cracked skin

irritants

bacteria

ONE solution

protech hands

Working in Foodservice can be tough on your hands and skin. Protech hands provides a protective barrier allowing your skin to resist attack from harmful irritants, whilst restoring moisture levels and with an added layer of hygiene at the

Protech hands also protects more than just skin. It can help combat hygiene, bacterial contamination and skin problems at work in ONE.

Experience the benefits of protech hands:

- ✓ Proven Food Safe-does not affect the organoleptic quality of food.
- Ongoing antibacterial actionstops the spread of germs.
- ✓ Longlasting & Waterproof active for at least 3 hours, even after hand washing. Saves time and money.
- Skin Friendly the non greasy, moisturising properties of aloe vera & jojoba oil replenish and soothe. No lanolin, alcohol, colourings or added fragrance. Suitable for all skin types.
- ✓ Protection from irritants harsh substances (i.e. cleaning agents), foods (i.e. tomato/ flour) and even the alcohol and lanolin found in many moisturisers/cleansers are all known to dry out and irritate skin.
- Proactive no fuss solution prevention is better than cure. Minimise the risks of bacterial contamination and skin problems at work.

www.proarma.com 1300 889 280







Effective Risk Minimisation that's easy to Implement



Across the spectrum of hospitality/ accommodation today, it's imperative that hygiene and safety standards be maintained at their highest possible levels. As a professional working in this demanding environment, you'll already be aware that Chux Superwipes

are the leading cleaning cloths on the market. Chux offers superior durability, rinseability and absorbency.

But did you also know Chux has a HACCP Australia-approved Colour Coding system to minimise the risks of crosscontamination of workplace surfaces during cleaning?

Using each of the five different coloured Chux Superwipes exclusively for particular applications such as cleaning food preparation areas, toilets, washrooms and for general purpose use – helps maintain hygiene guidelines in accord with Hazard Analysis Critical Control Point methodology.

You can nominate which colours are to be used in which areas and Chux can even provide a wallchart listing these to familiarise staff with the system. So try the Chux Colour Coding System today and you'll wonder how you ever did without it.

Clorox Australia. We've got your needs covered.



HACCP Australia's evaluation of Chux Superwipes (PE-197-CA-01) concluded they satisfy all requirements in accordance with the standards of HACCP Australia Food Safety Accreditation Systems



NSW 02 9794 9500 · VIC 03 9840 0111 QLD 07 3397 7266 · SA 08 8373 2661 · WA 08 9322 5077

Peanut allergies gone within five years?



By Stephen Daniells of FoodQualityNews.com

Genetically modified plants or immunotherapy may eliminate allergies to peanut within five years, suggests a prominent scientist from Duke University.

The comments were made in the current issue of The Lancet. Peanuts can cause the most severe food allergies, affecting about three million US residents a year, and causing up to 150 deaths.

The news however may put the dampeners on the free-from food market that has been enjoying sales growth of over 300 per cent in the UK since 2000, according to market analyst Mintel.

In industrialised countries allergies have been rapidly increasing in children, for causes that are not entirely understood. One study showed that between 1997 and 2002, peanut allergies in children doubled in the United States.

But help may be just around the corner, according to Wesley Burks from Paediatric Allergy and Immunology at Duke University Medical Center. Scientists at various groups around the world are working on the development of novel immunotherapeutic strategies, which would alter the immune system's response to an allergen.

Various approached are under investigation, but they are based on the principle of curbing the immune response of so-called Th2 cells, or by inducing tolerance.

"These studies offer the possibility of at least raising the threshold of the amount of peanut that it would take to cause a life-threatening allergic reaction; whether these types of treatments are likely to cause eventual clinical tolerance to develop remains to be seen,"wrote Burks.

"It is likely that in the next 5 years there will be some type of immunotherapy available for peanut allergic individuals," he added.

The GM approach

Another approach that may yield results is the development of allergen-free peanut plants.

"An example would be to introduce anti-sense RNA copies of

the allergen gene into the peanut plant to suppress allergen gene expression," stated Dr. Burks. "Post-translational gene silencing by mRNA degradation is another approach being investigated."

"The difficulty with this and similar approaches is that several peanut proteins are involved in IgE binding.

"The process of altering enough of the peanut allergens to make a modified peanut that is less likely to cause an allergic reaction would probably render the new peanut no longer a peanut," he added

Despite offering a potentially life-saving solution for millions around the world, acceptance of GM peanuts is not guaranteed. The GM tag continues to be one of the biggest challenges for consumer acceptance, particularly in Europe and most notably in the LIK

All food allergies gone within a decade?

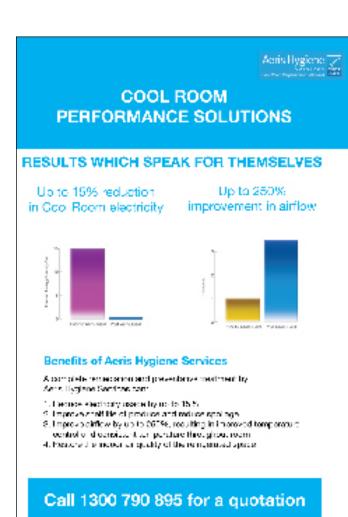
In 2006, Dutch Dutch researchers told the BA Festival of Science in England that food allergies could be consigned to the history books within a decade if the combination of biotechnology and vaccines work as planned.

Dr. Ronald van Ree from the University of Amsterdam told attendees in Norwich that the key finding of the research presented was: A clever combination of biotechnology (hypoallergenic recombinant allergens) and vaccine-development (novel adjuvants based on anti-inflammatory molecules from pathogens) [to] provide new tools to treat food allergy.

An estimated four per cent of adults and eight per cent of children in the 380m EU population suffer from food allergies, according to the European Federation of Allergy and Airways Diseases Patients' Associations.

Source: The Lancet 3 May 2008, Volume 371, Pages 1538-1546 "Peanut allergy"









DEMAND THE BEST







Contrac





Used Globally, Trusted Locally

For more information, please contact Bell's business manager in Australia: Melissa Cameron ■ magmeror@belllabs.com ■ tel: 0427 802 844



THE WORLD LEADER IN RODENT CONTROL TERCHNOLOGY

Modison, W. 53704 USA * www.bellcbs.com

"These products are food safe"



www.haccp.com.au

The HACCP Australia endorsement process supports organisations achieving food safety excellence in non-food products and services that are commonly used in the food industry. The HACCP endorsement is particularly aimed at those organisations that are required to supply 'food safe', 'compliant' or 'HACCP approved' products and services to their food safety conscious customers. This independent assessment and verification of fitness for purpose offers assurance to the buyer or user that HACCP food safety protocols will not be compromised in using such a product or service correctly and that such a product is 'fit for purpose' in the food industry.

Compliant or endorsed products are rigorously reviewed by HACCP Australia's food technologists and in their expert estimation are manufactured and designed to meet all the appropriate food safety standards. In performing

the assessment, they look for 'world's best' in terms of food safety features and characteristics. The food technologists undertaking these reviews all have extensive industry and manufacturing experience.

Only products that are assessed as meeting the criteria can carry the mark. Quite often, organisations are required to make modifications to the product, design, delivery, literature or recommendations in order to comply. This process is therefore particularly useful for products that are designed for many industrial applications.

The companies listed in this section carry a range of excellent and food safe products or services endorsed by HACCP Australia. Call on 02 9956 6911 for more details.

expert estimation are manufactured and designed to t			
CATERING EQUIPMENT (HEAVY)	SEMAK W AND P REEDY	Manufacturers of chicken rotisseries Suppliers of ovens and provers to the baking industry	03 9796 4583 02 9533 9522
CLEANING EQUIPMENT	AUSSIE RED EQUIPMENT GOLDSTEIN ESWOOD OATES CLEAN STEAMASTER AUSTRALIA PTY LTD	Aquafortis hot water high pressure clean and capture equip. Manufacturers of industrial dish and glass washers Full range of food grade cleaning equipment Hot and cold water pressure cleaners	1800 804 878 02 9604 7333 1800 791 099 02 9796 3433
CLEANING CHEMICALS	AVANTI CHEMICALS BIOTECH AUSTRALASIA PTY LTD DEB AUSTRALIA GREEN MOUNTAIN SOLUTIONS HYGIENESIS PASCOES WONDER TECH	Cleaning chemicals for food and agri. businesses Broad spectrum disinfectant Skin care and hand cleaning soaps for food handlers All purpose cleaning and disinfectant products Anti-bacterial hand sanitises Cleaning chemicals for the food industry High alkaline water for general cleaning	07 5549 3666 02 9603 4499 1800 090 330 07 5599 8410 07 3202 9457 08 9353 3900 0418 621 629
CLEANING AND MAINTENANCE SERVICES TO THE FOOD INDUSTRY	ACE FILTERS AERIS HYGIENE SERVICES PTY LTD BORG CLEANING CHALLENGER CLEANING SERVICES INTEGRATED PREMISES SERVICES P/L ISS HYGIENE SERVICES METROPOLITAN FILTERS OZ TANK PINK HYGIENE SOLUTIONS POWERTANK PTY LTD	Food grade cooking oil filters Specialist cool room and cool room motor cleaning services Specialist contract cleaning services for food premises Specialist contract cleaning services for food premises Specialist contract cleaning services for food premises Bathroom services for the food industry and premises Filters and filter services for range hoods and food facilities SS deep cleaning tanks and systems for pans and trays Bathroom services for the food industry and premises SS deep cleaning tanks and systems for pans and trays	1300 555 204 1300 790 895 03 9463 1300 02 9993 0562 02 9432 8000 02 8644 9704 1300 653 536 1300 66 88 66 1800 007 794 0411 441 441
CLEANING MATERIALS	3M CHEMPACK SUPPLIES CLOROX AUSTRALIA CONCEPT LABORATORIES PTY LTD DEB AUSTRALIA OATES CLEANING SABCO SUNNYWIPES PTY LTD	Scotchbrite™, cleaning chemicals, scourers and sponges Food grade bathroom paper and dispensers Chux™, Oso™ and Glad™ range of materials Suppliers of sanitising hand gel and sanitising wipes Disposable cleaning wipes Full range of kitchen cleaning materials Scourers, sponges, clothes and cleaning aids Disposable cleaning wipes for the food industry	136 136 02 9542 5822 02 9794 9500 07 5493 8433 1800 090 330 1800 791 099 02 9642 6411 03 5436 1100
CLEANING SANITATION SYSTEMS AND PRODUCTS	OZONE INDUSTRIES WONDER TECH	Ozone generator for sanitising High alkaline electrolysed water for general cleaning	02 9624 2466 0418 621 629
CLEANING SYSTEMS FOR CUTLERY AND UTENSILS	ICE CLEAN INDUSTRIES	Residual free dry ice cleaning	0403 044 162
FACILITY FIXTURES AND FIT OUT	ALBANY DOORS DMF INTERNATIONAL PTY LTD COLDSHIELD FLEXIBLE DOORS PHILIPS ELECTRONICS AUSTRALIA LTD THORN LIGHTING	Automatic rapid close doors Flexible PVC strip door/curtain material PVC flexible doors for food premises Food safe light fittings for food handling facilities Food safe lighting solutions for food handling facilities	1300 666 232 02 9636 5466 1800 462 233 02 9947 0000 1300 139 965
FLOORING, WALLS, AND MATTING	3M ALTRO SAFETY FLOORING BLUESCOPE STEEL DEFLECTA CRETE SEALS DYNAMIC COMPOSITE TECHNOLOGIES GENERAL MAT COMPANY (THE)	Specialist safety matting for food and beverage areas Specialist food premises flooring Colorbond® anti-bacterial coolroom panelling products (quote 2222) Anti-bacterial Flooring Product and Services Glassboard Coolroom and Food Transport Panelling Products Specialist safety matting for food and beverage areas	136 136 1800 673 441 1800 022 999 03 9318 9315 1800 051 100 1800 625 388
FOOD SERVICE EQUIPMENT AND UTENSILS	AACLAIM ADVANCED CARTS AUSTRALIA FOOD SERVICE EQUIPMENT (FSE) KENCAN LTD MONO & BEYOND P/L TOMKIN AUSTRALIA PTY LTD	Food service and food storage light equipment Automatic jug cleaning and sanitising system Juice dispensers and other buffet equipment Kee-seal™ disposable piping bags Food grade trays Providers of colour coded catering utensils	02 9525 1049 02 8868 8999 1800 673 153 07 3273 8111 02 9690 0900 02 9319 2993
FOREIGN BODY IDENTIFICATION	SMITH HEIMANN AUSTRALIA WJB ENGINEERING	X-ray inspection and foreign object detection equipment Magnetic separation technology and services	1800 559 729 1800 835 858
HAND SOAPS AND BARRIER CREAM	CONCEPT LABORATORIES DEB AUSTRALIA PROARMA	Food grade hand soaps Food grade hand soaps Antibacterial protection hand cream	07 5493 8433 1800 090 330 1300 889 280
ICE MACHINES	ICE MASTER SYSTEMS PTY LTD HOSHIZAKI LANCER PTY LTD	Ice machines for hotels, restaurants and catering outlets Ice machines for hotels, restaurants and catering outlets	03 9455 2300 08 8268 1388

KITCHEN CONSUMABLES	3M CLOROX LALAN GLOVES SAFETYCARE OATES CLEANING PARAMOUNT SAFETY PRODUCTS STEELDRILL WORKWEAR & GLOVES PTY LTD	Scotchbrite [™] , cleaning chemicals, scourers Glad [™] , Chux [™] and Oso [™] range of materials Disposable gloves for the food industry Full range of kitchen consumables Disposable gloves for the food industry Disposable gloves for the food industry	136 136 02 9794 9500 03 9706 5609 1800 791 099 03 9762 2500 03 9790 6411
LABELS - FOOD GRADE	PURBRICK HEALTHPRINT W W WEDDERBURN	Labels for the food and pharmaceutical industries Food safe labels for food products and food retail	03 9751 7100 02 9797 0111
LUBRICANTS - FOOD GRADE	LANOTEC AUSTRALIA	Suppliers of food grade lubricants	07 3373 3700
MANUFACTURING EQUIPMENT AND COMPONENTS	BSC MOTION TECHNOLOGY ENMIN PTY LTD FCR MOTION FESTO PTY LTD HARRINGTON ELECTRICAL MOTORS NORGREN PTY LTD SMC PNEUMATICS	Food grade bearings and housings Manufacturers of food grade feeder equipment Manufactures of food grade geared motors and inverter Pneumatics and valves for food manufacturing equipment Stainless steel electric motors for food processors Suppliers of pneumatics and valves for food manufacturing Suppliers of pneumatics and valves for food manufacturing	03 9560 3222 03 9753 3633 03 9362 6800 1300 889 696 03 9546 7515 02 9582 8000 02 9354 8222
PACKAGING MATERIAL AND EQUIPMENT	CONFOIL PTY LTD CROWLE INDUSTRIES DALTON PACKAGING MICROPAK PTY LTD NETPAK	Suppliers of food grade foil containers Repacking of consumables and food products Manufacturers of paper bags and products for the food industry Manufacturers of food grade packaging materials Suppliers of food grade netting to small goods manufacturers	02 8825 8800 02 9809 0254 02 9774 3233 02 9646 3666 02 9604 4950
PEST CONTROL EQUIPMENT AND MATERIALS	BASF AUSTRALIA LTD BELL LABORATORIES INC EKO SOLUTIONS INSECT-O-MATIC PEST FREE AUSTRALIA PTY LTD STARKEY PRODUCTS PTY LTD WEBCOT PTY LTD WEEPA PRODUCTS PTY LTD	Suppliers of rodent and cockroach control materials Suppliers of rodent control materials and stations Distributors of the 'ecomille rodent eradication equipment Suppliers of insect eradication systems and 'cryonite' Specialist electronic vermin elimination devices Range of insect control devices Suppliers of "Brandenburg" flying insect control Weep hole protection devices for new or retro application	02 9150 7449 0427 802 844 1800 612 212 1800 244 300 02 4969 5515 08 9302 2088 03 9832 0770 07 3844 3744
PEST CONTROLLERS (ALL STATES)	RENTOKIL	National pest control services for the food industry	1300 736 865
PEST CONTROLLERS (NSW)	AEROBEAM PROFESSIONAL PEST MGNT. ANT-EATER ENVIRONMENTAL SERVICES CPM PEST & HYGIENE SERVICES CORPORATE PEST MANAGEMENT HACCP PEST MANAGEMENT RENTOKIL SCIENTIFIC PEST MANAGEMENT STOP CREEP PEST CONTROL	Secialist food premises pest management Specialist pest control services for the food industry Specialist pest control services for the food industry Specialist pest control services for the food industry Specialist food premises pest management services National pest control services for the food industry Regional pest control services for the food industry Regional pest control services for the food industry	02 9636 5840 02 9939 8208 02 9674 5499 02 9311 1234 02 9922 3743 1300 736 865 1300 139 840 02 9371 3911
PEST CONTROLLERS (QLD)	ARREST-A-PEST GOODE PEST CONTROL RENTOKIL SCIENTIFIC PEST MANAGEMENT	Specialist pest control services for the food industry Specialist pest control services for the food industry National pest control services for the food industry Regional pest control services for the food industry	07 3279 1199 1300 13 12 14 1300 736 865 1300 139 840
PEST CONTROLLERS (VIC	DAWSON'S WEED AND PEST CONTROL PESTAWAY AUSTRALIA PTY LTD RENTOKIL SCIENTIFIC PEST MANAGEMENT STATEWIDE PEST TRAPS PEST CONTROL PTY LTD	Specialist pest control services for the food the industry Specialist pest control services for the food industry National pest control services for the food industry Regional pest control services for the food industry Specialist pest control services for food the industry Specialist pest control services for the food industry	03 9222 2222 03 9850 3777 1300 736 865 1300 139 840 1800 136 200 03 9390 6998
PEST CONTROLLERS (WA/SA)	RENTOKIL	National pest control services for the food industry	1300 736 865
REFRIGERATION MATERIALS AND EQUIPMENT	CAREL DANFOSS HEATCRAFT AUSTRALIA PTY LTD PHASEFALE	Temperature controllers and supervisors for refrigeration M2 alarm and monitoring system HACCP specification cool room thermostats and alarms Temperature controllers for refrigerated storage	02 8762 9200 02 8845 1813 13 23 50 03 9553 0800
REFRIGERATION	FROSTLINE REFRIGERATION SERVICES MELBOURNE REFRIGERATION SERVICES	Cold room services Refrigeration installation and repair	1300 550 502 03 8761 6395
REFRIGERATION GOVERNORS	CAREL DANFOSS HEATCRAFT AUSTRALIA PTY LTD PHASEFALE	Temperature controllers and supervisors for refrigeration M2 alarm and monitoring system HACCP specification cool room thermostats and alarms Temperature controllers for refrigerated storage	02 8762 9200 02 8845 1813 13 23 50 03 9553 0800
REFRIGERATOR SERVICE	AERIS HYGIENE SERVICES PTY LTD FROSTLINE REFRIGERATION MELBOURNE REFRIGERATION SERVICES REJUVENATORS (THE)	Specialist cool room and cool room motor cleaning services Cold room services Refrigeration installation and repair Specialist cool room cleaning and rejuvenation services	1300 790 895 1300 550 502 03 8761 6395 0407 292 826
STAFF RECRUITMENT AND HUMAN RESOURCES	SKILLED GROUP	Specialist HACCP trained workforce solutions for the food industry	1300 366 606
STORAGE, SHELVING AND RACKING	ARMACEL TECHNOLOGY GROUP MONO & BEYOND PTY LTD	Food storage containers, food grade shelving Distributors of food grade shelving	02 9450 0900 02 9690 0900
SYSTEMS AND REPORTING	SHADOW ORGANISATION PTY LTD	Audit, compliance and monitoring systems	02 8448 2090
THERMOMETERS, PH METERS AND DATA LOGGERS	3M TESTO PTY LTD TRIPLE POINT CALIBRATION	TL 20 Temperature logger for logistics Specialist thermometers for use in the food industry Thermometer calibration services	136 136 03 9800 4677 08 8172 2233
TRANSPORT CONTAINERS AND PALLETS	ARMACEL TECHNOLOGY GROUP MONET INDUSTRIES SCHUETZ DSL (AUSTRALIA) PTY LTD	Manufacturers of food grade pallets and storage solutions Manufacturers of food grade pallets and storage solutions Food safe storage and transportation palletcons	02 9450 0900 09 9793 5355 1800 336 228

FoodQuality news.com

FoodQualityNews.com is a leading daily B2B news online service Food Safety and Quality Control. The site focuses on the areas of HACCP, Food Safety, Food Quality, Food Microbiology and Hygiene, providing professionals every day with the latest breaking news and its implications for the industry. Joining the subscriber base entitles one to the free newsletter.

www.foodqualitynews.com for more details.

FoodQualityNews.com is published by Decision News Media, an international online business-to-business news publisher. The company runs market leading science and business news services in the food, pharmaceuticals, science and cosmetics industries. From its newsrooms in Europe, the USA, Russia and Asia Pacific, Decision News Media serves decision makers in large international companies worldwide. Decision News Media has its head office in Montpellier - France and offices in London and Hoboken - New Jersey.

www.decisionnewsmedia.com

STOP CREEP PEST CONTROL PTY LTD

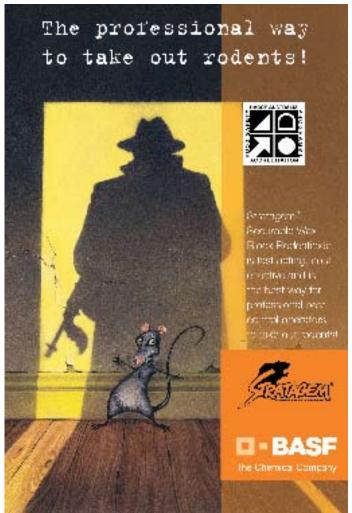
The world's safest method in cockroach control since 1991 - HACCP ENDORSED

- NO SPRAY, NO DUST, NO FUMES, NO MESS
- NO NEED TO EMPTY CUPBOARDS
- NO-NONSENSE 1 YEAR WRITTEN WARRANTY



PHONE **02 9371 3911** MOBILE **0411 749 316** stopcreep@acon.com.au









100% Clean

Clean Design by Festo: Always a clean solution

The IP67 Clean Besign valve terminal CDVI offers a 100% clean solenoid valve solution for your control needs. Without the need for a control cabinet, the ease of installation and maintenance will save you both time and money.

To find our more about this product of to view the null range of resto's hope industry and HACCP approved products, phane 1300, 88 96 96 or visit the website at www.festo.com.au



FESTO

Festo Pty Ltd

Australia Head Office 179 182 Browns Road Noble Park XIII. VI: 3174

Phone: 1300 88 96 96 Fax: 1300 88 95 95

www.festn.com.au

The safest way to manage pests is to keep them out in the first place...

Available through good hardware and building supply companies Australia wide.

For an information pack including samples contact Weepa Products





Often pests gain entry into the wall cavity through weepholes in brickwork, then inside through plumbing and electrical access points.

Weepa Products have a patented, HACCP endorsed range of vermin exclusion devices for weepholes.

For installation during construction or for retrofitting.



Phone (07) 3844 3744 • Fax (07) 3844 9844 • enquiries@weepa.com.au • www.weepa.com.au

WHICH SPREADS FASTER?

BACTERIA IN A REUSABLE
PIPING BAG
OR
BAD PUBLICITY DUE TO FOOD
CONTAMINATION...

Why Risk it?

Choose wisely, choose **kee**-seal[™] Disposable Piping Bags



For your free product sample call or email Kencan Australasia

07 3273 8111 Info@keeseal.com.au