

Feedback

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Feedback: Your levies at work

November/December 2016

A note from the MD...

t MLA's AGM last month, I was pleased to report on MLA's vision to create value in the red meat and livestock industry today, tomorrow and beyond 2020. To realise this vision we need to build on our strengths and address the threats.

One way MLA is building on our strengths is by enhancing the industry's integrity systems through a new, user-friendly online platform which consolidates producer feedback and compliance data in a one-stop-shop. More on this in early 2017.

Maintaining the competitiveness of Australia's red meat supply chain requires a shift to livestock production and marketing with producers rewarded against objective data and value measurements. Last month I announced MLA's plan to invest \$150 million and install objective carcase measurement technology in all AUS-MEAT accredited meat processing facilities (see page 3). This initiative will fast-track gains across the value chain - from providing signals to seedstock producers to improve genetics, through to providing producers with objective data on how their animals performed at processing, and improving efficiency in processing plants.

In my two years at MLA, the need for such transparency in over-the-hooks selling has been one of the industry's biggest issues. This was also a key theme in the ACCC's report on its cattle and beef market study. MLA's plan, together with other initiatives like the review of the current beef language system by the peak industry councils (PICs) and MLA, provides the opportunity to meet this need.

As I indicated in my AGM address, MLA is consulting the PICs on the proposed funding of our plan and we will also conduct national consultation prior to any final decision. When we announce those consultation dates in early 2017, I encourage you to come along and engage in what will be a defining decision for our industry.

Finally, in terms of heading off threats, MLA is fighting two patent applications that threaten the genetic advancement and the international competitiveness of our industry - one by a North American company and one from a subsidiary of the Victorian DPI. If MLA does not challenge these patents all future genomic work may incur a licence fee back to these companies (see page 5).

These are just a handful of initiatives that demonstrate MLA's focus on fostering prosperity in the red meat industry today, tomorrow and beyond 2020. You can hear about this at www.mla.com.au/agm2016

Richard Norton MLA Managing Director

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Cover image: Tim Burvill of Adelaide's A Hereford Beefstouw by David Sievers Photography.

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Feedback is produced and published by Meat & Livestock Australia Ltd (ABN 39 081 678 364). MLA acknowledges the matching

funds provided by the Australian Government to support the research and development detailed in this publication.

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This magazine was printed on Sumo Offset Laser, an environmentally responsible paper manufactured under the environmental management system ISO 14001 using Elemental Chlorine Free (ECF) pulp sourced from sustainable forests. Sumo Offset Laser is FSC Chain of Custody (CoC) certified (mixed sources).

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Made to measure: the objective future

MLA has released a revolutionary plan to install objective carcase measurement technology across the red meat industry.

As a first step, MLA will create a platform to install stage one of the new technology into all AUS-MEAT registered processing facilities in Australia.

The initiative paves the way for scientific measurement of saleable meat yield, future value-based marketing and industry-wide productivity gains through processing automation, genetic improvement and data-based on on-farm decision making. Longer term, the plan is also expected to reduce the industry's annual multi-million dollar cost of grading.

MLA Managing Director Richard Norton said universal adoption of the technology was the only way to capture the potential of the data it generates to benefit all of industry.

To do so, MLA proposed to acquire a commercial loan on behalf of industry to finance the \$150 million one-off cost of installing Dual Energy X-ray Absorptiometry (DEXA) technology in up to 90 AUS-MEAT registered facilities.

"The most important product of objective carcase measurement is the data it will generate - and MLA's plan ensures that data will be available to all participants across the value chain," Richard said.

"We're now at a stage where our smallstock DEXA technology is ready for commercial deployment, while for beef our DEXA research and development is nearing completion and ready for commercial installation trials in early 2017.

"Once the first stage of objective carcase measurement is installed, both systems will provide valuable information for the value chain including saleable meat yield, bone and fat.

"The systems will become more and more valuable as ongoing research and development enhances the application of



DEXA technology provides timely, accurate and objective information on the lean meat, bone and fat composition of each carcase.

objective carcase measurement around all conceivable measures."

Getting the edge

Richard said the Australian Competition and Consumer Commission's (ACCC) interim report on its cattle and beef market study supported Cattle Council of Australia's focus on how the competitiveness of Australian markets could be improved by the adoption of objective carcase measurement.

The universal adoption of the technology would also contribute to maintaining the Australian red meat industry's ability to compete in global markets, he said.

"Australia is a high-cost producer compared to some of our international competitors, so we need to constantly innovate and invest in productivity and efficiency improvements from the farm right through to the processor and ultimately to market," Richard said.

"MLA's plan will drive a shift from the current subjective grading of lamb and beef to a new system of livestock production and marketing where producers can be transparently rewarded against objective data and value measurements.

"On farm, that will stimulate further advances in genetics and livestock production systems.

"Within the processing plant, the technology will reduce wastage and workforce injuries and boost productivity through the use of accurate, objective measurement and automation."

Rollout

MLA has sought and received in-principle support from the Deputy Prime Minister and Federal Minister for Agriculture, Barnaby Joyce, for the introduction of objective measurement across industry, and will continue to consult industry peak councils about how to best structure the one-off cost of its introduction.

What DEXA does

DEXA has been used for decades in the medical industry to measure bone density and body fat composition. By using an existing technology, MLA, in collaboration with industry partners, has shortened the timespan to apply it to lamb and beef carcase scanning.

In the red meat industry, DEXA technology provides timely, accurate and objective information on the lean meat, bone and fat composition of each carcase.

Sharing this information along the value chain allows all sectors to benefit and make more informed business decisions based on objectively measured information.



Funding applications invited

MLA has commenced its annual call for research, development and adoption projects that benefit sheepmeat and grassfed beef producers. Preliminary proposals for new one to five -year projects to be funded in 2017-18 must be received by 23 December 2016.

The projects must address national sheepmeat and grassfed beef industry priorities established through MLA's new regional consultation strategy, which starts at the grassroots and is fed back to MLA via the Northern Australia Beef Research Council, Southern Australia Meat Research Council and Western Australia Livestock Research Council, Sheepmeat Council of Australia and Cattle Council of Australia.

These funding opportunities aim to increase:

- → on-farm and local industry sustainability and profitability
- \rightarrow adoption and adaption of key research

findings to commercial implementation

- → collaboration and coordination between producers and support agencies through shared goals
- \rightarrow knowledge and best practice.

From the call, a selection panel will develop a list of projects to be invited to submit full proposals between 21 March and 28 April 2017. New projects will start in August 2017.

Eighteen new on-farm research, development and adoption projects were funded by MLA in 2016.

One of those funded aims to provide area-wide control of the cattle pest, buffalo fly, while preventing its southward spread.

The three-year project will focus on direct control of buffalo fly populations using a control agent known as Wolbachia. It is anticipated that infection with the insectinfecting bacterium in male buffalo flies will lead to effective sterility of female flies.

Robotic rib cutting a reality

Check out the results of investment by MLA, Scott Automation + Robotics and JBS in research and development which has led to a robotic rib cutter being installed at JBS Dinmore, the largest beef processing plant in the southern hemisphere. The benefits are improved safety outcomes and more consistent and efficient cutting.

Watch a new video of the rib cutter in action by going to www.youtube.com and searching for the Scott Automation + Robotics channel.



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A new way for LPA

From January 2017, producers will be required to renew their Livestock Production Assurance (LPA) accreditation every three years by completing an online assessment.



Producers whose accreditation anniversary is in January 2017 will be the first to be reminded. Once notified, producers have two months in which to renew.

Producers need to log on to the secure, password-protected LPA Service Centre at http://lpa.ausmeat. com.au/ and correctly answer 10 multiple-choice questions relating to the core elements of the LPA program.

MLA's Nuffield scholar

Stuart Tait from Mandurama in central NSW has been awarded the 2017 Nuffield Scholarship supported by MLA.

With his parents, Stuart manages 1,600ha over two farms in the high rainfall zone, producing certified grassfed Angus beef cattle for the domestic and export markets, with a secondary enterprise of



dryland cereal and oilseed cropping

Through Nuffield, he will investigate integrated beef and cropping systems, including dual-purpose grazing crops, soil and nutrient management, productivity optimisation and grazing management.

Stuart's research will focus on the effects of integrating two separate enterprises on business productivity and profitability.



"The assessment will be part of a nationwide push to ensure every red meat producer understands their food safety responsibilities," LPA Advisory Committee chair Kevin Roberts said.

"The introduction of an assessment strengthens the commitment that underpins our promise that Australian red meat is safe to eat. This helps secure us access to more than 100 markets across the world."

Access background information on all aspects of Australia's red meat integrity system at the Integrity Hub: **www.mla.com.au/rmis**

Meet MLA's new director

Production and supply chain systems and meat retailing specialist Allister Watson was elected to the MLA Board at the recent MLA AGM, filling a vacancy created with the retirement of long-time director Lucinda Corrigan.

MLA members voted on the election of three directors to the MLA Board, which included the re-election of current MLA Chair Dr Michele Allan and fellow director George Scott.

The MLA Board is a skills-based Board. Directors have complementary skills in order to make important decisions for the long-term benefit of the livestock industry.

Allister Watson has extensive experience in primary and secondary processing and in meat retailing in Australia and New Zealand. He has held senior positions in Woolworths NZ and Coles and is a past executive of Coles Australia, during which time he was integral in transforming the way Coles retailed meat, leading their fully integrated, whole of supply chain meat business including exporting.

With more than 30 years' operational experience in the meat industry, Allister has an understanding of lot feeding and backgrounding, and processing, combined with value adding, yields and retail ready product offerings.

www.mla.com.au



MLA Directors George Scott, Michele Allan and Allister Watson.

New BRD guides for lotfeeders

Two new online resources developed with MLA funding are available to cattle lotfeeders to help with the management of Bovine Respiratory Disease. Available for download now are:

- → Tips & Tools Summary of Bovine Respiratory Disease preventative practices. Go to: www.mla.com.au/ tipstoolsBovineRespiratory
- → Evaluation of practices used to reduce the incidence of bovine respiratory disease in Australian feedlots.
 Go to: www.mla.com.au/
 EvaluationBovineRespiratory



Genome patent challenge

MLA is fighting two patent applications which threaten the genetic advance of Australia's cattle industry and its international competitiveness.

The actions include MLA's launch of legal proceedings in the Federal Court of Australia to appeal an Australian Patent Office decision to grant an Australian patent to North American companies Cargill USA and Branhaven LLC over cattle selection methods.

MLA regards the application as a bid to patent general discoveries of nature in cattle research - with the patent so broad that it affects genomic selection for all cattle production traits.

Another genomic patent application, by Victorian Government subsidiary company Agriculture Victoria Services Pty Ltd, was opposed by CSIRO (who is leading the action) and MLA on similar grounds.

If allowed to proceed to grant, MLA considers the Cargill/Branhaven patent will affect the use of most DNA-associated genetic tests in the industry. Cargill USA and Branhaven LLC have licensed only a handful of commercial operators to provide those services on the payment of royalties.

At a minimum, MLA believes the granting of the patent will discourage or hamper industry research into understanding the natural genetic makeup of cattle and the continued progress of Australia's national genetic improvement programs.

In turn, MLA fears there will be a subsequent impact on farm productivity and, ultimately, the Australian red meat industry, given the contribution genetic improvement makes to our international competitiveness.

MLA's investment in genomic research and development - on behalf of its levy payers and the Australian Government which matches industry's research investment - is substantial and currently accounts for approximately 15% of MLA's total on-farm R&D portfolio.

The hearing date for the Cargill Branhaven case will be set down by the Federal Court in 2017.

Building resilience

Family farm success

Over the past 50 years, farm business consultant Rob Napier has visited 60 countries and worked with some of the world's leading family farm businesses. Now he is sharing what he has learned in a free video series about the pursuit of a successful family farm future.

Progressive family farm businesses regularly outperform the corporate farm business model in Australia, and farm business consultant Rob Napier wants to help more farm families achieve that high level of success.

A former principal of Orange Agricultural College, Rob founded Napier AgriFutures 15 years ago. His work involves studying global changes in agriculture and assisting leading farmers in Australia and overseas to successfully respond.

Rob sat down with *Feedback* to answer a few questions about just what makes the top family farms so successful.

1. What are some strengths of the family farm business model?

One of the key strengths is motivation and

What leading producers do

The following checklist is based on a learning tool Rob Napier gives to producers he works with in Australia and overseas.

"I would be delighted if *Feedback* readers could also use the checklist," Rob said.

"They can give themselves a score on each issue, stick the checklist on the fridge and use it to give some objectivity in family meetings."

		Your score /10
1.	Plan from the outside in - not the inside out	
2.	Have written and regularly revised individual, family and business goals + a business plan	
3.	Do ordinary things extraordinarily well – monitor, analyse, improve	
4.	Seek and evaluate new technologies – focus on systems – work with researchers	
5.	Be market-driven and integrate all steps in the supply chain	
6.	Work together with like-minded people	
7.	Grow the business using new management models	
8.	Prepare for volatility – risk management plans – ask 'what if?'	
9.	Look for opportunities to add businesses and services	
10	Achieve excellence in people development, management and succession planning	

the alignment of interests - wonderful things happen when everyone is moving in the same direction.

Good relationships, trust and teamwork give strength to both the business and the family.

Small businesses in general, and family farm businesses in particular, have broader goals than just money, which is another real strength. Their goals encompass their people, the wider community and sustainability.

Family businesses can be nimble because they are not bureaucratic. If they are on the front foot and really watching what is going on, they can duck and weave. They also have better control over their overhead costs than more bureaucratic businesses.



Agricultural industry consultant Rob Napier and his Kelpie 'Please' at 'Kyalla Park', Borenore.

Finally, most successful family farm businesses in Australia are lean, they don't waste money and they are a bit hungry - they chase opportunities.

2. What are some weaknesses of the family farm business model?

The business and the family are interwoven, which can lead to lack of objectivity and confusion, meaning the business isn't driven as clearly as it needs to be in a tough industry.

A potential weakness is that everyone is self-employed, which requires a lot of discipline to ensure a good balance between operational and business management tasks.

A general weakness is people management. When I talk to groups of producers in Australia and ask them to score their strength in people management, I get a lot of low scores.

In small farm businesses we also have the challenge of scale, and the problem of people trying to handle an ever-more complex agricultural business on their own.

3. What can family farm businesses do to maximise those strengths and minimise the weaknesses?

There are many things people can do, which I discuss in detail in the videos, but here are some key pointers:

- → Have clear goals that are reviewed quite regularly and make sure everyone in the business is involved in goal setting.
- → Create business plans to fit the goals and review the plans very regularly.
- → Hold regular meetings with all members of the family farm business and talk about real issues, not small talk.
- → If you find it hard to separate family issues from business issues, consider using an advisory board or adviser for objectivity.
- → Work on the people issues to build strong relationships, teamwork and trust.
- → Ensure you have a family culture of questioning everything and being able to put up ideas without being ridiculed.
- → Be prepared to outsource. If your skills aren't as strong as you like in a particular area, find someone who has those skills and concentrate on the things you do well.
- → Utilise the skills of all family members, on-farm and off-farm.
- → Surround yourself with other dynamic, positive people who see opportunity in change.
- → If scale is an issue, consider the opportunities presented by leasing, joint ventures and syndicates. Smart producers know it's important to control assets, rather than own them.
- → Learn, learn, learn be prepared to learn the non-production, generic business skills that are so important in today's agriculture. These include marketing, people management, communication, monitoring, analysis and planning, and information management.
- → Work hard to put more cash in the balance sheet. Cash makes a business more flexible and resilient in a volatile world.
- → Follow the lead of the top family farm businesses by trying to combine the best attributes of family and corporate businesses.

(i)

(1)

4. What does your video series offer family farm businesses?

The underlying theme of all the videos is the need to encourage family farm businesses to be learning organisations, embracing opportunities from change and continually developing capabilities for success.

I wanted the videos to be available to all farm families around the world. Thanks to Farm Management Canada, the videos can be accessed online at any time and in any place.

Each video is accompanied by a series of slides in a PDF file, which can be downloaded to give a brief overview of the video content.

There are 11 videos in the series, including an introduction. I recommend watching them in the following order:

- → What leading farmers do a checklist for evaluating the strengths and weaknesses of the current farm business.
- → Global opportunities and risks a review of strategic issues facing farm businesses.
- → Environmental management messages from the world - a discussion of lessons learnt from observations of water, soil, air pollution, radiation and renewable energy challenges in many countries.
- → Four videos concerned with people issues in family farming – communication, succession, learning plans and time management.
- → What I would do if contemplating a career in agriculture an audio discussion aimed at young people.
- → Farming for success: Lessons learnt across 60 countries in 50 years - a discussion of the changes that are occurring in agriculture and the skills, attitudes and actions required for successful farm management.
- → Seeking opportunities and building on knowledge - a short interview discussing how top farmers learn and the role of travel as a stimulus for new ideas.

Rob Napier // E: rnapierag@gmail.com Barbara Bishop E: barbara@barbarabishop.com.au

To access the videos go to: **www.fmc-gac.com** or search 'Napier AgriFutures videos'.

Check out the MLA extension and education programs which assist skill building in family farm businesses, including Pastoral Profit, Making More From Sheep, More Beef from Pastures and BusinessEDGE: www.mla.com.au/Extension-training-and-tools

Five tips for opening the communication lines

Barbara Bishop works with farming families throughout Australia, developing tactics for talking and planning together to help create thriving businesses and family environments.

Earlier this year, Barbara presented the BeefConnect webinar 'Building a multigenerational business', which you can hear by visiting the MLA-supported FutureBeef website.

Here are Barbara's five top tips for opening the lines of communication between all members of a multi-generational farm business:

- 1. Start the conversation early aim by the time your children are 15. It is never too late, but it gets harder the older they are.
- 2. Don't start planning anything until the needs, ambitions and expectations of each family member in each generation have been identified and shared. This can take months to become clear for each individual.
- 3. Communication is the critical factor in building multi-generational businesses, so hold regular family meetings:
- you may need an external facilitator to get started, but remember you own the process not your facilitator, accountant, solicitor, etc
- this communication is not about decision making, but about exploring the opportunities
- family meetings include all stakeholders, including in-laws and long-term partners
- meetings need to have structure (agenda), a purpose (what do you want to achieve at the end) and the decisions and actions recorded.
- 4. Beware of the "they can sort it out when I am gone" syndrome. This is not good business practice as the planning should include your needs, ambitions and expectations.
- 5. "Fair isn't about everyone getting the same thing. Fair is about everyone getting what they need to be successful."

Building resilience

Pressure points

Farming can be tough - the very nature of agriculture means producers face pressure from all directions. However, there are simple strategies that can help manage stress and build resilient farming families and businesses.

Pressure points can come from external sources, such as the weather; government legislation; commodity prices and interest rates; from within the farm business, such as finding and keeping good workers; or from family issues, such as succession planning.

"These can create stress that affects decision making, productivity, and workplace health and safety," said Associate Professor Tony Lower, Director of the Australian Centre for Agriculture Health and Safety at Moree - an academic unit of the University of Sydney that researches injuries and fatalities on Australian farms.

In recognition that physical and mental health are key drivers to good farm productivity, MLA supports projects that improve the wellbeing of producers through initiatives such as the Primary Industries Health and Safety Partnership (PIHSP).

A PIHSP project led by Tony, with input from producers, included developing practical online resources to help producers plan and implement on-farm health and safety initiatives.

Tony said sound workplace health and safety practices were just one way producers could help avoid potential stress caused by injury, lawsuits or even fatalities.

Need someone to talk to?

If you, or someone you know, needs support contact: Lifeline Australia on 13 11 14 or Beyond Blue on 1300 22 46 36.

Tony Lower

(🗳)

E: tony.lower@sydney.edu.au MLA's occupational health and safety information: www.mla.com.au/WHS

A sunny outlet in tough times

Like many north-west Queensland producers, Julie and Adrian Brown of Longreach have faced their share of challenges in recent years. For Julie, tough decisions such as destocking and succession planning have been made more bearable by channelling her creative side.

It might seem ironic to launch a swimwear brand during a drought, but Julie's online business 'Coola Cozzies' has helped her remain positive and has provided an outlet from the pressures of living on the land.

Adrian, Julie and their children Xavier (8) and Bronte (6) live at Marchmont, an hour north-east of Longreach. The 20,000ha property is part of Adrian's family business and before the drought it carried 8,000 Merino wethers and 800 Santa Gertrudis cattle.

"Drought began to bite for us in September 2013, and by April 2015 we were totally destocked. It had been an agonising process to make the decision to destock and we faced questions such as what financial strain restocking could put on the business," Julie said.

While Julie loves living on the land, she said the stress of managing drought intensified other pressure points, such as the ongoing process of succession planning and the challenge of educating Xavier and Bronte through distance education.

Julie recognised she needed to relieve the pressure and, inspired by the advice of former director of the Longreach Pastoral College, Frank Keenan, to "come to the table with solutions, not problems", she started Coola Cozzies.

"The weather and other surrounding factors were totally out of my control, but with Coola Cozzies I could set goals and work to influence the outcomes. It was also a creative outlet," she said.



The idea came from Julie's ongoing quest to find sun-safe swimwear for her fair-skinned family but, while she dreamed up the concept in 2006, it wasn't until the drought intensified in 2013 that she started researching swimwear manufacturers and wrote a business plan. Her goal: to design fashionable, sun-safe swimwear to help reduce Australia's high rate of melanoma.

'Being able to contribute to the world in a positive way is a core value for me," Julie said.

"I want my kids to have a great life, I want to contribute to their school and to our community and - if I can contribute even in a small way to reducing the incidence of melanoma in rural Australia or beyond every minute of the hard graft to get Coola Cozzies off the ground will have been worth it."

Julie also likes to take a break from both businesses with simpler strategies, such as going for a walk or jog at the end of the day. "This enables me to clear my head, have a yarn with God and set goals for tomorrow."

She also prioritises visiting her parents at Yeppoon during school holidays for a proper unwind: "Even though it's often difficult to get away from the property, it helps recharge the batteries and gives me fresh perspective."



Julie Brown E: adrian.r.g.brown@bigpond.com Coola Cozzies:



It's the running shoes, not the work boots, that are essential to Gavin Lutze's South Australian prime lamb enterprise.

Gavin (pictured) and his wife Jenni operate a cropping and sheep enterprise on 1,200ha at Coonalpyn, 160km south-east of Adelaide. Training for the next triathlon, ironman competition or marathon provides the 55-year-old with an important physical and mental outlet from farming.

Whether training for a marathon or just going for a walk at the end of the day, Gavin said anyone can reap the benefits of a physical outlet, as long as they don't use the excuse "I don't have time".

"I've had people joke that I must have run out of jobs on the farm if I have time to train, but the reality is that farming jobs never finish – you just have to make the decision to stop," he said.

"There is time, if you prioritise."

With Jenni working off-farm, Gavin said it was important he remained fit to run the enterprise on his own.

The additional benefits also make it worthwhile. He has seen his balance, flexibility, reflexes and general aerobic fitness improve, and he no longer suffers from a sore back after a day in the sheep yards. His sleep and diet have also improved.

In a story familiar to many, Gavin found there were limited physical pursuits in a

rural area after he retired from playing country footy in his thirties.

However, eight years ago, he started cycling with a friend who was recuperating from a shoulder operation. It didn't take long before a few others joined in. The men stored their bikes in town, as a central meeting point, and cycled together several times a week.

"We would get more farmers coming out to ride during drought years and dry spells as it was a great way to chat while doing something and to relieve a bit of mental stress," Gavin said.

From there, Gavin started competing in triathlons (he has entered five ironman competitions in three states) and marathons. He notched up his sixth full marathon (42km) in Adelaide in August.

Although he often hears comments such as "but farmers are already fit", Gavin said training for an endurance event required a completely different level of fitness.

"Farming is not as physical today as it was a generation or two ago, especially in a mixed enterprise where we spend long hours on the tractor," he said.

>) | Gavin Lutze E: jlutze@lm.net.au Twitter @GavinLutze

Fat Farmers: www.ppsa.org.au/ our-work/health-and-safety/ health_fat-farmers/

Gavin's tips to balance farming and fitness

Make exercise social: meet up with your mates to go for a ride, run or swim laps.

"This has the added bonus of accountability - it's harder to talk myself out of going for a swim when there are people waiting for me at the pool," he said.

"Arrange an active holiday such as bushwalking, trekking, riding or canoeing. It will encourage you to train for it."

Involve the family: take the kids for a walk, or get them to help move sheep on their bikes.

"Jenni is a runner as well, so we competed in a half ironman together in Auckland Harbour when we were on holidays in New Zealand - we crossed the finish line together."

Good habits require discipline, but it's worth it.

"I might head home early from social events when I have to get up early and run, but I still have balance. Our cycling group usually finishes our 100km weekend ride at the Coonalpyn Bakery, so there is a social side to training too."

Get some advice, so you're on the right track.

"There are training apps, but I recommend talking to a real person, such as a local personal trainer or even a triathlon coach, who can match a training program to your lifestyle."

Innovation

MDC seeking partners to develop food for the future

MLA Donor Company (MDC) is looking for innovative red meat businesses to become partners in a new program called '2Morrow's Food'.

'2Morrow's Food', launched at this year's MLA annual general meeting, is a program for Australian red meat value chain companies looking to develop high value growth strategies to target evolving global food trends, as identified by the Insights2Innovation program.

Partners with MDC will receive co-investment funding for the development of new products and process technologies, plus business and value chain design support, and insights from global food trend and market experts.

MDC CEO Christine Pitt said the Australian red meat industry can not only rely on a transaction-based, commodity business model, and other agrifood industries have reached the same conclusion.

"Insights2Innovation is a cross-sectoral project involving red meat, horticulture, dairy, seafood, pork and wine," Christine said.

"We're working together because we realise that, in the future, our most significant competition in emerging markets is not going to come from other proteins or meal types, but from overseas' competitors.

"For example Brazil and Uruguay can make the same claims as we do about producing 'clean, green beef', and they can do it much more cheaply.

"We can't compete against them on price or volume, so we need to establish a point of difference based on premium, high-value products.

"Understanding global food trends and targeting our innovation to these trends is a key component of this strategy and it's what will keep us ahead of the curve."

Insights2Innovation project manager Emily Walker said MLA and its cross-sector partners recognised the value that simply being 'Australian' gave our agrifood exports and were keen to capitalise on it.

"We're all working towards the same aim, which is to make Australian agrifood the premium positioned food in world markets," Emily said.

"We need to capitalise on our existing reputation and work together to develop it further.

"Our aim is that the high-value growth opportunities we target with our industry partners through Insights2Innovation's 2Morrow's Food program will make that Australian 'identity' even more valuable in global and emerging markets and with other uses of red meat."

Dr Christine Pitt E: cpitt@mla.com.au

What is Insights2Innovation?

In 2015, MLA was awarded a \$2.87 million grant by the Federal Government's Rural R&D for Profit Programme to lead the cross-sectoral 'Market and Consumer Insights to Drive Food Value Chain Innovation and Growth' project, which includes participation by the red meat, horticulture, seafood, dairy, pork and wine industries.

The project - known as Insights2Innovation - aims to identify innovation opportunities and support high value growth initiatives that build demand for Australia's agricultural food products in emerging export markets and market segments.

MLA is the project manager of Insights2Innovation

Interested?

Who can apply to become a '2Morrow's Food' partner?

Any current red meat value chain business, provided they can demonstrate a commitment to exploring high value growth opportunities and a move away from a transaction-based, commodity business model.

New red meat industry entrants looking to develop high value red meat products can also apply.

What will '2Morrow's Food' partners receive?

- → co-investment funding for the development of new products, process technologies, packaging, traceability/ anti-fraud and digital solutions that create higher value for consumers
- ightarrow assistance with value chain and business model design
- ightarrow access to market insights and R&D materials
- ightarrow access to global food trend experts.

Where are the global food trend opportunities?

In preparing for the Insights2Innovation 2Morrow's Food program, MDC commissioned research into high value, emerging global food trends. The trends identified included:

 \rightarrow Health and wellbeing \rightarrow Convenience, including snacking \rightarrow High protein \rightarrow Naturally functional

ightarrow Targeted demographics, including ageing population and infants ightarrow 'Free-from' ightarrow Direct-to-consumer.

Let's take a closer look at some of those trends:

Snacking

In America, 75% of consumers snack more than twice a day. The UK is close behind.



Consumers will pay significant premiums for the convenience of snacks.

In the USA some of the fastest growing snack brands contain red meat, such as:

ightarrow Krave Jerky - official sponsor of 2016 USA Olympic team

- ightarrow Epic bars marketed to extreme athletes/ alternative lifestyle
 - → Bombshell Jerky marketed primarily to females
 - → Wild Zora popular with 'free-from' enthusiasts.

Technology

The power of digital technology is disrupting the way we live and work. How will it revolutionise the way people choose to eat?



Existing and developing technologies, such as smart packaging, can generate greater value through guaranteeing provenance, creating an interactive relationship with consumers and assuring purchased items are fresh and natural.

Active agers

The emerging generation of seniors exhibits very different characteristics compared with previous generations:

- baby boomer "bulge" a large volume moving to retirement in a short period
 - → greater disposable income and higher life expectancy
 - → lifestyle maintenance a priority.

Health and wellbeing

Consumers are demanding products that deliver a sense of health, prevention, treatment, satiety and/or wellness as part of a balanced diet.

These trends are driven by longer life expectancy, increasing obesity rates and greater consumer awareness.

Wholefood goodness that capitalises on natural, functional nutrients such as protein, and are low in fat, salt and refined sugars, are high on the menu.

Retail marketing

Keeping red meat on shopping lists

MLA's domestic marketing team is using consumer and category research to unlock untapped potential for beef and lamb in the Australian retail market.

MLA National Accounts Manager Garry McAlister said MLA had recently completed a large usage and attitude study that identified opportunities for beef and lamb.

"Australia is still the most valuable market for domestic beef and lamb, so it's critical for our industry that we keep red meat on the shopping lists of Australian consumers," Garry said.

"MLA is responding to consumer research to do just that by - among other initiatives - looking at other ways to sell traditional lamb legs and beef rump steaks.

"Both products have been retailed in the same format for decades, yet research suggests consumers are looking for smaller cuts with less external fat; they need to cook quicker and not result in a large amount of leftovers.

"If you overlay these insights with the fact that the shopper has a limited budget, perhaps \$150, to feed a family of four for a week, then clearly a lamb leg at \$30 is a big spend."

MLA has been promoting smaller cuts from subprimaled lamb legs and beef rumps to domestic retailers.

"These smaller cuts cost more per kilogram, but the overall item price is lower, which better suits a budget," Garry said.

"There are generally additional benefits of

On the domestic front

MLA works with national retailers and their supply chains to:

- $\rightarrow\,$ provide biannual updates for retailers on relevant insights into supply and demand, buyer behaviour and consumer trends
- → optimise seasonal beef and lamb consumer campaigns by ensuring product messages are communicated through point-of-sale materials such as recipe cards, pack stickers and shelf wobblers, and in retail catalogues
- → support and encourage individual retailer product innovation and merchandising activities based on shopper insights - for example, MLA research shows shoppers want smaller, easy-cook cuts, so the trade marketing team works with retailers to help develop products and position them for maximum appeal and return
- → facilitate greater adoption of technology and systems that enhance the competitiveness of their supply chain through projects on subjects such as eating quality, animal welfare and sustainability, packaging and shelf life research, and processing efficiency initiatives.



less external fat and improved eating quality."

The new products suit a wider range of meal types for modern households (singles and couples now account for more than 50% of all households), which will encourage people to buy them more often.

Garry said the promotion of smaller cuts to retailers was also a response to current high prices for stock.

"Rising farm gate prices for beef and lamb make cheaper proteins more appealing to shoppers, putting pressure on retailers to find competitive options for beef and lamb," he said.

"Smaller cuts can often be sold for more per kilogram, which helps retailers' bottom lines."

Garry said another area of focus for MLA's domestic marketing team was to promote non-loin 'Masterpieces' cuts and on-trend cooking methods.

"A good example here is the beef brisket," he said.

"We have worked with several retailers, encouraging them to range this cut as a summer barbecue line - that's how it's famously prepared in the US.

"Our research shows shoppers who love their food are willing to spend more and take a little extra time preparing and cooking the product.

"This insight is supported by retail sales data that shows premium steaks have increased in both volume and value terms, despite the large price increases for beef.

"Beef is still the 'king of meats' in many customers' minds; our goal is to keep it that way."



13 Growing demand

Backing butchers

On top of its popular *Entice* magazine and awardwinning beef and lamb marketing campaigns, MLA works with the independent retail sector through the Australian Butchers' Guild (ABG) retail program.

MLA Trade Marketing Executive – Retail, Elisha Moran said the ABG aims to support independent butchers in their efforts to offer customers value and convenience, while continuing to promote beef and lamb.

"There are a number of ways we do this including through our biannual recipe booklet and shopper competition," Elisha said.

"The competition offers buyers of beef or lamb products the chance to win a barbecue, and it has been steadily gaining traction.

"The first competition, three years ago, attracted about 1,000 entries. Our most recent campaign resulted in 4,129 entries."

The shopper competition is held during the 'shoulder' seasons of autumn and late spring, before the major marketing campaigns kick in.

"Producers sell stock all year round, so we need to ensure red meat is promoted throughout the year," Elisha said.

Another way MLA works with independent butchers is through *The Butchers' Paper*, an educational brochure designed to inspire butchers to trial new cuts and value-added lines.

These concepts are supported through workshops which also provide valuable feedback and insights to MLA.

"The workshops allow MLA to engage with butchers at a grassroots level, which keep us up-to-date on the challenges and opportunities in their businesses," Elisha said.

"We also sponsor programs that inspire butchers to develop new and innovative products, including the National Sausage King competition and the World Butchers' Challenge."



Elisha Moran, MLA

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In-shop support

Michael James is a fifthgeneration butcher and operates Carina North Quality Meats in Brisbane. He's also a member of the Australian Meat Industry Council's national retail council, is captain of the MLA-sponsored Australian Steelers team, which competes in the World Butchers' Challenge, and looks to support from MLA's Australian Butchers' Guild program in his business.

"Independents account for about 21% of the domestic market share and MLA's support is very valuable, particularly the survey data they gather and share with us about consumer behaviour and new eating patterns," Michael (pictured) said.

"I see plenty of value from MLA's Australian Butchers' Guild (ABG) program. I also find the ABG team is very accessible and quick to help if I have questions or need specific information."

Michael uses MLA point-of-sale materials in his shop, including the recipe publications *Entice* and *Australian Butchers' Choice*, reads *The Butcher's Paper* and attends associated innovation workshops.

"The recipe booklets help us sell product and help our customers



have a great meal experience," he said.

"For example, if MLA publishes winter recipe booklets we can encourage our customers to buy some chuck steak and give them the booklet to ensure they have a tested recipe before cooking it.

"The Butcher's Paper is also valuable as an information and education tool. It gives us updates on what's happening in the industry and has useful cut preparation guides."

Michael recently attended an ABG innovation workshop where Australian Steelers' team member Nick Dagg demonstrated valueadded pastry products, developed for this year's World Butchers' Challenge.

"The innovation workshops are really educational," Michael said.

 Michael James, Carina North Quality Meats

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What is the Australian Butchers' Guild?

It's an MLA-owned umbrella brand for marketing to independent retail butchers.

The Australian Butchers' Guild (ABG) assists butchers promote beef and lamb by providing them with point-of-sale materials as well as education and inspiration to differentiate their offer in the market:

→ Innovation workshops - Educational workshops designed to

'bring to life' the content of *The Butcher's Paper* by encouraging practice change in the industry

→ Point-of-sale/sponsorships - Development and distribution of specific point-of-sale material designed to assist independent butchers to promote beef and lamb. Examples include cuts charts and ticket toppers. Sponsorships include the National Sausage King competition and the Australian Steelers team, which competes in the World Butchers' Challenge. issue

Research at work

The latest on-farm strategies emerging from MLA's investment in research, development and adoption.

In this | 22// A profitable path

An update from producers piloting MLA's Profitable Grazing Systems' program.

26// Making plans

How Tasmania's Alison Napier uses tools and strategies to run her business.

28// Organic growth

Tips for transitioning to a financially viable organic beef business.

36// Rapid response

How research has led to a faster way to identify pasture rhizobia.

Weighing up precision management

A world-first remote stock weighing and satellite imaging system, the Precision Pastoral Management System, monitors animal condition and pasture quality and has the potential to revolutionise the northern grazing industry.

The system was developed through the Precision Pastoral Management Tools project, supported by MLA through FutureBeef, and is on the verge of being commercialised, with inquiries received from northern beef businesses as well as from the US and South America.

The system cleverly combines satellite images of pasture growth with automatic weighing and drafting of cattle – and could potentially be sophisticated enough to direct cattle to different areas of the paddock, based on weight and pasture availability – all from your office.

Project research leader Sally Leigo said the two technologies worked together to help producers make timely management decisions that field trials had shown could save tens of thousands of dollars. "The Precision Pastoral Management System is an automatic weighing and drafting system that is positioned at a fenced-off watering point or supplement station," she said.

- "As each animal crosses the weighing platform, its weight is recorded and correlated with its National Livestock Identification System tag.
- "This information is cross-referenced with satellite imagery that assesses pasture quality or greenness.

"During field trials, producers applied this technology for various purposes, however, they all found that early warning of pasture deterioration and animal weight loss - before it was visually detectable - helped them make better-timed management decisions for marketing cattle or starting supplementation."

Sally said there were a few surprise findings from the trials.

- 'Some producers said that using it reduced their stress levels, because they weren't trying to estimate when to move cattle from a paddock or when cattle were at their heaviest," she said.
- "What was really happening in the paddock was there in black and white, making the decision of what to do much clearer.
- Producers could also check their paddocks while they were away on holidays, satisfying themselves that their stock were still there and gaining weight.
- "It also acted as an early warning system."

The technology uses either a mobile or satellite telemetry connection and



cloud-based software, making it accessible anytime, anywhere.

Raw data is interpreted and analysed by the project research team, which removes any errors before producers use the information.

Sally said the Precision Pastoral Management System had an auto-drafting option for the remote weighing system, which enabled producers to automate more tasks, such as drafting off bulls after joining and steers as they reached target weights. Following trials, the research team has recommended three weeks for training animals to use the weighing platform. Younger animals are usually quicker to adapt. Once taught, stock remember the technology and their calves learn from their behaviour.

Costs

The Precision Pastoral Management Tools project team is still working on how this technology should be commercialised in Australia and whether producers would subscribe to a service or have the option to buy the package up front. "At this stage, we estimate a whole system would cost between \$23,000 and \$25,000 to implement," Sally said.

To learn more and view trial sites and presentations on its commercial application, visit the Precision Pastoral Management Tools project on Facebook.



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www.futurebeef.com.au and search 'Precision Pastoral Management Tools'



Precision management

Remote technology delivers



When 'Newcastle Waters' manager Jak Andrews first heard about the Precision Pastoral Management Tools project, he was a little sceptical about how this technology could have a practical application on a property covering more than 10,000km².

"Looking at the walk-over-weighing system, I was concerned about how it was going to work, how many units we would need for our scale of operation and if it would be commercially viable," Jak said.

"However, once we got it set up and started thinking outside the square, I realised we only needed one unit per land type to supply accurate information on our pasture quality and stock performance across the entire property.

"The more we thought about it, the more ideas we came up with on how to add value to livestock, in terms of kilograms, to save time and labour, and to make good land management decisions."

Initially, the team at Newcastle Waters used the technology to monitor weaner bulls.

"We run the company's multiplier stud herd, which disseminates Consolidated Pastoral Company's elite genetics across its commercial bull-breeding program," Jak said, adding that Newcastle Waters supplied around 800 bulls for the program each year.

By trialling the system in this area of the enterprise, Jak quickly found there were numerous benefits. He outlined some of the top ones:

1. Identifying good performers

Being able to regularly record individual weights, without labour or stress on animals, helped us identify those faster-growing bulls and, by tracing their dams and sires, we have identified those superior genetic lines.

2. Avoiding weight loss

Being able to regularly monitor weights and pasture quality made us realise the bulls had started losing weight before it was evident through normal visual assessment, i.e. condition score and pasture decline. As a result, we put them on supplement two weeks earlier than we normally would have. It's a lot easier to maintain weight than it is to put it back on.

3. Improving welfare and labour efficiency

Instead of mustering to see if we have animals ready for sale, a remote weighing station - even in our largest paddocks - could provide enough weight samples to let us know we have enough animals meeting a target weight to make mustering worthwhile.

We have measured that in walking five kilometres to the yards, animals are losing 2.5% of their bodyweight - and that doesn't account for the walk back. If you keep doing that to the tail-end of the mob, it makes it pretty hard for them to go forward and, if you extrapolate that weight loss across 5,000 head or so, it soon adds up. By eliminating those losses, it wouldn't take long for the technology to pay for itself.

Jak Andrews

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For information visit www.pastoral.com/en/content/ newcastle-waters



Enterprise:

Pasture:

Running a business with precision

Murray Grey describes the Precision Pastoral Management Tools project as 'a real game-changer' for extensive grazing enterprises in the north.

A project participant for the past three years, Murray (pictured above) has trialled the walk-over-weighing unit in combination with the satellite imaging system that delivers information on pasture quality verified by animal performance.

He is so impressed with the technology and the information it makes available to him that he plans to install this equipment permanently.

"My calculations show this technology could save us upwards of \$40,000 a year and the labour component is only a small part of that," he said.

"The biggest gains come from minimising weight losses. The technology is a more accurate guide to what country is capable of."

Learning curve

Murray, whose family has owned 'Glenflorrie' for more than 20 years, said he was shocked at the differences between his visual assessments of livestock condition and pasture and the project data he was receiving.

"I drove down the road past a paddock with cattle in it and thought everything looked okay but the system said they were starting to lose weight," he said.

"There was still a bulk of feed there but they couldn't eat enough of it to maintain their

bodyweight and my estimate of where they should have been was six weeks out.

"It really caught me on the hop because I hadn't planned to move them that early.

"By the time I could, they had lost half to a full condition score, which cost us about \$15,000.

"It taught me to be more flexible and to have somewhere to shift cattle to if we need to."

By being able to access current, constant weight data, Murray also discovered that his cattle lose, on average, 11kg/head when mustered out of the holding paddocks and walked 12km to the yards for drafting.

"That's weighing them full and trying to look after them as much as we can," he said. "They lose more weight walking back to paddock."

Murray said the additional auto-drafting function on the weighing platform could achieve some significant savings.

"By being able to program it to draft animals according to whatever parameters you want, businesses can avoid unnecessary weight losses caused by mustering unwanted animals and by disrupting the mob's routine," he said.

The system, which Murray refers to three or four times a week, also provides early warnings.

Snapshot

'Glenflorrie Station' 220km east of Exmouth, Pilbara region, WA



Property: 197,000ha

Enterprise: Breeding Brahmans for live export trade

Livestock: 5,000 head

Pasture: Buffel grass and Acacia country

Soil: Iron ore hills and red

Rainfall: 270mm

"If you've got fewer animals crossing the platform it may indicate missing cattle or deaths and, conversely, if there are more cattle crossing it than usual it may indicate animals have got into the paddock and fences need fixing," he said.

Training

So far, Murray has trained three mobs (about 700 head) to use the weighing platform as an access point to water. He said the training process usually took about 10 days.

"We start with a wide gap for cattle to access water and then gradually narrow it until they are happy to walk through the race and over the platform," he said.

In the past three years only three animals have refused to use the platform and Murray said the simple solution was to shift them to another paddock.

Murray can see huge potential for the project to expand its telemetry applications.

"Daily tank level monitoring, for example, could save on labour as well as reduce mortalities," he said.



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Visit www.centralstation.net.au/ meet-the-crew/glenforrie-station/



Snapshot

Matt and Emma Nield. Karridale.



530ha leased

Enterprise: lambs. 4,000 Merino ewes (2,000 joined to Merino sires; 2,000 joined to terminal sires)

gravel and karri loam

Matt Nield always wanted to farm. He grew up on a family farm at Boyup Brook, Western Australia, and when the succession plan showed no options for growth or a sustainable future for his new family, he looked at alternatives to capitalise on his farming background and agribusiness training.

"I worked as a stock agent, head stockman for a live export company locally and in the Middle East, an agricultural contractor and a few other things, but all I ever wanted was to get back to farming," he said.

Three years ago, Matt and his wife, Emma (pictured above with their son Bill. 10). leased a farm at Karridale in Western Australia's south-west. They crunched some numbers and decided sheep were the way to go. This year, for the first time, Matt is a full-time producer.

"This isn't a traditional sheep area - it's mostly cattle - and the sheep that are here generally aren't locally bred Merinos," Matt said.

"But when I looked at the numbers and the land I had access to, sheep seemed the obvious choice."

Matt's knowledge of sheep production has increased since he completed the original Sheep's Back program 10 years ago.

"I followed it up with other workshops and was involved in a Lifetime Ewe Management Group. We're now working through the More Lambs More Often materials," he said.

More Lambs More Often provides information, tools and support to

producers to help them manage variable seasons, as well as enhance their awareness of opportunities to reduce greenhouse gas emissions from their sheep enterprise. The project is funded by the Australian Government and more than 160 workshops have been delivered nationally by Rural Industry Skills Training in the past two years, including through MLA's Farm 300 program.

"Attending the More Lambs More Often workshop demonstrated how improving production efficiency and reducing wastage, mainly via lamb survival, can not only improve profitability but also reduce the carbon footprint. That's a win-win," Matt said.



Here's Matt's approach to maximising productivity while reducing emissions:

Matching grass to growth

Matt said the cornerstone of his enterprise was matching the stocking rate to the feed on offer.

"We lamb down the crossbreds in the first week of June and the Merinos at the end of July. That way, we're running our maximum stocking rate of about 8,000 DSE when there is the most feed," he said.

"Basically I'm a grass farmer. Growing grass is what I need to do to feed my stock, and my stock numbers are paired to the amount of grass available. Our DSE peaks at around 16/ha."

The strategy helps to increase his overall carrying capacity, and is proven to increase profit and reduce greenhouse gas emissions intensity.

Low-input fodder crops

'Each year I grow an oat crop for standing fodder on about 50ha," Matt said.

"It goes in the ground in June on a paddock that has been used for deferred grazing, to let the grass get going elsewhere. The stock come out and the oats go in. I could plant it

earlier and graze the oats, but it fits my system better to use the paddock for deferred grazing. Once the oats go in, I shut it up and let it grow. I wean the Merino lambs into the paddock in the first week of December.

"The oat paddock probably ends up with 150 tonnes of oats in it. I could harvest it, put it in storage and then trail feed it out in the paddock, but that's a lot of handling - which means a lot of time and money spent harvesting and feeding out. Someone told me once that if you put that much grain into a silo, you never feed it all out, because you don't think they need that much but - if it's out there - they eat it and they do well. It's a good low-input system.

- "It's also a good way to rejuvenate a paddock. The annual pasture that grows back in the paddock the year after the oat crop is much better than before the crop.
- "I guess it's a combination of the stubble providing protection for the emergent ryegrass and other annual pasture species, and also the fertiliser and break-crop effect of growing the oats."

The next challenge

Matt said in coming years he'd like to get his weaning rates up, particularly with the Merino replacement flock. Improving weaning rates is another strategy that improves emissions intensity in sheep enterprises, but has a longer-term pay-off than increasing carrying capacity.

- "Last year we weaned about 100% off the terminals and 90% off the Merinos. You can chase the percentages, but really it's about how many kilograms of lamb and how much wool you sell each year," he said.
- "I can see a future market in selling surplus Merino ewes to producers with terminal programs in the high-rainfall zone. There are not a lot of people doing that around here and there's a lot more potential for sheep in the area. At present, they need to buy stock in from further lower-rainfall zones east of here. I think there's potential in producing a locally fit ewe bred for this high-rainfall zone."

Matt Nield E: coomaroo MLA's Farm www.mla.c

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Reproductive efficiency

Evening up the score

Lamb producers will no longer have to adjust Merino condition score targets for their ewes. MLA-funded research is paving the way to lifting lamb survival, weaning rates and kilograms of lamb produced per hectare in maternal ewe flocks.

Sheep industry extension programs such as Lifetime Ewe Management (LTEM) and Bred Well Fed Well (BWFW) have equipped more than 5,000 producers with knowledge and confidence to change management based on ewe condition score targets at key times, but these guidelines were developed for Merino ewes.

While this hasn't stopped maternal breed producers from drawing on these measure-to-manage principles to increase weaning rates by 10% (about 20% of LTEM participants run a non-Merino flock), many producers and consultants are not confident in adjusting Merino targets to maternal ewes to maximise their profitability.

Since 2014, the Lifetime Maternals project has tracked the performance of maternal ewes and their progeny through the reproduction cycle to see if the same condition scores apply or if productivity and profitability can be increased with alternative feeding regimes. The research – involving Rural Industry Skills Training, Department of Primary Industries Victoria, SARDI and Murdoch University - involved trials in Victoria, South Australia and Western Australia, including with commercial producers Paradoo Prime (see case study over page) in western Victoria and Glenridge Park, Mount Barker, Western Australia.

Associate Professor of Animal Science at Murdoch University, Dr Andrew Thompson, said maternal ewes generally achieved higher condition scores at lambing than Merino ewes when managed under the same conditions. The economic value from improving the number of lambs weaned and weaning weights is about 50% greater for maternal ewes than Merino ewes.

"It is likely that management recommendations in programs that are based on Merino ewes are not directly transferable to maternals, but until now we have not known how to adjust them to maximise profitability," Andrew said.

"This project set out to duplicate what we did with Merinos 15 years ago and use a combination of on-property trials and bio-economic modelling to develop ewe liveweight and condition score profiles for maternal breeds."

Results from 2014

Maternal ewes that were condition score (CS) 3.1 at joining were divided into four groups



after pregnancy scanning. Each flock was managed to reach a target CS ranging from 2.6 to 3.6 to lambing. Ewes in lower condition also lambed in paddocks with less feed on offer than those in higher condition.

Lamb birth/weaning weight, lamb survival, weaning rates and subsequent reproductive performance were measured to assess the relationship between ewe condition score and ewe and lamb productivity.

Birth weight

Manipulating ewe liveweight and CS during pregnancy had predictable effects on lamb birth weights:

- → A 10kg change in ewe liveweight during early pregnancy (up to 90 days) changed lamb birth weight by about 300g.
- → A 10kg change in ewe liveweight from 90 days to lambing changed lamb birth weight by 430g.

Lamb survival

Changes in lamb birth weight had minimal effects on the survival of single lambs when ewes varied in CS from 2.6 to 3.3; even the lightest lambs still weighed about 5.5kg. However, survival of single lambs dropped 7% in ewes fed to achieve CS 3.7 through lambing (89% compared to 82%). The lower survival in over-fat ewes was associated with increased risk of birth injury and dystocia.

Increasing CS at lambing from 2.6 to 3.6 improved survival of multiple-born lambs, especially up to CS 3.3. The weaning rate from twin bearing ewes ranged from 135% to 169%.

Lambs from lighter ewes weighed 1.5kg less at weaning than those from heavier ewes - this was similar in singles and twins.

Ewe performance

Maternal ewes have the capacity to gain weight from low levels of feed on offer in late pregnancy and to compensate during lactation and post weaning. Despite differences of almost 15kg and more than one CS at lambing, there were minimal differences in liveweight and CS at the following joining.

FAST FACTS

- → Non-Merino ewes (maternal breeds) account for almost 30% of Australia's ewe flock and produce about 45% of the lamb supply.
- → MLA-funded research has established condition score targets at lambing of 2.7 for single-bearing ewes and 3.3+ for multiple-bearing ewes to maximise lamb survival and weaning rates from maternal ewes.
- → Improving nutrition during pregnancy increases lamb weaning weights and reproductive performance of the ewe at the following joining, regardless of feed on offer during lactation.

The carryover effects on reproduction the following year were variable but across the four sites the reproductive rate of ewes poorly fed during the previous pregnancy was only reduced by about 5%.

Maternal ewe targets

Andrew said economic modelling was still required to confirm the most profitable CS targets for singles and twins. However, he said that under mild weather conditions at lambing in 2014, CS of 2.7-2.8 at lambing was appropriate for single-bearing non-Merino ewes and CS3.3-3.4 for twin-bearing ewes.

"We also need to work out the most cost-effective pattern of liveweight during early-mid and late pregnancy to achieve these targets for lambing," he said.

Only 20-25% of maternal ewe flocks are currently scanned for multiple births. These results present a strong case for pregnancy scanning and differential management.

Results from 2015

Ewes were fed to achieve CS 2.7 or 3.3 at about day 135 of pregnancy and then separated into paddocks with varying levels of feed on offer (FOO) until weaning.

The impacts of CS prior to lambing were much less than the 2014 experiment and, surprisingly, FOO treatments had no effect on lamb birth weights.

FOO during lactation also had little - if any - effect on weaning weights, especially when greater than 1,000kg DM/ha.

When there was at least 1,000kg DM/ha during lactation, the effects of low CS prior to lambing was still evident and lambs were about 1.5kg lighter at weaning. At only one site, where FOO levels during lactation were as low as 600kg DM/ha, there was evidence that higher FOO levels could mitigate the effects on weaning weight of lower CS prior to lambing.

"Producer observations of the performance of maternal breeds and the results from this project demonstrate the performance of modern day maternal ewes far exceeds what can be predicted from previous knowledge of their intake capacity and energy requirements," Andrew said.

"Further work is needed to understand why maternal ewes perform so much better than Merino ewes from the same pasture base, and this work is essential to develop optimum CS and feed on offer targets."

Further work is underway to fine-tune the CS recommendations and materials to demonstrate what each CS looks like will be developed in the future.





Tim and Georgie Leeming, Pigeon Ponds, western Victoria



Property: 1,500ha

Enterprise: Self-replacing prime lamb flock using Coopworth composites, Coopworth and White Suffolk gene pool

Livestock: 6,600 ewes

Pasture:

Improved with phalaris, annual ryegrass and sub-clovers; grain and graze program with oats

Rainfall: 600mm



South-west Victorian lamb producers Tim and Georgie Leeming have seen the impact condition score targets have on lamb performance through their involvement in the Lifetime Maternals project.

The Leemings run a breeding enterprise based on Coopworth composite genetics at their 1,500ha Pigeon Ponds property, north-west of Hamilton. They joined 6,600 ewes this year and will send progeny to the feeder market, aged 13-16 weeks of age.

To achieve their target of joining an additional 1,000 ewes next year, the Leemings have retained a higher portion of ewe lambs in recent years and 41% of the flock is aged two years and under.

Ensuring lamb survival from a young flock requires discipline to maintain optimum ewe condition at reproductively critical times.

Tim said the Lifetime Maternals research reinforced many observations, for example, fatter ewes at joining achieve higher conception rates. It also provided guidelines for questions such as: how light can you run single-bearing ewes to prevent dystocia and what are the condition score thresholds for multiple pregnancies?

"How we manage ewes with multiple lambs, especially twins, is where we see the biggest economic gains and losses," Tim said.

"This research gives us more information around what knobs we need to turn to dial up nutrition for our twinning ewes." His ewe management strategies include:

Nutrition

A grain and graze program is used to renovate perennial pastures and bridge nutritional gaps. Oats are grazed in late winter (and still harvest at 80–100% yield potential), and grain is retained to feed pregnant ewes in late summer and autumn, offsetting supplementary feeding costs.

Joining

A single-cycle joining program with older ewes runs from mid-January to early April. Teasers (vasectomised rams) are used for two weeks before the rams go in at 2.5% (rams/100 ewes). The joining schedule is: rams in for 17 days, out for 20 days, in for 17 days, out for five days, in for 17 days. Ewe lambs also have staggered joining from late August when more feed is available.

"Preg-scanning shows us that about 75% of ewes join up in the first 17-day cycle, so we might tighten the joining cycle to 14 days in the future," Tim said.

This joining strategy not only weeds out ewes with poor reproductive performance, but is also important at lambing time. The Leemings' property ranges from protected red gum paddocks to open hills, but staggered joining spreads the risk from inclement weather, as all ewes can be lambed onto paddocks with 1,500kg DM/ha and shelter.

It paid off this year. Despite the wettest winter in 30 years, 87% of foetuses survived. The Leemings' property received 650mm (more than their annual average) from May to September.

Preferential management

Tim said lamb survival was economically fundamental in his self-replacing meat breed enterprise, especially with a young flock. This year, commercial ewe lambs (born June/July 2015) scanned at 152% and Tim hopes this translates to 110% marking.

Tim sets targets of condition score 2.7 for lambing, for ewes that scanned with single lambs, and at least condition score 3 for multiples. He observed minimal cases of dystocia this year with less than 1.2% ewe mortalities in single-bearing ewes.

Multiples graze on at least 1,400kg DM/ha and are run in smaller mobs than the singles. This year, the June lambing multiple-bearing ewes were stocked at seven ewes/ha in average mob sizes of 54 head, while their single counterparts were run at 11 head/ha in mob sizes of 200–450. This stocking rate increased by around one ewe/ha in multiples for each of the following two lambings in late July and mid-August.

Ewe mortality in twin-bearing ewes was fewer than 1% during lambing, and lamb survival in multiples averaged 85%.

Ewe recovery

After marking, ewes and lambs are run in larger mobs and rotated through cropping paddocks and pastures.

"We are proactive in making the right decisions to get the ewe back to her optimal joining target while we have quality feed," Tim said.

When there is plenty of feed, the Leemings wean lambs at 12 weeks. However, this year, with waterlogged paddocks reducing feed availability, they will wean down to nine weeks to deactivate lactation so ewes start laying down condition for next year's joining.

"This year has put our grazing skills to work and it's great to come into October fully stocked up with a full moisture profile," Tim said.



Management **Profitable progress**

Producer update: Stuart and Anja Croft

Stuart and Anja Croft are using Profitable Grazing Systems as an opportunity to critically assess the business performance of their Victorian and NSW wool and lamb enterprise.

What have you learnt from the program so far? A presentation from a bank manager provided a lender's perspective to finance. This opened our eyes to the fact that our bank is actually a co-investor in our business, not just a source of finance.

Farm economist Paul Blackshaw also led a session on the Livestock Farm Monitor Project, which analyses the financial and production performance of Victorian grazing enterprises. This insight into what sets the top 20% of grazing businesses apart from the others gave us plenty of food for thought.

For example, these top decision makers all have a thirst for knowledge, which reinforced to us the importance of learning.

Have you introduced new strategies into your business since we last spoke?

As part of assessing where our business is headed, we conducted a SWOT analysis to identify strengths, weaknesses, opportunities and threats. This was a good exercise to capture what was in our minds and formalise our thoughts on paper. We identified succession planning as an opportunity if we address it, but a threat if we don't. We have implemented a 12-month process towards a formal succession plan.

Have you identified some new areas for improvement? Labour efficiency is a big opportunity, so Anja has become more involved in the operational side of the business. This spreads management risk (Anja can manage the home property when Stuart is at their NSW enterprise) and allows us to share ideas and decision making.

What strategies are working for you, and what are the results? The opportunity to look at how our business is structured has given Anja stronger business literacy. This ties in really well with her growing involvement in the day-to-day operations of the business, as she is more aware of our profit drivers.



Do you have any big plans for 2017? We will start benchmarking our business



Snapshot

Stuart and Anja Croft, Stuart's parents Alex and Margaret Croft, south-west Victoria and Western Division of NSW

Property: 1,600ha in Victoria (560ha owned, remainder leased). 24,300ha in NSW

Enterprise: Wool and lamb production, small beef enterprise

next year using the Farm Monitor Project's spreadsheet tool. We look forward to seeing how our business performs compared to other south-west Victorian grazing enterprises. This will allow us to identify opportunities for improvement.

What is your one handy tool that has been useful for business planning/decision

making? The financial formulas provided to us during an early workshop are very useful for assessing business performance - we use 'return on assets vs return on equity' as a litmus test to see if borrowed money is actually working for us. We will continue to apply this formula over several years to see where our business is heading.

Stuart and Anja Croft 1) E: dalarossie.pc@gmail.com Farm Monitor Project: www.agriculture.vic.gov.au

Producer update: Sam and

Queensland producers Sam and Cassie Bassingthwaighte are using what they learnt from the Profitable Grazing Systems pilot to take stock of their grazing business and make measured changes. Since we caught up with Sam and Cassie in the last issue, they have welcomed a new addition to the family, with baby Jack born in August.

What have you learnt from the program so

far? Pasture identification is important to determine the percentage of 3P (palatable, productive, perennial) grasses. As a result of the program, we identified areas of non-palatable grasses, and destocked and burned them to create a range of palatable grasses to encourage even grazing.

We have also completed the BusinessEDGE component of the program, which highlighted areas of our business where we can measure performance. For example, it gave us tools to better 'reconcile' our herd each year to account for any losses. We also plan to seek more external advice to identify how we can continue to monitor the performance of our business.

Have you introduced any new strategies into your business since we last spoke?

We started our program of destocking and improving paddocks, one at a time. It's a short-term loss of productivity for a longerterm pay-off. We worked-up, fertilised and re-sowed pastures with a legume mix. We also plan to re-fence based on soil type so we can better manage grazing pressure on different areas. Our goal is to finish re-fencing the first paddock (517ha) in January.

Have you identified some new areas for

improvement? We planned to change our winter supplementation program to a year-round approach using licks tailored to each paddock. However, we have decided to take a more flexible approach and adjust supplementation based on the season and livestock requirements. We will use guarterly dung sampling so we will have time to prepare a seasonally appropriate supplementation strategy before each winter.

What strategies are working for you and what are the results? We sold 260 head of our breeding herd in the past 12 months to relieve pressure on pastures – it was a tough decision, but it will allow us to improve our feedbase so we can better match stocking

In the last edition of *Feedback* we introduced three farming families road testing MLA's Profitable Grazing Systems, a new program which aims to lift adoption for real on-farm impact. Here we catch up with these families to find out their latest actions resulting from Profitable Grazing Systems.

Cassie Bassingthwaighte



Sam and Cassie Bassingthwaighte, Jandowae and Dalby, south-east Queensland

Property: 5,500ha (two properties) Enterprise: Breeding and backgrounding cattle

rates with feed availability and, ultimately, lift our stocking rates.

We are also taking a fairly measured approach to change, on a paddock-by-paddock basis, so we can monitor the results of the pasture growth, and use this information to adjust our grazing strategies.

Do you have any big plans for 2017? When we finish developing the first paddock, we will sit down and take a good look at what it cost and what the benefits are from increased stocking. This will be our guide to developing future paddocks.

What is your one 'handy tool' that has been useful for your business planning/decision making? We used the NRM spatial mapping tool to analyse land condition and utilisation and plan infrastructure, including two new bores, to ensure watering points are in optimal locations.

Cassie and Sam Bassingthwaighte E: cassie@diamondyfieldservices.com.au NRM spatial mapping: www.nrmhub.com.au

Producer update: Robert Hazel

South Australian sheep producers, the Hazel family, are drawing on the Profitable Grazing Systems pilot to lift productivity on their Kapunda property.

What have you learnt from the

program so far? The pilot group we're involved in is based on the Pasture Principles program. We are developing practical skills for pasture management, such as matching the time and length of grazing to pasture growth phase. The program has reinforced the importance of not over- or under-grazing pastures. We now start grazing at the three-leaf stage for rye and cereals. The results are higher quality pasture, more feed on offer and increased growth, but we are still fine-tuning when to remove stock.

What strategies are working for you, and what are the results? After a wet winter and spring we had an abundance of feed, so we went back to set stocking our ewes. We still rotationally graze lambs and this is working well. We trucked out the April-born lambs on 11 October (to the sucker market), and they had averaged 315g/head/day in liveweight gain.

Have any new areas for improvement revealed themselves along the way?

We saw an opportunity to remove stock a bit earlier – leaving an extra 200–300kg DM/ha – to promote pasture growth. We were rotating mobs every 6–8 days, but will now run bigger mobs or use smaller paddocks and tighten the rotation to five days. The aim is to prevent sheep grazing new growth so pastures have a chance to recover between grazing cycles.

Do you have any big plans for 2017?

Shortening the grazing rotations will be more labour intensive, so we will invest in additional portable electric fencing and will leave it up for the season, rather than moving fences for each rotation.

We will wean the September-born lambs on to bean stubble at set stocking rates and will calculate the correct stocking rate after harvest.



Snapshot Clyde and Janet Hazel, Robert and Lorin Hazel, Kapunda, South Australia Property: 1,100ha Enterprise: Wool and prime lamb production, cropping

What is one 'handy tool' that has been useful for your business planning/ decision making? The Pasture Principles workbook has been a useful guide to calculating feed requirements of sheep and planning our grazing program.

Robert Hazel

(🗳)

E: hcfhazel@bigpond.com

Pasture Principles is a program developed by consultants Macquarie Franklin and was delivered in southern states in 2016 with support from MLA's More Beef from Pastures and Making More From Sheep. To register interest contact Macquarie Franklin: www.macquariefranklin.com.au On-farm

Feedbase

Indian couch: invader or rescuer

Indian couch: northern producers are divided as to whether this invasive grass is friend or foe. A producer-based study has found its exponential spread in Queensland and increased occurrence across northern Australia warrant urgent research into practical control measures.

Dr Nicole Spiegel, a grazing land management scientist with Queensland's Department of Agriculture and Fisheries, has been consulting with producers and colleagues via the MLA-supported FutureBeef network to ascertain Indian couch's value to, and impact on, grazing enterprises.

"We're hopeful this study will launch a new project focused on developing regionalised practical management strategies to help prevent the spread of Indian couch, rehabilitate areas denuded of other species and use it in a controlled manner where it can be of benefit," she said.

The history

A tropical grass, Indian couch was introduced to Australia in the 1930s and again in 1950 and, after some testing, was used primarily for civic purposes such as plantings of aerodromes, golf courses and lawns.

Nicole said it made history near Bowen in north Queensland after it rapidly colonised an area of degraded black speargrass country.

"It not only provided short, palatable feed for cattle but also stabilised soil," she said. "Unfortunately, Indian couch is also opportunistic and invasive, and is highly adaptable, being able to grow on a range of soils of varying fertility within rainfall bands of 500-1,400mm."

Nicole said the less vigorous strain, Bowen, took off in northern Queensland driven by

a combination of circumstances.

'During the 1970s, high cattle numbers and increased grazing pressure followed by droughts in the 1980s, along with Indian couch's ability to persist under grazing and colonise bare ground, created the perfect storm," she said.

'By the late 1970s, Indian couch was estimated to cover 80,000ha across northern Australia.

'Eight years later, it had established itself as a primary pasture and covered 800,000ha.

"Today, our latest estimates put the invasion area at 11 million hectares."

The problem

Indian couch is a prolific seeder and a highly adaptive and competitive species, according to Nicole.

The second secon

strategies," she said.

Nicole said although some producers didn't view Indian couch as a problem, its acceptance into the pasture base came at a price.

'It has about half the carrying capacity of buffel grass and, if given the opportunity (e.g. prolonged drought or overstocking), will out-compete native pastures to become a monoculture," she said.



Nicole said northern and central Queensland property managers consulted during the study said Indian couch provided some carrying capacity; however, it didn't last in droughts and resulted in production losses, making it inferior to native tussock grasses. These production losses are yet to be quantified.

The consultation in south-east Queensland also highlighted reduced water infiltration rates of land dominated by Indian couch.

In areas such as the Burdekin and Fitzroy Basin, increased run-off partly as a result of Indian couch affects the Great Barrier Reef, so there are important production, ecological and environmental drivers for discovering how to manage this grass for best effect," Nicole said.

Producers' views

As part of Nicole's project, five workshops were held in northern, central and southeast Queensland, attracting almost 50 producers who contributed their practical knowledge and opinions on Indian couch and research priorities.

An initial workshop, combining four producers from the Goldfields and Basalt country with researchers, set a platform for the producer workshops to work from.

Producers differ in their views of Indian couch but all of them could see the value in having regionally relevant management strategies to control its spread and/or to use it more effectively," Nicole said.



Dr Nicole Spiegel T: 07 4761 5150 E: nicole.spiegel@daf.qld. gov.au

Go to **www.futurebeef. com.au** and search "Indian couch"

Snapshot

Damien and Fran Lyons 'Basalt River', northwest of Charters Towers, Queensland



Property: 30,000ha

Enterprise: Beef breeding, turning

off Brahman-cross for domestic and live export trade

Livestock: 2,000 breeders

Pasture: Black speargrass and other natives

Soil: Red and black basalt

Rainfall: 625mm, summer dominant

Avoiding the end of th

| 3,000-4,000kg DM/ha or more."

Fran said producers in more fertile areas, such as basalt country, should understand that to accept an Indian couch-dominated pasture was to accept a less-productive beef business.

"The fact that Indian couch tolerates continuous heavy stocking does not do much to discourage the old approach of judging a business's success by how many head it runs," she said.

"Many of these businesses don't recognise the gradual slide in productivity and profitability that comes with an Indian couch monoculture."

Keeping the couch at bay

Fran and Damien are firm believers in paddock rotations and wet season spelling and consider good grazing management fundamental to their breeding enterprise, which produces Brahman-cross steers for live export and bullocks for the domestic market.

"In basalt country, Indian couch can't establish itself en masse unless it's given an opportunity, and that opportunity is usually over-utilisation of native pasture, especially during prolonged drought," she said.

"Our experience is that if you look after pastures, spell them and don't overgraze them, Indian couch is restricted to isolated areas such as around water troughs."

Fran said finding the courage and resources to rest paddocks while emerging from four years of drought was a challenge, but producers needed to find a compromise to preserve their pasture quality.

"Further research at a regional or land-type level into how Indian couch behaves may demonstrate how land managers could significantly speed up their pasture recovery times following drought," she said.

"Established perennial pastures are quicker to respond to rainfall events than species that have to reproduce regularly from seed.

"Indian couch, as a short-lived perennial or biannual plant, has to reproduce from seed more often than the native, longer-lived perennial species.

"As a result, as long as a viable seed bank for native perennials remains in the soil, tailored grazing land management that removes grazing pressure from the more palatable native perennial species may theoretically allow native perennials to re-establish and potentially out-compete Indian couch.

"However, this is yet to be demonstrated scientifically."



Cattle breeder and veterinarian Fran Lyons accepts Indian couch has its place as an effective ground cover.

However, she would feel more at ease if research could fill the knowledge gaps on the best grazing and land management practices to return Indian couch-dominated pastures to native perennial grasses.

"You can't go so far as to call Indian couch a weed because in many areas it provides ground cover where otherwise there would be none," Fran said. Fran is pictured above with her husband, Damien, and children Joseph, 6, Luke, 4, and Angela, 1.

"It also withstands continuous, heavy grazing, which our native species struggle to do."

Working as a cattle vet around Charters Towers, Fran has seen Indian couch-dominant pastures lower productivity on properties where long-term carrying capacities have not been reduced in line with the decreased pasture yield caused by Indian couch infiltration.

"Lower calving rates, higher breeder mortality and longer turn-off times are all seen where stocking rates are maintained in the face of reduced pasture yield," she said.

"While Indian couch may produce 600-1,200kg of dry matter/hectare (DM/ha), native basalt pastures may produce

Business management



Alison's tips for a robust business:

- → Use a range of tools, resources and professional networks.
- → Invest in planning and develop realistic goals to capitalise on opportunities and build resilience.
- → Skill development and education for all team members is vital.
- → Monitor and evaluate against goals and objectives regularly.
- → Keep a clear head. Take time out to focus on your own health and wellbeing.

Family farming often means dealing with curve balls, but for Tasmanian producer Alison Napier a traumatic event left her having to navigate uncharted territory. Today she can reflect on how she used planning, skill development and a range of resources to establish a new path with direction.

When her husband Alan took his own life in 2009, Alison was left with three primary school children to raise and a livestock business to run. As she told this year's MLA-sponsored Tasmanian Red Meat Update, her approach to taking over the day-to-day management of an enterprise she'd only been involved with at a business level was to get back to basics.

"For me, my business is about managing my people, my grass, my livestock and my budget," Alison said. "But I never lose sight of the bigger picture."

Alison grew up on a family farm on the east coast of Tasmania and has a tertiary background in

education. Although she worked with Alan on the business, with three small children and a teaching position at the local school, she didn't work on-farm at an operational level.

"Fortunately, we'd been involved for a number of years in the RCS ExecutiveLink process, which was fundamental in us taking a strategic approach to our business," Alison said.

"The things that were important to Alan and I then remain important to me now: to have clear business and personal goals and objectives."

In the beginning

Alison acknowledged that she was thrown in the deep end, with plenty of gaps in her knowledge.

"I quickly identified a need to develop not only my own knowledge and skills, but a professional support network – a structure of people involved in my business across all levels, including advisers, consultants, livestock agents and staff," she said. She also sought support from an informal network including family, neighbours,



friends and other business operators.

"I had to ask a lot of questions and get advice from my network, because I was suddenly running a business that wasn't my specific area of expertise.

"To ensure I communicated consistent messages across my support networks, I put in place clear and documented formal procedures, processes and strategies which helped me get everything out of my head and onto paper."

Seven years down the track, this level of formality and clearly articulating and writing down goals and objectives continues to support Alison's decision making.

"I ask myself: 'Does it fit within my goals? Does it fit in with the way I want to run my business?' My core objectives are a filter for all of the information that comes in."

Prepared for the long haul

Alison describes her approach as a long-term process, not a one-off event. It started with setting realistic big-picture goals and objectives and determining what is required to achieve these goals.

"Knowing and understanding exactly what the business is and being able to have an honest look at how it is currently performing are essential," she said.

Alison is the first to admit it has taken considerable commitment, time and energy to develop goals, objectives, policies and procedures across the breadth of the business, but says it is more than worth the effort.

"They operate on all levels – from where

I want to be in 10 years and how I might achieve this, to managing my cow condition score and grass through a dry season, through to which bulls I will potentially bid on at a bull sale and how I can keep myself and my staff safe at work," she said.

"They act as a guide for me and those involved in my business. They help me sleep well at night and take a lot of stress and emotion out of decision making."

Flexibility in strong foundations

While others may perceive Alison's approach as overly prescriptive, she is keen to clarify that it delivers her business critical flexibility and allows her to take time out of the business with the confidence it will remain healthy and continue on in the direction she needs it to in her absence.

"It isn't an inflexible plan that sits on my office shelf," she said.

"It is live, it is practical and it is useful.

"Agriculture is unpredictable and a rigid system simply wouldn't work, but being clear about where I'm going with my business and how I can best get there with the natural and human resources I have on hand allows me to keep heading in the right direction, even when I come across roadblocks.

'Some of the roadblocks I have come across have been huge, others are smaller challenges all producers face, but they can still be difficult to manage at the time."

Professional development

Alison, her children and her staff regularly participate in training and have completed courses in low-stress stock handling, pasture management, four-wheel motorbike training, livestock trading and general farm operation and safety. Here she shares the more recent courses and tools she has discovered and their benefits.

- → MLA's BusinessEDGE: "The two-day MLA BusinessEDGE workshop centred around economic sustainability, understanding business performance and managing the financial risks. Being able to generate meaningful reports with accurate up-to-date information helps me and those who support my business with decision making across all the levels – from big picture decisions to small everyday ones." mla.com.au/edgenetwork
- > MLA's More Beef from Pastures' Pastures Principles: "I really value evidence-based information, which is what I enjoyed about Pasture Principles. It helped me understand the science of growing grass." mbfp.mla.com.au
- → MLA's Rainfall to Pasture Growth Outlook Tool: "I use this when making strategic grazing decisions." www.rainfall.mla.com.au

For more advice, tools and resources on building personal and business resilience see pages 6-9 of this edition.

Organic production

Interested in going organic?

Increasing demand for organic beef, coupled with an attractive 25¢/kg liveweight premium is a huge incentive for producers to change their traditional production system. But how do you know if organic farming could work for you and where do you start?

An MLA Donor Company and Australian Organic Meat project to increase the number of certified organic beef suppliers in Australia contracted Organic Systems and Solutions consultant Marg Will to support producers transitioning to organic. She said operating as an organic beef producer was becoming easier.

"As more organic beef producers establish, so do the number of industry suppliers who provide organic products such as supplementary feeds, fertilisers and pest control options," Marg said.

"In the past, sourcing these was quite difficult at times, but it is far less so now."

In the 12-month project, 59 properties run by 30 enterprises turning off 30,000 head were supported to transition to organic certification. As a result, this year will see the first fully certified organic cattle for sale.

Marg said one of the biggest hurdles for many producers was the lack of knowledge and understanding of what was required.

"Many people don't realise that organic beef enterprises can still vaccinate - animal welfare is considered paramount," she said.

"Organic producers can even treat individual animals with antibiotics, as long as they satisfy certain requirements, without jeopardising their property's organic status.

"The individual animals lose their organic status but not the entire operation."

For producers interested in becoming organic, Marg has the following advice.

1. Do your homework

Marg emphasises the importance of producers understanding their motivation for pursuing organic status and warns that switching from traditional farming to organics is no silver bullet for saving the farm.

She said producers shouldn't be under the illusion that organics was less work.

ear tag or a different coloured ear tag," she said. "It's important to have procedures you can do easily and that fit into your production

system."

3. Seek help

Changing business models is demanding so Marg recommends producers involve financiers and advisors in the journey.

"It's not a management style of neglect,

"Successful organic beef producers are good business managers who have strong feed budgeting, pasture management and

financial skills and all these are necessary to ensure long-term sustainability." Marg recommends becoming familiar

with the Australian National Standard for

Lifetime traceability of animals and being

treatments for audit purposes is crucial for

need to be labour intensive, it just needs to

be practical and involve as few changes to

the existing production system as possible.

"Animals can be traced on a mob basis and

tracing animals that lose their organic

status can be as simple as a notch in the

able to record all animal and paddock

Marg said the way this is done doesn't

Organic and Biodynamic Produce.

2. Ensure traceability of stock

organic enterprises.

quite the opposite," she said.

'Becoming certified organic is a three-year process involving risk assessments and audits," she said.

"Producers need to have good advice to keep costs to a minimum and be well prepared for the pre-certification (initial 12 months) and in-conversion phases (following two years) to ensure as few obstacles as possible to achieving organic status within the minimum three years."

·(i)	Marg Will, Organic Systems and Solutions T: 0417 674 790 // E: marg@ organicsystemsandsolutions.com
۲	Resources: Training videos to get started www. organicsystemsandsolutions.com/ australian-organic-beef/ Australia's National Standard for Organic and Biodynamic Produce www.agriculture.gov.au/export/ controlled-goods/organic-bio- dynamic/national-standard



Snapshot

Miles and Penny Armstrong, 'Goondoola' at Weengallon, 90km south-east of St George, Qld



Property: 9,717ha

Enterprise: Operation in conversion to supply organic beef to Japanese Ox trade and cropping (wheat harvest and oats and forage sorghum for grazing) Livestock: 500 self-replacing Droughtmaster-

and barley for

Santa Gertrudis-Angus cross cow herd **Pasture:**

Buffel Soil: Cracking grey clays to brigalow belah and red box country Rainfall: 525mm



Producers road-test alternative

For Queensland producers Miles and Penny Armstrong the choice to 'go organic' was logical.

The couple could see their production system at 'Goondoola', 90km south-east of St George, was already closely aligned with organic guidelines and that little extra outlay would be required to formalise their status and realise market premiums.

"At this stage we've got about 7,287ha of our 9,717ha certified fully organic, the remainder is 'in-conversion'," Miles said.

"The speed with which country can be converted is very much influenced by its use in the past. For example, our grazing country became organic first while some of the cropping country will take longer because of herbicide/pesticide use.

The Armstrongs' top tips for making the organic transition smoother:

- ightarrow seek professional help and support
- ightarrow fully research organic alternatives for your system
- ightarrow keep good records from the beginning.

"We're hoping to achieve full organic status within the next two years."

The opportunity to capture organic beef premiums is still another 12 months away with their organic-certified weaners needing some time to grow to meet Japanese Ox market specifications (280kg carcase weight).

Starting out

Miles and Penny took the organic road after attending an MLA Donor Company and Australian Organic Meat project seminar at Roma in 2014, designed to lift the supply of organic beef.

"We could see organic beef production as a viable option to improving our beef enterprise profitability from our existing production system, while reducing overall risk," Miles said.

"The seminar really made us think it was achievable and provided us with the starting point."

The couple agreed the biggest initial challenge was the paperwork and engaged a consultant, Organic Systems and Solutions, to help them get started.

"Their input in the process, as well as providing us with a broader understanding of organic farming principles relevant to our system, was absolutely invaluable," Miles said.

All animals on Goondoola carry crossreferenced management tags and NLIS tags, recorded in an Excel spreadsheet, to ensure lifetime traceability and accurate records of any treatments.

Initially, Miles and Penny had to organise

veterinary declarations for any vaccinations they used in their herd, such as 5-in-1 and 7-in-1. These were recorded on their organic input register.

Each year the enterprise is audited, which costs several thousand dollars, however, Miles believes this to be reasonable in the context.

Taking the road less travelled

Miles believes there is nothing like a severe drought to road-test a production system and the management system behind it.

"We've been drought-feeding on and off for almost three years," he said.

"Prior to going organic, we supplemented with blocks and barley straw hay.

"As we are in-conversion, we've only been able to feed them our own organic grain stubble and mulga."

He said the key benefit of becoming certified organic will be their ability to maintain cash flow while reducing stock numbers, enabling their property to recover faster and become more resilient to drought.

However, he sees another protracted drought as a challenge for all organic production systems.

"Being able to source reliable supplies of organic supplementary feeds is a big concern – without them, producers may be forced to sell off stock but, in our favour, these options are increasing in number and variety all the time," he said.





Employee Michael Eales tagging twin calves shortly after birth. The mother of the cow pictured was in the first batch to go through advanced weaning in the trial on Frances Toohey and Dave Pilkington's farm. See case study over page.

Weaning

Work on weaners pays off

An MLA-funded on-farm demonstration has found the determining factor in the success of any cattle weaning technique is maximum human and dog contact with the stock.

Martin Dunstan, Farming Systems Demonstration Project Leader at Agriculture Victoria, managed the demonstration and said six farms took part and each trialled two of the three weaning methods being assessed - paddock weaning, yard weaning and advanced training.

"By preparing weaners well, we can reduce the incidence of dark cutting due to high stress levels, minimise bruising during handling or loading, increase weight gains, reduce the need for repairs to cattle infrastructure and improve on-farm safety for stock managers," Martin said.

"Yard weaning is generally accepted as a proven technique for improving ease of handling and the ability of cattle to handle stress.

"However, producers involved in the trial had reported mixed success and so were keen to compare a range of weaning and induction methods in a demonstration."

Advanced training, taught in this demonstration by stock training consultant Neil McDonald, is similar to yard weaning but involves more hours of human and dog contact including familiarisation sessions with the stockyards, going into the race, through the crush and into small holding yards, as well as being moved between small paddocks.

"Some producers did not want to use dogs and adapted their usual cattle moving techniques to the process," Martin said.

The results

The weaners were weighed and their flight speed from the crush measured (as an indicator of quietness) on day one, at the end of week one and again at the end of week six.

"Results showed that, at weeks one and six



"There was considerable variability in the results of the demonstration, but the group concluded handling weaners more during yard weaning produces cattle that are quieter and easier to handle."

There were no consistent weight-gain benefits observed for the advanced training groups, with other factors such as genetics, temperament and feed likely to impact differently on individual animals.

Top tips for successful yard weaning

MLA has produced a new video where Northern Territory cattle producer Jay Mohr-Bell shares his top tips for getting the most



out of yard weaning and how it sets his livestock up for a lifetime of productivity and low stress. www.mla.com.au/weaning

Martin said the take-home message from the exercise was that spending time with weaners and familiarising them with the yards and being handled and moved was a valuable investment for both home-bred and purchased weaners.

"In most commercial situations it is difficult to cull on temperament alone, so we have to make compromises," he said.

Read how two participating enterprises now manage their weaning programs on pages 32-33.

Animal health

Advanced training method yards ahead

For Frances Toohey and Dave Pilkington of Sandy Point, including their cattle in the South Gippsland Beef Producers Group's weaning trial was a learning curve, and they haven't looked back.

They used 120 of their home-bred weaners to compare their normal weaning practice – a combination of yard and paddock weaning – with the advanced training method, to see which approach yielded more docile cattle and better weight gains.

After the six-week trial, the weaner mob that underwent the advanced training had lower flight scores and gained, on average, 13kg/head more than the paddock weaners.

Frances and Dave run their enterprise over a number of farms that are several hours' drive apart, and they need to truck some of the calves home for weaning. Often the calves have had little contact with people up to that point.

"They overnight in the yards and next day they go into paddocks with good pasture and on silage," Frances said.

"The cattle stay in the paddock during the day, are yarded at night for three or four days and, during that time, we'll walk them through the yards to familiarise them."

Despite the calves being on silage and good pasture, the usual yard-paddock weaning method was not producing weight gain.

Change on the run

Frances said that although achieving an accurate comparison between the two weaning methods was difficult, they could see the advanced training method was more effective at quietening cattle than their traditional practice.

"In advanced training, the calves are taught to accept pressure from dogs as they are brought towards the handler," she said.

"Once the calves are compliant, the dogs are told to sit and keep their distance and the calves quickly learn that being around the handler is the safe or 'relief' zone."

Snapshot

Frances Toohey and Dave Pilkington 'Doonagatha', Sandy Point, Wilsons Promontory, South Gippsland, Victoria



Property: 600ha (owned, leased and agistment)

Enterprises: Angus, Angus-cross and Hereford beef breeders

Livestock: 700 breeders

Pasture: Ryegrass and clover

Soil: Sandy loam to peat Rainfall: 1,000mm

Frances said they were already using dogs for paddock movements but not to the extent required for the advanced training method,

"The biggest difference I saw was when the stock contact or working time was over, the advanced training mob would settle down and eat," she said.

"Ours would still be walking the boundary."

and not at all in the yards.

Frances said they found the more they learnt about advanced training by watching stock trainer Neil McDonald and his team of dogs, the more they changed their weaning practices.

'By the end of the trial, what we were doing was already very different from what we had done in the past," she said.

Weaning now

Two years on, Frances, Dave and their employee, Michael Eales, have further adapted their weaning protocol and believe their cattle are now quieter and more manageable.

"In an ideal world, we like to lead feed to get the weaners accustomed to a pellet ration, but we don't always have time - nor is it always practical," Frances said.

"In handling the weaners, we use our dogs a lot more and, although there are times when we are in a hurry when we move a mob into a fresh paddock, we make sure we put the dogs around them and block them up at the gate or at the water. This ensures that we leave them, not the other way around."



Frances Toohey and Dave Pilkington E: doonagatha@gmail.com or see more at www.facebook.com/doonagatha

Calm cattle win out

Weaning cattle using advanced training techniques may take time and commitment but South Gippsland producer Shane Harris (pictured) is convinced it produces the best results.

Shane and his wife, Claire, of 'Harris Farms', took part in an MLA-supported on-farm weaning trial that compared techniques to see which were best at quietening cattle and reducing weight loss.

Claire, who is also an Agriculture Victoria beef industry extension officer, was involved in the experiment design and data collection.

Shane and Claire put 100 Angus weaners in the trial (divided into two groups of 50) and compared their traditional paddock weaning method with advanced training, a technique that relies on the use of well-trained dogs and a sound understanding of the concepts of pressure and relief.

They had previously favoured paddock weaning, as they felt it avoided some of the respiratory and pink eye issues sometimes encountered when confining cattle, but the trial proved otherwise.

Shane said at the end of the trial the two groups were "chalk and cheese".

"The paddock-weaned mob were left on good pasture and were basically untouched, while the advanced training mob were worked with dogs for half-an-hour to an hour each day," he said.

"By the end, the paddock-weaned mob weighed about the same or slightly better, but they weren't quiet at all.

"The advanced training mob, which was also moved through the yards and crush as part of their routine, were really quiet - you could almost touch them in the paddock."



Shane said that 'quietness' was also reflected in flight speed data, with the advanced training mob recording slower times than the paddock-weaned mob after the first week.

Making changes

In the two years since the trial, Shane and Claire have embraced advanced training and now use their dogs for all their stock movements.

They have also moved away from injectable drenches to using pour-ons, as they believe too many needles upset young stock.

"It's really important that those first experiences with us are good experiences," Shane said.

The heifer weaners from the trial have now had their first calves, and Shane is convinced sound training at weaning sets the animal up for life.

"If we have to pull a heifer, we walk her down the road to the yards," he said.

"The steers put on weight faster because they're calm and, now word is getting out how quiet our cattle are, we're getting more inquiry from buyers." Shane and Claire Harris, Dumbalk North, south-east of Leongatha, South Gippsland, Victoria



Property:¥ 810ha (owned and leased) Angus and prime lamb breeding and cattle trading

Livestock:

600 breeding cows 1,400 trade stock, 1,600 ewes, 2,000 lambs

Pasture: Rvegrass a

Soil: Red, grey clay and sand peat

Rainfall: 1,075mm

Shane and Claire breed about 60 commercial bulls each year, based on Queensland and New Zealand bloodlines, with their focus on a more compact type.

"When people come to look at our bulls they're really impressed with how easy they are to work with and their calmness," Shane said.

"We've also applied the same principles to our sheep and we are seeing the same pleasing results."



Reproductive efficiency

Turn your cows into **CashCows**

Northern cattle producers now have access to a first-of-its-kind, practical resource developed specifically to help boost the productivity of their breeding herds.

The step-by-step guide is one of the outputs of CashCow, funded by MLA in partnership with the University of Queensland and the Northern Territory and Queensland governments, to help bolster performance in the northern beef herd.

The CashCow project team included veterinarians, beef production researchers and epidemiologists who collated and analysed data from around 78,000 cows in 142 breeding mobs across 72 northern breeding properties.

MLA General Manager - Producer Consultation and Adoption Michael Crowley said the assessment identified factors affecting breeder reproduction and developed solutions that can be adopted by producers.

"Ensuring production efficiencies in the northern beef herd is an ongoing challenge. In turn, this can impact the financial performance of northern businesses," Michael said.

"This toolkit encourages producers to ask themselves 'could my herd be more productive?' and provides an introduction to understanding their herd's productivity and possible causes of poor performance."

The guide provides four steps and advice on how to gauge production and performance:

- 1. Recording the right information
- 2. Understanding what is achievable for your operation's environment
- 3. Identifying the causes of low productivity
- 4. Assessing management options.

A range of suitable solutions which can address issues and enhance performance have also been provided, and include such actions as managing the feedbase, lactation, breeding, health and stress.



Weaner production per cow retained

The guide 'Could your herd be more productive? An introduction to understand your herd's productivity and possible causes of poor performance' is available at www.mla.com.au/cashcow

Market compliance



A life-changing accident has spawned an innovative business for Queensland cattle producers Rob and Sarah Cook.

In January this year, the Cooks (pictured) opened the MSA-licensed paddock-to-plate butcher shop, Tender Sprouted Meats at Bundaberg, selling their own MSA-graded beef, which is raised on barley sprouts.

The new business came less than 10 years after their lives changed forever on 30 September 2008. While mustering on his family's Northern Territory cattle property 'Suplejack', Rob was in a helicopter crash that left him paralysed from the shoulders down.

The champion bull rider spent three months on life support at the Adelaide Hospital and another seven months in rehabilitation.

In 2009, Rob and Sarah and their sons Braxton, now 10, and Lawson, now 8, returned to Suplejack where Rob's parents and three siblings still live. But it was difficult to find full-time carers willing to move to the NT's most remote cattle station.



So the family of four packed up and hit the road in search of greener pastures.

Ten months of travelling around Australia searching for their new home led them to Central Queensland.

Aside from the flat, open, irrigated country, found just 30km west of Bundaberg, the Nuffield Scholar said he and Sarah were drawn to 'Werribee' as they saw the potential for an "intensive cattle finishing operation".

"Sarah and I were always aware of drought so we aimed to safeguard our business by minimising the risk," Rob said.

"We had been using a Fodder Solutions barley sprouting unit in the Territory so we saw the potential for this new venture."

The system

Today Rob uses the MSA Index to guide his feeding regime, which produces the beef now lining the shelves of Tender Sprouted Meats.

"Becoming MSA-accredited had nothing to do with the premium ... though that is nice," Rob said. "I'm a big believer in the idea that you can only manage what you measure. If we were going to start retailing our own beef we needed the full picture.

"I know how to raise cattle on grass but what you see in the paddock and what you receive on the plate can often be deceiving. By adding the sprout feeding regime we can control daily weight gains at different stages of development because we noticed the huge impact this has on eating quality (and index scores).

"Being exclusively grassfed, marbling is our final hurdle so we're looking at using genetics to prop us up in that area."

The paddock

The sprouting shed produces about 1.5 tonnes of barley sprouts per day.

With 100 head consuming about 15kg/day

www.tendersproutedmeats.com.au



To see more of Rob's story, watch the Landline story that aired on 4 September 2016. Search 'Rob Cook' at **www.abc.net.au/landline**

Snapshot Rob and Sarah Cook Central



Properties: 'Werribee', 'Cabbage Tree' and 'Tandara'

Size: 1942ha

Enterprise: Paddock-to-plate sprout-fed beef

Livestock: Black Brangus

Pastures: Black-tipped speargrass, Callide Rhodes grass, creeping bluegrass, fine stem and Seca stylo legumes

Soil:

Coast light soils to heavy creek flats with some granite country **Rainfall:** 950mm

> "That way all the butcher shop needs to do is ring me up and say 'I've got body number 856', and I can look it up and we can tell the customer everything about the animal." As well as standing by the quality of their

As well as standing by the quality of their in-house dry-aged meat, backed by MSA Index scores averaging 59-60, Rob said the barley sprout-based diet gave the meat a "rich nutty flavour".

- "There was never a time where I thought we'd get out of cattle," Rob said.
- "I fought pretty hard those first few months just to stay alive, but then I fought the next four years to get back in the beef industry.
- "This was never in the too-hard basket; it's what we know and love. Without Sarah by my side none of this would be possible."

To predict the potential impact of production changes on your scores visit the MSA Index <u>calculator</u> **www.mymsa.com.au/msamobile/**_____

Rob's cost of production sits at around 12c/kg.

Rob's feed mixture generally includes 1.5 tonnes of barley sprouts, hay, mineralised molasses, molasses, cottonseed meal and sweet potatoes.

The Cooks' 730 head of cattle are run across three properties at Bucca, Gin Gin and Agnes Water.

The Agnes Water block is home to about 400 breeders.

Calves are moved to 'Cabbage Tree' at Gin Gin for weaning and backgrounding, before moving to Werribee when they reach about 350kg for finishing.

At Werribee, the 100-head herd will rotationally graze in small three hectare cells for four to five days at a time.

Cattle are handled in a low-stress environment and loaded in yards purpose-built to be controlled via a joystick, enabling Rob to work the race and crush.

The plate

Biggenden Meatworks, who process (and MSA grade) three to four bodies a week for us, has been fantastic to deal with and their system allows us to correlate our NLIS tag with the body kill number, giving us complete traceability," Rob said.

Feedbase

Rapid rhizobia identification a reality



Legume pasture quality and yield is driven by good quality rhizobia. A test is now available to producers to discover what rhizobia exist, and if the strain is optimal for legume nodulation and nitrogen fixation.

The technology was developed with MLA funding by Dr Sofie De Meyer (pictured) from Murdoch University. Known as MALDIID, it tests proteins in root nodules and the technology provides rhizobia identification within minutes.

"Until now, identifying rhizobia has been time consuming and labour intensive, taking four to six weeks. Producers can now access results for their pastures within a two-week turnaround (from submitting samples)," Sofie said.

"Each plant has specific rhizobia and it is essential that legume pastures are inoculated with the correct and current rhizobia strain or group. This allows producers to make better decisions about whether inoculation has been successful, or if effective nitrogen fixation is occurring."

The MALDIID testing provides producers with information on whether they have the current group of inoculants in their legume pasture and, depending on the result, provides several management options.

"The MALDIID test results provide one of the puzzle pieces in the producer's whole

paddock health survey," Sofie said.

MLA-funded research linked to this project has shown that factors such as soil pH, soil nutrient levels and herbicide application will also affect legume pasture performance.

Recommendations include re-sowing, which is the most expensive option, or pasture renovation by applying the correct rhizobia inoculant. Granular inoculants can be drilled into the soil during the sowing phase of the last non-legume crop in the rotation. Producers can also sow pre-coated seed, spray a liquid inoculant or use a peat application.

"Using a granular inoculant means the rhizobia is much more protected from the environment and the rhizobia stay alive a lot longer in the granules," Sofie said.

Further research is required to determine the most cost-effective method of applying rhizobia.

Sofie highlighted the importance of reintroducing rhizobia after an extended period of continuous cropping, as research shows when the host legume plant has been absent for several years, the number of rhizobium per gram of soil will decrease dramatically.

Take a test

To submit samples for MALDIID testing:

- 1. **Dig out** four plants in each location in the paddock. Aim to sample at least two or three different locations per paddock.
- 2. **Wash** the roots in a bucket of tap water.
- 3. **Cut off** the green part of the samples and place the roots in a clearly labelled zip-lock bag (one sample per bag). Samples can be stored in the fridge for up to a week or in a freezer for several months.
- Post the samples to the address on the MALDIID website: www.maldiid.com (The cost is currently \$70/sample, but it is anticipated this will reduce as volumes increase).

Dr Sofie De Meyer E: info@maldiid.com www.maldiid.com
Cattle projections

Dust to deluge - restockers fire 2016 cattle market

The combination of high demand and tight supply provided the Australian beef industry with a remarkable ride in 2016. But what's ahead in 2017? Here MLA Manager Market Information Ben Thomas explains the forces at play for the next 12 months.

The market momentum from 2015 carried right the way through 2016, with Australian cattle prices continuously finding new highs (Figure 1). However, the big change was the shift from strong international demand driving the market to extremely strong restocking interest in the wake of the greatest herd liquidation in more than 35 years.

As a result, the 52-week rolling average eastern states cattle slaughter ventured from in excess of 160,000 head a week in the later stages of 2015, to below 130,000 over the course of 2016 (Figure 2).

The tight cattle availability will continue to underpin the market during 2017. Those making investment decisions at such high prices need to be wary of the correction that may occur when Australian beef production eventually starts ramping up again, and especially now the trade environment is much weaker than it was in 2015.

Considering the national cattle herd is now at a 20-year low, at 26.2 million head, expectations are for the numbers processed to average below 120,000 head for the duration of 2017. The result will be a transition from record high eastern states cattle slaughter, to record lows.

Moving away from beef production and to beef prices, one of the best indicators of global movements is imported 90CL (90% chemical lean frozen cow indicator) prices to the US, as it's one of the largest traded beef items to the largest market. As a result of the 5% increase in US beef production during 2016 to 11.3 million tonnes cwt (Australia is forecast to produce 2.2 million tonnes cwt in 2016), the market has softened considerably.

In fact, rolling monthly average imported 90CL prices have shifted from being in excess of 670¢/kg FAS (free alongside ship) towards the end of 2015, to below 600¢/kg FAS presently. Expectations are for this market to keep moving lower as a result of a further 3% increase in US beef production expected for 2016, on top of a 2.5% rise in poultry and 2.7% rise in pork production. In other words, the US is forecast to have plenty more domestically produced protein.

The consequence of this is two-fold. Firstly it limits the demand for imported beef, which for 2017 is expected to be 12% lower year-on-year at 1.18 million tonnes swt, meaning weaker demand for Australian product. Secondly, the greater US production will leave more available for export, resulting in stronger competition in markets like Japan and Korea.





Back at home, widespread winter rainfall across virtually all of Australia is set to provide southern producers with abundant feed for the remainder of the year. The result has been extremely strong restocking interest causing the market to surge. This momentum is likely to be carried through to the end of 2016 and first half of 2017, especially if northern Australia receives good summer rainfall.





MLA in the news

What do the approaching global headwinds from international markets like Brazil and the US mean for the Australian beef industry? MLA's Managing Director Richard Norton discussed this on ABC's Landline recently in a market report with Kerry Lonergan. When posted online post broadcast it attracted more than 10,000 views. If you missed it go to **www.abc.net.au/landline** and search "Richard Norton".

CoMarketing

Brand smart

MLA's investment in brand marketing is helping Australian companies build customer loyalty while returning value to cattle, sheep and goat producers.

Almost 70 Australian meat companies are benefiting from strategic marketing knowledge developed through MLA's Collaborative Marketing (CoMarketing) Program, which gives industry access to professional expertise and support. Significant gains are also filtering down the supply chain to producers.



MLA Industry Marketing Programs manager Samantha Jamieson said the CoMarketing initiative, which leverages brand owners' marketing funds against industry funds (levies), was enabling brand owners and industry to boost their marketing efforts and achieve sustainable brand growth.

"MLA's marketing programs promote the unique nutritional



In 2015-16, MLA invested

\$2 million to support 492 beef

marketing activities in 30 countries

benefits of beef and lamb in our domestic market, and differentiate Australian beef and lamb from competitors' products in export markets by promoting the safety, quality and integrity of our red meat products," Samantha said.

In 2015-16, MLA invested **\$207,500**

to support 35 lamb marketing activities in 12 countries

Recent activities supported by the CoMarketing program include:

- → consultation with marketing professionals and agencies to develop effective brand marketing plans
- → social media brand awareness campaigns
- → magazine and billboard advertising
- → sponsorship of trade delegations to inspect paddock-to-plate supply chains
- \rightarrow in-store sampling
- \rightarrow chef education initiatives.
- "MLA's co-investment through the CoMarketing initiative is expanding the reach of branded Australian beef, lamb and goat



marketing programs through our global markets to build customer preference and premiums," Samantha said.

Early results indicate the program is achieving MLA's objectives to build marketing capabilities within the industry and deliver value back down the supply chain. Producers are increasingly recognising the advantages of a strategic customer-centric brand marketing approach over a commodity product sales approach."

In 2015-16, MLA invested **\$11,000**

to support 10 goat marketing activities in two countries

While MLA rated 63% of applicants as having 'high or very high' strategic marketing plans in 2014-15, the measure

> Samantha Jamieson E: sjamieson@mla.com.au

increased to 75% in 2015-16, and to 93% this year (2016-17) - demonstrating significant improvement in the marketing capabilities of companies after two years' involvement in the program.

The number of beef brands supported by MLA has increased by 42% since the program's launch; the number of sheepmeat brands has risen by 66%, and utilisation of the program has also improved.



The CoMarketing Program's success has given MLA the confidence to allocate \$3.1 million to collaborative marketing activities in 2016-17, which will provide greater support to some 69 companies representing more than 300 brands.

Turn over to read about recent MLA CoMarketing projects delivering returns.

CoMarketing Program eligibility criteria and guidelines are outlined at: https://comarketing.mla.com.au/

39 Growing demand



Developed with support from MLA's Collaborative Marketing (CoMarketing) Program, the new brands, Westholme and Wylarah, were launched in early October at the Spago by Wolfgang Puck Restaurant in the Marina Bay Sands, Singapore.

Westholme beef is raised on grass and is grain finished. Wylarah is AACo's most premium beef brand, and includes only the most exclusive cuts from the finest animals. Every carton of Wylarah contains a hand-signed certificate to reinforce its authenticity.



"The big drivers behind the establishment of the Westholme and Wylarah brands are firstly eating quality and performance for our customers," AACo CEO Jason Strong (pictured below left at the launch) said.

"Secondly, it is making sure that these brands represent the true history and heritage of AACo so that we can deliver to our customers a fantastic experience every single time."

Jason said Singapore was chosen as the initial market destination for the new labels due to its sophisticated restaurant sector and existing buyer relationships.

"Ultimately, both brands will be available in numerous markets," he said.

Jason said the company's brand strategies were constantly evolving to meet customer demand and, ultimately, plans were to refine branding from 10 to five brands, with every kilogram of AACo produced beef to be sold under one of these five brands.

"We appreciate the investment from MLA through CoMarketing in this marketing program," he said.



"It helped us to create some of the brand collateral that has been integral to our launch program."

AACo is Australia's largest cattle producer and operates a vertically integrated business with extensive landholdings, feedlots, processing and an export division.

> More information: www.aaco.com.au www.westholme.com.au www.wylarah.com.au

CoMarketing

Raising the flavour of beef



Kerrigan Valley Beef is an accredited feedlot and mixed farming operation near Hyden, 360km from Perth in Western Australia's wheatbelt. The business is owned and operated by second-generation producers Trevor and Sharon Hinck; their son Craig and his wife Lauren oversee the cropping enterprise.

The Hincks launched the Kerrigan Valley Beef brand five years ago, and established an alliance with sole distributor, Karradale Meats, two years later to establish a fully traceable, integrated paddock-to-plate food production system.

Cattle are sourced from the Great Southern and Esperance regions or bred by the Hinck family, then backgrounded on the property before entering the feedlot, where they are grain fed for 80 to 120 days.

In addition to family members, the business employs two permanent staff and a number of casual workers during seeding and harvest. It has an annual turnover of about \$3.6 million.

Sharon Hinck spoke with Feedback.

As producers, what motivated you to develop a brand and move into the next

stage of the supply chain? We were driven by a passion to showcase our premium quality beef to the wider public. Consumers want to know more about what they are purchasing, and we have a story we are proud to tell: we produce healthy cattle raised on a nutrient-rich, home-grown diet in a quiet, low-stress environment. We uphold strict animal welfare practices, electronically tag our cattle for lifetime traceability, and maintain high environmental standards; our feedlot by-product becomes compost for our cropping operations.

Which markets are you selling your meat to? When we launched our brand, our objective was to sell 10 beef carcases a month in a competitive market. We now sell 45 bodies weekly and hope to reach 60 in the near future. Karradale Meats sells our product to 150 restaurants, butcher shops and other outlets throughout Western Australia. Our feedlot also supplies Woolworths weekly from January to September.

How has MLA CoMarketing funding supported your strategic growth plan?

CoMarketing funding has supported the development of branded promotional materials including an upmarket website and a DVD tracing the path of our product from paddock to plate to educate chefs, the food service industry and consumers. This is key to developing a trustworthy brand that will attract and retain customers.

How has the CoMarketing investment made a difference to your business?

Website traffic has increased significantly and is generating inquiries daily. The website update, together with the DVD, print materials and updated product labelling, have raised brand awareness and connected our product to our farming story. Brand activity has contributed to a 15% rise in new sales in the past year; we aimed to increase retail-ready product sales by 10% and have already achieved 30% growth.

What are your goals? We plan to achieve sustainable growth and a steady increase in market share by further improving our brand recognition and loyalty, and developing stronger relationships with suppliers, agents (integral to improved quality control) and customers. We also intend to find a niche export market that is looking for a close relationship with its supplier. This will be supported by the expansion of our breeding herd and a 50% increase in our feedlot size. Finally, we plan to diversify the business by expanding our cattle custom-feeding services.

Watch the video: vimeo.com/175800142 (long version) vimeo.com/175643689 (short version)

Quality meat direct from Bass Strait



Beef and lamb naturally

Childhood mates Alister Ferguson and Peter Gall were raised on cattle and sheep stations in central western Queensland. In 2005, driven by global demand for grassfed organic meat raised the way producers 'up north' had been doing it for generations, they co-founded The Organic Meat Company.

The company became Australia's largest organic meat processor, riding on the early success of organic exports, and merged with Cleaver's Organic Meat in 2012 under the Arcadian Organic & Natural Meat Co. banner. Arcadian employs 60-plus people across offices in Toowoomba, Sydney and its value-adding plant at Gosford in NSW. The company sources beef and lamb from more than 120 certified organic producers.

Marketing Manager Paul da Silva spoke with *Feedback*.

Flinders Island Meat was established in 2010, when father-son team David and James Madden (pictured) took ownership of a disused abattoir on the remote island. Their vision: market Flinders Island lamb as a premium product raised in one of the world's most pristine environments.

James concedes it was a hard slog. "It took us years and a hell of a lot of hard work to be in a position where we have the lowest bacteria counts in Tasmania, a shelf life comparable to the large export plants, and world-class packaging."

In addition to the small abattoir, Flinders Island Meat now owns a butcher shop in the island's main town, a farming enterprise and a meat distribution business in Melbourne supplying its own produce and meat from like-minded producers, to chefs and retailers. The company employs 20 staff and has an annual turnover of more than \$8 million.

James shared his story with *Feedback*.

What motivated you to develop a brand and move into the next stage of the supply

chain? We were involved in the boning/trading end of the meat industry and Dad, who had a farming background, was ready for change,

As producers, what motivated Alister and Peter to develop a brand and move into the next stage of the supply chain? Arcadian is

committed to ensuring every kilogram of the organic meat we process achieves a market premium. This means strong, enduring brands are essential.

Domestically, organic beef and lamb are sold under the Cleaver's Organic Meat brand, now also going into Chinese and Taiwanese export markets. In other countries, predominantly the US, we continue to sell under the established Organic Meat Company brand, as well as the flagship Arcadian Organic Meat Co. trademark, depending on the product and the customer.

Which markets are you selling your meat to?

Primarily an export business, we send product to nine countries including the US - our largest market. Domestically, we sell organic beef and lamb at 900 Coles and Woolworths supermarkets, and independent stores.

How has MLA CoMarketing funding supported your strategic growth plan? It

has underpinned mixed brand activities in export markets. Programs encouraging US retail customers to trial our products generated significant in-store purchases; and a 2015 Thanksgiving social media campaign, in so when we heard about the abattoir we seized the opportunity. We wanted to realise the added value in the quality of livestock produced on Flinders Island, but there was no underlying plan or grand design in what has become a very vertically integrated business. Call it dumb luck or divine intervention – one thing led to another.

Which markets are you selling your meat

to? Our product is focused on Victoria's high-end foodservice and butcher retail markets. With only 200 lambs processed each week, there is not a lot of product to go around, and we take pride in fulfilling our brand promise of superior quality.

How has MLA CoMarketing funding supported your strategic growth plan?

After five years of diversification we had an image problem: the company and its products were branded under the same banner. CoMarketing funding enabled us to develop Flinders Island Saltgrass Lamb – a brand as unique as the product – that can also be used in export markets. A custom-designed website was completed and production of purpose-built cartons and packaging is underway. The CoMarketing program also supported the design and development of the Bass Strait Providores brand, which will enable us to pitch a new value-added supermarket range to a major retailer.

Did CoMarketing investment make a difference? It allowed us to undertake those projects much sooner than we could have otherwise afforded to. The development of both strategic brands provides a strong foundation for launching new products into domestic and international markets.

What are your goals? To roll out and evaluate the new brands' performance in the domestic market and explore options for processing lamb under contract on the mainland to facilitate a move into export markets. We also plan to bring the chef and the customer closer to the producer than ever before by communicating the story - the provenance of every product we sell.

) www.flindersislandmeat.com.au

partnership with Whole Foods Market in the US, prompted 30,000 Americans to visit the campaign's landing page.

CoMarketing has also supported strategies in new markets and facilitated Arcadian's attendance at the SIAL CHINA 2016 tradeshow in Shanghai, (see picture at right) which secured beef orders from two supermarket chains. Establishing business in China is an important growth objective.

Did CoMarketing investment make a difference to your business? CoMarketing has opened doors for Arcadian's organic meat trade into the US, Korea and China, and helped to consolidate brand programs targeting long-term clients in these markets. In turn, this has delivered premiums and secured supply partnerships with Australian organic producers.

What are your goals? To continue developing business in new domestic and export markets and our branded programs, backed by a constant supply of high quality product, will be key to this activity.



Product development



Dry-aged beef is trending on high-end restaurant menus and in gourmet butcher display cabinets. MLA, via MLA Donor Company (MDC), is backing the process with science to maintain product integrity and premiums.

Dry ageing is a traditional method of ageing beef to increase flavour and tenderness. The process, which involves storing meat in a low-humidity chiller, was overtaken by wet ageing with the development of vacuum-seal Cryovac technology in the 1960s.

Butchers, wholesalers, restaurants and supermarkets are now using dry-aged beef as a handcrafted point of difference to tempt the tastebuds of consumers and chefs.

MLA Project Manager for Meat Technology and Safety Long Huynh (pictured right) said that while tenderness improved with dry ageing, research showed little shear force (a tenderness-related characteristic) difference between wet and dry-aged product. The resurgence of dry-aged beef was more about creating a distinct flavour profile, which requires attention to several factors.

"Some dry ageing practices can cause undesirable changes in eating quality and food safety, so achieving the desired end product requires fine-tuning of the chiller conditions, such as humidity, air speed, temperature and use of UV lights," Long said.

To support red meat value-adders and retailers to achieve consistent, high-quality dry-aged product, MDC worked with Top Cut Foods – a division of food company Simplot – to develop guidelines for preserving the economic, quality and food safety characteristics of dry-aged beef. See side article 'Recipe' for dry-aged beef. No producer levies were used in this project.

Learning more about lamb

MLA has also backed the concept of dry-aged lamb, overturning the perception that dry ageing small, lean cuts of meat could result in high yield losses and have a negative effect on flavour.

Proof-of-concept trials found that after trimming and boning lamb to be 'plate ready', there was only 11% more yield lost from dry-aged lamb than the same wet-aged cut.

'We found dry ageing didn't have a negative impact on flavour; in fact, the biochemical process actually mellowed the flavour profile in stronger-tasting meat," Long said.

MLA Research, Development and Innovation General Manager Sean Starling said this could pave the way for producers to capture premiums for mutton and hogget, with the trial suggesting dry-aged sheepmeat products could sell for a 20-30% price premium over wet-aged lamb, based on the significant positive characteristics dry ageing adds to flavour.

"We've initially estimated that dry ageing just 10% of the available mutton supply could conservatively deliver more than \$3.5 million of new value to the sheepmeat industry," he said.

MLA is also investing in projects to better understand the biochemical processes during the dry ageing process and any pre-wet ageing treatment, and to evaluate the effectiveness of dry ageing red meat in shipping containers while in transit to overseas markets.

Meat Standards Australia protocols for dry-aged beef are in the pipeline in response to growing demand in Japan's steakhouse market.





Long Huynh // E: lhuynh@mla.com.au Sean Starling // E: sstarling@mla.com.au To view the final report and results of MLA's dry ageing trials go to: www.mla.com.au/dryageing

Watch MLA's chef Sam Burke explain the dry ageing process by going to YouTube and searching "exploring dry age beef."

'Recipe' for dry-aged beef

Ageing time: The suggested minimum time to gain the characteristic flavour profile and desirable tenderness is 14 days. Dry ageing for up to 43 days will improve meat flavour.

Temperature: Storing meat at low temperatures controls bacterial and fungal growth. However, the lower the storage

on the m

Mutton shines

temperature, the slower the enzyme action that tenderises meat and controls the growth of microbes. Aim for a temperature range of -0.5 to 1.5°C.

Relative humidity: If humidity is too high, it can promote bacteria and fungi; if it is too low, it can result in excessive evaporative loss (yield loss). Target a relative humidity range of 75-85%.

Air flow: Constant air flow around the entire cut enables even drying and minimises spoilage. Aim for a minimum air velocity of 0.2m/s to 0.5m/s.

Ultraviolet (UV) radiation: UV radiation can be used in the air filter in the chillers to improve the shelf life of meat. UV radiation at wavelengths between 200 and 300nm is effective at killing or damaging microorganisms.

South Australian produc ers and restaurateurs Tim and Sarah Burvill may have built their culinary reputation on beef but there is a new star on the menus at their Adelaide and Melbourne A Hereford Beefstouw restaurants: mutton.

That's right - a dry-aged, saltbush mutton loin has diners raving.

For the past five years, the Burvills have value-added to Hereford beef, including cattle from their own property, in their state-of-the-art dry ageing facility in the Adelaide Hills.

Their paddock-to-plate model has a strong international flavour. Tim (pictured above) and Sarah run the two Australian restaurants in partnership with Lars Damgaard, whose family opened the first A Hereford Beefstouw in Denmark in 1971. The Burvills also export drv-aged Australian Hereford beef to their sister restaurant chain, which has grown to 15 steakhouses across Scandinavia.

Ask Tim why he decided to try the traditional process of dry ageing with lamb, and his answer is simply: "Why not?"

In a trial at the Burvills' dry ageing facility, funded by MLA, dry-aged mutton out-performed standard wet aged lamb in a taste test at A Hereford Beefstouw, Adelaide.

"A tasting panel of food industry professionals, including chefs, found the dry-aged sheepmeat products were all higher in positive attributes, such as flavour and tenderness, and lower in negative attributes, particularly things like the metallic and livery characteristics that you can sometimes see in wet-aged lamb," Tim said.

This gave Tim the confidence to value-add what has traditionally been perceived as a lower-grade product to give his diners a unique flavour experience. He now dry ages mutton for 30 days and serves it cooked rare to medium rare.

Since debuting on the Adelaide menu in July, between 20 and 30 dry-aged mutton meals are ordered each week. The dish also features on the menu of the new Melbourne A Hereford Beefstouw, which opened in October.

"Dry ageing sheepmeat is an exciting opportunity for the whole industry, but my message to producers is that we still need good quality product to protect this niche and provide diners with an enjoyable experience," Tim said.



E: tim@a-h-b.com.au www.beefstouw.com

Watch: A short clip showing a time lapse of the dry ageing process for a lamb loin during the MLA trials can be viewed by going to YouTube and searching "dry aged lamb 2016"

On the ground

Marketing breakthroughs and highlights

To wrap up a busy year for MLA's international offices, *Feedback* caught up with each of the International Business Managers and Country Managers to hear their highlights and find out what's in store for 2017.

EU-UK-RUSSIA -Joshua Anderson

Name a breakthrough in 2016: Two things signalled strong opportunities to achieve greater market access:

- → Australia and the EU conducting 'scoping exercises' in preparation for free trade agreement negotiations, due to begin in mid-2017
- → Brexit.

In the case of the first one, MLA's role has been advocacy: promotion and education on our industry's world-class traceability, integrity, welfare and environmental credentials.

In the wake of Brexit, we are gathering intelligence, sharing knowledge, encouraging the UK to take a liberalised approach to trade, clarifying our WTO rights and exploring avenues for increased access.

Any new opportunities in your region? Australian

goatmeat found a niche market in Russia after we worked with a Moscow-based importer and the Goat Industry Council of Australia. Australia exported

- Member of the European Parliament and Welsh Labour politician, Derek Vaughan; Josh Anderson and Australian Ambassador to Belgium and Luxembourg and Mission to the European Union and NATO, Mark Higgie, at the MLA barbecue.
- Andrew Cox helping launch a new food truck for Tokyo restaurant Steak Teppei.
- 3. David Beatty hosts Australian Senator Richard Colbeck, former Minister assisting the Minister for Trade, at a trade show in the UAE.



Josh Anderson and EU red meat industry taskforce chair Jason Strong (right), managing director of AACo, meet with the European Commission Agricultural counsellor Phil Hogan.

42 tonnes of goatmeat to Russia in 2012, but none in 2013-2014. After securing importer interest, 14 tonnes were exported from September 2015 to June 2016.

One thing you'd like to see happen in 2017: The World Steak Challenge, held in London, enters its third year and Australian beef will attempt to win the 'world's best steak' title for the third time (from 17 countries). With only one major award currently up for grabs, we will work with organisers to incorporate different categories.

JAPAN - Andrew Cox

Name a breakthrough in 2016: Japan is a large, stable and diverse market for Australian beef and lamb, consistently worth more than \$2 billion. This year has seen US beef at dramatically reduced prices and, with reduced Australian supply, our market share is under pressure. Most retail and restaurant chains have stuck with us despite the price differential, evidence of the strong loyalty Australia has been able to cultivate.

What's a new opportunity in your region? The steak 'boom' in Japan has continued, with new modern Australian restaurants opening such as Terra Australis, Ruby Jack's and Covet. Recently I brought some influential chefs and food media to Australia as part of the Lambassador program which confirmed their perception that Australia's food scene was the benchmark for creative excellence

One thing you'd like to see happen in 2017: 'True Aussie' beef and lamb is well positioned in Japan and our team will keep working hard to maximise value for Australian producers.

MENA - Dr David Beatty

Name a breakthrough in 2016: MLA's Chef Tarek Ibrahim's new television series was a major success. MLA secured the three-part series through a partnership with Fatafeat TV, the leading Arabic food channel which reaches millions of households in 24 countries. The series reached a cumulative audience of more than 50 million. Social media promotion across Fatafeat's digital channels reached four million fans in 24 countries.

What's a new opportunity in your region? This year foreign trade sanctions to Iran were lifted and we saw renewed interest in Australian meat imports. Iran has a growing upper and middle class of well-educated and well-travelled people.

One thing you'd like to see happen in 2017: Meat labelling at retail is currently inconsistent and our aim is to secure a retailer in Saudi Arabia to use the 'True Aussie' label on all Australian beef and lamb packaging.



45 Growing demand

KOREA - Charlie Ko

Name a breakthrough in 2016: Australian lamb is gaining a foothold, with most major retailers following COSTCO and E Mart by stocking it. Korea imported 6,267 tonnes swt of Australian lamb in 2015, up 27.9% on 2014. By September 2016, Australian lamb exports to Korea were up 49%.

What's a new opportunity in your region? Warehouse-style retailing is on the rise, with the three majors - COSTCO Korea, E Mart Traders and Lotte Vicmarket - recording strong growth. The trio's total beef sales were worth approximately 299 billion KRW (\$341 million) in 2015, up 26% on the previous year, and exceeded sales by the top three hypermarkets, which have significantly more stores.

One thing you'd like to see happen in 2017: MLA will work with the rapidly expanding Korean foodservice industry to build 'True Aussie' brand awareness and drive Australian beef consumption, by tapping into the growing brisket market. One of the major chains offering chilli brisket soup, Yukdaejang, launched in February 2013. Already it has 150 stores and used 95 tonnes of brisket in 2016, up 33% from the previous year. The 'True Aussie' logo and food safety slogan will be on all Yukdaejang point-of-sale materials this year.

US - David Pietsch

Name a breakthrough in 2016: More than 20% of Australian exports to the US were chilled, grassfed beef for the first time. Culinary immersions, in-store promotions and 50/50 CoMarketing activities with brand owners solidified this position.

Australian sheepmeat cemented its dominance over New Zealand, with US imports of Australian sheepmeat reaching three times that of New Zealand in 2016, repeating 2014's result.

What's a new opportunity in your region: Lamb is becoming more popular with US consumers and in foodservice applications, with 30% of consumers surveyed for MLA saying it is becoming more popular - a higher figure than any other meat protein.

One thing you would like to see happen in 2017: Aussie grassfed beef brands continue to utilise the unique advantage afforded by Meat Standards Australia (MSA) grading in their marketing efforts. The US grassfed beef market is becoming more congested and competitive and Australia's greatest advantage may be our ability to guarantee consistent eating quality of grassfed beef through MSA, which has been recognised by the US Department of Agriculture's process verified program.

CHINA - Joy Tang

Name a breakthrough in 2016: Although total Australian exports to China dropped due to the high prices and shortage of supply, Australia's position as a premium meat supplier to China has been enhanced with a 17% increase in grainfed beef imports (Jan-Oct) and 3% increase in chilled beef (Jan-Oct) year-on-year.

What's a new opportunity in your region? There is a growing foodservice trend in Shanghai for quick steak meals on the go. Food counters are popping up in high-end retail shopping malls serving fast and convenient steak lunch meals. The menu consists of high quality steaks cooked in front of the consumer and cut into easy to eat strips with a small salad on the side.

What's planned for 2017?

MLA will continue rolling out the Supply Chain Development program with key stakeholders in China to increase penetration and improve the positioning and performance of Australian red meat. Together with exporters, distributors and end users. we have already conducted detailed reviews of a number of supply chains, provided recommendations on product mix and cut utilisation, and developed and implemented a strategy with training, educational programs and promotion.

SOUTH ASIA -Andrew Simpson

Name a breakthrough in 2016: Conducting seminars and workshops to educate local trade in Australia's integrity systems and quality attributes are key elements of MLA's Malaysian and Indonesian business development strategy. MLA butcher Calvin Gung and consultant chef David Carew helped deliver events on cut utilisation and product awareness.

What's a new opportunity in your region? Increasing the uptake of non-loin cuts. Under the CoMarketing program, MLA supports exporters in Jakarta, Kuala Lumpur, Bangkok and Singapore with promotions, brand launches and foodservice menu creation in non-loin utilisation.

What's planned for 2017:

Market access remains a key strategic pillar in Indonesia. MLA is building on Australia's technical and economic access conditions and maintaining key relationships to monitor and nurture improved access in boxed beef and live cattle.



- **4.** True Aussie Beef being promoted in the Gangseo Home plus store, South Korea.
- 5. US chefs attending a culinary immersion hosted by MLA North America.
- 6. A restaurant serving up quick steak meals in Shanghai.



Gold Coast//BeefEx 2016

A record number of delegates discussed all things grainfed beef when the Australian Lot Feeders' Association staged BeefEx 2016, partly sponsored by MLA. More than 400 attendees heard from international and local speakers on a range of topics tied to improving outcomes in animal welfare, productivity, cost of production, industry skills development, consumer engagement and perception, and technology uptake.

Winners of the Elanco Feedlot of the Year Awards were announced at a gala dinner. They were:

- → Above 10,000 head capacity: NH Foods' Whyalla Feedlot near Texas, Queensland, which has a 55,000 head capacity and 90 employees turning off 140,000 head a year for the company's Oakey and Wingham plants. Runners up were JBS Beef City near Toowoomba and Grassdale Feedlot near Dalby.
- → 3,000-10,000 head capacity: The Camm Agricultural Group's Wonga Plains Feedlot, an integrated beef enterprise across nine Queensland properties. Runners up were Gundamain at Eugowra in central NSW and Gunnee at Inverell.
- → Under 3,000 head capacity: Weeroona Feedlot at Guluguba, Queensland, a family owned enterprise operated by Tim and Tammy Stiller. The runner up was Freestone Feedlot - a custom feeding service located near Warwick, Oueensland.

The Performance Feeds Young Lot Feeder Achiever Award was won by 29-year-old Emily Pollock, a livestock team supervisor from Gunnee Feedlot. The other finalists for the award were Jeff Schuller from Coonamble Feedlot and Amanda Moohen from Wonga Plains Feedlot.

The Zoetis Education Medal went to Cailin O'Connor, a pen rider from Gundamain Feedlot at Eugowra in central NSW. Runner up was Brendan Orr, Feed and Milling Coordinator at Mort & Co's Grassdale Feedlot near Dalby, Queensland.

For the first time, the Bovine Dynamics and Quirindi Vet Group Communicate Your Research Award was run, offering students the chance to share their research project findings. The winner was Rudi McEwin from the University of Adelaide for her paper on *Mythbusters: non-additive genetic effects in Wagyu.*



The six finalists in the Communicate Your Research Award were (from left) Josephine Coddington, Rudi McEwin, Danila Marini, Stephanie Sammes, Tellisa Kearton and Farrah Preston and they were joined by sponsor representatives Tony Batterham from Quirindi Veterinary Group and Melissa Miller and Matt George from Bovine Dynamics.



Elanco's Simon Lakin (centre) presenting the Feedlot of the Year award to Whyalla Feedlot representatives John Collman, Craig Thorne, Anthony Cash, manager Gino De Stefani, Leigh Streeter and Daron Higgins.



Cailin O'Connor (centre) is congratulated by her employers, Tess and Andrew Herbert from Gundamain Feedlot.



Bryce Camm from Wonga Plains Feedlot accepts his award as winner of the 3,000-10,000 head category in Elanco Feedlot of the Year from Elanco's Cait Jenyns.



Hahndorf, SA//2016 Red Meat Industry Forum and MLA AGM

idn't make it to MLA's 2016 Red Meat Industry Forum and AGM? Well, you haven't missed out completely. Videos are available online of key forum and AGM presentations:

Sean Starling, MLA General Manager, Research, Development and Innovation: Improving uptake and efficiency of research, development and adoption through the value chain

Dr Christine Pitt, CEO, MLA Donor Company: Accelerating innovation in the red meat industry

Dr Jane Weatherley, CEO, Integrity and Information Systems Company: The power of information - the evolution of industry integrity systems

Michael Finucan, MLA General Manager, International Markets: Global consumers, customers and competitors - securing Australia's place on the plate

Q&A session: including Lisa Sharp, MLA Chief Marketing and Communications Officer and Michael Crowley, MLA General Manager, Producer Consultation and Adoption

... and from the AGM: Reports from MLA Chair Dr Michele Allan and MLA Managing Director Richard Norton.



Go to www.mla.com.au/agm2016 to see these 2016 Red Meat Industry Forum presentations.







Sean Starling, MLA, addresses the Red Meat Industry Forum



Markus Rathsmann from Cattle Council of Australia with AGM attendees Geoff Birchnell, David Stoate and Allison Horswill.



MLA's Ben Thomas with Queensland producers Michelle and Michael Lyons.



Alan Brunato of CHFP Australia with Anne Marie Huey, representing the North Australia Beef Research Council

Advocacy workshop

Being run with the Kimberley Pilbara Cattlemen's Association, this workshop will promote professional and personal development for producers. Topics covered will include social licence and MLA's community engagement program.

When and where:

16 December 2016 Broome, Western Australia

Bookings and more information: Jax Baptista E: jbaptista@mla.com.au

E: mgoodacre@mla.com.au www.mla.com.au/research-anddevelopment/funding-opportunities/

Mary Goodacre T: 02 9463 9225

Call for 2017-18 sheepmeat and

grassfed beef research funding

for new one to five-year research

regional consultation strategy for

setting industry priorities.

More information.

projects. Closing date 23 December

The call is out for preliminary proposals

2016. Proposals must be aligned to the

Who can apply? Producers, industry,

researchers, processors and students.

Free goat webinar

Good management of total grazing pressure is vitally important, particularly in the rangelands of Australia, to ensure grazing does not exceed stocking capacity.

Find out more on the topic with this short webinar with presenters Trudie Atkinson, Development Officer with the NSW Department of Primary Industries and Rick Gates from the Goat Industry Council of Australia.

When: 12pm 15 December 2016

Register at: www.mla.com.au/ goatwebinar

at: www.mla. com.au/events

Recipes Put some spice into your festive season entertaining this year with these tasty and healthy beef and lamb dishes.



Spiced beef rump with pine nuts and labneh

4 x 200g beef rump steaks, trimmed

1 tbsp extra virgin olive oil

1 tbsp ras el hanout or Moroccan spice

1 cup labneh (made by straining Greek yoghurt)

1 tbsp pine nuts, toasted

Kale salad:

1 bunch kale, trimmed, washed and shredded Juice of half a lemon 1 tbsp extra-virgin olive oil 250g grape or baby roma tomatoes halved 200g green beans, cut into 4cm lengths Lebanese bread, to serve

- Brush steaks with oil and sprinkle both sides with spice, salt and pepper. Preheat a char grill or barbecue to very hot and cook steaks for four to five minutes a side or until cooked to your liking. Rest for five minutes. Slice.
- 2. Place kale in a large bowl with lemon juice, salt, pepper and oil and turn to coat. Pour boiling water over green beans, leave for five minutes. drain. Combine kale with tomatoes and blanched beans.
- 3. Serve beef rump with kale salad and labneh topped with pine nuts, drizzled with a little extra oil if you like.

Barbecued lamb leg with roast vegetable salad

1.5kg butterflied lamb leg, trimmed Juice of one lemon

2 tbsp extra virgin olive oil

800g kent pumpkin, cut into 2cm thick wedges

2 red capsicums, seeded and cut into 4cm pieces

- 1. Preheat oven to 220°C.
- 2. Place lamb in a baking tray and pour over the lemon juice. Drizzle with one tablespoon of oil and season with salt and pepper. Cover loosely with foil and leave at room temperature for 30 minutes.
- 3. Place pumpkin, capsicum and zucchini in a large bowl and drizzle with 1 tablespoon of oil, salt and pepper, toss to coat. Spread over two or three baking trays and roast for 35–40 minutes until vegetables are golden brown and cooked through.
- 4. Preheat a barbecue to 220°C and cook lamb over indirect heat, serving side down for 15 minutes, turn over and cook for another 10 minutes for medium/medium rare, or until a thermometer reads 60°C, or until cooked to your liking. Rest covered loosely with foil for 15-20 minutes.
- 5. For tahini dressing, whisk tahini, lemon juice and water in a small bowl until the consistency of thickened cream. Add water to thin or more tahini to thicken. Season with salt and pepper to taste. Slice lamb and serve with vegetables and tahini dressing. Sprinkle with dukkah to serve

2 zucchini, cut on the diagonal into 4cm pieces

Tahini dressing:

2 tbsp tahini 1 tbsp lemon juice 2 tbsp water Dukkah, to serve

