



# Final report

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## Wingham Beef Exports Supply Chain Extension and Feedback Project

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## **Abstract**

Data is being collected at different points of the beef supply chain, which if converted to information and disseminated in a form which can be interpreted and acted upon by other chain members can increase the efficiency, productivity and profitability of the entire chain. The project activities addressed key industry strategic goals including how to facilitate on farm adoption of research and development as well as increasing the value of red meat sales through reduction in dark cutters which increases the value of the meat together with an increase in offal for human consumption. Producers once aware of the information which is available and the financial impact to their own business were interested to learn and change. It was identified a multi-faceted approach is required which included empowering champions with knowledge, field days with information shared from industry experts, peer to peer learning, online videos and one on one processor to producer information sharing. Internet connectivity and computer literacy were barriers in relying on web-based and emails to transfer information to producers. The program had seen an impact in reduction in liver fluke, increased knowledge and engagement from producers in understanding how to reduce downgrades and achieve price premiums. Wingham Beef Exports has learnt where misunderstandings, miscommunication and information sharing challenges are working on how to simplify the communication on pricing grids to improve the value of beef across the supply chain.

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## 1. Introduction

To remain globally competitive, it is critical that the productivity of each section of the supply chain is maximised. This project was designed to develop the feedback systems and associated extension material from the meat processor back to the producer with the aim of getting uptake by the producer of improved genetics, nutrition improvement and husbandry practices to enhance on farm productivity. Feedback will cover MSA data, animal health and potentially Lean Meat Yield (LMY).

Collectively, the red meat industry is investing hundreds of millions of dollars in technology and systems that will generate more and more data for use by supply chain participants. The assumption in these investments is that the data generated will be able to be used by producers to improve their performance (and profitability) and to ultimately improve the optimisation of the supply chain. The challenge of presenting complex information in a simple and actionable way is significant.

As the industry continues to develop lean meat yield feedback systems and combining with MSA data in feedback for suppliers, industry will need to focus on communications and extension of this to suppliers to ensure that the data/information that is supplied is in an accessible and actionable form.

Information needs to be presented in a manner that encourages action. A series of tools will need to be developed which will enable cattle producers to make improvements to their business. The industry needs to be ambitious enough to link carcass performance data (LMY and MSA) with genetics bringing short term gain through progeny testing and improvements to on farm breeding technology and long term through selection of more appropriate breeding lines for the consumers being targeted.

## 2. Project objectives

This project is an adoption strategy for the Wingham Beef Exports supply chain and provides an invaluable case study for industry. The process, tools and material developed would become available for use in the wider industry. Industry will also be able to feed into this project tools and extension materials for testing and verification. Critically this project will allow for the impact of the adoption of feedback to be quantified which will help drive similar models across the industry.

Project objectives include:

- Enhance existing feedback reports covering MSA, Animal Health and investigate inclusion of Lean Meat Yield
- Investigate the possibility of collecting data and reporting on other issues that could affect yield and grading outcomes such as nutrition, animal handling, and animal health.
- Understand current on-farm management systems and how they can evolve to use feedback from processors.
- Develop tools that farmers can use to maximise the benefit of feedback for example more controlled reproductive practices, better nutrition - trace elements, glycogen loading prior to shipping for slaughter)
- Identify relevant external tools and systems and implement in the supply chain
- Identify local champions who are willing to trial innovative practices.

- Benchmark on farm practices at the commencement and then measure annually to assess productivity improvements and provide case studies for other framers to follow
- Develop extension material related to the above topics.
- Deliver four producer workshops per year for three years.

### 3. Project Methodologies

It was the intention at the outset of the project to develop better ways of communicating to producers the livestock data which is collected at processing with the view to enhance their understanding of the information and to assist with use of the information in improvement of live animal management practices.

Wingham Beef Exports used a collaborative approach to setting up, delivering and enhancing the extension program over a three-year engagement strategy. This commenced with a range of activities that were further refined and enhanced through joint learnings with MLA, industry experts and producer and community stakeholders as the program matured.

#### *Vision for a Supply Chain network*

The transition from single connections in the left of Figure 1 to a network of connections to the right is an oversimplification of the relationships in the region. Many producers already have existing connections and relationships with other producers, Wingham Beef Exports and technical experts. However, it is quite accurate in terms of a processor-initiated program of activities where the project design has been to intentionally create awareness, build capability, develop support resources, and provide ongoing conversations that enable connection between these different aspects that is broader and multi-dimensional beyond the traditional processor-producer connection via a feedback sheet, and with some attached “How-to” guides as a best case.

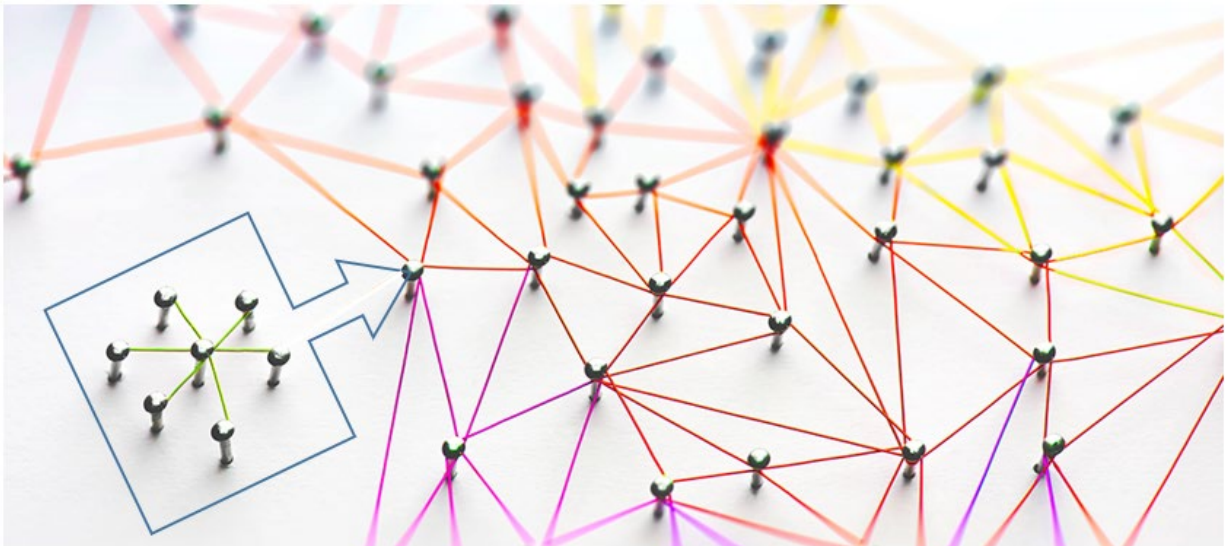


Figure 1: Growing out a network of connections to enable proactive Supply Chains

#### *Building out the network vision*

Across the three-year duration of the project, the activities evolved as collaboration and information transfer increased. The activities became more targeted as the program team developed a deeper understanding of the producer questions, needs, areas of interest and concern, knowledge gaps in their livestock performance at processing. A range of tools were developed to maximise the benefits

of feedback, adjust management practices in direct response to the needs identified by producers, Wingham Beef Exports and industry experts.

Considering all players in the chain are people and share a common interest, but all have different constraints, perspective and contexts, the program began with establishing a conversation, seeking to understand, identifying opportunity areas, then collaboratively addressing those opportunity areas.

The activities evolved progressively over the course of the project. Supply Chain capability does not increase in a direct linear fashion. It is more like, “here a little, there a little” with all capabilities increasing in parallel and at varying rates. The activities undertaken have been summarised as groups of capabilities, rather than as a timeline of activities across the three years.

The range of activities evolved and can be summarised in the following categories:

- Enabling a collaborative conversation
- Identifying opportunity to increase understanding
- Supporting the win-win
- Development of knowledge and capability
- Development of support materials
- Supporting an ongoing collaboration

## 4. Project Activities

Key activities have been drawn from the detailed program reporting and included here to underpin the results and findings in Section 5 and to support the recommendations in Section 6.

Development of an information sharing community to enable optimal productivity between producer and processor was a key objective overarching the project activities. Creation of educational materials and adoption of those materials through on-line media, face-to-face workshops, direct communications on site, plant tours, workshop sessions with producers supported this objective. Engagement in conversations to breakdown misconceptions and to build a level of trust became important in motivating adoption. Involvement from industry experts broadened the network and enable different conversations around motivations for change and the benefits.

The activities undertaken are documented in detail in each of the supporting milestone reports and are summarised as following:

- **Supply Chain Study Tour**
- Establishment of an **Industry Experts Network**
- Development and empowerment to selected **Producer Champions**
- **Producer Field Days**
- **Producer Workshops** with links to industry programs and activities as well as addressing producer questions
- Development and publication of **Extension and training materials** for producers
- Facilitating **access to feedback** for individual producers

## **4.1 Enabling a collaborative conversation**

Developing a connected network of people where information is shared easily and participants in the supply chain work to support each other in individual and collaborative practice change involving a number of sectors requires lots of conversation to be able to meet on common objectives.

The first consideration of the project was enabling conversations that could build and grow progressively, supporting trust, knowledge sharing and then practice change.

### **4.1.1 Producer Field Days**

Field days are a traditional way of getting producers together to share knowledge. The context for them to network and discuss various topics amongst themselves is also valued.

**Launching the project with field days** - was a context Wingham Beef Exports used to engage their existing network and to begin discussions around the broadening out of their communication and initiatives to work together with producers over the coming three years to enhance the supply chain for all involved.

**Field days tailored to Producer interests** – At the initial field days surveys were conducted to identify topics of future interest. Based on discussions with producers and industry expert's key topic areas raised by producers were then addressed through field days and informative videos which are available on YouTube.

**A conduit for raising awareness** – While the field days themselves had some reach, the advertising for the Producer Field days had a much broader reach. The advertising for the field days had a substantial impact and engagement outside of Wingham Beef Exports immediate producer network. Advertising of topics being discussed by industry experts also played a part in raising awareness of topics such as animal health and hydatids. These field days continued through the program and were an important ongoing aspect of network connections.

### **4.1.2 Identifying Producer Champions**

Producers talk to one another, trust each other as reliable information sources (more than they trust processors) and learn from each other. Given the project aimed at increasing adoption of practice change, leading producers are an example of what practice change can look like. No one is perfect and leading producers are often the first to admit they are focused on improving. So, adoption of new concepts is likely to happen faster with these types of producers.

Identifying and engaging producer champions was an initiative which from the outset enabled more collaborative conversations.

Initial scoping of the supply chain included review of registered suppliers in the contact list. Of these, a number were identified as producer champions who played a role in speaking of their successes and demonstrating benefits of adoption of best practice.

### **4.1.3 Developing a network of key industry experts**

In conjunction with MLA and Wingham Beef Exports existing connections, the concept of an Industry Expert Panel was developed. The intention of the network was to provide a method and context for support to producers as awareness and engagement increased that grew beyond a single line of



communication between the producer and the processor, the producer and the agent, the producer and the farm agronomist.

More than 40 experts and industry contacts were involved in the network and in supporting producers to better understand feedback and to apply knowledge to adapt management practices for improved performance.

Broadening conversations on topics which have financial impact around low compliance and downgrades helped keep conversation's objective. The way in which some experts communicated topics such as animal health and that the biggest losses are felt by the producer helped change perceptions that the program was being processor driven for processor gain only. Involvement of local experts and service providers helped to build connections or strengthen existing connections to better appreciate the bigger supply chain benefits.

#### **4.1.4 Facilitating Producer engagement**

##### *Communication Activity Log*

A log of activity was documented during the project. Key issues, concerns and topics of interest were used to support the design of future collaborative activities across the network and summarised in Table 2.

Frequency of engagement increased across the three years. As producers engaged in activities and became more aware of the support available to them from Wingham Beef Exports, more producers visited Wingham Beef Exports to access information and feedback about their livestock and in greater frequency.

Table 1: Summary of topics raised and discussed by participants

Topics / Activities
Glenyarra as a Producer Trial Site
Deep rooted pastures and quality vs standing dry matter
Rotational Grazing benefits to quality grass production
MSA Index Calculator used to support on-farm management practices to increase MSA compliance and Grade
Dark Cutting meat science explained with practical management interventions
Impact of dark cutting on supply chain value loss for everyone
Market intelligence and trends in both international and domestic markets
Non-Industry Brand ambassadors (Ed Halmagyi - Better Homes and Gardens) promoting the wider supply chain network to the consumer
Value of being a good corporate steward and importance of whole of supply chain involvement
Information sharing around broader supply chain initiatives NH Foods is investing in including Bio-gas, waste water collection, recycling community waste, reduced energy footprint.
Animal Health management and impact on producer and supply chain profitability and animal welfare
Specific animal health disease management activities including detection, treatment, prevention, economic benefit
Creating awareness of impacts along the whole supply chain and need for shared ownership of management interventions
Value of data collection and its use in making more informed data-driven decisions
Increased awareness of industry analysis tools, supported by training initiatives to increase adoption and value generated from these tools
Livestock Data Link
Gaining awareness of the benefits of producer demonstration sites and how to establish one
Increasing marbling scores
Collective conversations between processor and producer on development of new brands based on changing management practices
Beginnings of two direction conversations around value-based marketing and value-based pricing

#### *Feedback and feed forward*

Producers sought assistance from Wingham Beef Export staff to access LDL and carcass reports in person, over the phone and in hard copy. As part of this interaction, it allowed staff to identify any issues with the producer, discuss causes, possible interventions and where more information was available. This interaction provided direct feedback on issues producers were having in understanding the animal health information, pricing grids, dark cutting and other carcass compliance information presented to them in LDL. The workshops also highlighted areas of interest such as how to increase marbling scores and improve pasture management.

#### **4.1.5 Supply Chain development initiative**

As part of the initiative to support producer champions, a supply chain study tour was developed. This involved review of best practices at each stage along the supply chain and integrated input from Industry Experts at University of New England (UNE) into the activity.

The main issue identified by producers prior to assembling this study tour was MSA grading and in particular dark cutting animals. The study tour covered a range of topics, but dark cutting was the focus. Participants were able to view procedures and practices in place to minimise the instance of

dark cutting animals and follow livestock through the entire production chain to understand impact on carcass performance.

Wingham Beef Exports were able to schedule and execute the producer study tour to Whyalla Beef, Oakey Beef Exports & Armidale UNE. Six champion producers with Wingham Beef Exports attended the trip.

All the producers are long time suppliers into Wingham Beefs premium MSA brand – Manning Valley Naturally and have been involved in LDL promotions and surveys.

Insights gained from the activity were not only for the producer attendees but also for Wingham Beef Exports team. Producer perception of the processor, carcass grading and pricing and the feedback provided were better understood. These misunderstandings and their impact on the supply chain are covered in section 4.2.6 on page 13.

## **4.2 Identifying opportunity to increase understanding - Identifying barriers to adoption**

Through direct day to day interaction with producer champions (on tour) and with producers accessing carcass and animal health results pain points, knowledge gaps and misconceptions were identified at an on-farm level. Barriers to adoption of improved practices were (1) not knowing there was a problem (e.g. hydatids), (2) producers not understanding they have influence to reduce, solve or mitigate the problem (e.g. dark cutters), (3) producers not knowing latest proven research and development (e.g. pasture management) and (4) producers not understanding the economic influence and impact on their business (e.g. live fluke)

### **4.2.1 Producer pain points in current feedback**

Through the implementation of this program, it was identified that producers have knowledge gaps in understanding the implications and management interventions from the Animal Health Reports. It has also raised questions around the accuracy of offal inspection data as in some cases the analysis and trends for individual producers suggest discrepancies in data accuracy.

Producers were interested to meet the premium MSA markets however based on the carcass feedback they were unsure how they could increase their compliance to meet the premium MSA market specifications. Through the field days topics, it was identified producers were willing to change genetics and pasture management to meet premium market specifications, suggesting an openness in working collaboratively to improve whole of supply chain outcomes.

### **4.2.2 Encouraging Producer adoption of Feedback**

Producers are supporting peer to peer learning to utilise carcass feedback to inform farm management decisions and activities. One example of peer-to-peer learning is producers who are new to the area have become involved in the networks and have begun to actively source and use feedback to help make informed decisions on farm.

Producer Champions started supporting their peers through this program. One example is where the champions discussed bull selection and feed requirements to help drive the result that generates the highest quality product that they can. Improvement in MSA scores was evidenced during the program. Ongoing communication from these producers transferred to other producers in the group trialling differing procedures and techniques to see what the end result will be. Producers were also

becoming aware of non-compliance risks prior to processing and were able to detail the reasons why and what could be done differently in future to obtain the given result.

### **Pasture Utilisation and Agronomy prioritised over Animal Health**

Through the evaluation process conducted at workshops, it was singled out by engaged producers that pasture utilisation and agronomy were topics of interest. Consequently, these extension and development topics were covered in producer workshops. This highlights possible learnings:

- People have a strong interest in improving their pasture and feed utilisation to increase productivity and profitability of their chosen animal.
- Local producers are actively seeking out opportunities to assist them to meet Wingham Beef Export's specifications for the flagship brand "Manning Valley Naturally", which is exclusively for grass fed beef.
- There is still more work to be done in making producers link optimal animal health with optimal animal performance and associated increased financial returns which will continue to form an integral part of the message Wingham Beef Exports puts forward.

#### **4.2.3 Producer adoption challenges evidenced by NVD / LPA changes**

The 1<sup>st</sup> of January 2021 saw the enforcement of the latest National Vendor Declaration (0720). Even though Wingham Beef Exports had sent numerous emails to producers advising the changes were on the way, a large quantity of producers claimed they knew nothing about it. With a backlog on ordering the new books from the LPA, the livestock department worked with producers on site and over the phone with accessing their LPA account and educating them how to access the electronic version of the NVD. An IContact sent out from the 12<sup>th</sup> of January 2021 included a link to the Beef Central article explaining the changes. Section 5.1 describes in more detail how multiple approaches are needed for the message to be received. A further challenge, outlined by producers in a survey was limited internet connectivity.

#### **4.2.4 Pricing Grid Upgrades**

Given practice change is linked to pricing signals, Wingham Beef Exports Grid, payment structure and clarity around display of carcase information was reviewed. Some carcase grades were removed to limit the confusion and increase transparency. Some of the downgrades for fat penalties were adjusted and Livestock Data Link was referred to directly for Carcase and Animal Health feedback. Prices were increased around the changes to grab producer's attention to the changes.

After some correspondence with long term producers, it was brought to Wingham Beef Exports attention that some producers still struggle to understand how to read the company's Grid. Through discussions with NH Foods head office, it was decided to create a simplified grid that is the same across all NH Foods Australia owned abattoirs. The degree to which this increases the clarity to producers on how to obtain the highest price per carcase is being reviewed.

#### **4.2.5 Challenges towards engagement and collaboration**

##### *Dark Cutting Feedback and Management Intervention*

The following initiative towards reducing dark cutting is an example of the challenges faced in engaging suppliers in online surveys, practice change and collaboration for improved whole of supply chain outcomes.

A group of producers were selected to work with on reducing dark-cutting incidence based on the results in their MSA consignments in the first six months of 2021. A brief online survey was constructed consisting of seven questions for these producers to complete to gain insights on the subject. An explanatory email setting out what Wingham Beef Exports was attempting to achieve was sent to these producers which contained a link to take them to the survey. The purpose of the survey was not so much to drill down and find solutions based on the answers provided, but more to encourage and support producers to allow Wingham Beef Exports to work more closely with them and support them moving forward.

Unfortunately, feedback was extremely limited with minimal responders. Whilst the general overview was a willingness to engage, once contacted potential participants were reluctant to allow much more than general comments and observations or did not have consignments available in the near future. Of the respondents all but one fell into a low-risk bracket, having an overall percentage of less than 10% dark cutting across their last six months consignments. This demonstrated some level of successful management and understanding already in place.

There are a number of reasons and potentially historic reasons why increased engagement between producers and processors can be difficult. Without drilling into this too much, a key learning is that multiple communication paths, multiple topics, and a broader set of objectives are often required to break down historical barriers to collaboration to improve whole of supply chain outcomes.

Wingham Beef Exports has commenced attempts to educate producers on the variable causes and effects of dark cutters and the reasons why meat colour is still a condition of WBE's MSA grading processes. A short educational video has been developed as part of the project and was released on the 1st of June 2022 that explains how meat colour is determined, what constitutes a "dark cut" carcass and suggested management interventions.

#### **4.2.6 Mistrust in Feedback results – opportunity for collaborative assistance**

**Compliance disagreements are often a symptom** – while the deeper root cause is a genuine lack of understanding and awareness. Perception through lack of awareness then becomes reality and can't be changed except at the root cause. Part of the network development has been in gaining a deeper understanding about disagreements on pricing and what the real issues are around misunderstanding. Education in a collaborative way has been part of the initiative to address mistrust.

**Dark cutting remains a point of contention** - with certain producers seeking explanation (from a sentiment of mistrust) why certain bodies in consignments cut dark forcing downgrading to occur. Interesting insights were gained during the study tour with producer champions as to the misunderstanding and mistrust around downgrades on kill sheets and with dark cutting in particular (Section 4.1.5).

**Fat measurements causing downgrading** - due to MSA non-compliance, has always been an underlying issue with producers. Wingham Beef has experienced an increase in producers questioning fat measurements on carcasses leading up to, and during the project generally.

**High performing producer champions can be misinformed** - Within the group of producers were accompanied by WBE staff on the Supply Chain Study tour all but one had strong views on dark cutting, with several participants believing it was something done at the processing plant to "even the ledger". This shows a greater need for education in this space as producers misunderstand the real value loss and the impact on the processor. Education with positive sentiment around both

parties missing upside value is required, supported with joint working together to minimise non-compliance.

Education around causes, impact, and intervention for both these pain points were addressed with Wingham Beef Exports short video series.

### **4.3 Supporting the win-win**

#### **4.3.1 Other producer topics of interest**

**Animal Health Feedback is important** – A producer pain point brought to Wingham Beef Exports livestock team’s attention was only a limited number of animal health conditions are recorded in the livestock data link website.

**Information available on both Processor feedback and LDL** – is important to producers. Even where animal health data is available in LDL, not being available on the current NH Foods feedback sheets is an issue. This connects to another project observation about accessibility to information and how producers access LDL (presented in section 5.3)

**Enhanced genetics** - Interest in marbling, carcase quality and use of EBV’s to help in selection of superior genetics was identified as areas producers were interested to learn more about.

#### **4.3.2 Producer Pain Points in accessing Animal Health information**

Engagement with producers regarding pain points in current feedback included Wingham Beef Exports did not include Animal Health Data with feedback reports on Offal and Diseases in their feedback sheets. Though a lot of these producers were happy to know this information is available through Livestock Data Link, they found delivery of a feedback sheet that included this animal health information was an easier way to access and digest the information.

NH Foods is moving its Livestock platform from accounting-based software to more specialised Livestock Console, after which this data will become available to producers and will include animal health information as part of their carcase feedback.

### **4.4 Development of knowledge and capability**

#### **4.4.1 Photographic Feedback**

**Photographic feedback has been developed** - to support existing feedback information. A trial provided producers with photographs of any carcase grading Aus-Meat Meat Colour 4 or higher. Consignments that have a high incidence of dark cut carcasses are photographed using an Aus-Meat Meat colour 3 grade chip as a reference to give producers a visual insight to part of Wingham Beef Exports grading process. Each producer is emailed a copy of the photographs along with an explanatory paragraph which not only outlines the characteristics to the end consumer of meat that has “cut dark” and therefore has reduced eating qualities, but also attempts to offer the producer some of the possible reasons that can bring about dark cutting and high pH. The email also reminds producers that the loss or reduction in value that comes from downgrading is felt throughout the supply chain as the meat is unable to be marketed as MSA by NH Foods to the consumer and must be routed to other lesser value markets.

## 4.4.2 LDL Adoption

NH Foods staff participated in a run through of the new LDL prototype. The new prototype looks like a much-improved design and offers easy to use features that will benefit both Producers and Abattoirs. Wingham Beef Exports provided feedback to the designers that Wingham Beef Exports were excited with the new design.

## 4.5 Development of support materials

### 4.5.1 Development and Accessing of Extension Materials

A key part of the 3-year project was to support producers with information that is helpful and enables them to make changes to management practices in response to processor feedback. Development of video interactive training materials was scoped as an outcome from producer field days, workshops on site using LDL analysis, and from interactions between producers and the industry expert panel.

Plant Covid-19 restrictions were still in place for non-essential visitors, so filming needed to occur offsite. It was suggested that animal health (disease and defect) issues would be the best fit for offsite filming and using the Livestock Data Link website as reference, the two most common health issues for the previous financial year were chosen to concentrate on with Liver Fluke and Hydatids the two topics selected.

Video content and quality needed to be high to communicate the importance of the topics and to better reflect the overall image the company wants to portray.

Link to the videos can be reached here:

NH Foods Australia – Live Fluke in Cattle: <https://www.youtube.com/watch?v=w7wwJM6hnZY>

NH Foods Australia – Hydatid Disease in Cattle: <https://www.youtube.com/watch?v=uECQvCHvZ58>

NH Foods Australia – Dark Cutting: <https://www.youtube.com/watch?v=CKr7AWqrvBU>

Feedback from producers has been very positive overall. Many are happy that the videos highlight the problem, explain why it is a problem and offer solutions to the problem. It has also been said that the videos are easy to watch and follow.

When first released, the links for the videos were sent out to 5500 email contacts from the NH Foods database, as well as all local schools with an agriculture department and schools that had previously participated in the Wingham Beef Weeks School Steer Challenge to help educate the younger generation.

The number of people reached steadily increased after launch to achieve the following views in the first months.

#### Liver Fluke Video:

- YouTube Views: 1036
- NH Foods Social Media Reach: 8027
- ISC Social Media Reach: 8400
- NH Foods Social Media Engagements: 448
- ISC Social Media Engagements: 767

- LinkedIn Impressions: 657

Hydatids:

- YouTube Views: 648
- Social Media Reach: 4902
- Social Media Engagements: 198
- LinkedIn Impressions: 487

Initially the videos gained good traction, have now plateaued somewhat due in part to reduced promotion and because the gap in knowledge within Wingham Beefs Network has been filled to a large degree. The Dark Cutting YouTube video was launched on the 1<sup>st</sup> of June 2022.

Views as at 14/07/2022 are:

- Liver Fluke Video – 1489
- Hydatids Video – 762
- Dark Cutting Video – 2408

The content remains available to industry for use if and when it is required. It would be interesting to see how the learnings from Wingham’s network development could be translated to industry more broadly with the objective of producer peer groups transferring connection links to these extension materials. Extending this video formatted method to cover a broader range of extension topics, coupled with similar combinations of initiatives used in this project to strengthen networks may help support R&D adoption.

A key learning from this activity was the increase in reach achieved. Previous webinar initiatives may have only been getting 8-10 people logging in at most. Even Wingham Beef Exports field days within the project that gained huge support, filling up within the first 6 hours only have room for <120 people at a field day (compared to >10,000 views online with this initiative).

## **4.6 Growing out the network - Supporting ongoing collaboration**

### **4.6.1 Corporate Stewardship**

**Brand Ambassadors** can reimagine paradigms. They are seen in many contexts and can facilitate the change from single sighted connections (Processor to Producer, Industry promoter to Antagonist of Industry, Supplier to Consumer etc.) to raising awareness of a more diverse network of impacted parties.

The meat industry certainly has a job in communicating the truths of industry to uninformed consumers. Processors have a challenge in myth busting the impact of carcass compliance on consumer value.

NH Foods brand ambassador was involved in some of the producer field days and talked about being proud to work with a company who is passionate about environmental stewardship and listed a number of the companies initiatives such as the collection of bio-gas, their use of waste water for irrigation and by-products such as saw dust from a local saw mill being used to run their boiler, providing hot water to the plant. Their connection and reach to other networks of people is another connection in the network that adds weight and substance.



#### **4.6.2 Community Education and awareness**

Wingham Beef Exports worked with local schools to help educate students and work with them to understand live cattle judging.

Dairy NSW and high school agricultural departments have educated workshop participants thanks to resources supplied by Wingham Beef Exports.

#### **4.6.3 Collaboration with other RDC's**

The programs focus on developing networks has created opportunities to collaborate with other organisations such as Dairy NSW & The Department of Education to help educate producers on increased animal welfare and animal health management practices and the value of these activities.

#### **4.6.4 Moving towards value-based decisions**

A workshop to explain marble scores and genetic improvement to producers gained a lot of interest from both the producers and Wingham Beef Exports. The opportunity to market a premium version of Manning Valley Naturally Grass-Fed Beef with a marble score 3+ was identified.

The cost in developing a new brand is not insignificant and has implications on existing brand supply, processing plant capacity, packaging variants and market segmentation among other things. Producer capacity to provide continuity of supply and incentive to invest in higher cost production is also a significant factor.

The level of engagement built during the program to have these types of conversations between producers, processor, meat scientists and geneticists around value-based decision making is a positive achievement.

Given the network is still developing, building other network capabilities is still the priority before these types of strategic collaborations are ready to be progressed. When that time arises further workshops on this topic will be very important from both a technical and a supply chain engagement perspective.

### **5. Project results and findings**

Through the implementation of the project, it was identified that producers were interested in making changes however they didn't have access to all the information required to make informed decisions. The project has generated interest and uptake beyond the early adopters as producer without email are calling into the plant to access their animal health and carcass data. Individual carcass value has increased with increased MSA compliance and a reduction in active liver fluke being identified.

#### **5.1 Multiple extension approaches are required for impact**

**Extension activities were important in achieving objectives** – Multiple methods helped collate the topics of the program and bring them together. Whilst each quarter of the project touched on a different item or area it was important to make sure producers understand that the overarching theme to this whole process is about increasing animal welfare whilst also helping to increase on farm profitability.

**No one extension approach was the single answer** - for all supply chain participants. Many approaches supported engagement in different ways, and provided unforeseen insights, used later in the project to further refine messaging and engagement.

**Reaching a broader audience** – by employing varying methods throughout the project has allowed for the messages with greater impact and the ability for deliverables to continue to support and inform long after each reporting period had passed.

The videos have allowed a broader reach and provide a reference point for producers to share with peers and family members. The videos and extension materials provide resources at a time where the producer is interested and able to learn. Webinars have been held in the past however there was limited attendance. Adoption update is highest with one-on-one support however limited time and finances restricts one on one activities. Commercial companies working in agricultural supply chains including beef processors struggle to justify the return on investment in providing extension and training support to producers. Peer to peer learning provides this one-on-one interaction and was observed at field days and within the network of producers as more producers are contacting Wingham Beef Exports directly. While the current videos have been well received there has not been demand for additional content.

## **5.2 Producer responsiveness to extension activities**

**Producers increased management interventions** – as evidenced by a greater number of calls from producers wanting to access their carcass information, whether it is their animal health data or wanting further information surrounding their carcass results.

**Producers increased transfer of information with peers** - Producers who do not have access to email are increasingly calling the plant or stopping in to get assistance to access their data or feedback photos, as they have been told about the information available by other vendors. Based on this interest, producers have an interest in learning more about their livestock's health and reducing carcass and offal downgrades.

**Carcass results indicate changed management practices** – The incidence of liver fluke identified at plant has decreased, suggesting the information on incidence and treatment of liver fluke has reached the target audience. For hydatids there is no treatment once the animal is infected therefore a noticeable change was not expected as it is a long-term management issue.

**Overall MSA compliance has increased** - however this could have other contributing factors such as the season. The number of dark cutters has seen minor improvement however further education and awareness is required on the incidence, cause, and economic impact of dark cutters for the producer based on feedback received from producers and levels of engagement with suppliers with a high number of dark cutters. There was an expressed interest by producers in carcass traits such as marbling score, highlighting there is an interest from the producer perspective in changing management practices to improve profitability.

## **5.3 Producers access to information: LDL & Carcass data**

**LDL data is considered helpful to producers** - Since the commencement of the program the number of producers requesting NH Foods to provide the LDL results of their compliance has increased. Many of these producers visit the Wingham plant and ask for printouts of their LDL results. There is evidence that producers have used the information to assist in making practice changes to reduce disease and increase compliance.

**Producers appear to be increasing access to LDL information** - More and more producers are contacting NH Foods and requesting that the LDL information be provided to them directly by NH Foods. In summary the producers are wanting access to the LDL information now they know it provides animal health data and is useful to support management activities.

**There is some reluctance to access LDL data online** - There are a number of barriers which aren't well understood which limits some producer's willingness to access their information online. This could be as much a reflection on lack of connectivity in certain regional areas as anything else. This was not a focus on investigation.

Logging into LDL to extract information was found to be somewhat difficult for producers. Some participants who had not used LDL before found it a little tedious signing up for the first time. This is not necessarily a reflection on LDL accessibility but on having at hand the correct credentials to enable connection to their data. Enhancement suggestions in the recommendations (Section 6) could aid in this onboarding process.

## **5.4 Impacts of on farm change takes time to materialise**

Most processors recognise the value in having more informed producers, however, changes undertaken at the producer level are slow to trickle through to the processor. For example, some of the animal health education programs such as Hydatids, will not show any evidence of improvement for a long time. This makes it hard for processors to commit to development and extension programs like this one. The same can be said for genetic improvement and changes in pasture management programs. Improved pasture management often has unseen and unrealised benefits during "normal" times and the impacts are seen during drier times.

Wingham Beef Exports longer term objectives are to continue to work with and advance the knowledge of suppliers. The primary areas to focus increased supplier performance include:

- improving carcase quality which increases carcase returns for both the producer and the processor
- improving animal health which increases producer productivity and profitability.

Change is most likely to occur through time and labour-intensive activities, in small groups or one on one, which processors may not necessarily be able to justify if producers are not reliable and loyal suppliers to the processor.

## **5.5 Investing towards a common understanding of the shared opportunity**

Barriers to adoption of information have been a misunderstanding that the processor will get all the benefit from the reduced price paid for a dark cutter. Dark cutting was an issue and there was a general misunderstanding from producers that classifying an animal as a dark cutter was a way for the processor to discount while keeping the benefit. During the course of the program, producers began to be more proactive in making management interventions when they became aware that neither the processor nor the producer were getting any value from dark cutting.

**Producers request information when they know it's available** – The project has increased the availability of information to support feedback. As importantly, the project has increased awareness of this information and that it can help when dealing with the health of or defects in their animals. The livestock team have fielded increasing calls across the network requesting assistance accessing the information or the possibility of having the information provided to them.

**Information accessibility is important for adoption** - Generally, producers who request the information by phone are less proficient on computer and have been unsuccessful in their attempts to access the information themselves. As a result of multiple requests for data, a WBE employee went about downloading all animal disease and defect data for 2020 & 2021. This has allowed quick access to data when requested and has also allowed the use of sorting by PIC numbers to establish trends and localities which have been affected by particular animal health issues over a period of time.

**New digital functionality could increase adoption** – The manual downloading of data from LDL by Wingham Beef Exports so they can have it ready to present to less tech savvy producers indicates the value of, and importance of the data if they are willing to go to this effort. However, it also identifies an opportunity to have this information transferred (directly from LDL) by the processor in bulk export to all producers with one click of a button, or through an automated push notification that is configurable within required permission levels.

Quoting Wingham Beef Export users – “Anything that makes the LDL data more accessible is a good thing”.

**Evidence indicates data is informing even the most aware producers** - Common responses to the data from producers are that the results are “interesting and will be useful”. Producers said they were unaware that they had a particular issue to such an extent and also that they did not realise that they also had another animal health issue. “We knew we had some issues with liver fluke, but we were not aware that our cattle had such a hydatids issue”. In the surveys a very small number of producers said they don’t care about LDL. The vast majority when shown information about Hydatids said they didn’t realise they had Hydatids.

**WBE, MLA, service provider and ISC collaboration with producers** – throughout the project helped increase awareness of MLA tools, support resources and practical help to increase producer capability. One producer education focused on increasing carcass profitability by reducing the burden of Liver Fluke.

Collaboration across industry groups, community groups like catchment management groups, extension services, animal health suppliers and providers (Veterinarians), animal health manufacturers will provide an opportunity to increase access to information and provide information from several different sources. Enhanced collaboration across the different groups who interact with producers will provide to improve producer outcomes.

## **6. Conclusions/recommendations**

### **6.1 Messages are required in multiple forms**

For a message to be effectively communicated the message also needs to be delivered in a way in which the receiver is able to absorb. To engage in receiving the message, the receiver also needs to understand the importance of relevance of the message. For effective message communication to a broad spectrum of producers' multiple forms of the message is required from email, phone conversations, text messages, face to face meetings, field trips, videos and feedback with a dollar value impact. To communicate a message to producers it is therefore important to develop a number of channels to ensure the communication is effective. Cooperating with and providing extension materials and resources to the different groups which interact with producers means messages reach producers in different forms from people they trust and interact with.

### **6.2 Producer / Processor Collaboration**

Producers are more likely to adopt change and trust the information when it comes from another producer, thus working with "champions" and "demonstration farms" are ways to increase the impact of the message and facilitate change. Producers will also engage with trusted experts. Through the program, staff within Wingham Beef Exports became trusted experts with producers who were unable to access LDL information online, calling into the plant.

### **6.3 Value Propositions to Support Supply Chains**

Activities which are undertaken on farm impact the profitability and efficiency of the whole beef supply chain. Through this project it was identified that producers had limited understanding of the whole of chain value implications. When producers understood the value implications for them, interventions were undertaken. When enacting change, the value propositions, financial impacts and dollar returns on interventions should be clearly communicated to facilitate the change process.

### **6.4 Enhanced digital information sharing functionality**

LDL's new interface and the data presented received positive comments from Wingham Beef Exports and producers during workshops. If ISC is planning further enhancements to LDL, a super helpful feature would be more automated accessing of data and reporting.

- The ability to extract data/reports as a processor for all producers for a period (weeks production for example), push those reports via e-mail to each producer with a single push of a button, or set this up to occur automatically would increase the presentation of LDL data while saving time and effort of the processor.
- Making that e-mailed report clickable to view, and to automatically log into LDL to see that report / selection of data presented in LDL for the producer could help increase adoption of the data and encourage direct access to LDL by producers.
- This could be initiated for each producer, either in conjunction with processors or at an industry access level.
- Functionality for the producer to turn the feature off would enable them to have the last point of control, but after being presented with the functionality first.

## **6.5 Progressive Network development is needed for lasting improvement**

Strong progress has been made in development of a more performance driven supply chain for Wingham Beef Exports and their producers.

Objective information has been adopted by a wider group of producers. This is due in part to the multipronged approach taken to engagement, extension, and support initiatives with the project.

The starting of discussions around value-based decision making across the supply chain have begun. But effort required to move forward will be unlikely to continue without some form of external intervention to re-ignite those discussions. Clarifying potential value propositions for all parties involved, and identification of the risks, coupled with support to explore and collaborate further would be important to address.

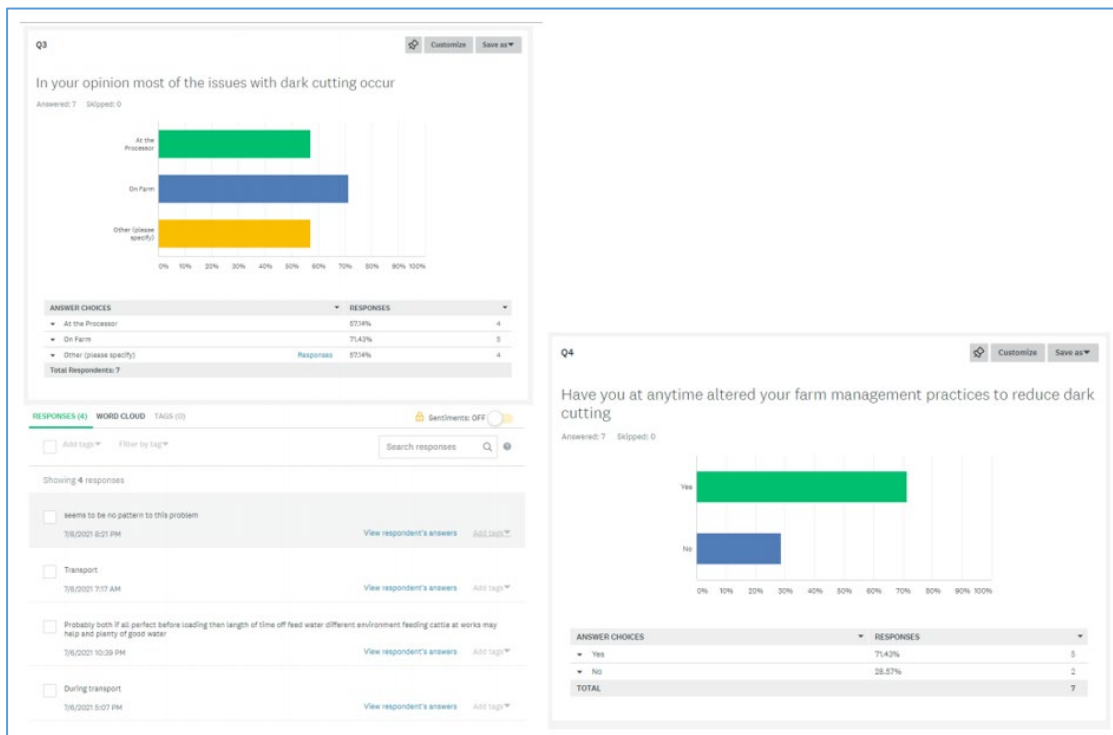
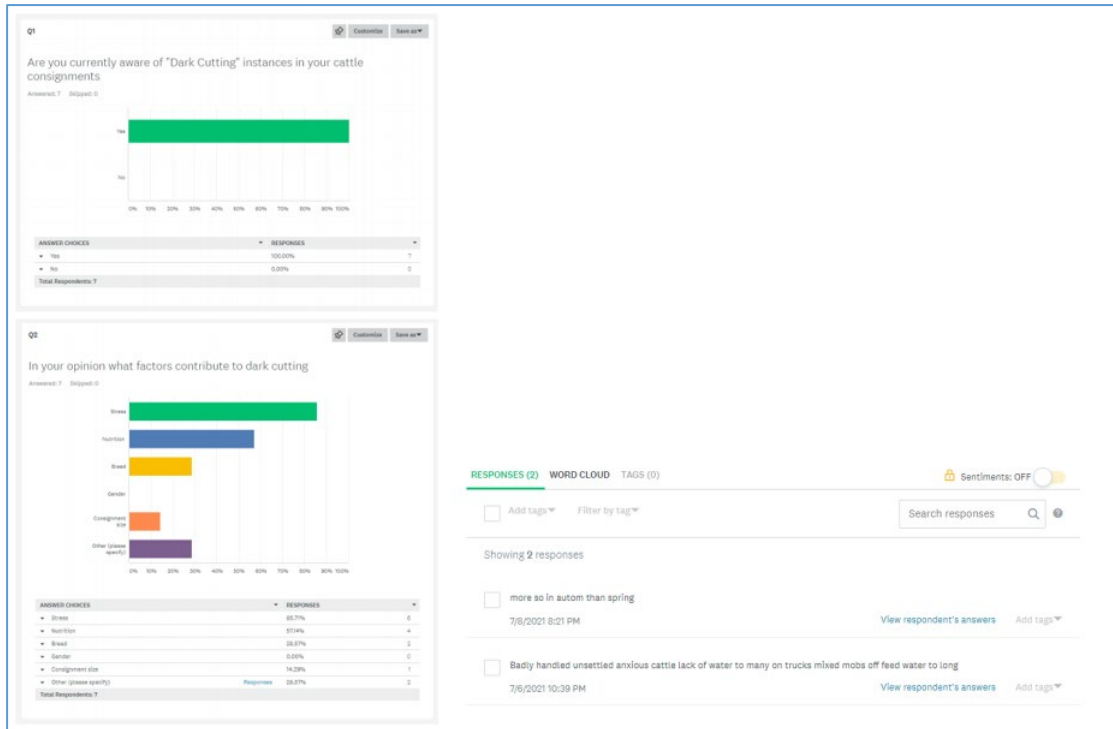
Consideration should be given to build out network support so producer peers can support each other ongoing. This is more sustainable than high effort activities like the ones invested in during this project. However, given the time it takes for cultural and practice change across the supply chain, the activities within this project should be continued in some form to achieve a well informed and connected producer peer network.

## 7. Appendix

### 7.1 Appendix – Industry Expert Support Network

A total of 41 industry experts were engaged with as part of this project.

### 7.2 Appendix – Online survey, questions and responses



**Q5** Customize Save as

Briefly, if you have changed on farm practices - what did you change & did you see results

Answered: 7 Skipped: 0

ANSWER CHOICES	RESPONSES	Count
N/A	57.14%	4
Other (please specify)	42.86%	4
<b>Total Respondents:</b>		<b>7</b>

**Q6** Customize Save as

Do you use Livestock Data Link to review your animal health data

Answered: 5 Skipped: 2

ANSWER CHOICES	RESPONSES	Count
Yes	60.00%	3
No	40.00%	2
<b>TOTAL</b>		<b>5</b>

---

**RESPONSES (4)** WORD CLOUD TAGS (0) Sentiments: OFF

Add tags  Filter by tag

Showing 4 responses

- Not weighing or changing paddocks or mixing mobs later than 14 days before slaughter  
7/8/2021 8:26 AM View respondent's answers Add tags
- The breed of the animal  
7/7/2021 5:21 PM View respondent's answers Add tags
- I have had mixed results where I thought cattle should of all been perfect and other times the opposite  
7/6/2021 10:39 PM View respondent's answers Add tags
- Putting in small paddock the night before loading  
7/6/2021 5:07 PM View respondent's answers Add tags

**Q7** Customize Save as

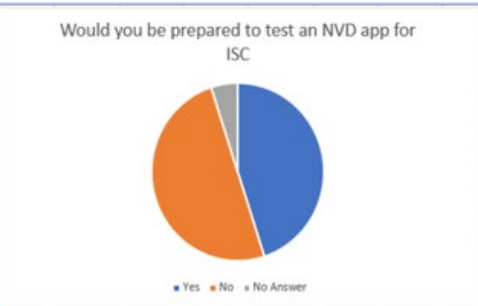
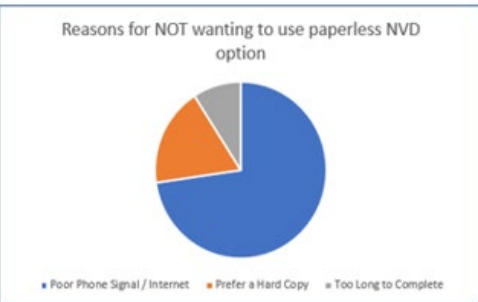
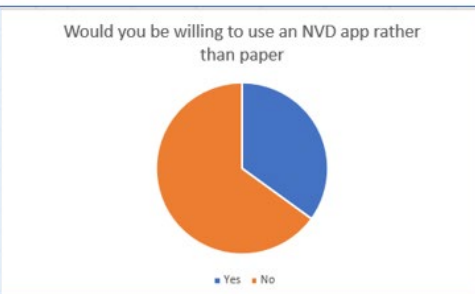
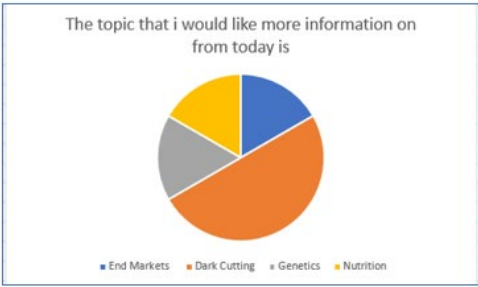
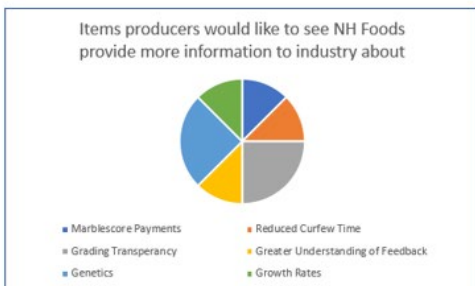
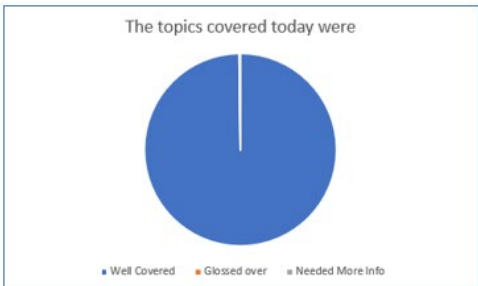
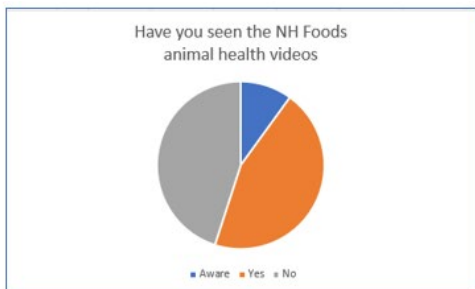
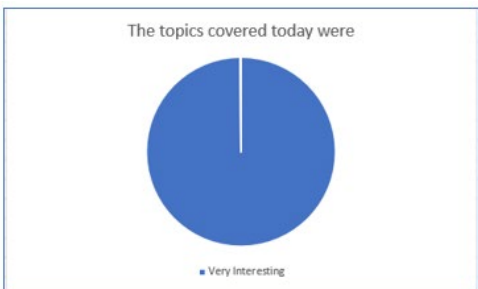
Wingham Beef is seeking to reduce / understand further the instances of dark cutting carcasses in cattle consignments. If you would be willing to allow Wingham Beef to follow one of your future MSA consignments through the plant to try and establish possible trends or issues that may contribute to dark cutting please leave contact email below

Answered: 7 Skipped: 0

ANSWER CHOICES	RESPONSES	Count
Yes	85.71%	6
No	14.29%	1
<b>Total Respondents:</b>		<b>7</b>



### 7.3 Appendix – Collated Survey Responses



## 7.4 Appendix - NVD Requirements Updates

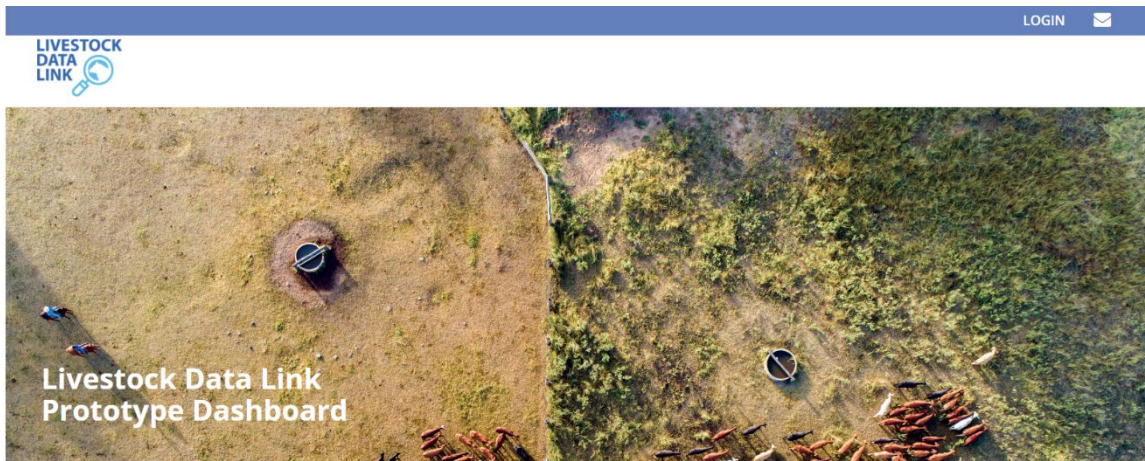


All cattle delivered to Wingham Beef Exports must have the new version of the National Vendor Declaration (NVD) - **C0720**

Any cattle sent with an old NVD will not be processed

New NVDs - Beef Central

## 7.5 Appendix – On Plant Producer Workshop – Understanding Feedback with LDL



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UNE CASI (Computation, Analytics, Software, Informatics)