AUSTRALIAN NUFFIELD FARMING SCHOLARSHIP



1999 SCHOLARSHIP REPORT

by

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Subject

- o Market Supply chains within the Lamb and Beef Industries.
- o Consumer Driven Food Safety.

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TABLE OF CONTENTS

INTRODUCTION	3
BACKGROUND	3
NUFFIELD MOTIVE	4
OBJECTIVE	5
INVESTIGATIVE PLAN	6
ASIA	7
UNITED STATES	8
EUROPE AND THE UNITED KINGDOM	9
BEEF	11
LAMB	11
WHERE DOES AUSTRALIA STAND AS RED MEAT PRODUC WORLD STAGE	
AUSTRALIA'S BEEF INDUSTRY	14
AUSTRALIA'S SHEEPMEAT INDUSTRY	15
WHAT IS WRONG FOR THE PRODUCER?	17
WHAT ARE WE DOING?	18
SUMMARY	19
MY SUGGESTIONS	20
CONCLUSION	21

INTRODUCTION

BACKGROUND

I have spent the last six years been running a Gubbins family property of 1000ha located in the southwest corner of Victoria in southern Australia. We had an average rainfall of 1000mm, and with the correct balance of soil nutrients we produced an average of 12t of dry matter per hectare. We devised what we felt was the best system to utilise and convert this into profit. The enterprises that we ran were self-replacing composite prime lambs and a performance recorded Angus beef herd. Both reproduced in the spring to best utilise the flush of grass at that time of year. The prime lamb flock and the beef herd are both run under the requirements of Cattlecare and Flockcare. We could see that quality assurance was going to be the way of the future and if we were going to truly meet our consumers concerns on food safety we would need to be involved.

We have been operating as a business for six years at Maneroo. We progressed it from average production to a sustainable high return business. The aim was to maximise returns, enjoy a rural lifestyle and to leave the asset in a better state than our generation found it. We were concerned with all the environmental and sustainability issues. The last six years have been a building phase to get the business to its current level of production

NUFFIELD MOTIVE

Many people who know of the Nuffield Scholarship asked me why would I want to spend that much time away from my family and business?

My answer to that was that I felt that the Nuffield offered a unique opportunity for me to take the next steps for the business to grow into sustainable flexible meat production centre that was truly consumer focussed.

Bearing in mind our concern for sustainability, I felt that we would be able to increase production marginally and lower our cost of production though efficiency but the big gains for us would be in the development of relationships and contacts that would ensure a market for our sale stock. This would insulate us from supply fluctuations of and price volatility.

I needed to map out the next stages of growth for our business so as to satisfy a personal desire to move forward and meet new challenges. I personally find maintaining the status quo very boring and unrewarding.

OBJECTIVE

- The first objective was to look at a wide range of red meat supply chains around the world. Compare them to ours and see if they were as long, and had all the same problems of uneven profit distribution.
- Was this a problem that was unique to the meat industry?
- It will be the main focus of this paper to try to turn the tide of the producers to become part of a "Demand Chain" instead of a Supply Chain" and still keep the skills of high production at low cost that are the main drivers of profitability.
- It was this question "Is QA worth the effort?" that was the other major interest to my study on the Nuffield.
- Is it our fault as farmers and not marketers that we have not secured more of the retail value of the product for ourselves.
- QUOTE "A VALUE IS CREATED BY A FEW, FARMING, FISHING AND MINING AND THEN IT IS ALLOCATION ALONG THE SUPPLY CHAIN TO COME UP TO RETAIL VALUE" Jeffery H Kapell.

INVESTIGATIVE PLAN

To be able to fulfil my objective my plan was to glean as much from the Asian experience, in understanding their culture and the potential that Asia is as a market for our red meat today and in the future.

I felt it was necessary to look at our markets in the UK and the US, meet with our consumers and try to understand the real issues for them. I felt as the UK tends to lead the way in branded products that the greater portion of my time be spent there.

Lastly was to glean as much knowledge from the other scholars and share their experiences.

ASIA

The guided section of the tour through Singapore, Malaysia and Thailand highlighted the extent of the market to our north. The population of predominantly no discerning consumers that are moving into westernisation very rapidly was a real eye opener to me. We looked at various retail outlets and to my amazement where is our marketing? Maybe we are going to leave that market to New Zealand as well! The lack of funding for the promotion of Australian beef and lamb in Asia to me appeared to be typical of the marketing initiatives for our rural commodities.

Australian Meat Exports Product	Volume (tonnes)	Value (A\$m FOB).
Beef and Veal	470033	1902.529
Lamb	11334	50.108
Mutton	39307	92.018

It can be seen from these figures that this is one of our main markets and requires way more attention to promotion and marketing. It took quite some time to find red meat with the Australian name on it and when I did find it what I saw was of poor quality. In one large supermarket a small percentage of the meat was off. This was Australian beef and I was honestly embarrassed to see it had Australian on it. We did see some good product in the very up market supermarkets that catered for the westerners, but should we not be marketing our product to the population and not just to the wealthy upper class. This region of the world is going to be a huge market opportunity for Australia, or for someone else's fresh, quality meat.

The marketing highlight of the Asian section of the tour was New Zealand's Milk marketing body in Asia. We can all learn from this, as it was a great example of using people skills that understood the Asian culture and way of doing business.

Rationalise our meat industry bodies and get on with the job of marketing our product to meet the requirements of the various cultures of the World. Or our competitors will.

UNITED STATES

I spent a total of five weeks in the US. In that time I gained a good understanding of their meat industry and the way in which it is heading. The US market may not be as discerning as the UK but is highly important to us for all our meat industries.

Australian	Meat	Ex	ports
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Product Product	Volume (tonnes)	Value (A\$m FOB)
Beef and Veal	311707	955.124
Lamb	21823	146.170
Mutton	15667	31.961

I travelled extensively while in the US and was invited to the Columbia University where I completed a one-week course with some of the heads of US cooperatives, looking at their future role in the supply chain management within the agricultural sector. This was a unique opportunity to meet with major players in the Ag product supply chain and gain some valuable contacts.

The future of cooperatives was extensively debated around the two following quotes

"Industrialisation of agriculture will lead to the demise of farmer cooperatives" Helmberger

"As industrialisation of agriculture evolves Cooperatives will increasingly become the farmers integrating agency". Abrahamsen.

This was a very beneficial study for me and highlighted the problem that we as primary producers are faced with. We have allowed our supply chains to grow to a point where the profit is shared by too many individual cost centres along the way. I was also fortunate to be able to get into the new meat pasteurisation facility in Sioux City Iowa. This is new technology that uses power beam similar to the microwave oven to kill all food born pathogens on fruit and vegetables. At present in the US 70% of chicken is treated in this way to guarantee food safety. The boxed meat from the abattoir is passed under the beam and then shipped to the retail outlet for sale. This is a very fast growing trend in the US for all fresh food. I asked the question why not implement stricter hygiene and quality control rather than introduce another major cost centre to the supply chain.

Quality Assurance and total quality management are paramount for all sectors of the supply chain, to guarantee our consumers food safety.

EUROPE AND THE UNITED KINGDOM

In the time spent in the United Kingdom I visited many researchers, producers, processors, retailers and consumers in both the beef and lamb industries. The common thread is that the producers are hurting. Since the mid-1990s, the value of farm output has fallen by 4 billion pounds and farm incomes have plunged by 60%. Losses of this scale are not sustainable for UK farmers.

The UK has 137 000 farming businesses that drive an industry worth 16 billion pounds and sustain food and drink exports worth 6.5 billion pounds per year. They employ 605 000 workers and spend 9 billion pounds on input costs. They care for 80% of the land mass and produce 70% of the nations food.

This market is an important one to us and is going to become more so in the future. They are among the most discerning consumers and have the strictest guidelines for imported product.

There has been a lot in the press lately as to relevance of this market to us. My experience is that it is a potentially massive market that is looking at the southern hemisphere for supply them with a safe and consistent product. There is a perception that our beef and that of New Zealand that it is of superior quality and has a good clean and green image. We need to capitalise on this and get used to supplying the likes of the UK and Europe and meeting their requirements on quality control. Many countries around the world watch closely the policies that are formulated in the EU on food safety, traceability and animal welfare.

All our customers will demand these standards and codes of practice in the future.

Current Meat Exports to the EU			
Product	Volume (tonnes)	Value (A\$m FOB)	
Beef and Veal	7441	49.675	
Lamb	12088	54.122	
Mutton	6117	22.396	

The UK farmers feel that they have made huge gains in efficiency and productivity in the last 10 years. This drive for efficiency, however, is made much harder by the increasing regulatory burden in the food chain, and by the presence in the market place of a few large buyers that exert enormous price pressure on the farmers. The "Big five" supermarkets now account for well over 50% of total food retail sales. This to me represents an enormous imbalance in the food chain.

The high value of the pound in relation to the Euro and other currencies coupled with interest rates double those available in the Euro zone are the main factors driving the downward trend in farm incomes. As globalisation increases and the UK becomes more exposed to world markets the situation will deteriorate further. This high pound and interest rate has left agriculture in depression with the rest of the UK economy in its longest ever period of sustained growth. The UK retailers are tempted to source cheaper product from the world market. This trend will continue and the likes of Australia will be able to increase its share of the UK domestic market.

BEEF

In my time in the UK I visited many beef farms. The pressure that the beef industry is under is generating frustration and anger and many of the industry people I met with are convinced that beef farmers will never be able to move into a comfortable position within the profit zone unless they own or control a section of the retail chain. This is because the biggest buyers of UK beef the "Big five" constantly scan the world market, and there are fears with the rising domestic market they will continue to switch to cheaper beef from the US, Argentina or elsewhere.

The beef industry I found to be very diverse in the UK. Most of the farms I visited were suckler producers running crossbred cattle. The main focus is on the subsidy or the "Brown envelope" as it is known over there. The use of later maturing cattle like Simmental is common practice so that they do not mature too early to enable them to claim the third subsidy payment. This does not help eating quality or encourage farmers to listen to the market signals. There is currently a move in the UK to look at the future direction of the meat industry.

Total beef consumption in the United Kingdom is now back up to pre BSE levels. Total consumption is now at 906 000t with 40% of that being sold as processed product. This figure is predicted to rise to 70% by the year 2005.

LAMB

Sheep production in the UK is still in crisis, with sheep and lamb prices lower again this year. The year 98-99 saw revenue from sheep and lamb production fall by 33.5m pounds and was predicted to fall again in the current year. In addition to this the heddage subsidy paid to farmers is severely depressed by the strength of the pound.

Lamb consumption is dropping in the UK and is now at 368 000t in 1999 from 548 000t in 1970. The average age of consumers is 45 years and older.

The only light on this front is the advent of The Farmers Ferry that is a farmer initiated and farmer owned export business that shipped 1.8million lambs to the continent in the last 12 months. It has now expanded into an abattoir and carcase export. This has been particularly beneficial to the hill farmers and the producers of lighter weight lambs.

Producers in both industries are distracted by the heddage-based subsidies. This takes the

focus off all the main factors that drive low cost of production efficient beef and lamb enterprises.

Producers are being pushed into various QA schemes by the supermarkets. While I believe in the principle of Quality Assurance there seems to be duplication in the various models. It would appear to me to be the ideal time to introduce one meat industry QA scheme that embraced eating quality. This would go a long way in restoring consumer confidence in the meat industry.

The big five supermarkets have no loyalty to red meat. They have a loyalty to their investors and their sole aim is return per meter of shelf space. What they sell on that metre is not important providing it meets the profit margin. We as red meat producers need to realise this and regard all other protein sources as our competitors.

As we are seeing in Australia there is becoming fewer and fewer processors that are processing more and more of the product. The high throughput of these plants does nothing for eating quality. This maybe alright in the future for grinding and processed beef but there is still going to be a demand for premium eating quality in both countries. Legislation and regulation has got to be realistic for the smaller processors to survive as they are going to play a vital role in the future of our red meat industries.

The UK has seen 18 000 farmers leave agriculture in 1999, this equates to one job in twelve. This decline is twice the rate of any other industry. Income support and social security benefits are being claimed by an all time high of 20% of farmers. The morale of farmers is low and the current trend of farmers leaving the industry will continue on a world scale, they are not an isolated case.

The future success of Australian and British farmers hinges on their ability to get closer to the consumers. The noticeable advantage in the UK is vast consumer base in such close proximity. I personally doubt that the current political system is going to allow British beef and lamb to get them into a competitively priced position on the world market.

It appears that time and time again we see legislation come out of Brussels and the UK enforcing it to the maximum at the expense of the producers and the small to medium processors.

At every turn the UK farmer comes up against stifling bureaucracy over implementation of EU policy and unequal interpretation of that policy by EU members. Government needs to reduce regulation and concentrate on equality within the EU, to ensure balanced

implementation across all member states.

Such levies and taxes as the pesticides tax and the climate change levy will add more costs to the UK producer. These and the like will merely satisfy the ever-increasing population of "greenies and tree huggers" that the UK seems to have more than its fair shared of. Unless the UK government lifts the red tape burden it is going to see the current trends continue.

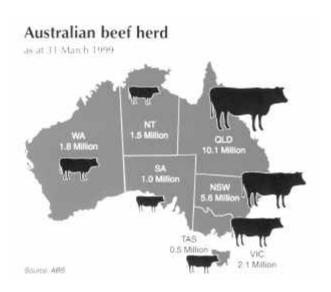
Farmers in the UK are acutely aware that the way forward is to become more competitive by reducing their costs of production and improving productivity. There is currently a large move towards collaboration within the industry on marketing initiatives. This has seen a massive increase in farm shops and farmers markets, farm processing and regional foods across the country. This increase in farmer controlled businesses, FCBs is seen by many as one of the major initiatives that will help to turn the tide for UK farmers. The major advantages of these FCBs is in the shortening of the supply chains, achieving economies of scale, encouraging the concept of added value and the benefits of contracts of supply for producers.

I feel with managing the image of our Australian meat industries combined with the right animal welfare standards, and a graded eating quality product there is a huge market that could be supplied with our product in the future.

WHERE DOES AUSTRALIA STAND AS RED MEAT PRODUCERS ON THE WORLD STAGE

AUSTRALIA'S BEEF INDUSTRY

Australia is one of the world's leading producers of cattle and is the world's largest exporter of beef. 70% of our beef is produced in Queensland and New South Wales. Each year we produce 2 million tonnes of carcase weight beef with a gross value of \$4.4 billion (ABARE) including live export.



Around 80% of Australian households buy fresh beef and eat 38.3 kg per person yearly and in volume terms this is the second most popular fresh meat consumed through the food service industry after chicken.

In 1999 Australia exported 66% of its total beef production with a total value of beef exports at \$3 billion. In 1999, 45% of beef and veal exports were manufacturing grade beef (about half of this was sent to the US) and 48% was boneless primal cuts (over half of these went to Japan).

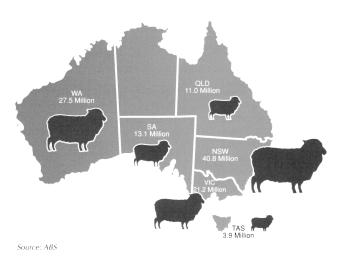
Our live cattle exports in the same year were valued at \$416 million. 40% of these were exported from Western Australia and 28% from the Northern Territory.

AUSTRALIA'S SHEEPMEAT INDUSTRY

Australia is one of the worlds leading producers of lamb and sheep and is the world's second largest exporter of sheep meat. We produce around 344,000t of lamb and 327,000t of mutton per year. The states of Victoria and New South Wales produce over 60% of Australia's production. The gross value of the sheep meat industry and the live sheep trade is estimated at A\$1 billion.

Australian sheep and lamb flock

as at 31 March 1999



In 1999 Australia exported 32% of its total lamb production with a gross value of a\$320 million.

On the production side it is widely predicted that lamb supply will continue to increase over the coming year despite the current lower returns experienced over the last twelve months. This high supply will continue to put pressure on the price of lamb for this year. The lower price for lamb and the increase price for wool are expected to result in a decrease in production in the year 2001 as producers move back into wool and diversify. The future strength of the wool market will play a major role in determining lamb supply. A sustained recovery in wool prices will hasten the move away from lambs to wool and ease the over supply problems that we have today.

The scheduled easing of US restrictions should also aid on the export side. However a raising of these barriers, or extension beyond 2002 can not be ruled out. The current value of the A\$ will have a positive effect on both exports and skin prices in the next twelve months. While on the other hand it is most unlikely that they will return to the prices that we were receiving prior to the market collapse in Aug 98.

Another positive is that the downward trend in the New Zealand flock size is continuing. Numbers are expected to fall from 45.24 in the current year to 40.3 million in the year 2004/5. While there will be some productivity gains the overall export figure is expected to be down.

Those producers who have positioned themselves in market supply chains and alliances have not suffered to the same extent as those selling on the open auction markets. It is estimated that only approximately 15% of our current lamb production is marketed in this way.

WHAT IS WRONG FOR THE PRODUCER?

Most producers tend to look at the sale yards and abattoirs as our customer. I guess in a lot of ways this is understandable in that the only feedback we get is from the Agent, or kill sheet to let us know if we have met what the sale yard or abattoir has a market for that particular week.

The supply chains for both beef and lamb in Australia are too long with too many individual profit centres along the way. Our farm gate prices in real terms are lower than ten years ago and our input prices have gone up over 30% in the last twelve months. This trend will continue and unless we can turn the attitude of agricultural producers around.

It did not matter which country I was in, the image of agriculture was the same. I blame a lot of this on our media in the way they portray agriculture. If you pick up any rural press in Australia today or next week you can be assured that there will be a "goon" on the front or a "goon" on the back and guaranteed there will be a photo of horned cattle or something just as out of date.

This feeds a negative culture in the rural industry. Whatever industry we are involved we need encouragement and positive feedback to help in the creation of a positive culture.

The other problem that I noticed with our beef industry in comparison to that of the US was that we are not working together enough to create complete demand chains.

The US has known areas for breeding, feedlotting and seed stock production and each stage of beef production is located in that particular area that is best suited. There has also been a move by processing works to position themselves closer to the feedlots to improve efficiency. The cattle are the trucked closer to the grain belt and finished under similar systems on mainly corn-based rations that ensure a more even product at the time of slaughter. Most producers have a prearranged destination for their turn off cattle and specialise in one sector of the beef production chain. We in Australia tend to dabble in all phases and operate as individuals rather than setting up systems of supply coordination.

WHAT ARE WE DOING?

Supply chains are one of the catchwords of the rural sector today and in my opinion are typical of the rural industry. We are very good at producing a product at ever decreasing cost and more and more per hectare. We pour research money into these "Production" initiatives and end up over supplying our market or in fact not having a market there in the first place.

As we all know the rural industry is not only slow to accept change but is also plagued with negativity on the fundamental marketing initiatives such as Quality Assurance. We took up Quality assurance very early and have wondered at times was it worth it as we seemed to be spending money year after year with no returns. It is now that I have looked at our markets that I have a renewed faith that Quality Assurance is one of the fundamental requirements of marketing a product.

The other major marketing initiative that will help enormously in the demand for our product is the long awaited introduction of MSA. This will give us a much more accurate feedback on the actual eating quality of our product. The implementation of MSA is continuing, with mixed results. It has become clear that MSA will require time and a persistent approach to gain wide adoption. The various agenda's of the different sectors and political forces with in our beef industry is a major stumbling block for the success of MSA. Until we can unite the industry and streamline all states together we are going to see the industry lead in different directions by the various state bodies and political groups. A unified approach is paramount to the future of the industry.

I clearly understand that the industry is divided by geographical differences that necessitate different production systems that will cause large differences in meat quality. It is also obvious that we have as many diverse markets that can cater for the beef that does not grade MSA. Producers have got to understand that they are not going to be disadvantaged by the fact that their cattle don't fit MSA requirements. It is a matter of understanding what you produce and what market it is best suited. Or even better, see what is in demand understand what exactly they want and when they want it and supply accordingly.

SUMMARY

In summary my recommendations for the Australian red meat producer are as follows.

- 1. Rationalise our meat industry bodies and get on with the job of marketing our product TO MEET the requirements of the various cultures of the World.
- 2. The various agenda's of the different sectors and political forces with in our meat industries is a major stumbling block for their success. Until we can unite the industry and streamline all states together we are going to see the industries lead in different directions by the various state bodies and political groups. A unified approach is paramount to the future of both our red meat industries.
- 3. There is a perception that our beef and that of New Zealand that it is of superior quality and has a good clean and green image. We need to capitalise on this and get used to supplying the likes of the UK and Europe and meeting their requirements on quality control. Many countries around the world watch closely the policies that are formulated in the EU on food safety, traceability and animal welfare. All our customers will demand these standards and codes of practice in the future.
- 4. Supermarkets have no loyalty to red meat. They have a loyalty to their investors and their sole aim is return per meter of shelf space. What they sell on that metre is not important providing it meets the profit margin. We as red meat producers need to realise this and regard all other protein sources as our competitors.
- 5. I feel with managing the image of our Australian meat industries combined with the right animal welfare standards, and a graded eating quality product there is huge markets that could be supplied with our product in the future.
- 6. The future success of farmers to meet the ever-increasing cost price squeeze hinges on their ability to gain control of their demand chain and capture a greater portion of the retail value.
- 7. MSA is by far the most advanced piece of meat science and research ever undertaken in the world. It is paramount that every effort be undertaken to ensure it's future success.
- 8. Quality Assurance is one of the fundamental requirements of marketing a product.

MY SUGGESTIONS

- 1. It is up to all producers to understand what they produce, and what market they should aim for.
- 2. We as producers need to understand that our consumers are as diverse in their requirements as we are in our breeds and production systems.
- 3. If we are going to survive it is up to us to promote ourselves as professional, dynamic industry that promotes best practice under efficient sustainable systems that satisfy consumer perceptions and demands.
- 4. We need to work on instilling a positive culture and a "Can do" attitude. Too often I have heard the whinging farmers all around the world. The ball is in our court!!

"If you are not prepared to be part of the solution then you forfeit your right to complain" Des Penny. Proteus Enterprises.

CONCLUSION

The relevance of this report to our red meat industry is paramount. I have had very little contact from any meat industry bodies since my return. Is this because of their arrogance, or was my study topic irrelevant to industry? Surely an opportunity for an Australian producer to meet with some of our major customers and listen to their issues and concerns would provide valuable feedback for our industry. I am not the first Nuffield Scholar to be faced with the same lack of industry interest. I have travelled with a New Zealand Dairy board sponsored scholar who was not only in constant contact with the New Zealand board but was addressing on a day to day basis the major issues the NZ dairy board was facing. This is an example of the entrepernal marketing ability and the faith that NZ industry bodies have in the Nuffield Scholarship as a unique opportunity to advance commercially focussed progressive farmers to the forefront of our industries.

This study trip has been a unique opportunity for me to step outside the day-to-day activities of the business and look at it from afar. To my sponsors William Buckland Foundation, Rural Finance and the Bendigo Bank thank you for having faith in me. To my fellow Nuffield's I have enjoyed your company and challenging conversations. Friendships have been made that will last a lifetime. It was my first experience at overseas travel and I guess the process of years of conditioning had kept me totally focussed on the "Task". It had been drummed into me all my life that the only time success came before work was in the dictionary and this had not encouraged me to stand back from life and self assess. I think that this is something we as farmers do not do enough of and it tends to stifle awareness and growth. The opportunity would have not been possible with out the support of my family. To all the other people who opened their homes and businesses to me I thank you all very much and hope that I can repay the hospitality in the future.

There has been some changes made and there will be a lot more in the future.