

First consignment of export produce being loaded on the steamer Woolloomooloo at the Government Produce Department facility, Ocean Steamer's Wharf, Port Adelaide, 17 April 1895. Source: PIRSA Image 108774

A STORY OF SUCCESS

SOUTH AUSTRALIA'S GOVERNMENT PRODUCE DEPARTMENT

1895 to 1975

Pioneering Export of Refrigerated and Other Agricultural Products

CONTENTS

This document traces the history of the Government Produce Department between 1895 to 1975. It provides information about its products, facilities, people, achievements, and contributions to South Australia's agriculture industries.

The document is made up of the following sections that can be read as "stand alone" documents. Each section can be accessed individually by simply clicking on the title:

Contents

Introduction

Summary

Key Timelines for the Government Produce Department

Establishment of the Government Produce Department

Products and Services

Sheep Meats – Lamb, Hogget and Mutton

Canned and Dehydrated Meats

Beef

Pork and Pig Meats

Animal Byproducts

Butter

Rabbits

Poultry

Wine, Brandy, and Spirits

Apples and Pears

Oranges

Other Fruits

Product Storage, Export and Marketing

Supplying Government Institutions

Ice Manufacture

Product Inspection and Certification

Wharf Shunting Services

Secretarial Services to Committees and Organisations

Government Produce Department Facilities

Light Square, Adelaide

Port Adelaide

Dry Creek Export Slaughterhouse

Port Lincoln Abattoir

Overseas Market Representation

Staff and Key Influencers

Legislation and Boards Influencing the Government Produce Department

Review and Closure

Further Reading

Decimalisation and Metrication

Authors

Acknowledgements

References

INTRODUCTION

A forgotten and undervalued organization, the Government Produce Department played a vital role in growing South Australia's agricultural exports and wealth. This document traces the Government Produce Department's 80-year history.

A pioneer in the development of refrigerated produce exports from South Australia, it established supply, shipping, marketing and logistics networks to the United Kingdom and Europe. Founded in 1895, it rapidly grew the lamb and mutton trade. By 1908, its new Port Adelaide export abattoir and freezing works had the largest refrigeration capacity in Australia.

Growth of the Government Produce Department business was achieved through establishing a network of abattoirs, processing, chilling/freezing, transportation, and marketing facilities. It coordinated shipping, monitored product out turn; and arranged promotion programs. Its product quality standards also supported delivery of grain export inspection services on behalf of the Commonwealth Government.

The Government Produce Department did the "heavy lifting" taking risks in establishing export markets and logistics, improving export packaging, creating opportunities for individuals and industries, and fostering private enterprise entry into export operations. While its focus was on large industries like meat, apples, wine and butter, it also serviced many minor industries that did not have the capacity to develop exports.

Gradually, numerous private exporters developed businesses modelled on the Government Produce Department structure, utilising its market development work, and further expanding exports. These private exporters became competitors with the Government Produce Department reducing its profitability in later years.

Domestically, the Government Produce Department supplied a wide range of foods to government institutions, provided cool storage facilities for many clients, manufactured ice for domestic consumers, grew the supply of power to southern Eyre Peninsula, and supported emerging industries such as tuna with freezing and canning facilities.

Other functions included administration of Government assistance schemes and providing administrative services to a range of industry and government bodies. It also played a vital role during WW1 and WW2, coordinating export of vital food supplies and delivered food rationing functions on behalf of State and Federal agencies.

A substantial array of infrastructure was established and constantly upgraded by the Government Produce Department in an environment of frequent government scrutiny and onerous financial requirements. Despite this, it was nimble in responding to changing markets, supply challenges and government policy.

Contributions of the Government Produce Department goes well beyond exports. It coped with agricultural industry challenges such as drought, economic depression, war and changing markets, often provided an outlet for otherwise unsaleable

produce, fostered the entry of private enterprise into export markets, and was a major employer.

The Government Produce Department and its staff should be applauded for their achievements, without which South Australia would have been a much poorer state.

Loss of the United Kingdom as a major market in 1973 when it joined the European Economic Union was a critical factor triggering abolition of the Government Produce Department in 1975.

The Government Produce Department was criticised for its losses during its latter years of operation. Its costs to taxpayers were minimal. The Government Produce Department was self-funded from its business trading, paid interest and depreciation to South Australia's Treasury, and the assets it owned on behalf of the South Australian government appreciated significantly in value.

The wealth created and growth generated for farming districts over its 80 years of operations far outweighed the accumulated losses (outstanding debt \$3.58m as at 30 June 1975) of the Government Produce Department in its latter years.

SUMMARY

Successful pastoralist Thomas Sutcliffe Mort pioneered the use of refrigeration in Australia for storage and export of butter, cheese, and frozen meat. In 1875 he established the New South Wales Fresh Food & Ice Co and went on to sponsor the successful development of a cold chain comprising a slaughterhouse and freezing works at Bowenfels (New South Wales), cold stores near Darling Harbour, refrigerated milk depots, and cooled railway trucks¹.

During the 1880s, steam powered ships began offering refrigerated freight services from Australia to major United Kingdom and European ports. Shipping companies were keen to expand this lucrative produce trade, creating interest from farmers.

Refrigeration technology was still relatively new in the 1890s. It created opportunities for South Australian farmers to export meat, butter, fruit, eggs, and other perishable products overseas. After several unsuccessful attempts to attract private investment to develop refrigerated produce export businesses, the South Australian government decided to establish the Government Produce Department. This organisation was given powers to establish processing facilities in conjunction with transport and product marketing chains for a wide range of perishable produce.

Success and growth of the Government Produce Department's business in the first 5 years of operation encouraged investment in new facilities and services. It "kick started" trading doing the early heavy lifting to develop markets and took business risks in areas where private enterprise was not prepared to venture.

A major new abattoir, cool storage and shipping facility was built at Port Adelaide in 1908. Other facilities were established at Dry Creek, Port Lincoln and Light Square (Adelaide). Quality assurance services were developed for grain exports at numerous ports. Other enterprises developed included meat and fish canneries, butter factories, egg pulping plants, cordial factories, and electricity generating and distribution networks.

Sheep meats were the Government Produce Department's core export product. Other exports included wine, beef, pork, butter, apples, rabbits along with numerous minor products such as canned meats, dried fruit, honey, eggs, citrus, olive oil, tallow, fertilizer, and skins.

Marketing networks in the United Kingdom and Europe were supported by the appointment of South Australian Commercial Agents, Trade Commissioners and Agent Generals based in London. An important element of these marketing networks was the provision of regular feedback to farmers and exporters about market outlooks, opportunities, packaging, and product improvement.

During its operational life, the Government Produce Department processed or facilitated export of the following quantities of major products:

- Lamb/mutton 1895-1975 21.6 m carcasses
- Beef 1908-1969 29,673 t
- Pork/bacon 1895-1960 438,866 carcasses or 23,396 t

•	Butter	1893-1935	19,782 t (GPD handled 50% of SA's exports)
•	Rabbits	1896-1953	15 m rabbits
•	Apples	1895-1975	11.3 m bushels (GPD handled 30% of SA exports)
•	Wine	1895-1940	2.294 m imperial gallons (10.32 m litres)

The Government Produce Department played a vital war time role coordinating supply and shipping of key foods from South Australia. Both World Wars demanded considerable expansion of processing and transport operations, especially for meat products. Some industries such as apples lost export market access during WW2, requiring the Government Produce Department to coordinate delivery of Federal financial assistance to South Australia's growers.

Repeated operating losses mainly associated with the Port Lincoln abattoir during the 1970s placed the Government Produce Department under severe financial stress. This was compounded by the United Kingdom entering the European Economic Community on 1 January 1973 and placing large tariffs on imports from Australia.

In January 1971, the Minister of Agriculture, Tom Casey appointed the South Australian Government Produce Department Investigating Committee to examine operations with special emphasis on the Port Lincoln works. The Committee's report to the Minister of Agriculture recommended that the Government Produce Department be abolished. Alternate delivery arrangements were established for some functions.

The Government Produce Department ceased operations on 20 October 1975 after 80 years of support to South Australia's agricultural industries.

KEY TIMELINES FOR THE GOVERNMENT PRODUCE DEPARTMENT

To provide a quick "snapshot" of the development phases, operations, and history of the Government Produce Department's growth, following is a chronological list of major milestones and events:

1893	Parliamentary approval to form the Government Produce Department.
1894	Wine and Produce Depot established at Thames Wharf area London.
1895	Final structure of Government Produce Department approved.
	Small chiller facility opened at Ocean Steamers Wharf, Port Adelaide
	Launch of first consignment of produce to United Kingdom on 17 April.
1900	Construction of lamb slaughterhouse and holding yards at Dry Creek.
1903	Appointment Mr E Burney Young, first Trade Commissioner in London.
1906	Butter Factory commenced operations at Port Adelaide.
	Export grain and flour inspection and certification service established.
1907	Appointment of Commercial Agent London – product promotion.
1908	Larger new slaughtering and freezer facilities built at Port Adelaide.
	Dry Creek slaughterhouse closed.
	Cattle slaughtering commences at Port Adelaide.
	First consignments of beef exported to United Kingdom.
1909	First consignments of beef exported to United Kingdom. Meat cannery installed at Port Adelaide commences operation.
1909 1910	
	Meat cannery installed at Port Adelaide commences operation.
	Meat cannery installed at Port Adelaide commences operation. Light Square cool rooms, ice plant and lamb freezing unit purchased.
	Meat cannery installed at Port Adelaide commences operation. Light Square cool rooms, ice plant and lamb freezing unit purchased. Commenced manufacture and retail distribution of ice.
1910	Meat cannery installed at Port Adelaide commences operation. Light Square cool rooms, ice plant and lamb freezing unit purchased. Commenced manufacture and retail distribution of ice. Light Square lamb exports transferred to Port Adelaide.
1910 1915	Meat cannery installed at Port Adelaide commences operation. Light Square cool rooms, ice plant and lamb freezing unit purchased. Commenced manufacture and retail distribution of ice. Light Square lamb exports transferred to Port Adelaide. Light Square butcher shop started to supply Government Institutions.
1910 1915 1920	Meat cannery installed at Port Adelaide commences operation. Light Square cool rooms, ice plant and lamb freezing unit purchased. Commenced manufacture and retail distribution of ice. Light Square lamb exports transferred to Port Adelaide. Light Square butcher shop started to supply Government Institutions. Trade Commissioner office transferred to Australia House, London.
1910 1915 1920 1925	Meat cannery installed at Port Adelaide commences operation. Light Square cool rooms, ice plant and lamb freezing unit purchased. Commenced manufacture and retail distribution of ice. Light Square lamb exports transferred to Port Adelaide. Light Square butcher shop started to supply Government Institutions. Trade Commissioner office transferred to Australia House, London. Commencement of cooperative owned abattoir at Port Lincon.
1910 1915 1920 1925 1926	Meat cannery installed at Port Adelaide commences operation. Light Square cool rooms, ice plant and lamb freezing unit purchased. Commenced manufacture and retail distribution of ice. Light Square lamb exports transferred to Port Adelaide. Light Square butcher shop started to supply Government Institutions. Trade Commissioner office transferred to Australia House, London. Commencement of cooperative owned abattoir at Port Lincon. Expansion of Light Square cool rooms and new Head Office building.
1910 1915 1920 1925 1926 1928	Meat cannery installed at Port Adelaide commences operation. Light Square cool rooms, ice plant and lamb freezing unit purchased. Commenced manufacture and retail distribution of ice. Light Square lamb exports transferred to Port Adelaide. Light Square butcher shop started to supply Government Institutions. Trade Commissioner office transferred to Australia House, London. Commencement of cooperative owned abattoir at Port Lincon. Expansion of Light Square cool rooms and new Head Office building. Transfer of Port Lincoln abattoir to Government Produce Department.

	Move of Trade Commissioner's office to Oxford Street, London.
1935	Egg pulping plant set up at Port Lincoln.
1936	Port Adelaide abattoir closed in 1936 then demolished in 1939.
1940	Re-commissioning of canning equipment at Gepps Cross for WW2.
	Apple and wine exports cease - shipping shortages in WW2.
	Handling of SA apple and pear crop acquisition commences.
1941	Upgrade and major expansion of Port Lincoln abattoir facilities.
	Ramping up lamb production and shipments for WW2.
	Administering WW2 domestic meat management commences.
	Construction of cannery building at Port Lincoln for fish and tuna.
1942	Compulsory acquisition expands meat supplies for military use.
1950	Port Lincoln electricity generating plant transferred to Electricity Trust.
1952	Light Square ice sales to distributors cease.
1953	Sale and transfer of Light Square rabbit export business.
1957	Sale of Port Lincoln fish cannery to SAFCOL.
1958	Bulk handling and shipping of grains commences.
1959	Experimental use of bulk bins for apple exports commences.
1963	MV Troubridge ferry service to Port Lincoln, Kingscote, Port Adelaide.
1965	Nelson's meat auction hall established at Light Square facility.
1971	Review of Government Produce Department operations and functions.
1975	Transfer of export grain certification to Department of Agriculture.
	Food supply services transferred to Services & Supply Department.
	Transfer of Port Lincoln abattoir to Metropolitan Export Abattoirs Board.
	Closure and wind up of Government Produce Department 20 Oct 1975.

ESTABLISHMENT OF THE GOVERNMENT PRODUCE DEPARTMENT

Initial Advocacy

In their annual report to the Minister of Agriculture in 1890-91, the South Australian Bureau of Agriculture proposed opportunities for export of dressed poultry, lamb, pork, game, butter, oranges, apples, pears, and other perishable commodities to London using the refrigerated holds available on mail steamers servicing Port Adelaide.

Wine exports were also viewed as another major export opportunity, especially since the state's grape plantings and wine production had doubled from 4,202 ac (1,701 ha) to 9,570 ac (3,875 ha) between 1880 and 1890, resulting in annual wine production increasing from 313,060 gall (1.4 m litres) to 762,776 gall (3.4 m litres)².

This message was further reinforced by the South Australian Bureau of Agriculture in their 1891-92 annual report. They highlighted trial shipments of apples and oranges made to the United Kingdom, details of refrigerated produce exports from New Zealand, Victoria and New South Wales, and their activities surveying South Australian fruit and butter producers³. They recommended:

- Initially using the cool store facilities built by South Australian Railways at Adelaide Railway Station for butter exports.
- Establishing cool room facilities at Port Adelaide for storing butter, and precooling fruit, or freezing other perishable commodities in anticipation of loading onto refrigerated ships.
- Planting of Radiata pine plantations in South Australia to produce timber for manufacture of fruit packing cases.
- Exploration of processing and value adding industries for preserving, pickling, canning, drying, jam, and oil manufacture from horticulture products for local consumption.

Parliamentary Approval to Establish a Government Produce Depot in London

In November 1893, Parliamentary approval was gained for:

"Establishment of a Wine and Produce Depot in London for the purpose of placing South Australian wine and other produce on the English markets under the most favourable conditions, and for obtaining such information with regards to the requirements of the markets as would be of value to producers"⁴.

Interest in using new refrigeration technology and the potential to develop an export trade in frozen beef, mutton, lamb, and rabbits was gaining political traction. On 13 December 1893, the South Australian Parliament passed the following resolution:

"That in the opinion of this House the prayer of the petition for fostering the meat industry should be considered by the Government with a view of

assisting the industry by the grant of portion of the proceeds of the Stock Tax as a subsidy to monies raised by the stockholders for the purpose of establishing Freezing Works to the encouragement of the industry"⁵

In 1894, the South Australian Government authorised the establishment of a South Australian Wine Depot in London to market and provide information for SA's wine makers about requirements of this market. Professor Perkins at Roseworthy Agricultural College was tasked with developing a quality assessment service for wines to be exported to the United Kingdom.

Further public discussion occurred about opportunities for meat exports. Consideration was given to Penola and Port Augusta as potential sites for building an abattoir and freezing works.

Later in 1894, Sir David Gordon along with other supporters developed a prospectus for a private company to establish a freezing works. This failed to get significant financial support from stockowners and merchants. In response, Sir David Gordon stated that there was "apathy of stock owners, the indifference of merchants, and the timidity of capitalists"⁶.

The South Australian Government made a further unsuccessful attempt to attract private investment for a produce export enterprise. In July 1894, a Parliamentary Committee passed a Resolution to provide seed capital to attract investment. It was moved by the Minister of Agriculture Dr Cockburn: "That the Committee approves the fostering of the frozen meat trade in approved localities by advances not exceeding half the total cash expenditure on the premises and plant necessary for the conduct of an export trade. The advance to be for a term of five years to be a first charge on the premises and plant to bear interest at the rate of 5% per annum and no advances in any case to exceed £10,000". Again, there was a lack of response from potential investors.

Significant public debate about establishing a government export business followed, with this seen as being interference with the role of private enterprise. Many ridiculed the idea expressing the view that establishing such a government enterprise would not be successful.

Despite this resistance, eventually a resolution was passed through the South Australian Parliament to establish the Government Produce Depot. Dr (later Sir) John Cockburn was a persistent advocate for this enterprise and was considered the "father of the Produce Depot".

Butter Bonus Act 1893 – a Template for Refrigerated Exports

The *Butter Bonus Act 1893* provided a template and triggered establishment of channels for perishable agricultural produce to be exported from South Australia to the United Kingdom using refrigerated shipping.

During the 1890s, over production of cream, low prices, and variable butter quality depressed profitability for South Australia's dairy farmers. Significant opportunities

for export of butter to England were identified. It was claimed that England "imported yearly 12,000,000 pounds of butter from the Continent"⁸.

The *Butter Bonus Act 1893*, assented to on 27 September 1893, was put in place to pay a bounty of 2 pence per pound for export of good quality butter.

South Australia's numerous small butter factories did not have the capacity or finances to develop an export trade, and their product quality was highly variable. The Butter Bonus legislation was established for three years with the total bonus capped at £12,0009 to assist the purchase of surplus cream, to manufacture it into butter, cool store and export it.

This financial incentive established butter exports to London, utilised excess cream and quickly improved the profitability of South Australian dairy farms.

The small freezing unit already built at the Adelaide Railway Station to assemble export butter consignments was found to be inadequate. A larger cool store was needed. The Ocean Steamer's Wharf at Port Adelaide was identified as a suitable site to build a larger cool storage unit for butter. Subsequently the project was expanded to include the processing and freezing of sheep meats, export of wine and other agricultural produce (see "Products and Services/Butter" for further detail).

These works were built at Port Adelaide and known as the "Government Produce Department" with an operational policy of:

- (a) "The opening up and development of overseas markets for the products of this state not then being shipped.
- (b) The development of the production of minor perishable products, and the finding and improvement of markets for same" ¹⁰.

Success of the *Butter Bonus Act 1893* triggered development of the Government Produce Department and establishment of perishable agricultural product exports from South Australia.

Birth of the Government Produce Department

A formal opening ceremony for the Government Produce Department and its Port Adelaide facility was held at Ocean Steamer's Wharf on 17 April 1895. This celebrated the loading of the first export shipment of refrigerated produce for London. The opening was attended by Lieutenant Governor (later Chief Justice) Way, and the Minister of Agriculture Sir John Cockburn.

The initial Port Adelaide facility comprised a receiving store for wine with cool stores for butter, meat, and fruit. This facility would be expanded through the early 1900s with establishment of slaughtering and freezing facilities, a butter factory and a cannery (see section about Port Adelaide).

The first 1895 export shipment destined for England was loaded on the SS Woolloomoolloo. This was described by the Minister of Agriculture as "consisted of 30 well grown pigs from Roseworthy Agricultural College, a number of sheep,

several tons of honey, some poultry and rabbits, cases of apples, and 110 hogsheads of wine".



Ocean Steamer's Wharf, Port Adelaide, 1895 with Government Produce Department sheds on left. Source: PIRSA image 108775

During 1896 in its first full year of operation, the Government Produce Department achieved £50,408 of sales, with the most significant products being 62,880 gallons of wine, 350 t of butter and 1,800 dozen eggs.

Through coordinated export operations in South Australia and active marketing representation in London, sales grew steadily, necessitating expansion of warehousing facilities for storage and wine bottling in London. Sale of lamb and mutton expanded to become the Government Produce Department's main export product. By 1900-01 a sound business base had been established with annual turnover exceeding £141,000 and the Government Produce Department exporting the following volumes of produce in that year¹¹:

- 84,938 gallons of wine.
- 626,908 rabbits.
- 94,597 lamb and 7,122 mutton carcasses (50% of Government Produce Department sales).
- 312 t of butter.
- 19,270 cases of fruit, predominately apples.

To expand lamb and mutton exports, a property was purchased at Dry Creek in 1900 for holding stock, and to build a sheep abattoir to service the Port Adelaide freezing and export operation. The Dry Creek slaughterhouse commenced operation on 8th October 1900 with a planned throughput of 2,500 lambs per day.

After its first five years of operation, the Government Produce Department had established a successful business model, was operating profitably, and delivering good outcomes for South Australia's primary producers.

Financing of Government Produce Department by South Australian Treasury

The Government Produce Department did not have subscribed capital but was funded by the South Australian Treasury, which acted as its banker. The Government Produce Department was required to pay all salaries and operating costs from turnover, repay borrowed principal, pay interest on outstanding debt (usually varied between 4 to 5.2% pa), and pay depreciation on plant and equipment. Under normal economic conditions this was achievable but represented a high-risk during periods of drought or recession.

During sustained periods of reduced exports, poor prices and losses, debt to South Australian Treasury accumulated. In 1927 after four years of limited lamb trading, due largely to a major world oversupply of meat following WW1; the Government Produce Department was coming under sustained political criticism for its large accumulated losses, despite profitable operation of the butter factory, ice manufacture, grain inspection, cold storage, and strong performance of apple and wine exports.

In his 1926-27 annual report, General Manager Mr G A W Pope pointed out that the Government Produce Department was disadvantaged by its financial arrangements with South Australian Treasury. He compared these to financial arrangements for private companies. In this annual report he wrote:

"During this period of depression private companies are not paying dividends, but as the Department has no subscribed capital it is called upon to pay interest at the rate of £5 1s per cent per annum. It also had to find £6,815 17s 8d per annum for depreciation, while a company would only show this as a liability depending on future profits or past reserves to supply the cash. Both these items help to make the Department appear in a worse light than would a private company under similar conditions" 12.

Mr Pope also highlighted the Government Produce Department's strong equity position. While its financial accounts showed it owed Treasury a total of £181,527, the increased value of its land, buildings, machinery, and other assets were not considered, and far outweighed this debt¹³.

Following a further year of losses, in the 1927-28 annual report, Mr Pope intimated that Treasury was "double dipping" from the Government Produce Department accounts. He made the following comment about the inequity of these financial arrangements, especially depreciation payments:

"The Department has made a total loss of £89,909 18s 6d during the past five years, but not withstanding this the Treasury has been paid £42,905 4s 11d in interest and £31,008 8s 11d for depreciation, and the accounts have been balanced by using up the reserves held of £16,836 7s 9d, obtaining the balance of £73,073 10s 9d from the general revenue of the state.

No company would borrow such a sum so that it could pay interest on its capital, nor for the purpose of refunding a certain depreciation. Therefore, if

the Department's balance sheet was reconstructed on commercial lines, the items charged as interest and depreciation would disappear, and the loss of £73,073 10s 9d would also disappear."¹⁴.

These comments triggered a response from South Australian Treasury in 1930 when depreciation arrangements were changed. Instead of being paid to Treasury, depreciation was deposited with the Public Debt Commission and held in reserve for future renewals and replacements of equipment, a more equitable arrangement¹⁵.

Financial Phases of the Government Produce Department

Financial performance of the Government Produce Department was greatly impacted by drought, wars, economic depression, tariffs, international market outlooks and agreements. Diversification of product range provided some flexibility to cope with varying economic conditions. However, the heavy investment in abattoir facilities for lamb and mutton exports meant that world downturns in sheep meat prices impacted dramatically on the Government Produce Department's financial performance.

With high wool prices farmers retained more sheep for wool production meaning smaller volumes of lamb for export. This contrasted with WW1 and WW2 when there were large volumes of lamb, beef and other foods being exported to support military forces, creating periods of high turnover and profitability.

Other business enterprises associated with butter, fruit exports, ice manufacture, government institution supply, grain and flour inspection, and minor commodity exports generally broke even or made reasonable profits.

These factors contributed to the Government Produce Department experiencing a series of financial phases during its history, comprising:

- 1895 1914 steady expansion of export sales and growth in turnover.
- 1914 1920 WW1 major contracts with the United Kingdom Government for frozen and canned meats resulted in strong returns to growers and dramatic expansion of turnover and profit.
- 1920 1934 world oversupply of meats, carryover of meat from WW1, depressed markets, small export volumes, contributed to 10 years of consecutive losses.
- 1934 1939 introduction of the Ottawa Meat Agreement between the United Kingdom and Commonwealth countries resulted in meat market recovery and growth of turnover.
- 1939 1945 WW2 creates huge demand for meat products. This improves lamb prices, expands pork and beef exports, creating strong financial returns.
- 1946 1960 stable meat prices continue post WW2 delivering sound financial performance.
- 1960 1971 expansion of the boned meat trade to United States of America, Japan and other countries developed. These markets demanded large investments in plant upgrades to obtain abattoir accreditation, contributing to growing losses by the Port Lincoln abattoir.

 1971-1975 continuing losses at the Port Lincoln abattoir. Loss of the United Kingdom market in 1973 trigger wind up of the Government Produce Department.

Parliamentary Inquiries

Over time, various privately owned produce export companies were established by investors. They viewed the Government Produce Department as a competitor, triggering various parliamentary questions and inquiries.

During its first 5 years of operation, there were numerous Parliamentary questions about the effectiveness of the Government Produce Department, and the performance of some staff members. Accumulating debt in the 1970s triggered further examination of the agency's future.

Some examples of major inquiries are:

Purchase of Light Square

Purchase arrangements for the Light Square Cold Store in 1910 sparked an inquiry by the Attorney General. This examined the government approval process for purchase of this business, despite the purchase being pre-approved by Treasury. The inquiry commented on many operational processes used by the Government Produce Department but contained little criticism of the Light Square Cold Store purchase process¹⁶.

Port Adelaide Losses in 1920s

A Parliamentary Standing Committee on Public Works investigated the Government Produce Department's consecutive losses in the 1920s, and published its findings in Report No 35, 11 June 1929. This committee ascertained that from the end of WW1 to 1929, the Port Adelaide Freezing Works was not financially successful, but had provided an outlet for surplus livestock that had been very valuable in maintaining local values, especially during drought. Graziers, farmers, and stock agents were supportive and keen to see the Port Adelaide facility remain open.

This investigation concluded that an annual throughput of 200,000 to 250,000 lambs was deemed necessary for the Port Adelaide works to operate profitably.

The 1929 Parliamentary Standing Committee on Public Works report made the following recommendations:

- Lamb producers be given an opportunity to form an organisation and take over operation of the Port Adelaide facility.
- Pending recommendation 1 occurring, fees for all stock being handled by the Government Produce Department be increased, and arrangements also be made for the Abattoirs Board to increase its fees, and these be paid to the Government Produce Department¹⁷.

Review for Closure of Government Produce Department

In January 1971, the Minister of Agriculture Tom Casey appointed the South Australian Government Produce Department Investigating Committee to examine operations of the Government Produce Department with special emphasis on the Port Lincoln works.

This committee ultimately recommended abolition of the Government Produce Department. For more details about this committee, go to the "Review and Closure" section.

Farmer Trading Arrangements

Flexible arrangements enabled farmers to export stock to international markets through the Government Produce Department using various trading channels, including 18:

- Ship on consignment through the Trade Commissioner in London.
- Export "on hook" at prices obtained by the Government Produce Department.
- Sell direct to exporters on the farm.
- Sell through normal livestock auction markets.

Trading arrangements between farmers and the Government Produce Department could be customised via:

- The Government Produce Department ordering rail transport, unloading on arrival at the Depot, slaughtering, grading, and freezing on behalf of the owner.
- Overseas shipping space could be booked, and lambs shipped according to instructions, but at owner's risk.
- If the owner preferred, the Government Produce Department would sell product on the United Kingdom market giving an advance payment at the time of shipping.
- Farmers were normally paid for fat at market rates, with this being manufactured into tallow by the Government Produce Department.
- Skins could be sent to the owners preferred agent or sold on their account.
- Subsequently sale returns were forwarded to clients minus service costs.
- The Government Produce Department would establish export markets for different or new commodities when requested by producers.

In some circumstances the Government Produce Department would simply buy livestock in the open market, process, and export carcasses at its risk. To supply canning operations, Government Produce Department would buy low grade animals at regional stock markets and process them to meet canned meat orders, often supporting market prices for good quality stock.

PRODUCTS AND SERVICES

Through its 80 years of operation, the Government Produce Department business focussed mainly on processing and export of chilled/frozen meats, predominately lamb and mutton, and to a lesser extent beef and pork.

Using its cold stores, freezers, and marketing chains, it also exported a wide range of other agricultural commodities including wine, butter, fruit, eggs, canned meats, rabbits, honey, and abattoir byproducts such as offal and tallow.

Associated with exporting was the provision of certification services for grain, flour, and wine products, shipping management, and documentation services. It provided access to market representation through the South Australian Trade Commissioner or Agent General in London.

Domestically, the Government Produce Department was a major supplier of ice to Adelaide, electricity for Port Lincoln, meat, and food products to South Australian Government Institutions, and played a vital role in development of the Port Lincoln tuna industry.

This section provides historical information about the main products and services delivered by the Government Produce Department.

Sheep Meats - Lamb, Hogget and Mutton

Prior to establishment of the Government Produce Department, South Australia's lamb producers could only access domestic markets. Peak spring production would over supply local markets, and stock prices would crash to unprofitable levels. Introduction of freezing technology enabled more consistent year-round supply of meat to domestic markets. More importantly, it opened new markets for livestock via the export of frozen meat products overseas.

During its 80 year history, export sheep meats were the Government Produce Department's main focus. Products included lamb, mutton, kidneys, brains, tongues and other sheep organs, and byproducts such as tallow and skins.

Between 1895 and 1975, more than 21.6 m lamb, hogget and mutton carcasses were processed and approved for export, almost entirely to the United Kingdom¹⁹. Lower grade mutton, and beef was canned or dehydrated, especially during WW1 and WW2.

Early Development of the United Kingdom Meat Market

In the 1890s, most farmers were raising Merino sheep with a focus on wool production. Meat was a secondary product. With greater demand for sheep meats, many farmers adopted the use of Merino or crossbred ewes mated with Dorset, Suffolk, Southdown, or Rylands rams. This strategy produced lower fat, and heavier lamb carcasses, favoured in United Kingdom markets.

From commencement of trade in 1895, lamb exports grew steadily. By 1900-01 the Government Produce Department had exported more than 150,000 lamb and mutton carcases to the United Kingdom²⁰.

During the Boer War, the Government Produce Department was responsible for securing a range of products on behalf of the Australian War Office and shipping these to South Africa. It did not charge administration fees for this service. It shipped 776 t of jam, 6,511 lamb and mutton carcases and 8,476 t of hay²¹.

Exports grew steadily until a slump in 1909-10. This forced South Australian farmers to refocus on wheat production, with sheep exports declining to only 33,220 carcasses in 1913-14.

WW1 revitalised lamb exports with the United Kingdom Government agreeing to purchase all Australian surplus meat available. The 1914 drought proved a setback, but lamb production ramped up in subsequent years. The WW1 United Kingdom purchase agreement ceased in 1919 with trading going back to pre-war arrangements.

1920s Sales Doldrums

The export of 328,035 lamb and mutton carcases in 1919-20 was followed by a decade of depressed exports and significant financial losses for the Government Produce Department²². Lamb sales slumped to 89,511 carcases in 1920-21, no exports in some years, and did not recover until the 1930s²³.



Export lamb competition display, Portsmouth 1910. Source: PIRSA image 108795

Depressed lamb and mutton exports during the 1920s were caused by:

- World over production, mainly because of expanding beef and lamb production in Argentina.
- Carryover of large quantities of canned and frozen meats after WW1.
- Impact of various droughts.
- The Great Depression.
- High wool prices in the mid-1920s encouraged Australian farmers to expand flocks for wool production and reduced meat output.

The slump in lamb exports resulted in 10 consecutive years of losses (between 1923-24 to 1932-33) for the Government Produce Department's abattoir operations²⁴. Throughout the 1920s, processing was below the target of 200,000 lambs pa needed to pay abattoir staff, operating and business costs.

Good conditions in 1931-32 finally stimulated expansion of lamb exports with 136,747 shipped in that year (70% crossbreds and 30% Merino), thus reducing Government Produce Department annual loss to £1,672 in 1931-32²⁵.

Ottawa Meat Agreement – Reboots Exports

The Ottawa Meat Agreement was a major breakthrough reinvigorating Australian meat exports. Signed (in Ottawa Canada) between the United Kingdom and Commonwealth Governments it overcame the depressed meat prices of the 1920s. Markets were stabilised in 1932 and 1933 by the introduction of quarterly quotas for beef, mutton and lamb entering the United Kingdom from Commonwealth countries (based on sales in the previous year ended 30 June 1932).

The Ottawa Agreement was amended in 1934-35 to allow some meat to be imported into the United Kingdom from non-Commonwealth countries with additional tariffs. The United Kingdom Government made special arrangements for a limited supply of meat from Argentina in 1936.

This process reduced Australian lamb stocks held in cold storage, and South Australia's lamb and mutton exports to the United Kingdom rebounded to 277,593 carcasses in 1934-35.

The Ottawa Agreement expired in August 1937 but was replaced by a new threeyear agreement controlling United Kingdom meat imports. It ensured United Kingdom lamb imports did not decline by more than 5% from 1935 levels.

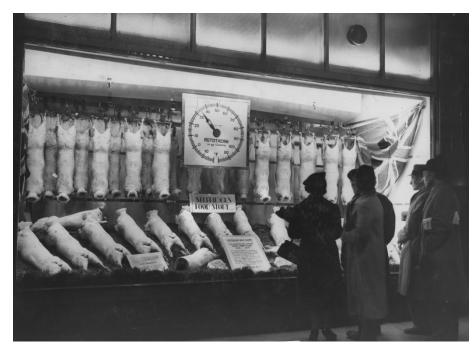
South Australia's lamb and mutton exports increased to 418,394 in 1936-37 (Metropolitan and Export Abattoirs Board 357,968, Port Lincoln 60,426), with marginally improved prices, then reached 666,307 in 1938-39 (MEAB 558,952, Port Lincoln 103,172).

WW2 Export Agreements

The outbreak of WW2 dramatically stimulated demand for all livestock with Britain seeking to acquire most of Australia's meat exports. Throughout WW2, abattoirs operated at capacity, with the Government Produce Department exporting more than 4.5 million lamb and mutton carcasses to the United Kingdom. The table below shows annual shipments of lamb and mutton from South Australia during WW2²⁶.

South Australian Exports of Lamb and Mutton During WW2

Year	Quantity Carcasses	Total Carcasses
1939-40	743,348	
1940-41	736,808	Total lamb & mutton
1941-42	561,041	exports during WW2
1942-43	670,914	4.5 m carcasses
1943-44	847,336	
1944-45	941,800	



Australian Meat Board lamb carcass display, Selfridges Department Store, London, 1938-39. Note the large thermometer in the window displaying temperature. PIRSA Image ID 106684

High levels of sheep and lamb exports during WW2 along with a severe drought in 1945 reduced South Australia's sheep population by one third, from 10.246m head in January 1942 to 6.787 million head in March 1946²⁷.

During WW2, authority to manage the Australian meat industry was placed with the Controller of Meat Supplies and the Meat Canning Committee under the *National Security Act* 1939-46²⁸. In August 1946, legislation was passed to reinstate powers of the Australian Meat Board.

The WW2 agreement with the British Government, established by the Controller of Meat Supplies operated until September 1948. This allowed for some price increases to occur after 1 October 1946²⁹. Post WW2, lamb and mutton exports gradually returned to pre-war levels.

A good season in 1946-47 recovered SA's sheep numbers by 1.172 million to 7.959 million³⁰.

Post WW2 normalisation of sheep and lamb exports continued in the late 1940s with a two-year supply contract extension (to 30 September 1950) being signed between the United Kingdom and Australia in January 1948, with an option for a further two-year extension. Meat rationing in Australia was abolished in June 1948 although fixed ceilings for domestic wholesale and retail prices were retained³¹.

Consolidation of Exports in the 1950s

High wool prices in the early 1950s, retention of ewe lambs to build stock numbers, and strong demand for lamb on the domestic market reduced volumes being exported. By 1952, SA's sheep flock had recovered to 11.47 million, (the highest level since 1943) and wool prices had started to ease³².

A new 15-year meat trade agreement (for beef, veal, mutton, and lamb) was established between the United Kingdom and Australia, operating from 1 July 1952 to 30 September 1967. This agreement included significant price increases³³.

Consistent and strong export of lamb and mutton to the United Kingdom continued through the 1950s³⁴, maintaining Government Produce Department profitability. Discounting of processing costs by 1/8 penny per pound for stock delivered before 15 September each season helped smooth abattoir throughput volumes and reduce high demand for slaughter capacity in the peak months of October and November³⁵.

Privately owned Noarlunga Meat Ltd commenced export of small quantities of sheep and lambs.

Year	Lamb Carcasses	Boned Lamb Packages
1952-53	721,344	19,863
1953-54	523,579	18,227
1954-55	831,563	19,890
1955-56	522,846	13,754
1956-57	381,722	9,070
1957-58	670,674	59,945
1958-59	646,219	76,601

Development of Boneless Exports in the 1960s and 1970s

The packing of South Australian boned lamb and mutton into cartons was an emerging product opportunity in the late 1950s. Sales of packaged hearts, livers, tongues, sweetbread, and kidneys were also growing.

By 1962-63, boneless mutton sales to the United States of America had expanded to almost 60,000 cartons³⁶, but lamb and mutton exports began to taper off in the late 1960s. By 1968-69 it was becoming evident that the United Kingdom would join the European Union. With the United Kingdom being the main market for lamb and

tallow, fresh emphasis was placed on expanding new markets for boneless meats in Japan and the United States.

The last two years of significant exports were 1970-71 (450,906 carcasses) and 1971-72 (349,722 carcasses)³⁷.

Canned and Dehydrated Meats

The 1908-09 drought created an oversupply of old and poor-quality sheep. To utilise this stock, a meat canning operation was established at Port Adelaide³⁸.

The Port Adelaide cannery was capable of handling up to 1,000 sheep per day. In 1909, 14,000 sheep were processed followed by 67,157 in the second year. Canned lamb, tongues, and meat extract (a Bovril like product) was marketed domestically and in the United Kingdom.

During the first year, the canning facility made a small loss³⁹. In the subsequent few years, canning throughput slowed. Despite this, Government Produce Department buyers were significant purchasers of poor-quality sheep and cattle at saleyards for canning, providing a welcome economic outlet for low grade animals.



Government Produce Department canned meat display 1913. Source: State Library of SA Image PRG 280-1-14-614.

During WW1, the canning facility ran at capacity to supply armed forces in the United Kingdom and Europe. It was expanded to process boiled and corned beef. During 1914-15, 7,433 sheep and 3,855 cattle were canned. A new 6 lb tapered tin making line was installed at Port Adelaide in 1914-15 along with a new boning room⁴⁰. Most beef and mutton was canned in 6lb tins for armed forces use, while 1 lb and 2 lb cans targeted domestic consumption.

Large stocks of canned meat were carried over after WW1, reducing utilisation of the canning facility. Resurgence in canned meats began in 1933-34 with lamb tongues being manufactured.

During WW2, meat canning was revived with the old Port Adelaide canning line machinery being rebuilt at Gepps Cross and another canning line was established at Port Lincoln. In 1941-42, 491 head of sheep, 595 cattle and 507 pigs were processed, predominately to supply military forces⁴¹. By 1942, Port Lincoln was canning approximately 50 head of cattle per week⁴². Meat dehydration was also expanded in 1943-44, with meat from 5,208 carcasses being dried⁴³.

Beef

Between 1908 and 1969 the Government Produce Department exported 29,673 t of beef⁴⁴.

Frozen beef processing commenced at Port Adelaide in 1908 with construction of a cattle line and treatment of an initial 200 carcases. Beef was exported in boxes either as quarters or boneless beef. The boneless beef trade enabled the marketing of bulls and lower grade animals⁴⁵. Port Adelaide's beef slaughter line was expanded in 1913 to process 150 cattle per day. In 1912-13, 4,088 cattle were treated producing 628 t of quarters and boneless beef for export.

Import duties on meat entering the United States were removed in 1914. This stimulated interest from United States based meat companies (especially Swift Beef Co and Chicago based meat packer Armour & Co) in purchasing beef from Australia⁴⁶. The Government Produce Department was interested in accessing the United States market, but the 1914 drought curtailed this opportunity.

By 1919-20, beef exports were expanding with 67,385 quarters and 41,773 packages of boneless beef, representing 36,708 head being shipped. At this time, South Australia was not a major beef producer, sourcing some cattle from Queensland. World oversupply supressed beef exports between 1920 and 1934 but regained momentum in 1936-37 with 460 t of beef quarters and boneless beef being exported to the United Kingdom⁴⁷.

WW2 triggered a new resurgence of beef exports with a peak year being 1939-40 with 673 t⁴⁸. Further strong sales occurred in 1947-48 with 531.9 t being shipped⁴⁹.

From 1948, reduced United States import duties and strong demand made this an attractive beef market. Australia was a favoured source because of its low disease status. The Metropolitan and Export Abattoirs Board used double shifts and weekend work at Gepps Cross to meet demand from the United States market. Difficulties with inadequate freezing required introduction of more stringent licensing and inspection of Australian abattoirs marketing to the United States⁵⁰.

By 1960, alternative beef markets were emerging, and the beef trade was expanding with strong focus on Japan, the Philippines, and Singapore as well as the United States. Beef exports moderated in 1960-61 to 1964-65 with 4,223 t, being exported over the five years, an average of 845 t pa⁵¹. During the last half of the 1960s, boned beef exports averaged approximately 580 t per year.

Pork and Pig Meats

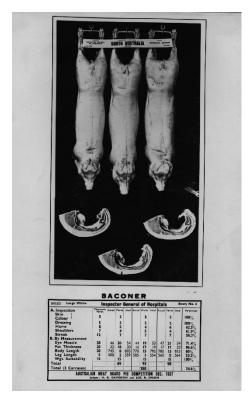
Between 1895 and 1960, the Government Produce Department exported 438,866 pork carcasses (23,936 t), mainly to the United Kingdom. Annual pork exports were highly variable⁵².

The first Government Produce Department shipment contained 30 pig carcases sourced from Roseworthy Agricultural College. Variable United Kingdom pork prices gave intermittent exports. During the first 35 years of United Kingdom trading to 1930, only 5,799 pig carcasses were exported, with 5,277 of these being at the end of WW1⁵³ in 1917-18. Pork carcasses were mainly shipped to the United Kingdom as "sides" or "legs" with pig offal (hearts, kidneys, lungs) packaged in boxes.

Market research in 1933-34 identified a large opportunity for pork exports to the United Kingdom, revealing per capita consumption of pig meats at 44 lb (20 kg) per head compared to 30 lb (13.6 kg) for lamb and mutton, or 67 lb (30.5 kg) for beef. Australian pig farmers were disadvantaged by higher transport costs (than British farmers), but their feed was cheaper, and the Australian currency was valued 25% below the British pound⁵⁴.

Strong 1930s demand from the United Kingdom resulted in a Pig Instructor being appointed by the South Australian Department of Agriculture to assist development of the industry. Pig export competitions were established with porker and baconer divisions targeting improved carcass size and quality⁵⁵.

The Ottawa Meat Agreement stimulated South Australian pig meat exports. Between 1933-34 to 1937-38, 52,620 carcasses were shipped⁵⁶. During this five-year period South Australia's pig population halved from 113,831 to 66,647, largely because of higher feed grain prices⁵⁷. Subsequent declining grain prices stimulated new investment and recovery of pig numbers.



Australian Meat Board Baconer carcass competition guide 1937.

Source: PIRSA Image No 106916.

During WW2, all pork surpluses were purchased by the Australian and United Kingdom Governments. The Government Produce Department supplied a total of 328,442 carcasses during WW2 with annual pork exports to the United Kingdom Ministry of Food peaking at 121,514 carcasses in 1940-41 and 98,080 carcasses in 1944-45⁵⁸.

Post WW2, exports fell dramatically. In 1947, high feed costs and shortages of meat meal reduced pig production. Relaxation of WW2 domestic meat quotas resulted in significant quantities of South Australian pigs being sold to Victorian bacon manufacturers to service the Australian market⁵⁹.

By 1950, South Australia's pig meat exports had fallen to around 100 t annually, mostly in the form of boxed pork cuts⁶⁰. Pig production continued at low levels through the mid-1950s⁶¹.

The Government Produce Department's halcyon WW2 days of pig meat exports never returned. Exports of pig meat ceased in 1960, with only small quantities of boxed hearts, kidneys, livers, tongues, and other pig offal continuing⁶².

Animal Byproducts

The Port Adelaide and Port Lincoln abattoirs were equipped with rendering and processing equipment to recover animal byproducts. These were critical to profitable operation. Over the years, various machinery upgrades improved rendering and skin handling efficiencies. These reduced labour, improved energy efficiency and enhanced product recovery rates.

Key animal byproducts processed included:

- Skins and hides which were dried in special drying sheds, bundled, and sold to tanners and processors.
- Fat which was rendered into tallow and sold in drums for manufacture of soap and other industrial products.
- Intestines were recovered, cleaned, and used to manufacture sausages casings.
- Meat meal was recovered as a protein source for poultry and animal feeds.
- Kidney, brain, heart, and livers packaged and sold locally or packed in cartons and frozen for export.
- Lamb and beef tongues were sold fresh, packed for export, or canned as a specialty item.
- Bone dust and meat meal products were sold as fertilizer.
- Horn, hair, and cow tail tips were also collected and sold.

Butter

Following success of the *Butter Bonus Act 1893* in stimulating butter exports, the Government Produce Department established a butter manufacturing and export program with the South Australian dairy industry. Elements of this program included:

- Initially, storing butter received from private factories at the Port Adelaide cool stores before loading it for export to the United Kingdom.
- Establishment of a "state of the art" butter factory at Port Adelaide using best practice quality standards and modern cool room facilities for storage of cream and butter.
- Purchasing cream from dairy farmers (from South East, Lower Murray, Adelaide Hills and Mid North districts) on a butter fat and quality basis, especially during spring when cream production was at a peak.
- Coordinating transport of cream to the Port Adelaide butter factory using the South Australian Railways network.
- Marketing butter overseas and domestically, primarily in the United Kingdom.
- Paying farmers based on the returns received for the butter less transport, manufacturing, handling, and marketing costs.

Butter Manufacture - Port Adelaide

The butter factory established at Port Adelaide commenced operation in 1906-7 manufacturing 113 t of butter in the first year (see Port Adelaide Section for further details).

Strong support from farmers for this initiative saw butter output increase to 223 t in 1907-8 and 299 t in 1908-9. Farmer response outstripped the capacity of the initial butter making machinery. New higher capacity machinery was installed in 1908-09, including a "state of the art" pasteuriser plus combined churner and butter working machine, lifting capacity to 30-40 t per week⁶³.

During 1909-10, the first year of new machinery operation, the factory produced 369 t of butter, growing to 562 t in 1912-13. Drought periods and difficult seasons greatly reduced production. During the 1914-15 drought, only 2 t of butter was exported.

While butter was sold locally in South Australia and Broken Hill, most was exported to London, being marketed under varying grade names (in 1924-25, these grades were "Choicest, 1st Grade, 2nd Grade, 3rd Grade, and Pastry").

A butter factory was also installed at the Port Lincoln abattoir after it was taken over by the Government Produce Department. However, the Port Lincoln facility only manufactured small quantities of butter.

Butter Exports and Storage

Between 1893 and 1934-35, the Government Produce Department exported 19,782 t of butter, or 48% of South Australia's total butter exports (40,958 t) during this period.

Private butter factories took advantage of the United Kingdom market developed by the Government Produce Department, hiring cool storage space at Light Square and Port Adelaide to accumulate and store export shipments.

Through the 1920s and 1930s, privately owned butter factories ramped up production and exports. By the early 1930s, the Government Produce Department was only manufacturing and handling about 20% of South Australia's butter exports.

The Government Produce Department discontinued butter manufacture at Port Adelaide when ownership of this facility was transferred to the Metropolitan and Export Abattoirs Board in 1934-35

By 1937-38, annual exports from South Australian butter makers had risen to 3,958 t⁶⁴. Government Produce Department annual reports ceased recording butter exports in 1940 due to lack of shipping in WW2.

The *Butter Bonus Act 1893* and Government Produce Department programs stimulated butter exports. Although this subsidy only operated for two years, it triggered export growth from zero to almost 4,000 t pa by the late 1930s, generating significant income for dairy farmers and processors.

Rabbits

Wild rabbits were introduced to Australia in 1859 and quickly spread across the nation. South Australian cropping and grazing enterprises suffered significant losses. To utilise this pest, the Government Produce Department commenced export of frozen rabbits to the United Kingdom in 1896.

Rabbits rapidly became an important export commodity and continued as a significant Government Produce Department product until 13 March 1953. During this 58 years, more than 15 million rabbits were marketed. Peak exports occurred in the late 1930s (1.186m handled in 1938-39).

Sourcing Rabbits

Wild rabbits became an important source of income for rural communities during the early 1900s. In 1938-39, Australia produced 7.3 million (303,407 crates) rabbits for domestic and export markets with about 30% sourced from South Australia⁶⁵. The Government Produce Department processed 55% to 75% of South Australia's rabbit trade depending on seasonal conditions.

Rabbit pelts were also an important raw material for fur coats and felt hat manufacture. Demand for use in military uniforms generated strong demand during WW1 and WW2.

Rabbit Production Logistics

Initially rabbits were prepared and packed at the Government Produce Department's Port Adelaide freezer works. After 1910, processing, packing, and freezing was moved to Light Square. Private rabbit exporters and traders also rented Government Produce Department freezer space.

Rabbits for export were initially sourced from the South East (particularly Mount Schank and Mount Gambier) and Murray Bridge regions, and were railed to Adelaide⁶⁶. Later northern pastoral (Port Augusta) and Eyre Peninsula regions became major sources.

Transport to Adelaide from Mount Gambier on the rail system was slow and often unreliable resulting in spoilage of rabbits during hot weather. In 1903, several entrepreneurs set up canning facilities at Mount Gambier, but their success was

short lived. A small packing and freezer facility was established at Mount Gambier in 1913-14 and operated until 1920. It packed and froze rabbits before transportation to Adelaide, minimising spoilage in transit⁶⁷.

Some small quantities of frozen rabbits were also processed and stored at Port Lincoln between 1935 and 1941. Port Lincoln rabbit processing was handled by National Egg Ltd who engaged trappers and managed the production season. A constraint was the need to accumulate consignments of over 5,000 crates to warrant collection from Port Lincoln by sea freighters⁶⁸. Rabbit processing was still operating at Port Lincoln in 1939⁶⁹.

Export rabbits were packed in crates unskinned, but sometimes skinned or as boned rabbit meat. Furred rabbits were the preferred export product, being marketed under a series of size and colour descriptive grades including "Large Blue", "Young Blue", Small Blue", and "Large Red". Crates normally contained 24 furred rabbits⁷⁰.

Rabbit Markets

The Government Produce Department focussed rabbit exports on the United Kingdom market. By 1900, the enterprise was trading more than 500,000 rabbits annually. Despite supply variations due to drought and economic factors, throughput continued at a sustained pace until the end of WW1.

Three experimental consignments to Hamburg and Amsterdam in 1912-13 (totalling 2,650 crates or 63,600 rabbits) failed to generate significant market interest⁷¹.

Depressed international meat markets after WW1 reduced United Kingdom demand for rabbits. Introduction of the Ottawa Meat Agreement in 1934 restored rabbit exports with improved prices. In 1939, 91% of Australia's rabbit exports were forwarded to the United Kingdom, with small quantities being shipped to the United States (3%), Belgium (1.4%) and Canada (1.4%)⁷².

Shortages of refrigerated shipping space to the United Kingdom during WW2 suspended sales except for one consignment of 750 crates to satisfy a special United Kingdom Ministry of Food order in 1943-44⁷³.

Post WW2 food rationing in the United Kingdom created strong demand and restoration of rabbit exports (0.82 m in 1946-47 and 0.64 m in 1947-48). However, this market was suddenly disrupted by a 10 shillings per crate tariff on rabbits from January 1950 followed by total prohibition of imports from 1 March to 1 August 1950. Sales of rabbits were deregulated in the UK after 1 August 1950, and prices slowly recovered⁷⁴.

The profitability of rabbit exporting was marginal due to high labour costs for packing, shipping and rail freight, often resulting in losses. It was estimated that an annual throughput of 500,000 rabbits was required for the Government Produce Department enterprise to be profitable. Despite losses, reducing rabbit populations was considered a "public benefit" for farmers and graziers. Trapping and sale of rabbits also provided regional income for landholders, and South Australian Railways earned revenue from transport. Rabbits were also an important source of cheap protein for rural communities, especially during the Great Depression.

The Government Produce Department supplied rabbits to Government institutions such as hospitals and gaols. Volumes sold to institutions peaked during the Great Depression (31,530 pairs in 1935-36). During this difficult period, rabbits were a popular and cheap meat source, normally supplied to Adelaide households by travelling hawkers and butchers.

Sale of the Government Produce Department Rabbit Enterprise

The Government Produce Department ceased exporting rabbits on 13 March 1953. The Light Square rabbit export enterprise including the "pick up" run, handling equipment, and access to freezer space was transferred to Perfection Frozen Foods Pty Ltd⁷⁵.

Perfection Frozen Foods Pty Ltd was in turn acquired by William Angliss & Co in 1953-54⁷⁶. William Angliss & Co was continuing to rent and operate the rabbit processing facilities at Light Square in 1955-56⁷⁷.

Post 1953, the Government Produce Department's trading operation was limited to supplying rabbits to Government Institutions.

Myxomatosis virus was released in Australia by CSIRO in 1950. Over subsequent years it would reduce wild rabbit populations and in turn influence the viability of the wild rabbit export trade⁷⁸. Consumers were also concerned about risks associated with eating diseased rabbits.

Poultry

Dressed Poultry

Prior to the mid-1960s, there were few commercial poultry processors operating in South Australia. The Government Produce Department established a poultry processing operation at its Light Square facility for chicken, ducks, geese, pigeons, and turkeys, mainly to supply dressed poultry to Government Institutions.

From 1895, Mr D F Lawrie (Government Poultry Expert) ran a series of lectures and information sessions for poultry farmers to encourage production of meat birds for export to the United Kingdom. There were successful trial shipments, but the focus of South Australia's poultry industry continued with egg production making it difficult to establish exports of dressed poultry to overseas markets.

In 1907 an inaugural commercial shipment of poultry was made to the United Kingdom. Further larger shipments of chicken, ducks and geese were made in 1908 and 1909, but prices received were similar to domestic poultry markets, resulting in a lack of interest. With a resurgence of meat exports to the United Kingdom in the mid-1930s, another trial shipment of 80 frozen turkey hens achieved modest success.

Expansion of Government Produce Department poultry processing began in the late 1930s but with a domestic focus. In 1936-37, 8,200 turkeys were processed at Light Square, mostly being sold in Sydney, Melbourne, and Perth⁷⁹. These interstate

sales continued and by 1938-39 had grown to 27,702 birds (5,257 turkeys, 18,705 fowls and cockerels, and 3,722 pigeons).

Throughout WW2, there was steady growth in poultry processing for domestic markets⁸⁰. By 1948, strong domestic demand for fowls, ducks, geese, pigeons, and turkeys (18,301 processed) eliminated interest in exports⁸¹.

A new wet plucking machine was installed at Light Square in 1955 to improve processing efficiency and reduce costs⁸². Poultry processing grew in the 1960s, reaching an output of almost 34,000 birds in 1962-63, then 38,000 head in 1964-65⁸³.

Production through the 1960s remained focussed on supplying South Australian Government institutions, topping over 40,000 birds in 1968-69⁸⁴. From time to time, the Government Produce Department would market dressed poultry to the public through its Light Square complex, particularly at Christmas and Easter, although these retail sales rarely exceeded 20% of the total dressed poultry volume.



SA egg and poultry display London 1909 – includes innovative new egg crates. Source: PIRSA image 108804.

Fresh Hen Eggs

The first export shipment of eggs (in shell) in 1895 was packed in straw, the packing technique used in Europe at that time. This shipment did not create strong follow up orders⁸⁵.

In 1906, a trial shipment of 1,002 crates (each containing 30 dozen eggs) was made to the United Kingdom. This was followed by further trial shipments in 1907 and 1908. A new type of crate with cardboard fillers had been developed for export shipments, resulting in minimal damage and very good outturns. "Egg Circles" were established in South Australia to improve information exchange between poultry farmers and expand egg production⁸⁶.

Similar egg prices on the London and domestic markets meant export shipments normally occurred in the spring when egg production was high and South Australian prices were low. This coincided with seasonally high egg prices in London. Despite this marketing strategy, exports were not very successful. Strong demand for South Australian eggs in Sydney made this the preferred market.

South Australia's egg producers focussed on domestic markets with Light Square cool stores being used to store fresh eggs and frozen egg pulp on behalf of local traders.

Frozen Egg Pulp

The advent of egg pulping and freezing enabled peak spring production of fresh eggs to be stored and marketed throughout the year to food manufacturers. However, egg pulp manufacture was not a large business for the Government Produce Department.

In 1920, small volumes of frozen egg pulp began to be exported on behalf of private processors utilising the Government Produce Department's freezer facilities. An initial quantity of 33 cases (each containing 3 tins X 32 dozen eggs) was exported to London that year.

Annual freezer storage volumes fluctuated from 33,733 tins in 1923-24, then declined to approximately 6,000 tins in 1929-30⁸⁷. During the Great Depression, frozen egg pulp production and storage declined, with no egg pulp being stored in 1931-32.

To diversify the Port Lincoln freezing works business, egg pulping machinery was installed in 1935-36⁸⁸. This was leased to A A Brice & Co Ltd who marketed most of their egg pulp in Australia⁸⁹. During the next 2 years, approximately 4,000 tins of frozen egg pulp was manufactured and stored at Port Lincoln⁹⁰. The Port Lincoln egg pulping operation could process approximately 1,000 dozen eggs per day in 1939⁹¹.

Shortages of refrigerated shipping during WW2 stopped frozen egg pulp exports in 1940⁹². Post WW2, egg pulp exports grew from, 6,661 tins (1949-50) to 17,309 tins in 1955-56, but then became intermittent between 1955 and 1965⁹³.

Wine, Brandy and Spirits

Between 1895 and 1940, the Government Produce Department exported 2.294 million gallons (10.32 m litres) of wine to London under South Australian Government certificates of quality⁹⁴. Government Produce Department wine exports

grew steadily and reached 85,000 gallons (382,500 litres) in 1900 but tapered off by the 1930s to approximately 10-15,000 gallons annually.

The Adelaide Plains, Southern Vales and Barossa Valley proved to be ideal wine producing regions, resulting in significant vineyard expansion through the mid-1800s. By 1895, South Australia's wine industry needed to establish export markets. Hence wine was a major product in the Government Produce Department's first export consignment to the United Kingdom.

Early exports were marred by some poor-quality wines. A marketing campaign organised by the Manager of the London Wine and Produce Depot promoted quality wines and established marketing connections with numerous wine merchants. Quality assurance was given a high priority, and a pre-export quality assessment and certification process was established with Roseworthy Agricultural College under the supervision of Professor Perkins.

A diverse range of wine types were exported including Claret, Burgundy, Riesling along with fortified wines like Port, Sherry, and Brandy.

Most of this wine was shipped in barrels and bottled in the London Bond Store. Frequently a lack of bottle maturity made it difficult for purchasers to accurately assess wine quality, creating a marketing disadvantage. To overcome this, a "duty paid" bottling cellar was added to the wine store in 1900 to enable bottle aging of wines before they were marketed⁹⁵.

Staff at the London Wine and Produce Depot arranged shipping and exhibiting of wine samples from South Australian wine makers to the annual London Brewers Exhibition. This forum provided a profile for their new products with wine merchants. Gradually South Australian wineries established business connections with United Kingdom wine merchants and exported their produce to London independently of the Government Produce Department.

A lack of shipping space during WW2 brought wine exports to a standstill in 1940. The Government Produce Department did not recommence exports after WW2, but winemakers reestablished the trade and expanded sales through the 1950s.

Apples and Pears

The Government Produce Department played a vital role in the development of South Australia's apple and pear export industry. Apples were South Australia's most important fruit export between 1895 and 1975, with more than 11.3 m bushel cases being shipped.

Merchants and exporters gradually took over shipping and marketing of export apples. During the 1930s, the Government Produce Department was handling 25% to 30% of South Australia's apple and pear exports, but by 1967, this had dropped to 16%. The Government Produce Department ceased handling of export apples when it closed in 1975.

Apple exports commenced in 1895 with 432 cases included in the first Government Produce Department consignment to the United Kingdom. Markets were later

developed in Germany, Sweden, Belgium, Finland, and France⁹⁶. The table below shows the main periods of apple exports.

South Australian Apple Exports 1895 to 1975

Period	Apple Exports (million bushels)
1895 - 1910	0.545 m
1911 - 1920	0.552 m
1921 - 1930	1.936 m
1931 - 1940	3.445 m
1941 - 1950	0.229 m (WW2 intervention)
1951 - 1960	2.129 m
1961 - 1965	1.698 m
1966 - 1975	0.7 m (approx.)
Total SA Apple Exports (1895 – 1975)	11.3 m



Inspecting apples prior to auction in Hamburg 1907-08 (Source: Department of Agriculture and Intelligence Annual Report 1907-08)

Role of the Government Produce Department in Apple and Pear Exporting

The Government Produce Department's apple export functions included:

- Developing apple export markets (United Kingdom, Scandinavia, Germany) in conjunction with South Australia's Trade Commissioner in London.
- Providing feedback to industry about quality and marketing issues and promoting strategies to overcome these marketing problems.
- Sourcing and providing standardised packaging materials.

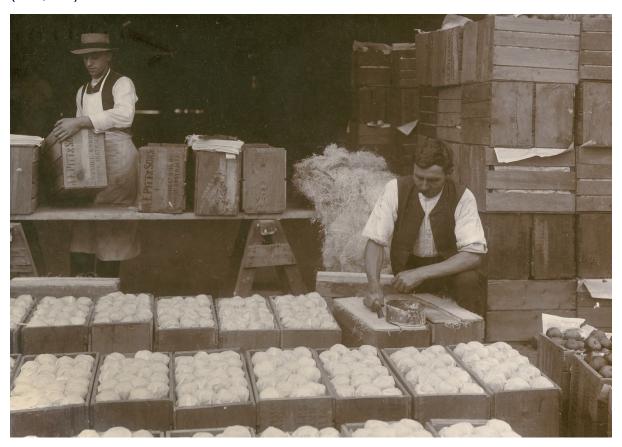
- Introducing innovative new cell cartons and bulk export apple handling systems in the 1950s and 1960s
- Acting as a conduit with government agencies to help industry cope with new legislative matters, especially acquisition of South Australia's apple and pear crop during WW2.
- Coordination of shipping, marketing, and logistics.

Factors Influencing Apple and Pear Exports

During the early 1900s, apple exports to the United Kingdom grew steadily. Apples were individually wrapped, and row packed into wooden bushel cases with a top and bottom layer of woodwool to minimise bruising. During periods of drought such as 1914-15, export sales fell to a trickle.

Variable quality associated with inconsistent size grading, Bitter Pit disorder, codling moth, and hail damage created variable outturn. In the early 1900s, inconsistent shipboard storage temperatures were also a problem.

Expansion of apple and pear plantings after WW1 increased production in the 1920s. Biennial bearing of trees was a major problem with alternate heavy crop years creating a series of high export years like 1927-28 (505,653 bushels), and 1929-30 (667,234).



Packing apples for export. A E Pitt & Son, Adelaide Hills 1920. Source: PIRSA Image 108777.

New grading regulations were introduced in 1923-24 to improve the quality of Australian apple and pear exports. Fruit had to be graded under the descriptions

"special", "standard", and "plain". The lack of sound grade specifications for these descriptors meant growers did not achieve improved prices⁹⁷. New Commonwealth requirements for fruit to be free of spray residue were introduced in 1926 to meet United Kingdom Government import requirements⁹⁸.

To ensure consistent presentation, the Government Produce Department supplied wooden cases, lining paper, fruit wrappers and wood wool to South Australia's apple exporters. The ideal case structure was found to be hardwood case ends, with side boards made of more flexible Radiata pine. Following problems with the consistency of boards supplied by saw millers, the Government Produce Department liaised with the South Australian Woods and Forests Department to supply Radiata pine logs to sawmillers manufacturing apple packing cases.

Printed colour paper box labels were introduced on case ends in 1924. These were a major improvement over black stencilling, making it easier for buyers to recognise brand names and trademarks.

A new Adelaide Hills "Orchardists Association" was formed in 1924 consisting of four branches. Each branch used a common brand, consolidating the large number of South Australian apple brands appearing in export markets.

During "on crop" production years, (such as 1930 when 667,234 cases were exported), fruit was shipped directly to various ports such as Hamburg (50%), London (28%) with the remainder shipped to Hull, Liverpool, Glasgow, Rotterdam, Stockholm, and Colombo.



Government Produce Dept apple label used in the 1920's. Courtesy Lionel A Mason, Forest Range

In 1930, the South Australian Fruit Marketing Association coordinated a quality improvement program with growers, achieving an additional price of 1s per case⁹⁹. Key strategies for this improvement program were:

• Deliberately focussing on upgrading pack out from "Plain" to the improved "Standard" or "Special" grades.

- Adoption of the "Canadian Standard" bushel case made from soft wood with wire binding to control bulge. These cases could be reliably packed with 40 pounds (18.2 kg) of fruit preferred in European markets.
- Switching to "count" packs making it easier for buyers to assess the quantity
 of fruit in a case. Packing methods were improved through training schools
 run at packing sheds by Department of Agriculture staff.
- Unsightly black stencilling of cases was universally replaced by attractive colour printed paper labels.
- The Association collectively bargained for shipping including chartering of extra tonnage to move the very large 1930 crop. Much of that crop was sold FOB, so growers were assured of their price before the fruit left Australia.

The Commonwealth Government ran a trade mission to the Netherland East Indies (Indonesia) and Malay States (Malaysia) in 1931-32. General Manager Mr Pope was the South Australian representative on this trade mission. It featured the supply of apples. As a result, 2,324 cases of apples were supplied to these countries in 1933¹⁰⁰. The trade blossomed in 1933-34 with 141,858 cases of apples being shipped to Asian countries but was later disrupted in WW2.

The United Kingdom government introduced a 10% tariff on imported fruit in March 1932. Trade Commissioner Charles McCann responded by developing additional new apple and pear exports in Scandinavia and Germany. These new markets often took more than 50% of SA's export apple crop and proved very profitable until the emerging threat of WW2 in the late 1930s.

In 1933-34, the national Apple and Pear Council of Australia was formed with representation from each state's apple growing organisation. It took on the role of coordinating Australia's apple exports from each state. One of the Apple and Pear Council's first decisions was to simplify marketing by banning export of 60 minor apple varieties not favoured in United Kingdom and European markets¹⁰¹.

Australian Apple Export Bounty – 1930s

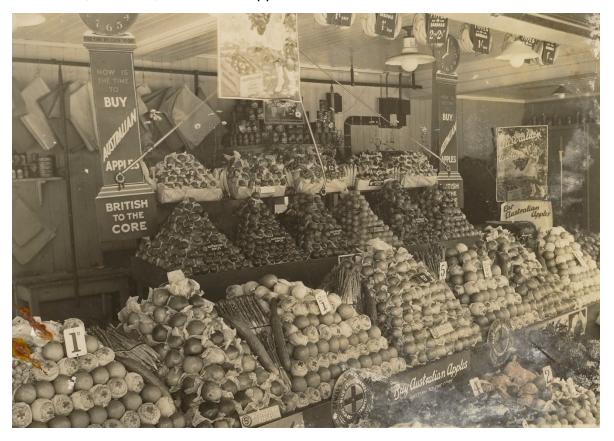
During the early 1930s, poor prices were being received for export apples and pears. To provide special assistance for apple and pear exports, the Commonwealth Government introduced a per case Australian Apple Export Bounty on national production.

In 1935, £12,990 was allocated from this bounty to South Australian export apple growers. A grower committee was formed to allocate these funds to the 390 growers who applied. The Australian Export Bounty paid to South Australian growers was 4 pence and 4.5 pence per case¹⁰².

Changing European Markets

In 1935, Germany which had developed into a major market ceased purchasing Australian apples, and sales to Holland and Belgium also fell dramatically. Loss of these markets created expectations of poor returns. Fortunately, severe unseasonal frosts in Spain and the United Kingdom caused major damage to a wide range of fruits, resulting in a resurgence of prices for Australian apples in the 1935 season.

Strong growth of Australia's and South Australia's apple exports continued into the late 1930s, with 623,602 cases shipped in 1937-38¹⁰³.



An Australian apple promotion display, Ladson's Stores, Birmingham 1930. Source: PIRSA image 108809.

1937 Experimental Pear Shipments

Small quantities of pears were exported to the United Kingdom over the years. Varying maturity rates for different varieties and difficulties obtaining ideal shipping temperature for each variety made it hard to consistently achieve high quality outturns.

In 1937, a large experimental shipment of 20,000 cases of Duchess pears was forwarded to the United Kingdom. Two fast steamers were used (shipping time 35 days) and specific temperatures were used to achieve good outturns and prices 104.

WW2 Loss of Apple Export Markets

As part of the move to a "War Footing", the British Government requisitioned and took control of all refrigerated shipping operating from Australia. Transport of fresh fruit was deemed a low priority and was stopped. This was disastrous for the Australian apple and pear industry which in recent years had been exporting approximately 4.5 million cases of apples and 0.7 million cases of pears annually. Export fruit had to be sold on Australia's domestic markets.

To provide relief to apple and pear growers, the Australian Apple and Pear Board asked the Australian Government to purchase the national apple and pear crop. After considerable negotiations, the Australian Government reluctantly agreed to

introducing this market intervention (commencing 1 March 1940 under "security" legislation). In 1939-40, South Australia's crop was assessed at 849,775 cases of apples and 139,074 cases of pears¹⁰⁵. A three stage per case payment schedule was established.

A South Australian Apple and Pear Acquisition Committee was set up to control delivery of fruit and administer these payments to South Australian growers. Chaired by the General Manager of the Government Produce Department, this committee had representation from growers, merchants, and exporters. The South Australian Cabinet appointed the Government Produce Department to manage payments to growers.

Regulations were put in place to control how growers harvested, graded, packed, presented and documented their apples and pears. Marketing was also regulated for merchants, and cool store operators¹⁰⁶.

The Government Produce Department completed acquisition of South Australia's 1941 apple and pear crop. In 1942, staff shortages due to War enlistments made management of this process difficult. The South Australian Government relinquished the acquisition process, and the Australian Apple and Pear Marketing Board established its own office and team of staff in Adelaide for the 1942-43 and 1943-44 apple and pear seasons 107.

The Commonwealth Acquisition Scheme for apples and pears was discontinued in 1943-44 for all states except Tasmania and Western Australia. Victoria, New South Wales, South Australia, and Queensland growers resorted to marketing their own crop while apple exports remaining suspended 108.

Post WW2 - Trading Challenges of the 1940s and 1950s

Post WW2, apple exports recommenced but were seriously impacted by seasonal conditions, shipping difficulties, tariffs, and bushfires. Overseas competition caused variable annual exports during the 1950s.

In 1953-54 the United Kingdom Government introduced an Australian apple import quota of 3 million cases. Delays in shipping were also a problem¹⁰⁹. Expansion of Western Australia and Argentine orchards in the 1950s lifted production and introduced new competition. To compete South Australian growers had to pay close attention to quality, achieve early despatch of ships, improve packaging and labels, and focus on continuity of supply.

Assembling larger volumes of fruit to meet specific orders required the Government Produce Department to rebrand or sub-brand boxes to satisfy these contracts.

The severe 1955 Adelaide Hills bushfires destroyed many orchards, reducing South Australia's apple exports to only 21,941 cases in that year¹¹⁰.

New Packaging Systems

A revolution in packaging technology commenced in 1959 with the Government Produce Department initiating an experimental export shipment of 15 X 25-bushel bulk bins¹¹¹. Following success of this trial, 600 bins were exported in 1960, along

with further experimentation with 18 bushel bins. Bulk bin use expanded steadily over the next 5 years, reducing labour, shipping, and other handling costs, but were only of interest to large wholesalers or agents with forklifts and equipment to handle and unpack them.

Experimental use of cell pack cartons began in 1961, replacing wooden bushel cases. Premium wholesalers favoured these packs because of low damage levels. By the mid-1960s, carton packs and bulk bins dominated exports with only limited quantities of wooden bushel boxes being shipped.



Loading a bulk consignment of apples at Port Adelaide, 1967. PIRSA Image 103395.

1960s Apple Export Expansion in Europe

The 1960s saw steady expansion of South Australian apple exports. These were disrupted by another round of United Kingdom quotas in 1960 and 1962, and 1967 shipping interruptions on the Suez Canal. A peak year was 1964-65 with South Australia's apple exports totalling 557,966 cases (United Kingdom 432.978, Germany 33,998, Sweden 90,981)¹¹².

The United Kingdom entered the European Economic Community on 1 January 1973. New tariff arrangements imposed by the European Union in 1973 made Australian apples uncompetitive, resulting in almost complete cessation of apple exports.

The Government Produce Department ceased all export of apples and pears when it closed in 1975¹¹³.

Oranges

In 1897, the Government Produce Department shipped its first consignment of 1,866 cases of oranges and 10 cases of lemons to London¹¹⁴. Subsequently only small intermittent shipments of citrus were made, largely because of the industry's strong domestic focus.

Spanish and South African citrus growers also had the competitive advantage due to much lower freight costs and shorter shipping times to United Kingdom markets.

Throughout the 1920s, there were only 2-3,000 cases of citrus being exported annually by the Government Produce Department. Expansion of citrus plantings on River Murray Soldier Settlement properties after WW1 created some fresh interest in developing export markets, but it was difficult to attain profitable returns.

Variable maturity and quality of shipped fruit in the 1930s resulted in inconsistent outturns, poor profitability and decline of this trade.

Other Fruits

Over the years, there were many small shipments of other fruits exported by the Government Produce Department, mainly to the United Kingdom. This included peaches, grapes, nectarines, lemons, quinces, plums, and dried fruits (currants, lexias, sultanas and apricots).

In 1922 and 1923, there were several trial shipments of plum, pear, peach, nectarine, and table grapes to assess the best packing techniques, transport temperatures, and market response, but this trade did not blossom¹¹⁵.

A trial shipment of plums and nectarines packed in trays was made to the United Kingdom in 1955. This required fruit to be forwarded to Melbourne by rail to obtain an effective shipping date. The consignment arrived in good condition but needed to be premium quality to compete with fruit being exported from South Africa¹¹⁶.

South Australia was a major producer of dried fruits during the 1920s through to the 1960s. The Government Produce Department would periodically market small quantities of dried fruits on behalf of packers in the United Kingdom and Europe depending on price and market outlooks.

Product Storage, Export and Marketing

During the early 1900s, there was very limited cool room and freezer space available in South Australia. The Government Produce Department rented cool room space to both domestic and export produce traders. Products for export could be handled through the Government Produce Department shipping and marketing channels or marketed by the owner of the produce while paying fees for cool storage, shipping, and other services.

The Government Produce Department cool rooms were used to store a very wide range of commodities including honey, bees wax, eucalyptus oil, yacca gum, kangaroo tails, cow hair, rabbits, hares, fish, olive oil, almonds, fruit pulp, cider, Eau de cologne, brandy, goat meat, tomato sauce, hides, pearl shell, feathers, dates, beer, dripping, and lard.

Supplying Government Institutions

A retail butcher shop was established at the Light Square facility in 1915. This initiative enabled the Government Produce Department to become the main

providore to public institutions such as hospitals, gaols, orphanages, and aged care facilities. During the period 1946 to 1970s, it was also the supplier of fresh foods for the Long Range Weapons Research establishment at Woomera. Main products supplied to institutions included meat, butter, cheese, bacon, poultry, eggs, potatoes, onions, fruit, vegetables, rabbits, and coal.

The volume of produce being handled steadily increased. By the 1920s there were approximately 5,000 people living in Government institutions requiring a supply of 25 head of cattle, 100 sheep, 65 lambs and 6 pigs weekly. Preparation of this meat employed 4 full time butchers at the Light Square facility.

Rapid growth of South Australia's public hospital network in the 1950s and 1960s expanded this service. By 1967-68, produce supply turnover had reached \$900,000 pa. The range of produce being supplied was further expanded in 1968-69 to include fish on behalf of the Public Stores Department. Expansion of the Light Square butcher shop and its chilling plant was required in 1968-69¹¹⁷.

After closure of the Government Produce Department in 1975, provisioning of Government institutions was transferred to the Supply Department.

Ice Manufacture

Before domestic refrigerators were a common appliance, ice was an important household commodity, with perishable foods such as meat, butter and cheese being stored in "ice chests". Households required regular deliveries of block ice.

When the Government Produce Department purchased the Adelaide Ice and Cold Storage Company (Light Square) in 1910, it included an ice manufacturing and distribution business producing 12 t per day. Between 1910 and 1912, ice continued to be delivered to retail customers across Adelaide. From 1912-13, sale of ice was contracted with distributors who obtained their ice from the Light Square factory door¹¹⁸.

Demand for ice grew steadily, and an additional ice manufacturing plant was installed at Port Adelaide lifting production to 20 t per day. All ice was manufactured using distilled water to provide a clear and clean product. Extra ice produced during winter months was stored in freezer rooms for sale during peak summer demand.

A major upgrade of the Light Square ice manufacturing plant was completed in 1924-25¹¹⁹. This consisted of a new 100t capacity refrigeration machine, 40 t ice tank, and erection of an ice store to hold 500t.

Pre WW1 ice sales were approximately 2,000 t per year. By 1928, Light Square was producing about 5,400 t pa with a further 790 t pa being sourced from Port Adelaide¹²⁰.

In 1928, an amalgamated ice delivery scheme called the "Clear Ice Service" was established between Adelaide's three main ice suppliers (Adelaide Milk Supply Coop Ltd (AMSCOL), Adelaide Crystal Ice Co, and the Government Produce Department). From 1 October 1928, the Clear Ice Service divided metropolitan Adelaide into 18

delivery districts and appointed a vendor for each. The Clear Ice Service overcame delivery duplication, provided improved service and cheaper ice to households¹²¹.

Demand for ice varied according to seasonal conditions, with annual production from Light Square varying between 5,000 and 9,000 t. Peak production of 9,480 t was achieved in 1947.

From the 1950s, domestic refrigerators became more common resulting in declining ice sales. Ice manufacture and distribution from Light Square ceased on 1 April 1952, with the ice manufacturing rooms being converted to produce cool storage 122.

The Port Lincoln freezing works also produced ice to support the tuna and fishing industry, but there are no records of its ice output in annual reports.

The following table summarises ice production tonnage for Light Square and Port Adelaide between 1910 and 1952.

Ice Manufacture (t) – Light Square and Port Adelaide

Year	Light Square	Port Adelaide	Total Ice
1910 to 1920	22,050		22,050
1921 to 1930	48,701	6,616	55,317
1931 to 1940	39,515	575	40,090
1941 to 1952	79,791		79,791
Total	250,057	7,191	257,248

Produce Inspection and Certification

Following requests from merchants, inspection and certification of export grain, flour, and chaff was commenced by the Government Produce Department in February 1906. This provided international buyers with assurance about the quality of grain being purchased from South Australia. Inspectors and casual sampling staff were located at major regional ports. In the first year, 700,549 bags of grain products were inspected and certified 123.

Flour certification also provided assurance that export flour was milled from sound Australian wheat, was free of pest infestations, and was manufactured using the best roller mill practices.

Initially grain certification was on behalf of the South Australian Government. The introduction of Commonwealth Exports (Grains) Regulations in Oct 1963 required all grain exports being shipped from South Australian ports to be inspected on behalf of the Australian Government by Government Produce Department inspectors.

On 1 February 1953, the Government Produce Department also became responsible for administration of Commonwealth flour export regulations. This eliminated overlap of flour quality regulations between state and commonwealth legislation.

Between 1906 and 1958, the Government Produce Department certified over 170 m bags of grain, flour, and chaff¹²⁴.

Transition from bagged to bulk grain handling commenced in 1958-59. Bulk shipping provided dramatic cost savings in loading and transport but required major changes to inspection procedures. The Government Produce Department became responsible for ship hold inspections prior to grain loading, inspection of grain and flour being loaded, monthly inspection of terminal silo installations, liaison with Cooperative Bulk Handling (SA), handling and storage of grain samples for analysis, as well as preparation of inspection certificates and documentation.

In 1958-59, 40% of South Australia's 513,637 t of export grain was bulk handled¹²⁵. By 1962 this had grown to 92.5% (of 780,027 t) of exports. Wheat especially dominated with 96% of exports being bulk handled in 1964 (of 1,038,972 t)¹²⁶.

On 1 July 1975, the grain inspection team and their functions were transferred to the South Australian Department of Agriculture, Horticulture Branch, under responsibility of the Chief Horticulture Officer. Inspection services continued from Port Adelaide, Port Pirie, Wallaroo, Port Giles, Ardrossan, Port Lincoln, and Thevenard.

Other Inspection Functions

From time to time, Government Produce Department staff also provided inspection services for other export products such as butter, lamb, beef, and canned meats. This certification process was conducted under national Commerce Acts.

Initially wine for export was assessed at Roseworthy Agricultural College by Professor Perkins. All wine being marketed through the Government Produce Department facilities in London was assessed against established standards before shipment.

Wharf Shunting Services

Most refrigerated ships were loaded at Ocean Steamers Wharf adjacent to the Government Produce Department's Port Adelaide cool storage facilities. However, by 1920 there was an increasing number of larger refrigerated vessels docking at the deeper Outer Harbour wharves. This required frozen carcasses to be trans-shipped by rail from the Port Adelaide depot to Outer Harbour for loading.

To improve wharf handling, the Government Produce Department established a shunting operation for rail wagons at Outer Harbour and the Port Adelaide wharves. This serviced Government Produce Department loading operations and other stevedoring companies.

South Australian Railways would deliver rail trucks to the wharf area with their locomotives. The Government Produce Department shunters would use a horse team to move individual rail trucks into loading/unloading positions on the wharf, and then move empty rail trucks back to the rail shunting area. This function ceased when the Port Adelaide abattoir facility was closed.

Secretarial Services to Committees and Organisations

The Government Produce Department provided secretarial support to a range of produce, industry, and export organisations over the years. These services were

supplied without charge, being considered an "extension service" to meat and fruit organisations. The meetings provided an opportunity to promote the services of the Government Produce Department and provide industries with better knowledge of market requirements.

The following organisations were receiving secretarial services in 1968¹²⁷:

- Operational Committee of the Meat Board of South Australia.
- Sheep and Lamb Meat Industry Marketing Conference.
- Beef Cattle Production and Transport Conference.
- South Australia Beef Carcass Competition Committee.
- South Australia Porker and Baconer Carcass Competition Committee.
- South Australia State Lamb Committee.
- South Australia Tallow Manufacturers Association.
- South Australia Apple and Pear Shippers Association.
- Associated Cold Stores of South Australia.
- South Australia Chamber of Manufacturers Inc.

GOVERNMENT PRODUCE DEPARTMENT FACILITIES

During its 80 years of operation, the Government Produce Department ran its business from four major facilities located at Port Adelaide, Dry Creek, Port Lincoln, and Light Square, Adelaide.

The table below provides an overview of facilities, functions and activities operating from each of these locations. In addition, localised grain export inspection services were provided from South Australia's major grain loading ports.

Major Government Produce Department Facilities and Functions

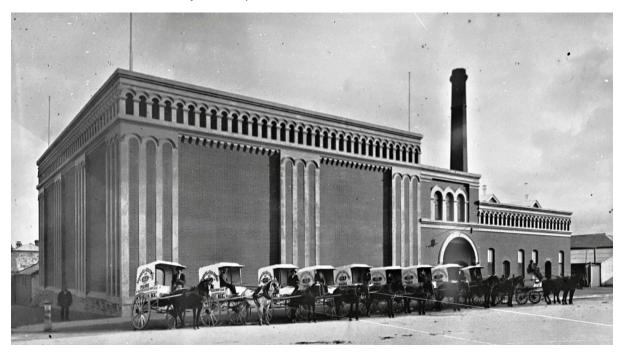
Adelaide (Light Square)	Port Adelaide (Ocean Steamers Wharf)	Dry Creek	Port Lincoln (Proper Bay)
1910 – 1975 Transferred to State Supply Department 1975	1895 – 1934 Expanded 1908 Transferred to Metropolitan Export Abattoirs Board in 1934. Closed 1936 Demolished 1939	1900 – 1908	1928 – 1975 Transferred to Metropolitan Export Abattoirs Board in 1975 Closed 1984
Head Office and main administrative centre Freezers & cold store space for lease/rent Ice making and distribution. Rabbit and poultry processing Coordinating and managing grain/flour inspection and certification Egg pulp freezing Butcher shop for meat preparation Produce supply and distribution to government institutions. Meat auction sales hall	Abattoir Skin drying Bi-product processing & rendering Meat cannery Freezers – for storing export meat. Cold stores for pre-cooling and storing produce for export Butter factory Ice making Wharf shunting service Grain inspection	Abattoir Stock holding and fattening paddocks. Skin drying	Abattoir Offal rendering Skin drying Bi-product processing and rendering Beef packing Freezers & cold stores Bacon factory Butter factory Cordial manufacture Tuna and meat cannery Rabbit freezing Egg pulping and freezing plant Ice making Eyre Peninsula Livestock sale yards Power generation Grain inspection Port Lincoln management office

Light Square, Adelaide

Purchase and Upgrade of Light Square Premises

The Light Square cool storage and ice making complex was the head office and main administration centre for the Government Produce Department from 1910 to 1975.

This two-story red brick complex at the corner of Morphett Street and Light Square, Adelaide was built by the Adelaide Ice and Cold Storage Company (Mr C A McDonald) in 1900. Contractors for construction of this building were Milburn and Jeffrey¹²⁸. Adelaide Ice and Cold Storage used these refrigeration facilities for ice manufacture and for freezing export lamb and mutton (slaughtering was at works north of Adelaide near Dry Creek).



Original Light Square Cold Store buildings C1911 with ice delivery carts at front. Source: SA Government Archives AYAD 19-9-2022

By 1910, Adelaide Ice and Cold Storage was exporting approximately 100,000 lambs annually to the United Kingdom. The Government Produce Department and Adelaide Ice and Cold Storage were major competitors in the lamb export business.

Negotiations with Mr McDonald, resulted in the Government Produce Department purchasing the Adelaide Ice and Cold Storage business, its plant, and premises in August 1910 for £33,000¹²⁹.

This purchase process was handled by Acting General Manager Mr McCann while General Manager Mr Pope was stationed in London. This purchase, despite previous Treasury approval, was the subject of political criticism. An investigation by a Select Committee appointed by the Legislative Council was chaired by The Hon E Lucas MP. The Select Committee held 12 meetings, interviewed 20 witnesses, and tabled its findings in December 1911¹³⁰. Many of the Select Committee's

recommendations related to Government Produce Department business activities and had no relevance to the Light Square purchase process.

Light Square remained in use as the Government Produce Department's head office until 1975 when the agency closed. Ownership of the building was transferred to the State Supply Department when the Government Produce Department was wound up.

Light Square Enterprises

The Government Produce Department used the Light Square facility for:

- Head office and main administration centre.
- Ice manufacture, storage, and distribution.
- Processing, packing and freezing rabbits for export.
- Dressing and preparing poultry.
- Storing, preparation and distribution of meat and foods for Government institutions.
- Egg pulping manufacture and freezing.
- Auctioning livestock carcasses.
- Rental of freezer and cool store space.
- Management office for the export grain and flour certification service.

Descriptions of these enterprises is contained in the previous "Products and Services" section.

Light Square Upgrades and Improvements

A retail butcher's shop established at the Light Square facility commenced operation in July 1915. This quickly developed into a significant "over the counter" retail outlet. Following a change in State Government leadership, retail sales of meat ceased because of complaints about competition with local retail butchers. The butchery area was then converted to supplying foods to Government Institutions and expanded to accommodate additional staff.

A major upgrade of the ice manufacturing plant was completed in 1924-25 to meet growing demand¹³¹. This consisted of a new 100 t capacity refrigeration machine, 40 t ice tank, and erection of an ice store to hold 500 t.

In 1926-27, a two-storey brick extension was built on the eastern end of the Light Square cool rooms. This provided accommodation for the Government Produce Department's head office, administrative, and grain inspection staff.

By 1935-36, the Light Square cool rooms required major renovation including reconditioning of insulation, improvements to the engine room, and rehabilitation of the refrigeration plant. Egg pulping machinery was also installed, and arrangements made for a company to lease this facility ¹³².

A further upgrade of the ice making plant was completed in 1941 along with construction of additional cool rooms¹³³.

Steady growth in provisioning of Government institutions and expansion of poultry processing through the 1950s resulted in further enlargements to the butchery area in 1959¹³⁴.



Government Produce Department Light Square facilities and head office in 1942 showing the large cooling tower for the refrigeration plant on the right. The two-storey office block in the centre of the photo was built in 1926-27. Source: State Library of South Australia; Image B 10905. Other photos in this series include B 2994 (1925), B 8838 (1925).

Meat Auction Hall

A new Meat Auction Hall was constructed in the Light Square complex in 1965 for marketing of dressed carcasses. This initiative enabled farmers to market livestock as a dressed product "on the hook", rather than the traditional marketing of live animals in saleyards. The Meat Auction Hall was officially opened by the Minister of Agriculture G A Bywaters on 18 March 1965¹³⁵. It was leased to Nelson's Meat Markets of Western Australia.

Following its success, Nelson's Meat Markets expanded the carcass auction hall in 1966-67 requesting additional office and cool room space. Nelson's also diversified the range of livestock carcases being auctioned to include pigs, beef, and veal¹³⁶.

Establishment of the Meat Auction Hall created a new opportunity for Eyre Peninsula farmers to market carcases year-round. This was possible using refrigerated trucks travelling on the ferry MV Troubridge between Port Lincoln and Adelaide.

The first shipment of 80 mutton carcases via the MV Troubridge was made to the Light Square facility on 18 September 1963. These carcases were used to provision Government institutions ¹³⁷.

Port Adelaide

The Government Produce Department's operations at Ocean Steamers Wharf, Port Adelaide were formally opened on 17 April 1895. Initially the facility comprised 4 refrigerated chambers for freezing, cooling, and storing export produce.

Subsequent major expansions at the Port Adelaide complex comprised:

- Erection of a butter factory (1906).
- Construction of a new abattoir and larger freezing works completed in 1908.
- Installing a meat canning plant (1909).
- Setting up of additional ice manufacturing plant (1922-23).

Below are details about phases of development of the Port Adelaide complex and its key functions arranged in chronological order.

Initial Pt Adelaide Export Storage and Freezing Rooms - 1895

The initial facilities built at Ocean Steamers Wharf, Port Adelaide in 1895 consisted of four small freezing chambers each with the capacity to hold 30 t of produce. The initial refrigeration machine was powered by a 25 hp boiler and was capable of cooling 20 tons of butter or meat per day. This first refrigeration machine was manufactured by J & E Hall of Dartford England.

Prior to 1900, sheep for export were killed at private slaughterhouses near Dry Creek and transported by rail to the Port Adelaide freezing works¹³⁸. Between 1900 and 1908, sheep for export were processed at a small abattoir established by the Government Produce Department at Dry Creek (see separate information about Dry Creek).

Port Adelaide Butter Factory - 1906



Interior of the Government Produce Department Butter Factory at Port Adelaide in 1906 (Source: Minister of Agriculture Annual Report 1906-07; P 37)

The Minister of Agriculture was lobbied to establish a government butter factory to improve butter quality and stabilise cream returns for dairy farmers. The State Dairy

Expert, Mr P H Suter was instructed to establish a new butter factory at Port Adelaide. It commenced operation on 14 September 1906.

Cream was delivered by rail. Volumes grew quickly, being received from as far north as Hawker, and from Beachport and Mount Gambier in the South East¹³⁹. More equitable payments from the Government Produce Department butter factory resulted in rapid growth of cream consignments from farmers.

In the first year of operation (1906-07), 400 farmers supplied cream and the factory produced 112 t of butter. Peak production occurred in 1917-18 when the Port Adelaide butter factory handled cream from 2,450 farmers and produced 1,255 t of butter¹⁴⁰.

In 1927 a proposal to move the dairy factory from Port Adelaide to Light Square to reduce cream transport costs and improve access to labour did not eventuate. The butter factory operated until 1934-35 when management of Port Adelaide facilities were transferred to Metropolitan Export Abattoirs Board¹⁴¹.

Major Upgrade of Port Adelaide Abattoir and Freezers - 1908

In 1908 a major upgrade costing £75,000 was built at Port Adelaide abattoir, to upgrade freezing, storage and meat export facilities. It included a 250 ton capacity refrigeration plant, the largest in Australia at that time. This major expansion of the Port Adelaide complex comprised 142:

- Adding to the existing Ocean Steamers Wharf site by purchasing a neighbouring 36 ac (14.6 ha) property previously used by the Broken Hill Co for its Block 14 smelter.
- Raising land levels by approximately 1 m to avoid flooding.
- Upgrade of wharf areas to give 300 ft (90 m) of river frontage plus additional dredging of shipping berths for easier navigation.
- Constructing sheep yards containing 60 pens capable of holding 17,000 to 20,000 sheep with an adjoining railway siding.
- Killing floor comprising space for 112 butchers, each to process 75 sheep per day for a daily output of 8,400 lambs.
- 27 freezing chambers each capable of holding 1,000 carcasses.
- Longer term freezer capacity for 200,000 carcases.
- The British made Linde refrigeration plant installed had capacity to freeze 250 ton of ice daily.
- New jarrah slides to reduce labour in transferring frozen carcasses from upstairs storage freezers to the wharf for ship loading.
- Installation of a larger tallow and bi-products processing facility.
- The Port Adelaide facility also included a new power generation plant, wine storage area, accommodation for the butter factory and later an area for the meat canning operation.
- The facility was expected to employ approximately 450 men when operating at maximum capacity.

These Port Adelaide upgrades were formally opened on 7 September 1908 by Lady Le Hunte, the wife of the South Australian Governor¹⁴³. The Dry Creek slaughter facility was closed in 1908 after this new Port Adelaide abattoir facility became fully operational.



Expanded Port Adelaide freezer rooms (left) and abattoir (right) C1908. PIRSA Image 108776

Processing Lambs at Port Adelaide

Butchers working in the Port Adelaide slaughterhouse were paid on a piece work basis with good butchers averaging 96 lambs per shift. After 1914-15, daily tallies were limited to 100 sheep per shift, then later reduced to 80 sheep per shift to ensure good quality work and minimise stress on butchers¹⁴⁴.

After killing and dressing, carcasses were weighed, graded, labelled, chilled, and dried for 2-3 days, before wrapping and transfer to the freezer rooms. Frozen carcasses were then stacked and stored awaiting shipment.

Wrapped frozen carcasses were moved to the wharf side on trolleys, and loaded into ships' freezer holds using net slings. These handling systems had the risk of damage by soiling of wraps and carcasses getting wet if it was raining. Potentially this could downgrade the value of carcasses in London markets.

Meat Cannery - 1909

A meat cannery was installed by the Government Produce Department at Port Adelaide, and commenced operations in July 1909. It could process up to 1,000 low

grade sheep per day¹⁴⁵. Canned products such as corned meat and tongues were well received in United Kingdom markets.

In its first full year of operation (1909-10), the Port Adelaide cannery processed 67,157 sheep and made a loss of £20¹⁴⁶. During WW1, the Port Adelaide cannery would work at near capacity, play a vital role in assisting farmers to dispose of inferior stock, and contribute to the War Effort.

The canning line was disassembled and removed in 1936 when the Port Adelaide abattoir was closed. Following the outbreak of WW2, a review in April 1940 established that another meat cannery was needed. Subsequently a beef and mutton canning line was established at the Gepps Cross Abattoir with capacity to handle 10,000 to 12,000 sheep per month. Old canning machinery salvaged from Port Adelaide was used, along with a further £800 invested in new machinery, and a shed costing £1,500¹⁴⁷.

From 28 July 1943, the Commissioner of Meat Supplies introduced compulsory acquisition of one forequarter of all cattle slaughtered to be canned for supply to the United Kingdom as part of a WW2 "War Strategy". Privately owned bacon factories were also working at full capacity producing canned bacon for Australia's forces and the United Kingdom. In January 1943, domestic meat rationing was introduced for South Australian consumers 148.

With accelerated demand for canned meats during WW2, another canning line was established at the Port Lincoln abattoir to supply military forces. 149 It was also used to can fish and tuna commencing in 1940-41 (see Port Lincoln section).

Closure of the Port Adelaide facility left the Government Produce Department operating the cold storage works at Light Square and the Port Lincoln abattoir and freezing works.

Further Expansion of Pt Adelaide Facilities – 1914 and 1923

With increasing demand for export beef during WW1, a new beef chiller and killing line was installed at Port Adelaide in 1914-15 to handle 120 cattle per day.

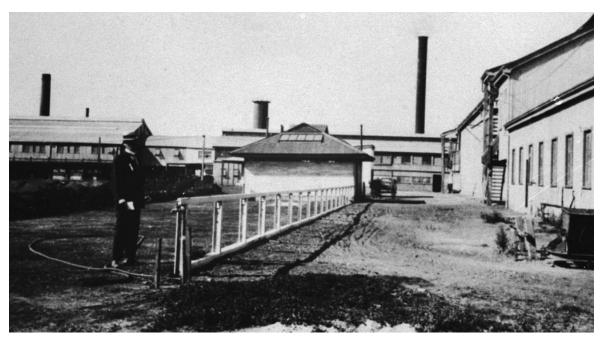
During the 1920s, there was further refurbishment and expansion of the Port Adelaide abattoir facilities. Mutton slaughterhouse and offal processing upgrades were completed in 1922-23 at a cost of £80,000, and were operational for spring of 1923. Included in the upgrade was a new skin shed and a cover over the stockyards¹⁵⁰. Ice making was also extended with expansion of the refrigeration plant by a further 100 t and building of a new 500 t ice store¹⁵¹.

By 1928, consideration was being given to connection to the local electricity grid to reduce labour, coal, and maintenance costs associated with 24 hour per day operation of the steam powered generators and refrigeration equipment.

Legislative Restructuring - Domestic vs Export Abattoirs - 1934

On 2 December 1908, the *Metropolitan Abattoirs Act 1908* was enacted to enable establishment of the domestic abattoir at Gepps Cross for supply of meat to metropolitan Adelaide and surrounds.

The Gepps Cross abattoir commenced operation in 1912-13, supplying Adelaide through 18 delivery districts. At that time there were 140 small private slaughterhouses located in the metropolitan area with 117 of these in the Adelaide City area¹⁵². Establishment of Gepps Cross abattoir triggered closure of many small slaughterhouses over the next few years.



Port Adelaide premises 1920. Source: State Library of SA Image B 56055.

Under the *Metropolitan Abattoirs Act 1908*, the Port Adelaide abattoir could only process livestock for export. Poor quality carcases could not be sold on the domestic market, requiring them to be processed through canning or boiling down to recover costs, reducing business profitability. Similarly, the Gepps Cross abattoir was confined to only processing stock for domestic markets.

These constraints were rationalised in 1934 with enactment of the *Metropolitan and Export Abattoirs Bill 1933* making Gepps Cross the main Adelaide abattoir to process stock for both domestic and export markets.

On 12 April 1934, the land (Block 63 and 64, Hundred of Port Adelaide) along with all buildings, plant, implements, freezers, machinery, stock yards and tallow house at the Port Adelaide site was transferred to the Metropolitan and Export Abattoirs Board¹⁵³. This required payment of £50,000 to South Australia Treasury, via six monthly instalments over 42 years and secured by debentures¹⁵⁴.

The Port Adelaide facility was then closed by the Metropolitan and Export Abattoirs Board in 1936 with staff being transferred to Gepps Cross. The Port Adelaide buildings were subsequently demolished in 1939 along with other smaller abattoirs at Glenelg and Marion¹⁵⁵ ¹⁵⁶. Equipment from the Port Adelaide facility was retained, with the canning line later being installed at the Gepps Cross abattoir during WW2¹⁵⁷.

A section of land at Port Adelaide not transferred to the Metropolitan and Export Abattoirs Board was sold in 1938-39 for £6,932 17/6¹⁵⁸.

Gepps Cross Commences Processing Export Lamb - 1937

In July 1937, export lamb processing commenced at the Metropolitan and Export Abattoirs Board Gepps Cross facility. It used a more modern chain production line system with capacity to process 8,000 lambs per day¹⁵⁹. Strong demand for export lambs required further expansion of Gepps Cross capacity to 60,000 lambs per week¹⁶⁰. The Government Produce Department then handled export of lambs from both Gepps Cross and Port Lincoln abattoirs.

Dry Creek Export Slaughterhouse



Stock yards and slaughterhouse facilities, Dry Creek. Source: State Library of South Australia image PRG-280-1-1-17-96

In 1900, land was purchased and leased at Dry Creek by the Government Produce Department to hold sheep and establish a slaughterhouse to temporarily service the expanding Port Adelaide freezing and export operation. It comprised 51 ac (20 ha) of freehold land and 500 ac (202 ha) of leased Crown land.

Operations commenced on 8th October 1900 with processing capacity being 2,500 lambs per day. Dressed carcasses were transported to the Port Adelaide freezing works using special railway trucks, necessitating extra handling and railway costs. Dry Creek abattoir capacity soon expanded to 5,000 head per day, with this throughput being exceeded by 1908.

The Dry Creek facility was decommissioned after the new Port Adelaide export abattoir became fully operational in 1908.

Port Lincoln Abattoir

Development and operation of the Port Lincoln Abattoir commenced in 1924. The facility was also known as the "Freezing Works" by the local community.

Prior to the 1950s, Eyre Peninsula was isolated from the rest of Australia by poor roads but had a good harbour at Port Lincoln. These transport constraints restricted development of domestic markets for farm produce, but favoured shipping overseas.



The original Pt Lincoln Abattoir buildings under construction c1924. Source: Port Lincoln History Group Photo Collection.

The export abattoir and freezing works at Proper Bay, Port Lincoln was established to process and store lamb, beef and pig meats for world markets and foster growth of Eyre Peninsula livestock industries. The first direct shipment of lamb occurred in 1930 and expanded dramatically during WW2.

The Port Lincoln abattoir became a hub for other food processing businesses on southern Eyre Peninsula. This included a bacon processing facility, butter factory, egg pulping plant, cordial factory and livestock sale yards that all contributed to growth of Eyre Peninsula agriculture industries. The cannery facilities at Port Lincoln assisted development of a fish and tuna canning industry commencing in 1940-41. The abattoir was also the main supplier of electricity to Port Lincoln and southern Eyre Peninsula until 1950.

Information about development and operation of the Port Lincoln abattoir complex is arranged in approximate chronological order.



Early construction of the Port Lincoln abattoir complex c1924

Source: Photo by the Late Peter Stephenson. Courtesy Eyre Peninsula Yarns and Family History and Rod Waters, Port Lincoln History Group

Establishment of the Port Lincoln Abattoir - 1924

The Port Lincoln abattoir was established in 1924 by the Eyre Peninsula Cooperative Ltd. This cooperative of approximately 1,000 Eyre Peninsula residents provided seed funding and obtained financial assistance from the South Australian Government secured by debentures over the works¹⁶¹. The Eyre Peninsula Cooperative commenced with £100,000 of community capital, a £30,000 loan from the South Australian Government, and a grant of £5,000 from the State Bank. The Government Produce Department contributed by supplying and installing the steam powered ammonia refrigeration plant.

The Port Lincoln complex was built on Pine Freezers Road, Proper Bay adjacent to the Eyre Peninsula Railway line. It was officially opened by Mr G A W Pope, General Manager, Government Produce Department on behalf of the Minister of Agriculture on 22nd November 1924. The initial buildings, plant, and railway siding cost £36,000.



First Directors of the Port Lincoln Freezing Works.

Standing; L – R: O.A. Hall; Frank Masters (founder); Arthur Leech (Secretary).
Seated; L – R: A.G. Laidlaw; E.J. Broad (Lipson Chairman); A.B. Wishart (Tumby Bay).

Source: Saga of Wangaraleednie by Frank Masters; National Trust of South Australia; Franklin Harbour and Cleve. Courtesy of the Port Lincoln History Group Collection.

In its first two years of operation, the Port Lincoln abattoir slaughtered approximately 1,500 lambs. Labour issues and low sheep numbers meant the abattoir struggled to make a profit, and it subsequently faced bankruptcy.



Visitors attending the official opening of the Pt Lincoln Abattoir on 22 November 1924. Source: Port Lincoln History Group Photo Collection.

A Public Works Committee investigated and recommended that management of the Eyre Peninsula Cooperative Ltd be taken over by the South Australian Government, with focus on generating power and processing lambs. This Public Works

Committee recommended that a seasonal throughput of 3,000 lambs was needed for the abattoir to operate profitably 162.

This Public Works review examined the design, engineering, management, financial and operational aspects of the Pt Lincoln freezing works¹⁶³, concluding that the establishment of the Pt Lincoln Freezing Works was "a little ahead of its time"¹⁶⁴.

Transfer of Port Lincoln Abattoir to Government Produce Department - 1929

On 1 July 1927, Mr G A W Pope, General Manager, Government Produce Department was appointed as Receiver, and on 18 May 1928 was designated as Liquidator. The Liquidator handed over the works and its assets to the Governor of South Australia on 1 March 1929. The Government Produce Department was then instructed to take control of the facility and operate it as a branch 165.

Mr I Siggins (from Government Produce Department Head Office) was then appointed as the first Port Lincoln Branch Manager. Between 1929 and 1934 the facility operated with a skeleton staff focussed on processing lambs, electricity generation and ice production. Its Branch Office and Electrical Store were located at Adelaide Place, Port Lincoln.



Transporting sheep to the Port Lincoln Abattoir via Eyre Peninsula Railway c1930s

Source: Photo courtesy Eyre Peninsula Yarns and Family History and Rod Waters, Port Lincoln History Group

Gradually lamb throughput increased. The first direct export shipment of 4,555 frozen lamb carcasses was made from Port Lincoln on 15 December 1930 via the vessel *Port Campbell*. During the late 1920s and early 1930s, Government Produce Department staff made numerous presentations at Eyre Peninsula Agriculture Bureau meetings to promote export services and encourage throughput of livestock through the Port Lincoln abattoir 166,

A butter factory was established at the Port Lincoln complex in 1928. Eyre Peninsula had few dairy cows as the climate was not suited to dairy production. Annual reports do not contain any data about butter production at Port Lincoln, but storage records indicate there were only small quantities of butter being held in the Port Lincoln cool rooms (1938-39 annual report shows there were 6 boxes of butter stored at Port Lincoln)¹⁶⁷.



Loading the first direct shipment of lamb from Port Lincoln, December 1930 – vessel Port Campbell.

Source: PIRSA image 108806

The *Port Lincoln Abattoir Act 1937* permitted domestic sale of carcases to butchers in the Port Lincoln area. It also permitted manufacture and sale of small goods and cooked meats (such as bacon) in the Port Lincoln and surrounding districts. This legislation enabled a bacon processing facility to be established and leased to Lincoln Bacon Specialists Ltd, who operated it for many years.



Port Lincoln freezing works and abattoir c1930s.

Source: Port Lincoln History Group Photo Collection Capacity of the Pt Lincoln abattoir grew steadily as lamb exports developed after initially operating seasonally from August to December. By 1935 a permanent slaughter hall foreman and meat inspector/grader had been appointed, with up to 5 slaughtermen killing 400 lambs per day.

Expansion of Pt Lincoln Processing Capacity – Late 1930s and WW2

Growth in Eyre Peninsula lamb production required more abattoir capacity. The processing line was upgraded to handle 800 lambs per day and two additional freezing rooms were added in 1936. Another upgrade in 1937 installed a chain system for slaughtering, increasing capacity to 2,080 lambs per day. Four additional freezer rooms were constructed to handle this throughput.

Passing of the *Port Lincoln Abattoirs Act 1937* declared Port Lincoln as an "abattoir area", enabling appointment of a full time Commonwealth Meat Inspector for continuous operation, and enabling appointment of more full-time staff.

Year-round operations provided flexibility for farmers but placed more financial stress on the Government Produce Department. Extremely busy periods in the spring "lamb season" were followed by low throughput for the rest of the year. Despite these problems, the Port Lincoln abattoir and its access to overseas markets stimulated land development and growth of livestock industries on Eyre Peninsula.



Government Produce Department Administration Building built at Adelaide Place Pt Lincoln in 1939-40.

Photo: Barry Philp May 2023

A new administration building was built at 5 Adelaide Place, Port Lincoln in 1939-40 to house Government Produce Department management staff and provide offices for Department of Agriculture staff (Fisheries and the Stock and Brands Sections)¹⁶⁸.

The outbreak of WW2 required dramatic expansion of abattoir throughput to supply meat to the United Kingdom and military forces.

To cope, a new freezing and storage block was built with the assistance of a Commonwealth grant. It was officially opened by South Australia's Agent General, Sir Charles McCann in December 1942¹⁶⁹. The new larger freezer rooms were used to handle all lamb production while the older freezer rooms were used for pig, cattle, and calf carcasses.



Major extensions to abattoir and freezer facilities under construction at Pt Lincoln 1941.

Source PIRSA Image 108807

Abattoir Upgrades - 1950s

The 1950s ushered in a series of abattoir upgrades to improve turnover and meet changing market access requirements. These included:

- Construction of a new "beef house" which was completed in 1950-51 for slaughtering cattle and packing beef for export.
- An area of land at the Port Lincoln site was leased to Eyre Peninsula Stock Marketing Pty Ltd to operate weekly livestock sales. Killing space on the abattoir production line was assigned for livestock sold through these sale yards. The new livestock market proved successful with good prices received by farmers¹⁷⁰. Growth in sheep sales required an increase in the abattoir processing allotment from 2,000 to 4,000 head per week.
- By 1956, the Port Lincoln abattoir was capable of processing 10,800 sheep and 1,000 pigs per week. It included a small local abattoir to supply meat to Port Lincoln and Eyre Peninsula. Storage capacity had been increased to 800 t of meat, edible offal, and egg pulp, along with 300 t of tallow, and 250 t of stock feed and fertiliser. At this time the works employed 87 people full time, and 224 casuals during the export season.

Development of new boneless mutton and beef markets, particularly in the United States, required construction of a new boning and packing room in 1959¹⁷¹. Servicing the boned meat trade helped spread slaughtering through the year, enabling a higher proportion of staff to be permanently employed. By 1965 Port Lincoln's permanent work force was 80-90 staff with 40-50 casuals during the lamb export season.

In 1959, the bacon factory leased to Lincoln Bacon Specialists Ltd was expanded by 50% to accommodate their growth. Two new oil-fired boilers were also installed 172.

Pursuing United States Markets – 1960s

In May 1963, the United States announced increased meat import standards effective from 1 May 1964. A review of the Port Lincoln abattoir facility revealed it did not comply with these new standards and required a total rebuild. This upgrade required a loan of £80,000, from South Australian Treasury¹⁷³.

Upgrade work progressed despite the Port Lincoln works making a large loss of £27,129 in 1963-64, consisting of overhead costs such as loan interest (£15,370), depreciation on buildings, plant, and machinery (£10,117), plus pensions and insurance (£5,304) 174 .

Contractors O'Neill and Clayton Pty Ltd were engaged to demolish and rebuild the lamb/sheep dressing section and edible offal packing room. Cost of this rebuild was £49,500 and commenced in February 1965. Government Produce Department staff installed fittings and machinery within the facility. During the rebuild process, off season sheep and lamb slaughtering was handled in the pig dressing room¹⁷⁵. On completion of the sheep section, modifications proceeded on the boning room, drying room, cold stores, beef, and pig halls.

New Shipping Service to Adelaide - 1963

The introduction of the "roll on roll off" ferry MV Troubridge operating between Adelaide, Port Lincoln, and Kingscote, created new niche marketing opportunities for Eyre Peninsula farmers and helped smooth Port Lincoln's processing peaks. The first shipment of 80 mutton carcases via the MV Troubridge was made to the Light Square facility in Adelaide on 18 September 1963. These carcases were used to provision Government institutions ¹⁷⁶.



Rail entry to the Port Lincoln abattoir complex 1974.

Source: Photo by Alex Grunbach. Courtesy Eyre Peninsula Yarns and Family History, and Rod Waters, Port Lincoln History Group.

Development of Tuna Processing - 1939 to 1975

In 1938-39 space was leased by Kangaroo Investigations Pty Ltd to erect a canning facility following research into the Southern Ocean's tuna fishery capacity¹⁷⁷. An initial trial fish cannery was temporarily set up in 1940, using the skin packing room (after lamb export had finished) while using freezer space to store tuna prior to canning¹⁷⁸.

In late 1941, a new building for fish and tuna canning, operated by Port Lincoln Fisheries Pty Ltd, was constructed on the east side of the main Port Lincoln Abattoir buildings¹⁷⁹. Initially canned fish and tuna was sold through war time contracts with the Royal Australian Navy and Australian Army. In 1947, further fish factory alterations and additions were completed.

The season's tuna catch was normally stored in the Government Produce Department freezers, and gradually processed through the canning line over about six months.

With steady expansion of the tuna industry the cannery was leased to South Australian Fishermen's Cooperative Ltd (SAFCOL) in February 1957. They later purchased and expanded the tuna cannery. A larger section of freezer space was dedicated to storing the tuna catch for canning.

By 1967, the Port Lincoln tuna cannery was operating at capacity, requiring a further 2,000 t of tuna to be processed at the Gepps Cross abattoir cannery.

When the Government Produce Department closed in 1975, there were four fish processing businesses operating from the Pt Lincoln facilities¹⁸⁰.



Fish cannery building at the Port Lincoln Abattoir c1940s.

Source: Port Lincoln History Group Photo Collection.

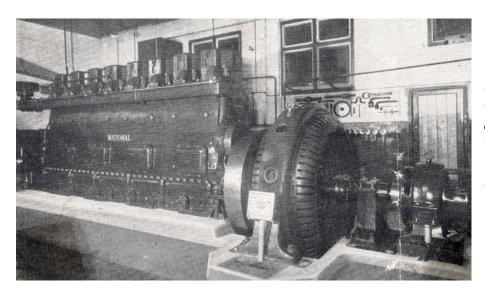
Electricity Generation 1924 to 1950

From its commencement in 1924, the generators at the Port Lincoln Abattoir also supplied electricity to the town of Port Lincoln and surrounding areas of lower Eyre Peninsula.

Growing abattoir and town power demand required a series of generating plant upgrades. A second 750 KVA generator was installed and commissioned on 30 September 1930¹⁸¹. In 1938-39 another 312 KVA diesel generator was installed 182,

followed by a further upgrade in 1946-47 when an additional 525 hp 394 KVA generating plant was installed 183.

On 1 July 1950, the Electricity Trust of South Australia took over electricity generation and distribution for Port Lincoln and Eyre Peninsula as part of rationalisation of South Australia's electricity supply network. The Government Produce Department continued to operate its power generators to supply freezers and equipment at the Port Lincoln abattoir on behalf of Electricity Trust of South Australia. These generators were later linked to the Port Lincoln power station when it was built on the foreshore of Boston Bay¹⁸⁴.



The 440 bhp National diesel generator. One of four generating plants installed at the Port Lincoln Abattoir.

Source: Port Lincoln History Group Photo Collection.

Port Lincoln Abattoir – a Regional Business Hub – 1970s

Over many years, the Government Produce Department facilitated establishment of other food processing businesses within the Port Lincoln abattoir precinct. By the 1970s, the Port Lincoln abattoir complex provided land, facilities, plus electricity, refrigeration, and steam services to the following private businesses:

- Lincoln Bacon Specialists bacon factory office accommodation, processing and packing rooms with steam and refrigeration being provided by Government Produce Department under contract.
- Australian Bight Fishermen's Society leased land with improvements provided by them.
- Kraft Foods Ltd leased land but owned their own improvements and purchased steam and refrigeration services.
- A Raptis & Sons leased a small area and purchased steam and refrigeration services.
- South Australia Fisheries Cooperative Limited leased land for their car park, owned a section of land used for their processing facility and was supplied with steam and refrigeration services.
- An area of land had been transferred to Eyre Peninsula Stock Marketing Co Ltd for operation of the livestock sale yards.
- Land used for rail yards was owned by the Government Produce Department.

Declining Profitability – 1970s

By the early 1970s, the Port Lincoln abattoir was suffering ongoing losses which were subsidised by South Australian Treasury loans and increasing interest payments.

By 30 June 1975, the Government Produce Department had accumulated losses of \$3.58m. In the 5 years of operation between (1970-71 to 1974-75), total losses of \$1.663m were incurred. Much of this was attributable to the Port Lincoln abattoir. In the 10 years to 1975, \$1.493m had been invested to upgrade facilities and equipment at Port Lincoln to meet compliance requirements of various export markets¹⁸⁵.

This financial situation, mainly attributable to the Port Lincoln abattoir, and declining market outlooks brought into question whether the Government Produce Department should be wound up.



Government Produce Department Port Lincoln abattoir and freezing complex in 1974. Source: PIRSA Photo ID 108794

A review of the Port Lincoln abattoir complex in June 1974 revealed it had the following assets 186:

- Sheep and lamb slaughtering facilities capable of processing 2,000 lambs or 1,820 sheep daily.
- Cattle slaughtering facilities with capacity of 55 beasts daily.
- Pig processing capacity of 180 head daily.
- Edible offal and pet food packing rooms capable of trimming and packing product from all types of livestock.
- Three chiller and freezing complexes with a total capacity of 350,000 cu ft.
- Skin drying and packing shed.
- Casing room for stripping and packing intestines for sausage casings.

- Bi-product plant to recover fats and convert them to tallow.
- Three automatic steam boilers with total capacity of 1,100 hp.
- Eight ammonia refrigeration compressors with a total capacity of 620 t.
- Effluent screening and disposal system.
- New office accommodation complex to house 150 people including supervisory staff, meat inspectors, meat section employees, and Lincoln Bacon Specialists Ltd personnel.
- 6 residences owned within Port Lincoln township for staff accommodation.

Transfer of Port Lincoln Abattoir to South Australian Meat Corporation - 1976

The Government Produce Department ceased operation on 26 October 1975. In 1976, control of the Port Lincoln Abattoir was transferred to the South Australian Meat Corporation using the *South Australian Meat Corporation Act Amendment Act* 1976. It provided for:

- Transfer of land held on 7 certificates of title and arrangements for land tax.
- All property, plant, and any rights and liabilities under contracts in effect at the time of transfer.
- Arrangements for transfer of staff to the South Australian Meat Corporation.
- Repeal of the Port Lincoln Abattoir Act 1937, and new arrangements to enable some meats (such as small goods) not sourced from the Port Lincoln Abattoir to be sold in the Port Lincoln area.

Economic Review of Port Lincoln Abattoir – 1979

After several years of mounting debt under South Australian Meat Corporation (SAMCOR) management, the Minister of Economic Development commissioned a study into the viability of the Port Lincoln abattoir. This study completed on 26 April 1979, evaluated whether operation of the Port Lincoln abattoir should be continued, and if so under what circumstances 187.

This report concluded that:

"It is unlikely that the abattoir will ever be viable and that to minimize the loss of State Government funds over the longer term it would be desirable to remove the responsibility of the meat works from SAMCOR and the south Australian Government. This could be affected by the sale or lease of the meat works, or in the absence of a buyer or lessee, the closure of the abattoir".

This 1979 Department of Economic Development study identified the following contributing factors to the losses:

- The abattoir had a capacity of 2,000 lambs, 120 cattle and 180 pigs per day, a slaughtering capacity that "was considered to be unbalanced".
- The facility met Australian Department of Primary Industries standards but did not meet increasing United States Department of Agriculture (USDA) standards. The United States was a prime export market.
- Was remote from larger domestic markets creating a freight disadvantage.

- Two thirds of stock being sold on Eyre Peninsula was being trucked to other abattoirs at Peterborough or Adelaide.
- Port Lincoln abattoir had a very seasonal (spring) operation with a severe downturn in slaughtering during winter.
- Wide fluctuations in annual throughput resulted in a great deal of idle capacity.
- The contract for the employment of staff working on the killing line was under the South Australian Conciliation Committee Award rather than a Federal industrial award used by most Australian abattoirs. This required weekly rather than daily hire of casual staff.

Closure of Port Lincoln (1984) and SAMCOR (1996)

Despite the Port Lincoln abattoir gaining approval for USDA export, it was closed on 29 June 1984 after incurring \$9m of cumulative losses over 10 years 188.

In the early 1990s, South Australia had a significant oversupply of abattoir capacity, and after several years of substantial losses, the SA Government made the decision to abolish South Australian Meat Corporation, close the Gepps Cross abattoir and sell its assets. This process occurred under the *South Australian Meat Corporation* (*Sale of Assets*) *Act 1996*. On completion of this process all abattoirs in South Australia were under private ownership.



Recent view of the repurposed Pt Lincoln abattoir buildings and freezers. Photo Barry Philp May 2023.

Port Lincoln Premises - Current Use

After closure of the Port Lincoln abattoir, the livestock sale yards, and land was sold. The vacant Port Lincoln abattoir buildings and freezers were purchased by a local businessman and pastoralist. Some freezers were refurbished and remain in use (as of July 2023). Facilities were leased to local businesses for storage of fish bait and manufacture of foliar fertilizers.

OVERSEAS MARKET REPRESENTATION

For the Government Produce Department to be successful, good overseas market representation was essential. In 1894, the United Kingdom being the "mother country", was a large importer of produce, and because of Commonwealth links was considered the highest priority export market.

London was a logical hub for establishing premises to service the United Kingdom and European markets. The South Australian Government appointed a series of Trade Commissioners and/or Agent Generals to represent exporters and the Government Produce Department in London.

There were also short periods of market representation in South East Asia.

London Premises

The type of London warehousing, office and display facilities used for handling, promoting, and distributing produce changed over the years. Initially wine was the major product, so the initial focus was on warehousing to store wine barrels. Over time the need for wine storage declined, resulting in only office and showroom facilities being needed. Below is a description of major locations used over the years.

London Wine and Produce Depot

In May 1894, Manager, Mr E Burney Young commenced the search for suitable premises to house the London Wine and Produce Depot. This required protracted negotiations with United Kingdom Customs and Treasury to establish bonding arrangements. The initial London Wine Depot was leased at City Mill Buildings, Upper Thames Street, Port of London. This facility fronted the Thames wharves, had storage capacity for 2,500 hogsheads of wine, and space for wine bottling¹⁸⁹. A "duty paid" bottling cellar was added in 1900, enabling bottle aging of wines before they were marketed¹⁹⁰.

As South Australian wines gained a reputation for quality and wine makers established relationships with wine merchants, they forged direct trading arrangements reducing the need for the Government Produce Department to operate a wine depot.

The Government Produce Department's London Wine Depot was taken over by the Commonwealth of Australia Wine and Produce Company in 1904¹⁹¹.

Australia House

Building of the national "Australia House" on The Strand, London, provided a location to house Commonwealth and State government representatives. Australia House was formally opened by King George V on 3 Aug 1918. Each state had an office for its Agent General and supporting staff. It provided staff offices, a venue to meet customers, and an area for produce displays¹⁹².

In December 1919, South Australia's Trade Commissioner, Agent General and staff moved to Australia House¹⁹³.

Other London Premises

On 1 August 1935, the South Australia House office was moved from Australia House to British Industries House in Oxford Street, London. This new location was launched with a large display of South Australian goods for Empire Trade Week¹⁹⁴. The move from Australia House was made to obtain a more central London location, superior display space and cheaper rent. Several other states also moved their offices from Australia House in the mid-1930s.

During WW2, this Oxford Street office suffered bomb damage on several occasions, including a nearby strike by a V2 rocket in March 1945¹⁹⁵.

After WW2, South Australia House moved to a location near Trafalgar Square at 50 The Strand, London, a short distance from Australia House.

Currently (2023) the Agent General for South Australia is again located at Australia House on The Strand near Aldwych, London.

Representation in British and European Markets

The London based Agent General had a broad role representing all interests for the South Australian Government in the United Kingdom and Europe.

Trade Commissioners and Agent Generals were appointed by the South Australian Government to facilitate trade in the United Kingdom and Europe. Over the years there were periods when the South Australian Agent General and Trade Commissioner roles were combined.

The industry and business representation roles comprised:

- Establishing linkages with United Kingdom and European produce merchants and buyers.
- Developing contracts and marketing arrangements with customers.
- Researching demand, evaluating opportunities, and assessing competitive advantages.
- Providing feedback to South Australian producers about market opportunities, quality requirements, produce presentation, competitiveness, and how they might improve returns.
- Delivering South Australian promotional programs in target markets.
- Managing showrooms, produce displays, and marketing events.

During both World Wars, the Government Produce Department also played a vital role coordinating and managing contracted supplies of food to the United Kingdom government for domestic and military use.

Trade Commissioners and Agents General

Following is a list of South Australian Trade Commissioners and/or Agent Generals appointed to the London office during the Government Produce Department's period of operation:

- 1894: Mr E Burney Young was appointed as first manager of the London Wine and Produce Depot on 31 March 1894.
- In 1905 when Mr G A W Pope was appointed as Acting Manager of the Government Produce Department, he immediately requested improved representation in the London market. Producers had also expressed the opinion they needed a representative with a good knowledge of South Australia's agricultural products and marketing systems ¹⁹⁶.
- 1905 1909: Maj A E M Norton was appointed and operated as the Commercial Agent for the Government Produce Department in London.
- 1909 1910: Mr G A W Pope temporarily operated as the Commercial Agent while Maj Norton was undertaking an industry tour in South Australia. During this period the role of Commercial Agent was restructured to Trade Commissioner.
- 1910: Maj A E M Norton returned to London and resumed the role of Trade Commissioner, then resigned.
- 1911 1914: Mr Charles McCann (who had held various Government Produce Department positions) deputised as the Trade Commissioner in London. In 1912 he returned to South Australia for a period, then moved to London to fill the Trade Commissioner position in 1914.
- 1914 1919: Mr Charles McCann continued as Trade Commissioner in London during WW1.
- 1919 1920: Mr McCann was temporarily appointed as Trade Commissioner, being replaced by Lt E F Shepherd who had considerable experience working in the Government Produce Department's Adelaide office.
- 1920 1931: Mr R M K Lewis was then appointed as the Trade Commissioner in 1920. He was previously the Assistant Manager of the Government Produce Department's Light Square facility¹⁹⁷. Mr Lewis died in office on 6 March 1931.
- 1931 1951: On 1 October 1931, Mr Charles McCann was reappointed as Trade Commissioner and as Secretary to the Agent General. On 21 September 1934, Mr McCann was elevated to the combined position of Trade Commissioner and Agent General. Mr McCann was knighted in 1938 in recognition of his extensive services to South Australia's agricultural industries. He remained as the combined Trade Commissioner and Agent General until his death in office on 5 June 1951.
- 1952 1960: Mr Alfred Greenham was appointed as Acting Joint Trade Commissioner and Agent General in July 1952, then permanently appointed on 6 August 1953. He retired in 1960 but remained in the position to complete marketing of a large export apple crop in early 1961.
- 1961 1966: Mr Malcolm Pearce became Agent General and Trade Commissioner in 1961. To assist with handling the large apple crops in 1962 and 1963, Mr K Pender was appointed as a supporting Trade Officer.

1966: Mr K L Milne was appointed as South Australia's Trade Commissioner in London.

1971-1974: Mr Raymond Taylor was Agent General from 1971 to 1974.

Communication With South Australian Farmers

When Mr E Burney Young was appointed as initial manager of the London Wine and Produce Depot (March 31,1894), his first task was to undertake a major study of the wine, cheese, butter, and olive oil industries in the south of France and Bordeaux regions. Detailed reports about French product quality, export standards and new production technologies were provided to South Australia's wine and dairy industries.

Government Produce Department staff regularly made presentations at regional meetings of the South Australian Agriculture Bureau and other farming groups. These presentations were often in conjunction with Department of Agriculture technical specialists. They focused on opportunities for export of various commodities, quality considerations, product specifications, market outlooks, and services provided by the Government Produce Department.

In 1911, Mr. Charles McCann commenced as Trade Commissioner. A prolific publisher, he supplied weekly media articles about produce marketing opportunities in the United Kingdom and Europe. He was well known in the farming community through numerous and frequent articles he published in The Advertiser, Chronicle, The News, and Stock and Station Journal¹⁹⁸.

In 1934, Mr McCann visited South Australia for 12 weeks. He undertook a comprehensive program of regional visits with numerous presentations at farmer meetings. He encouraged participation in export markets and informed producers about how to achieve the best returns¹⁹⁹. Mr McCann also facilitated London lamb and pig carcass competitions to improve product quality²⁰⁰.

On another visit to South Australia in December 1942, Agent General McCann met with groups of producers and also officially opened new extensions at the Port Lincoln Abattoir.

Product Promotion and Market Development

In 1907, Major A N M Norton, as Commercial Agent in London, embarked on a program of "lantern" lectures, exhibitions, shows and other promotional activities to present SA agricultural products to British merchants, distributors, and the public.

New opportunities for apple exports to Germany were identified in the early 1900s. By 1907 significant volumes of apples were being traded through Hamburg. Later, Mr Charles McCann further developed apple exports in Scandinavian countries. This promotion was very effective as during some seasons, over 60% of South Australia's export apples were sold in Germany and Scandinavia.

The Government Produce Department established produce displays at United Kingdom retailers and major food exhibitions. In 1924, seven South Australian butter manufacturers jointly purchased a stand at the British Dairy Farmer's Show. Stanley

Wine Co, G Gramp & Son, and S Smith Ltd also received numerous awards for their wine entries in the Brewers Exhibition in London. These promotional activities were facilitated by the Government Produce Department.

Following WW1, the Australian Government established more coordinated promotion of national produce in the United Kingdom. In 1927, the Government Produce Department paid for South Australia's contribution (12.5% of total funds) to this national promotion program, ensuring South Australian exporters were well represented.

Adelaide based Advertiser Newspapers started a produce gift promotion scheme in conjunction with the Government Produce Department in 1931-32. South Australian residents could purchase and forward a lamb as a Christmas gift (using Government Produce Department shipping networks) to friends and family living in the United Kingdom. For Christmas 1932, 1,236 lambs were forwarded, and were received with much positive media coverage in London because of the Great Depression. Over the next 5 years, the lamb gift scheme was expanded to include canned fruit, apples, and jams²⁰¹. During its final year, 1938-39, the Gift Scheme was limited to canned fruit and jam²⁰².

War Time Supply Coordination

South Australia's Agent General and Trade Commissioner played vital roles coordinating supply of agricultural products to the United Kingdom during the Boer War, WW1, and WW2.

Through the Boer War, the Government Produce Department secured products on behalf of the Australian War Office and shipped these to South Africa. This included 776 t of jam, 6,511 lamb and mutton carcases and 8,476 t of hay²⁰³. The Government Produce Department did not charge administration fees for this service.

From July 1914 (WW1), Trade Commissioner McCann coordinated contracts with the United Kingdom War Office. Most of Australia's and New Zealand's meat exports were purchased by the United Kingdom for military use. He also negotiated supply of various manufactured products from South Australian companies, such as 20,000 bandoliers (ammunition belts) from Adelaide company Holden & Frost²⁰⁴.

The outbreak of WW2 dramatically increased the Government Produce Department's role. In 1939, the Australian Government signed an overarching contract with the British Government for purchase of meats. During the first year from 1 October 1939 to 30 September 1940, Australia supplied 260,000 t of meats. Prices to Australian exporters were fixed and published by the Australian Meat Board in their annual report of 30 June 1940. The United Kingdom Ministry of Food paid War Risk Insurance and controlled distribution within the United Kingdom²⁰⁵.

The Australian Government also contracted the Government Produce Department to supply a range of other foods, including canned meats and tuna, for Australia's military forces²⁰⁶.

South Australian war time controls on domestic meat supply commenced in 1942. The General Manager of the Government Produce Department was appointed Deputy Controller of Meat Supplies with responsibility for acquisition of lamb, mutton, pig meats and meat offal on behalf of the Commonwealth Controller of Meat Supplies²⁰⁷.

WW2 resulted in huge sales of meat products to the United Kingdom. In 1944-45, exports of lambs, sheep, pigs, and cattle reached record levels with 1,315,390 animals being processed through the Gepps Cross abattoir and 317,209 animals handled through Port Lincoln²⁰⁸. Total volume of lamb and mutton supplied during WW2 topped 4.5 m carcasses.

With support from his wife, Sir Charles McCann also played a vital role supporting South Australian service men and women in the UK during WW2. He set up the "Boomerang Club" venue in mid-1945 at the Oxford Street, London offices. This was a social haven for service personnel and prisoners of war returning to South Australia from Europe during 1945.

South East Asia Representation

During the early 1920s, there was oversupply of canned meats and butter in the United Kingdom due to overrun from WW1 contracts depressing world prices and curtailing exports of lamb and mutton to the UK during the early 1920s.

To identify new market opportunities in the "East" (South East Asia), South Australia shared the cost of a Commonwealth Trade Commissioner to this region with other states²⁰⁹.

The Australian Government also ran a trade promotion mission to the Netherland East Indies (Indonesia) and the Malay States (Malaysia) in 1931-32. The Government Produce Department participated in this trade mission being represented by General Manager Mr G A W Pope. Apple sales were heavily promoted, resulting in 2,324 cases of apples being supplied from South Australia to these countries in 1933²¹⁰. This trade blossomed in 1933-34, with 141,858 cases of apples being shipped to Asian countries.

STAFF AND KEY INFLUENCERS

General Managers

During its period of operation, the Government Produce Department was led by 10 General Managers. Mr G A W Pope was the longest serving holding the position for 35 years. Most started their careers as junior staff members and gradually worked their way through various middle management roles before being appointed as the General Manager.

Below is a list of Government Produce Department General Managers and their periods of service:

Mr E J B Ebdy Oct 1893 to Jul 1897 (resigned)

Mr R W Skevington Oct 1897 to Jun 1905 (resigned)

Maj A E M Norton Dec 1905 to Oct 1906 (moved to Trade Commissioner, London)

Mr G A W Pope 1 Oct 1906 to late 1940 (retired then died June 1947)

(During 1909-10, Mr McCann was Acting General Manager while Mr Pope was acting as Commercial Agent in London.)

Mr W D Price 19 Jan 1941 to 1944 (died in office 29 July 1944)

Mr I Siggins 1944 to 1946 (Acting General Manager).

Mr T F Rice 1946 to Dec 1957 then transferred to Supply and Tender Board.

Mr W E A Peck 1958 to 1959 – Mr Peck was General Manager from early 1958

until 1959, then retired after 48 years of service including roles

as Manager of Port Lincoln and Light Square facilities.

Mr J R Dunsford 1960 to May 1963 then promoted to Director of Lands.

Mr R G Badcock (Secretary and Accountant) was appointed as Acting General Manager between May and August 1963 until Mr

Jeanes assumed the General Manager position.

Mr E C Jeanes Aug 1963 until 20 October 1975 and retired when the

Government Produce Department closed. He steered the organisation through its final review and wind-up processes.

Major Influencers

Following is more detailed information about key people who provided outstanding service in guiding and shaping development of South Australia's Government Produce Department. They included:

Sir Charles McCann²¹¹

Born in Jamestown, South Australia on 10 June 1880, Charles Francis Gerald McCann joined the Government Produce Department as a cadet on 21 April 1898. In 1900 at the age of 20, he became clerk-in-charge of the Dry Creek Depot. By

1906 he was appointed works manager at Port Adelaide, then in 1910, a sub-manager of the department with responsibilities for inspection of wheat, export meat and rabbits. While in the position of Acting General Manager in 1910, he oversaw purchase of the Light Square property.

In 1911, Mr McCann began deputising for the South Australian Trade Commissioner based in London, and in 1914 was permanently appointed as the Trade Commissioner. Throughout WW1 he played a key role liaising with the United Kingdom War Office about supply of South Australian agricultural products and provided support to South Australian service men and women in London.

After WW1, he obtained a position (between 1919 and 1930) with the Smithfield and Argentine Meat Co and assisted this company to enlarge and modernise its plants and grow Argentina's meat exports to Europe. In 1930, he was appointed as a director of wholesale fruit merchants Minear, Munday & Miller Ltd.

From 1930-31 Mr McCann acted as South Australia's Trade Commissioner in London, assisting Mr R M K Lewis during his lengthy period of illness. Following the death of Mr Lewis in 1931, Mr McCann was appointed as Trade Commissioner. On 21 September 1934, he was then appointed to the combined positions as South Australia's Trade Commissioner and Agent General.

Through the 1930s, Mr McCann initiated promotional programs for South Australian produce, developed new markets, fostered improvements in packaging and quality. Of significance to farmers was his delivery of extensive regional speaking sessions across South Australia to encourage profitable export of perishable products. Much of his advice was widely reported by regular articles in South Australia's rural newspapers.



Sir Charles McCann. SA Agent General 1934 to 1951. Source: State Library of South Australia image B 7765.

In January 1938 Charles McCann was knighted in recognition of his services to South Australia's agricultural industries.

During WW2 he continued the critical role of coordinating food supplies to the United Kingdom. On a visit to South Australia in December 1942, he officially opened additions to the Port Lincoln abattoir.

He became a member of the International Wool Secretariat in 1943 and was later appointed its chairman.

Sir Charles McCann died in office on 5 June 1951.

Mr Gerald A W Pope

Mr Gerald Albert William Pope joined South Australia's Public Service on 5 November 1894. He was appointed as a junior clerk in the Government Produce Department on 20 September 1897. On 1 October 1906 he was promoted to General Manager and held this position for 35 years until his retirement in late 1940.

During his term as General Manager, he steered major structural growth of the agency including commissioning of the butter factory at Port Adelaide (1906), building of the Port Adelaide abattoir (1908), establishment of a cannery at Pt Adelaide (1909), oversaw purchase of the ice works at Light Square (handled by Mr McCann in 1910), followed by coordination of food services to Government Institutions from Light Square (1915) and construction of head office facilities at Light Square (1922).

Under his guidance, the Government Produce Department took over management of the Port Lincoln abattoir in 1929 following financial failure of the Eyre Peninsula Cooperative Ltd.

Oversupply of world meat markets during the 1920s, drought, financial difficulties experienced with South Australia Treasury, and the Great Depression were all major management challenges faced by Mr Pope. He steered the Government Produce Department through a period of major legislative restructuring when the Metropolitan and Export Abattoirs Board was formed (1934) and took over operation of the Port Adelaide abattoir.

During the early stages of WW2, large extensions of the Port Lincoln abattoir and freezing facilities were initiated and completed.

Mr Pope held numerous executive positions in his career including Chairman of the South Australia's Dried Fruits Board, Chairman of the South Australian Apple and Pear Acquisition Committee, Chairman of the Transport Control Board (WW2), and member of the Australian Wheat Board.

He retired as General Manager in late 1940 but continued as a member of the Meat Board of South Australia until his death in June 1947²¹².

Mr Walter D Price

Mr Walter Davies Price joined the Lands Department in 1903 then transferred to the Government Produce Department in 1907. He was based at Head Office until 1920 when he was appointed Assistant Manager of Light Square. Subsequently in 1938, he was promoted to Assistant Manager of the Government Produce Department.

On 19 January 1941, Mr Price was appointed General Manager after Mr Pope retired steering the agency through the challenges of labour shortages and major expansion during WW2. Sadly, he died suddenly on 29 July 1944²¹³.

At the time of his death, he held several key positions including Deputy Controller of Meat Supplies South Australia, Chairman Clear Ice Service Board, and Chairman of the Ice Manufacturers Association of South Australia.

Mr T F Rice

Mr T F Rice joined the South Australian public service in 1910 working in a series of positions in the Audit Office and Tax Department, before being appointed as Chief Storekeeper of the Public Stores Department in June 1940.

On 1 March 1945, Mr Rice was appointed General Manager of Government Produce Department but did not take up the position until February 1946. He retired from the General Manager position on 2 December 1957 after almost 12 years in the role.

Mr Rice was Chairman of the Supply and Tender Board as well as being the South Australian Government representative on numerous other boards. He was awarded a CBE on the Queen's Birthday Honours list in June 1952 for his services.

Mr J R Dunsford

Mr Dunsford commenced as General Manager in 1959 and held this position for almost four years until May 1963. He was then appointed as Director of the Lands Department, a large agency at that time.

In January 1971, Mr Dunsford was appointed as chairman of the "Produce Department Investigating Committee". This committee examined what future role the Government Produce Department should have and recommended that it should be wound up.

Mr Eric Charles Jeanes

Born 5 November 1910, Eric Charles Jeanes commenced employment with the Government Produce Department on 10 June 1936.

He enlisted in the Royal Australian Navy in 1941 serving as a Lieutenant throughout WW2, then recommenced his service at the Government Produce Department in July 1947²¹⁴.

On return from war service Mr Jeanes was appointed as Acting Works Manager at Port Lincoln, replacing Mr W E A Peck who had transferred to the Light Square Works Manager position. Mr Jeanes was the Works Manager at Port Lincoln for 17 years until 1963.

In August 1963, Mr Jeanes was appointed as General Manager. He held this position for 12 years until 20 October 1975 when the agency was closed ²¹⁵.

Mr Jeanes retired after providing 33 years of service to the Government Produce Department and died in 1985²¹⁶. His obituary was published in The Advertiser; 11 September 1985, P16.

Staff Numbers

Annual South Australian Parliamentary papers indicate that during the 1920s to 1970s the Government Produce Department employed approximately 40 staff in permanent management and clerical roles. This peaked at 56 permanent staff during the hectic years of WW2.

Large freezing plants operate 24 hours, with machinery operations requiring significant teams of weekly paid tradespeople. This includes engine drivers, firemen, electricians, carpenters, mechanical and other maintenance staff to operate and maintain boilers, refrigeration plant, cool rooms, freezers, abattoir chains, waste processing, and other machinery.

Abattoirs also employ large and varying numbers of casual butchers, packers and other staff who work in the killing, meat canning, and packing lines. Casual staff numbers employed varied from season to season and week to week depending on levels of livestock throughput.

Detailed records about these weekly paid and casual employees are not available. However, following are some indicative staff numbers published in annual reports:

- When the Port Adelaide abattoir was built in 1908, it had stands for 112 butchers on the killing floor and was expected to employ a total of 450 people when operating at peak capacity.
- In 1956, the Port Lincoln abattoir employed 87 full time and 224 casual staff. System upgrades to improve throughput resulted in a work force reduction to 80-90 full time staff plus 40-50 casuals for the 1965 lamb export season.

The Government Produce Department abattoir and freezer facilities were significant employers in the Port Adelaide and Port Lincoln communities.

LEGISLATION AND BOARDS INFLUENCING THE GOVERNMENT PRODUCE DEPARTMENT

Operation of abattoirs in South Australia during the 20th century was controlled by a complex and constantly changing array of state and federal legislation.

This section provides a brief overview of legislation influencing operation of the Government Produce Department between 1908 and 1975. Marketing meat in overseas countries was also influenced by Federal legislation and the Australian Meat Board.

Rationalising South Australia's Abattoir Legislation

The *Metropolitan Abattoirs Act 1908* established initial controls for the operation of abattoirs in South Australia. Under this Act, the Government Produce Department's Port Adelaide abattoir could only process stock for marketing overseas and could not sell carcases on the domestic market. Subsequent amendments to the *Metropolitan Abattoirs Act 1908* enabled establishment and operation of the Gepps Cross abattoir to process livestock for domestic markets.

This legislation disadvantaged both businesses. The Government Produce Department could not sell lower quality carcases unsuitable for export on the domestic market. It was forced to process these through canning or rendering, a major impediment to profitability. Similarly the Gepps Cross abattoir was unable to export carcases or meat products.

Legislative segregation of export and domestic abattoir operations was unique to South Australia. Meat exporters operating abattoirs in other states could trade openly on both domestic and export markets providing flexibility to direct various qualities of meat to the most appropriate and profitable market.

A Livestock Inquiry Committee investigated these marketing barriers and in 1933, a new *Metropolitan and Export Abattoirs Act 1933* merged the Port Adelaide and Gepps Cross abattoir operations to form the Metropolitan and Export Abattoirs Board, enabling trade on both domestic and export markets.

After this legislative restructuring, the Government Produce Department could source export meat from both its Port Lincoln abattoir (controlled under the *Port Lincoln Abattoirs Act 1937*) and the Gepps Cross abattoir.

The Metropolitan and Export Abattoirs Act was changed through many iterations to ultimately create the South Australian Meat Corporation in 1974.

Following the closure of the Government Produce Department on 20 October 1975, ownership of the Port Lincoln abattoir was transferred to the South Australian Meat Corporation in 1976, who operated this facility until it was closed in 1984 (see Government Produce Department Facilities - Port Lincoln Abattoir section for more detail).

The South Australian Meat Corporation operated the Gepps Cross abattoir and saleyards until early 1997 when they were sold.

After the sale of Gepps Cross, all South Australian abattoirs and saleyard facilities were privately owned and operated.

South Australian Legislation Impacting Abattoirs and the Government Produce Department

Below is a chronological list of South Australian legislation impacting operation of abattoirs and meat marketing in the 20th century. This constantly changing legislation influenced the competitiveness, profitability, and success of the Government Produce Department.

The Metropolitan Abattoirs Act 1908

The Metropolitan Abattoirs Act Amendment Act 1910

Abattoirs Act 1911

The Metropolitan Abattoirs Act Further Amendment Act 1911

The Metropolitan Abattoirs Act Further Amendment Act 1912

The Metropolitan Abattoirs Act Further Amendment Act 1914

Metropolitan Abattoirs Act Further Amendment Act 1916

Metropolitan Abattoirs Act Further Amendment Act 1927

Abattoirs Act 1930

Metropolitan and Export Abattoirs Act 1933

Metropolitan and Export Abattoirs Act 1936

Metropolitan and Export Abattoirs Act (Amendment Act) 1936

South Australian Meat Corporation Act 1936

Metropolitan and Export Abattoirs Amendment Act 1937

Port Lincoln Abattoirs Act 1937

Abattoirs Act Amendment Act 1938

Metropolitan and Export Abattoirs Amendment Act 1945

Abattoirs Act Amendment Act 1946

Abattoirs Act Amendment Act 1947

Metropolitan and Export Abattoirs Amendment Act 1948

Abattoirs Act Amendment Act 1950

Metropolitan and Export Abattoirs Amendment Act 1952

Metropolitan and Export Abattoirs Amendment Act 1954

Metropolitan and Export Abattoirs Amendment Act 1955

Metropolitan and Export Abattoirs Amendment Act 1956

Metropolitan and Export Abattoirs Amendment Act 1957

Metropolitan and Export Abattoirs Amendment Act 1958

Metropolitan and Export Abattoirs Amendment Act 1962

Metropolitan and Export Abattoirs Amendment Act 1964

Metropolitan and Export Abattoirs Amendment Act 1972

South Australian Meat Corporation (Sale of Assets) Act 1974

South Australian Meat Corporation Act Amendments Act 1974

Post 1975 Abattoir Legislation

After closure of the Government Produce Department in 1975, legislation controlling operation of South Australian abattoirs and the meat industry continued to evolve. Below is a list of post 1975 legislation. Disposal of the Port Lincoln abattoir property and facilities was controlled in this legislation.

South Australian Meat Corporation (Sale of Assets) Act 1976

South Australian Meat Corporation Act Amendments Act 1976

South Australian Meat Corporation (Sale of Assets) Act 1977

South Australian Meat Corporation Act Amendments Act 1977

Meat Hygiene Act 1980

South Australian Meat Corporation (Sale of Assets) Act 1980

South Australian Meat Corporation Act Amendments Act 1980

Abattoirs Act Amendment Act 1980

South Australian Meat Corporation Act Amendments Act 1981

South Australian Meat Corporation Act Amendment Act 1983

Meat Hygiene Amendment Act 1987

Meat Inspection (Commonwealth Powers) Act 1987

Meat Hygiene Act 1994

Meat Hygiene (Definition of Meat and Wholesome) Amendment Act 1995

South Australian Meat Corporation (Sale of Assets) Act 1996

South Australian Meat Corporation Act (Amendments Act) 1996

Meat Hygiene (Miscellaneous Amendments) Act 2004

Commonwealth Acts Influencing the Government Produce Department

The Government Produce Department in its role as a significant meat exporter was also influenced by Australian meat industry legislation. The main national legislation formed the Australian Meat Board on 30 June 1935 using the *Commonwealth Meat Export Control Act No 52 1935*.

Key functions of the Australian Meat Board were to:

- Regulate exports of Australian meat, meat products and edible offal.
- Report to the Minister on matters such as quality standards and grading of meat for export.
- Make recommendations about export programs.
- Collaborate with other boards or authorities on improvement of quality, preventing deterioration, transport, and promote sales of meat and offal products overseas.

The Australian Meat Board was a key contributor to a Standing Committee established by the British Government to coordinate supply of meat to the United Kingdom via²¹⁷:

- The Empire Meat Council to review existing trade agreements.
- A Standing Meat Conference of all countries supplying meat to the United Kingdom. This Conference was responsible for coordinating information on trends in supplies, prices, and production.

The Australian Meat Board along with representatives from State agencies also facilitated development of Australian meat exports through programs such as:

- Survey of the Australian lamb industry.
- Inquiry into causes of bruising of cattle and how to overcome this problem.
- Investigating quotas for importation of meat from Australia to the United Kingdom.
- identifying new market opportunities for Australia's surplus beef, lamb, mutton, and pig meats.

The Australian Meat Board inaugurated carcass competitions on a state basis to improve the quality of lamb and pig carcasses for export²¹⁸. The Government Produce Department coordinated with livestock breed groups and played a key role in delivery of lamb and pork carcass competitions in South Australia.

Contributions to Boards

Government Produce Department staff also provided input to a series of boards associated with South Australia's meat industry. This included:

South Australian Meat Export Board

The South Australian Meat Export Board was formed on 1 February 1931²¹⁹ to coordinate and stimulate South Australian meat exports and provide guidance to the Government Produce Department. This Board was made up of:

- Mr G A W Pope; General Manager Government Produce Department (Chairman).
- Mr E A Brooks; Stock Owners Association.
- Mr H J Copley; Stock Salesman's Association.
- Mr T Phelps; representing Exporters.

The South Australian Meat Export Board met regularly in the 1930s to identify strategies and improve export sales. By 1935-36, it had been operating for 5 years and was having a positive impact on export growth.

Farmers and the whole meat marketing chain faced difficult times due to drought in 1945. The SA Meat Marketing Board coordinated arrangements between all sectors of the supply chain to market poor quality stock, resulting in 105,700 head of sheep being approved for dehydrating while 210,725 were processed through canning operations²²⁰.

Coordination of Northern Territory Beef Production and Transport

Commencing in 1949, annual meetings coordinated production and transport of beef cattle from northern pastoral zones in South Australia and the Northern Territory. From 1951, the Government Produce Department facilitated these meetings under Ministerial authority²²¹.

Key objectives of these meetings were to:

- update cattle production estimates.
- assess train requirements and availability.
- identify rail improvement requirements.
- progress eradication of pleuro-pneumonia.
- coordinate receiving of store cattle into Southern districts for fattening.
- evaluate slaughtering requirements.

Participants in these meetings were:

- Metropolitan and Export Abattoirs Board,
- South Australian Department of Agriculture and Department of Lands
- South Australian Railways and Commonwealth Railways,
- Department of Primary Industries, Commonwealth Animal Industries Division,
- Northern Territory Administration,
- Centralian Pastoralists Association and Far Northern Cattlemen's Association,
- Australian Meat Board,
- South Australian Stock Salesman's Association,
- A Bureau of Agricultural Economics representative was added in 1960.

By 1960, road transport was the main way of moving cattle from northern districts reducing the need for this rail focussed group, and it was wound down.

REVIEW AND CLOSURE

Declining Competitiveness of the Government Produce Department

From the mid-1960s, the Government Produce Department was facing declining competitiveness and increasing losses. Private exporters were increasing market share in business that had been the traditional domain of the Government Produce Department. The 1966-67 annual report provides the following insight into these challenges²²²:

"As the policy of the Department has been to recover its costs and to provide the maximum returns to the producer, there has been ample scope for private enterprise to enter the marketing sphere and as the established markets have become remunerative, they have been taken over by private trading organisations.

Whilst there is considerable gain to the State from the trade pioneered by the Department, the Department has been left with these facets of trade that are not sufficiently remunerative to attract private industry. During 73 years of trading the financial results have varied considerably and the results of this year under review are among the unfavourable ones with an overall deficit of \$167,576".

A series of important factors contributed to declining profitability and the ultimate wind up of the Government Produce Department, included:

- accumulating debt and the overhead cost of interest payments.
- loss of the United Kingdom as the main market when it transitioned to the European Economic Union. Australian farm produce had great difficulty competing in the United Kingdom market because of the high European Union tariffs.
- the need to constantly upgrade abattoir facilities to maintain access to United States and other meat markets.
- declining competitiveness and throughput of the Port Lincoln abattoir.
- Growth of private abattoirs and export businesses that operated with more competitive labour arrangements and lower overhead costs.

These factors brought into question whether the South Australian Government should retain the Government Produce Department.

Establishment of an Investigating Committee

In January 1971, Minister of Agriculture Tom Casey appointed the South Australian Government Produce Department Investigating Committee to examine its operations with special emphasis on the Port Lincoln works.

This committee comprised:

Mr J R Dunsford, Director of Lands (Chairman).

Mr K M Lowe, Managing Director, City Meat Co Pty Ltd.

Mr C C Catt, Senior Lecturer in Economics, SA Institute of Technology.

Mr D Carter, Administrative Officer, Public Buildings Department (Secretary).

The Chairman of this committee, Mr Dunsford, had been the General Manager of the Government Produce Department between 1959 and 1963, before being promoted to Director of Lands, so had a good understanding of its operations.

The Committee's Terms of Reference were²²³:

- To advise on whether the reasons for the establishment of the Government Produce Department are now valid and to what degree (if any) the role of the Department should be revised, and its activities integrated with or transferred to other organisations.
- 2. To report on the Port Lincoln Branch with reference to:
 - (a) The causes for continuing financial losses, and recommend what action (if any) can be taken to make it an economically viable unit;
 - (b) The desirability of integrating the Branch with the Metropolitan and Export Abattoirs authority and the circumstances and conditions under which this could be achieved.
 - (c) Any alternative arrangement which could retain the industry operative at Port Lincoln.
- 3. To advise to what extent in the present marketing situation the Department should be involved, directly or indirectly, in the business of buying and selling meats. (The Committee should have particular regard to the export market for frozen and canned products and may wish to comment on shipping and export facilities).

The Investigating Committee delivered its final report to the South Australian Government on 6 March 1972.

Key Findings of the Government Produce Department Investigating Committee²²⁴

The Review Committee's report to the Minister of Agriculture recommended that:

- 1 The Government Produce Department be abolished.
- 2 Grain and flour inspection functions and staff be transferred to the Department of Agriculture Horticulture Branch.
- 3 Control of the Port Lincoln abattoir be removed from the Government Produce Department. The management and operation of Port Lincoln abattoir was subsequently transferred to South Australian Meat Corporation who operated the Gepps Cross abattoir. The Port Lincoln abattoir had been making significant losses for several years, and the South Australian Meat Corporation was supported with additional funding for 3 years to offset the operating losses being experienced at the Port Lincoln facility.
- 4 Meat trading and marketing activities be discontinued.

5 Remaining functions be transferred to the State Supply Department. This included the supply of meat, poultry and smallgoods to Government institutions, operation of the Light Square Cold Stores and leasing of cold storage space.

Wind Up Process – Post 1975 Outcomes

By 30 June 1975, the Government Produce Department had accumulated losses of \$3.58m. In the 5 years of operation between (1970-71 to 1974-75), total losses of \$1.663m were incurred. Much of this was attributable to the Port Lincoln abattoir. In the 10 years to 1975, \$1.493m was invested to upgrade facilities and equipment at Port Lincoln to meet compliance requirements of various export markets²²⁵.

The South Australian Government adopted the recommendations of the Government Produce Department Investigating Committee, and the Government Produce Department ceased operations on 20 October 1975.

Remnants of the Government Produce Department were transferred to the State Supply Division of the Services and Supply Department²²⁶. This included supply of meat and foods to Government institutions along with operation of the Light Square Cold Stores property and rental of cold storage space.

It was subsequently proposed to close the Light Square Cold Store on 30 June 1980²²⁷.

Grain inspection services and their functions were transferred to the South Australian Department of Agriculture on 1 July 1975, being placed within the Horticulture Inspection Team under leadership of the Chief Horticulture Officer²²⁸.

The Port Lincoln abattoir was transferred to the South Australian Meat Corporation via the *South Australian Meat Corporation Act Amendment Bill 1976*²²⁹. This Bill provided for the transfer of property, plant, staff and rights and liabilities under contract at the time. The legislative process required repeal of the *Port Lincoln Abattoirs Act 1937* and amendments to the *South Australian Meat Corporation Act 1936 – 1974*.

The South Australian Meat Corporation took over management of the Port Lincoln abattoir in 1977 and continued to develop production. A further review of the financial losses in 1979 set a deadline of 5 years for the business to return to profit. The Port Lincoln abattoir regained United States Department of Agriculture export approval in 1982 but continued to make losses. Port Lincoln abattoir was finally closed on 29 June 1984 with cumulative losses exceeding \$9m over the previous 10 years²³⁰.

FURTHER READING

Following are a series of references that can provide additional information about the Government Produce Department and other abattoir operations within South Australia.

Anon The Golden Jubilee of the export by the South Australian

Government Produce Department of meat, apples, pears and other perishable produce; Government Produce Department; SA

Archives GRG20/101, 1893 to 1944.

Anon Report on the operations of the South Australian Meat

Corporation's abattoir at Port Lincoln; Department of Economic Development; State Library of SA Ref No 333.7616649 S726b;

April 1979.

Annual Reports Annual Reports have been published by the Minister of

Agriculture under a variety of titles including London Wine and Produce Depot, Produce Export Department, Adelaide Produce Export Department and Government Produce Department.

Annual Reports between 1891 and 1975 were published in

annual South Australian Parliamentary Papers.

Abattoirs web site
Australian Abattoirs – Chronological History of Australian

Abattoirs and Meatworks. https://australianabattoirs.com

Barker W C The Government Produce Department; How it has helped the

Primary Producer and justified its establishment. Government

Produce Department. SA Archives GRG20/105; 25th

Anniversary 1921.

Barnard Alan "Mort, Thomas Sutcliffe (1816-1878)"; Australian Dictionary of

Biography; Vol 3 1974.

Hancock J & Richards E "McCann, Sir Charles Francis (1880 – 1951)"; Australian

Dictionary of Biography; Vol 10, 1986.

Jeanes E C Manuscript: "A Brief History of the South Australian Government

Produce Department"; Government Produce Department; SA

Archives GRG20/101; 1965.

Legislative Assembly Second Reading Speech, Metropolitan and Export

Abattoirs Bill 1933, 22 November 1933, P 2359-66.

Maurovic R A History of the Gepps Cross Abattoirs and Livestock Markets.

Wakefield Press, ISBN 978-1-86254-726-1, 2007.

Pope G A W The History of the Government Produce Department and the

Perishable Produce Industries of South Australia; Government Produce Department report; SA Archives GRG20/99; 1893 to

1927; 1 August 1928.

DECIMALISATION AND METRICATION

Because the history of the Government Produce Department covers the period 1895 to 1975, much of this article expresses currency and measurements in imperial formats.

Australia replaced the imperial currency of pounds, shillings and pence with decimal dollars and cents in February 1966.

The conversion from imperial to metric measurements and standards commenced in 1970, with most agricultural industries making the conversion to metric by 1974.

For readers unfamiliar with imperial measurements and currency, below are conversions for significant imperial measurements.

Currency

Imperial: 1 pound (£) = 20 shillings (/-) 1 shilling (/-) = 12 pence (d)

Decimal: 1 dollar (\$) = 100 cents (c)

Conversion: £1 pound = \$2 dollars at the time of conversion in February 1966

Common Farm Imperial to Metric Conversions

Measurements	Area
1 inch = 25.4 millimetres	1 square foot = 929 square centimetres
1 foot = 30.48 centimetres	1 square yard = 0.84 square metres
1 yard = 0.914 metres	1 acre = 0.4 hectare
1 chain = 20.1 metres	
1 mile = 1.6 kilometres	

Mass	Volume
1 pound = 0.45 kilograms	1 pint = 0.55 litres
1 hundredweight (112 lb) = 50.8 kilograms	1 gallon = 4.546 litres
1 ton = 1,016 kilograms	1 bushel = 35.24 litres

The change to metric measurement impacted several aspects of farm management. Changing land area measurement from acres to hectares (1 hectare = 2.47 acres) influenced how many farming operations such as seeding and fertilizing rates were expressed.

Changes to yield measurement was one of the most challenging for farmers. When grain industries switched to bulk handling, measurement of grain yields moved from volumetric bushels or bags per acre to mass based tonnes per hectare. This overcame the confusing issue of a bushel of oats, barley and wheat having different weights.

AUTHORS

Lead Author: Barry Philp

Other Contributors: Mr Chris Mantle, Port Lincoln History Group

Mr Colin Gill, Port Lincoln History Group

Mr Rod Waters, Port Lincoln History Group

Referee contributions and editorial assistance were received from many members of the PIRSA History

Group

Date: October 2023

ACKNOWLEDGEMENTS

Port Lincoln History Group

Special thanks are extended to Mr Chris Mantle, Mr Rod Waters and members of the Port Lincoln History Group for their assistance. They provided information and numerous photographs of the Port Lincoln Abattoir buildings and facilities. Group member Mr Colin Gill who worked at the Port Lincoln Abattoir between 1955 and 1977 and was able to provide "first-hand" knowledge about operations at the facility. The Port Lincoln History Group holds a large collection of the Port Lincoln Abattoir photographs.

portlincolnhistory@gmail.com PO Box 2882, Port Lincoln SA 5606

State Library of South Australia

The State Library of South Australia was a valuable source of photographs, articles and documents. The SA Government Produce Department Investigating Committee report that commenced wind up of the Government Produce Department was particularly valuable.

https://www.slsa.sa.gov.au/home Corner North Terrace and Kintore Ave, Adelaide.

State Records of South Australia

Special thanks are extended to the research team at State Records of South Australia for their assistance in tracing many unpublished manuscripts and a host of annual and other reports.

https://www.archives.sa.gov.au Research Centre, 115 Cavan Road, Gepps Cross

Trove - National Library of Australia

Numerous newspaper articles about the Government Produce Department were sourced from the National Library of Australia's Trove website.

https://trove.nla.gov.au

REFERENCES

- ¹ Barnard A.; Australian Dictionary of Biography; Vol 3 1974 "Thomas Sutcliffe Mort"
- ² SA Agricultural Bureau, Annual Report 1890-91, P11.
- ³ SA Agricultural Bureau, Annual Report 1891-92, P8.
- ⁴ Pope G A W; "The History of the Government Produce Department and the Perishable Produce Industries 1893-1927" manuscript; 1927; P 1.
- ⁵ Pope G A W; "The History of the Government Produce Department and the Perishable Produce Industries 1893-1927" manuscript; 1927; P 2.
- ⁶ "Export Industries Fostered for Fifty Years Expansion in Meat and Fruit Products"; Chronicle; 20 Dec 1945; P 9; by G A W Pope.
- ⁷ Pope G A W; "The History of the Government Produce Department and the Perishable Produce Industries 1893-1927" manuscript; 1927; P 2.
- ⁸ Butter Bonus Bill 1893 Second Reading.
- ⁹ Butter Bonus Act 1893.
- ¹⁰ Pope G A W; The History of the Government Produce Department and the Perishable Produce Industries of South Australia; Government Produce Department report; SA Archives.
- ¹¹ Minister of Agriculture; Government Produce Department, Annual Report 1900-01; P 17.
- ¹² Minister of Agriculture; Government Produce Department, Annual Report 1926-27 P35.
- ¹³ Minister of Agriculture Government Produce Department Annual Report 1926-27 P35.
- ¹⁴ Minister of Agriculture Government Produce Department Annual Report 1927-28 P41.
- ¹⁵ Minister of Agriculture; Government Produce Department, Annual Report 1929-30 P42.
- ¹⁶ "Light Square Ice Works Correspondence Regarding Purchase"; Evening Journal; 17 Aug 1910; P 4.
- ¹⁷ Minister of Agriculture; Government Produce Department, Annual Report 1928-29 P42.
- ¹⁸ "Government Produce Department Its Functions and Administration"; W L Price; The Adelaide Chronicle; 6 Aug 1942; P 4.
- ¹⁹ Parliamentary Paper 4; Government Produce Department: Annual Report 1974-75 P 193.
- ²⁰ Minister of Agriculture; Government Produce Department Annual Report 1899-1900, P 30.
- ²¹ Minister of Agriculture; Government Produce Department Annual Report; 1901-02 P 27.
- ²² Minister of Agriculture; Government Produce Department Annual Report; 1919-20 P 73.
- ²³ Minister of Agriculture; Government Produce Department Annual Report; 1920-21 P 73.
- ²⁴ Minister of Agriculture; Government Produce Department Annual Report; 1939-40 P 35
- ²⁵ Minister of Agriculture; Government Produce Department Annual Report; 1931-32 P43.

- ²⁶ Minister of Agriculture; Government Produce Department Annual Report; 1945-46 P 37.
- ²⁷ Minister of Agriculture; Government Produce Department Annual Report; 1945-46 P 27.
- ²⁸ Minister of Agriculture Government Produce Department Annual Report 1946-47 P 43.
- ²⁹ Minister of Agriculture; Government Produce Department Annual Report; 1945-46 P 37.
- ³⁰ Minister of Agriculture Government Produce Department Annual Report 1946-47 P 34 & 37.
- ³¹ Minister of Agriculture Government Produce Department Annual Report 1947-48 P 40.
- ³² Minister of Agriculture Government Produce Department Annual Report 1951-52 P 44.
- ³³ Minister of Agriculture Government Produce Department Annual Report 1951-52 P 55.
- ³⁴ Minister of Agriculture Government Produce Departments Annual Reports 1953 to 1960 "Record of Produce Treated and Shipped".
- ³⁵ Minister of Agriculture; Government Produce Department Annual Report; 1954-55 P 50.
- ³⁶ Minister of Agriculture; Government Produce Department Annual Report; 1962-63 P 70.
- ³⁷ Parliamentary Paper 4; Government Produce Department Annual Report; 1974-75; P 193.
- ³⁸ Minister of Agriculture; Government Produce Department Annual Report; 1909-10 P 79.
- ³⁹ "Export Industries Fostered for Fifty Years Expansion in Meat and Fruit Products"; G A W Pope; Chronicle; 20 Dec 1945; P 9.
- ⁴⁰ Minister of Agriculture; Government Produce Department Annual Report; 1914-15 P 75.
- ⁴¹ Minister of Agriculture Government; Produce Department Annual Report; 1941-42 P 24.
- ⁴² 50 Cattle Slaughtered Weekly at Pt Lincoln Freezing Works; Pt Lincoln Times; 13 Apr 1942; P 1.
- ⁴³ Minister of Agriculture; Government Produce Department Annual Report; 1943-44 P 29.
- ⁴⁴ Parliamentary Paper 55; Government Produce Department; Annual Report; 1968-69 P 8.
- ⁴⁵ Minister of Agriculture; Government Produce Department; Annual Report; 1914-15 P 78.
- ⁴⁶ Australian Abattoirs Website; Gepps Cross; 1914.
- ⁴⁷ Minister of Agriculture; Government Produce Department; Annual Report; 1936-37 P 62.
- ⁴⁸ Minister of Agriculture; Government Produce Department; Annual Report 1945-46 P 42
- ⁴⁹ Minister of Agriculture; Government Produce Department; Annual Report 1947-48 P 44.
- ⁵⁰ Australian Abattoirs Website; "Factors Affecting Operations"; Gepps Cross; 1948.

- ⁵¹ Minister of Agriculture; Government Produce Department; Annual Report; 1964-65 P 64.
- ⁵² SA Parliamentary Paper 55; Government Produce Department; Annual Report; 1968-69 P 8.
- ⁵³ Minister of Agriculture; Government Produce Department; Annual Report; 1939-40 P 46.
- ⁵⁴ Minister of Agriculture; Government Produce Department; Annual Report; 1937-38 P45.
- ⁵⁵ Minister of Agriculture; Government Produce Department; Annual Report 1938-39 P 52 & 54.
- ⁵⁶ Minister of Agriculture; Government Produce Department; Annual Report 1936-37 P 61.
- ⁵⁷ Minister of Agriculture; Government Produce Department) Annual Report 1937-38 P45.
- ⁵⁸ Minister of Agriculture; Government Produce Department; Annual Reports 1940-41 and 1944-45.
- ⁵⁹ Minister of Agriculture; Government Produce Department; Annual Report 1946-47 P 34.
- ⁶⁰ Minister of Agriculture; Government Produce Department; Annual Report 1949-50 P 49.
- ⁶¹ Minister of Agriculture; Government Produce Department; Annual Report 1954-55 P 50.
- ⁶² Minister of Agriculture; Government Produce Department; Annual Report 1964-65 P 65.
- ⁶³ Minister of Agriculture; Government Produce Department; Annual Report 1908-9 P 51.
- ⁶⁴ Minister of Agriculture; Government Produce Department; Annual Report; 1937-38 P 57.
- ⁶⁵ Minister of Agriculture; Government Produce Department; Annual Report; 1938-39 P 63.
- ⁶⁶ Minister of Agriculture; Government Produce Department; Annual Report; 1896-97, P38.
- ⁶⁷ Minister of Agriculture; Government Produce Department; Annual Report 1913-14, P 80.
- 68 Rabbit Freezing at Pt Lincoln: The Advertiser: 19 Dec 1934: P 28.
- ⁶⁹ Port Lincoln Freezing Works; Port Lincoln Times; 6 Jan 1939; P 1.
- ⁷⁰ Minister of Agriculture; Government Produce Department; Annual Report 1939-40, P 47.
- ⁷¹ Minister of Agriculture; Government Produce Department; Annual Report; 1912-13, P 85.
- ⁷² Minister of Agriculture; Government Produce Department; Annual Report; 1938-39; P.64
- ⁷³ Minister of Agriculture; Government Produce Department; Annual Report; 1943-44 P 25.
- ⁷⁴ Minister of Agriculture; Government Produce Department; Annual Report; 1950-51 P 51.
- ⁷⁵ Minister of Agriculture; Government Produce Department; Annual Report; 1952-53 P 53.
- ⁷⁶ Minister of Agriculture; Government Produce Department; Annual Report; 1953-54 P 58

- ⁷⁷ Minister of Agriculture; Government Produce Department; Annual Report; 1955-56 P 56.
- ⁷⁸ Parer I, Conolly D, & Sobey W R; Myxamotosis: the Effects of Annual Introductions of an Immunizing Strain and a Highly Virulent Strain of Myxamotona Virus in Rabbit Populations; Aust.Wildlife Res; 1985; 12; 407-23.
- ⁷⁹ Minister of Agriculture; Government Produce Department; Annual Report; 1936-37 P 63.
- ⁸⁰ Minister of Agriculture; Government Produce Department; Annual Report; 1943-44 P 25.
- ⁸¹ Minister of Agriculture; Government Produce Department; Annual Report; 1947-48 P 40.
- ⁸² Minister of Agriculture; Government Produce Department; Annual Report; 1955-56 P 62.
- ⁸³ Minister of Agriculture; Government Produce Department; Annual Report; 1962-63 P 73.
- ⁸⁴ SA Parliamentary Paper 55; Government Produce Department Annual Report; 1968-69; P 9.
- *5 "Export Industries Fostered for Fifty Years Expansion in Meat and Fruit Products"; G A W Pope; Chronicle; 20 Dec 1945; P 9.
- ⁸⁶ Government Produce Department Important Development; Chronicle; 6 Aug 1910; P 8.
- ⁸⁷ Minister of Agriculture; Government Produce Department; Annual Reports 1920 to 1930.
- ⁸⁸ Minister of Agriculture; Government Produce Department; Annual Report; 1935-36 P 76.
- 89 Freezing Plant Installed in Port Lincoln; Port Lincoln Times; 25 Sep 1936; P 2.
- ⁹⁰ Minister of Agriculture; Government Produce Department; Annual Reports 1936-37 and 1937-38.
- ⁹¹ Port Lincoln Freezing Works; Port Lincoln Times; 6 Jan 1939; P 1.
- ⁹² Pt Lincoln Freezing Works Extension Being Considered; Pt Lincoln Times; 12 Dec 1940; P 1.
- ⁹³ Minister of Agriculture; Government Produce Department; Annual Reports; 1949-50 to 1955-56.
- ⁹⁴ Minister of Agriculture; Government Produce Department; Annual Report; 1939-40, P 49.
- ⁹⁵ Minister of Agriculture; Government Produce Department Annual Report; 1899-1900; P 24.
- ⁹⁶ "Export Industries Fostered for Fifty Years Expansion in Meat and Fruit Products"; G A W Pope; Chronicle; 20 Dec 1945; P 9.
- ⁹⁷ Minister of Agriculture; Government Produce Department; Annual Report; 1923-24, P83.
- ⁹⁸ Minister of Agriculture; Government Produce Department; Annual Report; 1925-26; P 45.
- ⁹⁹ Minister of Agriculture; Government Produce Department; Annual Report; 1929-30 P 45 & 46.
- ¹⁰⁰ Minister of Agriculture; Government Produce Department; Annual Report; 1932-33 P 55.
- ¹⁰¹ Minister of Agriculture; Government Produce Department; Annual Report; 1933-34 P55.

- ¹⁰² Minister of Agriculture; Government Produce Department; Annual Reports; 1934-35 P 65, 1935-36 P65, 1937-38 P 57.
- ¹⁰³ Minister of Agriculture; Government Produce Department; Annual Reports; 1936-37 P63, 1937-38 P 57, 1938-39 P65.
- ¹⁰⁴ "Export Industries Fostered for Fifty Years Expansion in Meat and Fruit Products"; G A W Pope; Chronicle; 20 Dec 1945; P 9.
- ¹⁰⁵ Minister of Agriculture; Government Produce Department; Annual Report; 1939-40 P 48.
- ¹⁰⁶ Minister of Agriculture; Government Produce Department; Annual Report; 1939-40 P 48.
- ¹⁰⁷ Minister of Agriculture; Government Produce Department; Annual Report; 1941-42 P 23.
- ¹⁰⁸ Minister of Agriculture; Government Produce Department; Annual Report; 1943-44 P 30.
- ¹⁰⁹ Minister of Agriculture; Government Produce Department; Annual Report; 1953-54 P 55.
- ¹¹⁰ Minister of Agriculture; Government Produce Department; Annual Report; 1954-55 P 60.
- ¹¹¹ Minister of Agriculture; Government Produce Department; Annual Report; 1958-59 P 59.
- ¹¹² Source: Minister of Agriculture; Government Produce Department Annual Report; 1964-65; P 67.
- ¹¹³ Source: Minister of Agriculture; Government Produce Department Annual Report; 1974-75; P 194.
- ¹¹⁴ "Export Industries Fostered for Fifty Years Expansion in Meat and Fruit Products"; G A W Pope; Chronicle; 20 Dec 1945; P 9.
- ¹¹⁵ Minister of Agriculture; Government Produce Departments; Annual Report; 1922-23 P 79.
- ¹¹⁶ Minister of Agriculture; Government Produce Department; Annual Report; 1954-55 P 60.
- ¹¹⁷ Parliamentary Paper 55; Government Produce Department Annual Report; 1968-69; P 11.
- ¹¹⁸ Minister of Agriculture; Government Produce Department; Annual Report; 1914-15 P 83.
- ¹¹⁹ Minister of Agriculture; Government Produce Department; Annual Report; 1924-25; P87.
- ¹²⁰ Minister of Agriculture; Government Produce Department; Annual Report 1928-29 P50.
- ¹²¹ Minister of Agriculture; Government Produce Department; Annual Report 1928-29 P44.
- ¹²² Minister of Agriculture; Government Produce Department; Annual Report 1952-53 P 53.
- ¹²³ Minister of Agriculture; Government Produce Department; Annual Report 1909-10 P 79.
- ¹²⁴ Minister of Agriculture; Government Produce Department; Annual Report; 1957-58; P 71.
- ¹²⁵ Minister of Agriculture; Government Produce Department; Annual Report; 1958-59; P 62.
- ¹²⁶ Minister of Agriculture; Government Produce Department; Annual Reports; 1959 to 1964.

- ¹²⁷ SA Parliamentary Papers 55; Government Produce Department Annual Report; 1968-69; P 10.
- ¹²⁸ The Advertiser 6 Sept 1900 P 5.
- ¹²⁹ Light Square Ice Works Correspondence Regarding Purchase; Evening Journal; 17 August 1910; P 4.
- ¹³⁰ The Adelaide Chronicle; 30 Dec 1911; P 42.
- ¹³¹ Minister of Agriculture; Government Produce Department; Annual Report; 1924-25; P87.
- ¹³² Minister of Agriculture; Government Produce Department; Annual Report; 1935-36: P76.
- ¹³³ Minister of Agriculture; Government Produce Department; Annual Report; 1939-40: P 35.
- ¹³⁴ Minister of Agriculture; Government Produce Department; Annual Report; 1958-59; P64.
- ¹³⁵ Minister of Agriculture; Government Produce Department; Annual Report; 1964-65 P 69.
- ¹³⁶ Parliamentary Papers No 55; Government Produce Department; Annual Report; 1965-66; P 13.
- ¹³⁷ Minister of Agriculture; Government Produce Department; Annual Report; 1963-64 P 77.
- ¹³⁸ Australian Abattoirs Website; Factors Affecting Operations, South Australia"; 15 September 2016.
- ¹³⁹ Minister of Agriculture; Government Produce Department; Annual Report; 1906-07; P 33.
- ¹⁴⁰ Minister of Agriculture; Government Produce Department; Annual Report; 1924-25: P 93.
- ¹⁴¹ Minister of Agriculture; Government Produce Department; Annual Report; 1934-35; P 74.
- ¹⁴² The Freezing Works Immense Additions Good Progress Made; The Advertiser; 19 Jun 1908; P 6.
- ¹⁴³ Government Works at Pt Adelaide; The Register; 4 Aug 1908; P 6.
- ¹⁴⁴ "Export Industries Fostered for Fifty Years Expansion in Meat and Fruit Products"; G A W Pope; Chronicle; 20 Dec 1945; P 9.
- ¹⁴⁵ The Chronicle; 24 July 1909; P 42.
- ¹⁴⁶ Minister of Agriculture; Government Produce Department; Annual Report; 1909-10, P 66 & 79.
- ¹⁴⁷ "Meat Canning in SA War May Permit Revival"; The Advertiser; 22 April 1940; P 18.
- ¹⁴⁸ Australian Abattoirs Website; "Factors Affecting Operations"; Gepps Cross; 1941 and 1943.
- ¹⁴⁹ Minister of Agriculture; Government Produce Department; Annual Report; 1941-42 P 24.
- ¹⁵⁰ Minister of Agriculture; Government Produce Department; Annual Report; 1923-24: P8.
- ¹⁵¹ Minister of Agriculture; Government Produce Department; Annual Report; 1924-25; P 88.
- ¹⁵² Australian Abattoirs Website; "Factors Affecting Operations, South Australia"; 15 September 2016.
- ¹⁵³ Minister of Agriculture; Government Produce Department Annual Report; 1933-34; P52

- ¹⁵⁴ Metropolitan and Export Abattoirs Bill 1933.
- ¹⁵⁵ Australian Abattoirs Website; "Factors Affecting Operations, South Australia"; 15 September 2016.
- 156 Freezing Works Go; The Advertiser; 25 Jul 1939; P24.
- ¹⁵⁷ Sale of Freezing Works Equipment; The Advertiser; 1 Dec 1938; P 1.
- ¹⁵⁸ Minister of Agriculture; Government Produce Department; Annual Report; 1938-39; P 51.
- ¹⁵⁹ Australian Abattoirs Website; "Factors Affecting Operations, South Australia"; 15 Sept 2016.
- ¹⁶⁰ Minister of Agriculture; Government Produce Department; Annual Report; 1938-39; P 52.
- ¹⁶¹ Export Industries Fostered for Fifty Years Expansion in Meat and Fruit Products; G A W Pope: Chronicle; 20 December 1945; P 9.
- ¹⁶² Port Lincoln Freezing Works Findings of the Committee; West Coast Sentinel (Streaky Bay); 3 Aug 1928; P 1.
- ¹⁶³ Freezing Works Port Lincoln Venture Government Control Recommended; The Advertiser; 1 Aug 1928; P 17.
- ¹⁶⁴ Establishment Too Soon; The News; 2 Feb 1928; P 17.
- ¹⁶⁵ Minister of Agriculture; Government Produce Department; Annual Report; 1928-29; P 44.
- ¹⁶⁶: Minister of Agriculture; Government Produce Department; Annual Report; 1930-31; P 46.
- ¹⁶⁷ Minister of Agriculture; Government Produce Department; Annual Report; 1938-39; P 70.
- ¹⁶⁸ Minister of Agriculture; Government Produce Department; Annual Report; 1939-40: P 35.
- ¹⁶⁹ Sir Charles McCann on Eyre Peninsula Port Lincoln Freezing Works; The Chronicle; 24 Dec 1942; P 5.
- ¹⁷⁰ Minister of Agriculture; Government Produce Department; Annual Report; 1954-55; P 55.
- ¹⁷¹ Minister of Agriculture; Government Produce Department; Annual Report; 1958-59 P 64.
- ¹⁷² Minister of Agriculture; Government Produce Department; Annual Report; 1958-59 P 64.
- ¹⁷³ Minister of Agriculture; Government Produce Department; Annual Report; 1963-64; P 77.
- ¹⁷⁴ Minister of Agriculture; Government Produce Department; Annual Report; 1963-64; P 77.
- ¹⁷⁵ Minister of Agriculture; Government Produce Department; Annual Report; 1964-65; P 70.
- ¹⁷⁶ Minister of Agriculture; Government Produce Department; Annual Report; 1963-64 P 77.
- ¹⁷⁷ Minister of Agriculture; Government Produce Department; Annual Report 1938-39; P 51
- ¹⁷⁸ Visit of Inspection to the Tuna Factory and Freezing Works; Port Lincoln Times; 11 Apr 1940; P 1.
- ¹⁷⁹ Port Lincoln Fisheries Limited; Port Lincoln Times; 28 August 1941; P 7.
- ¹⁸⁰ Minister of Agriculture; Government Produce Department Annual Report; 1974-75; P 190.

- ¹⁸¹ Minister of Agriculture; Government Produce Department; Annual Report; 1930-31; P 45.
- ¹⁸² Minister of Agriculture; Government Produce Department Annual Report; 1938-39; P 51
- ¹⁸³ Minister of Agriculture; Government Produce Department; Annual Report; 1946-47 P 44.
- ¹⁸⁴ Minister of Agriculture; Government Produce Department; Annual Report; 1949-50; P 52.
- ¹⁸⁵ Parliamentary Papers 4; Government Produce Department; Annual Report; 1974-75.
- ¹⁸⁶ SA Public Service Board Docket 358B/1973.
- ¹⁸⁷ Report on the Operations of the South Australian Meat Corporation's Abattoir at Port Lincoln, SA Dept of Economic Development, May 1979.
- ¹⁸⁸ Australian Abattoirs Web Site; Pt Lincoln Abattoirs.
- ¹⁸⁹ Minister of Agriculture; Department of Agriculture; Annual Report; 1894-95; P26).
- ¹⁹⁰ Minister of Agriculture; Government Produce Department; Annual Report; 1899-1900; P 24.
- ¹⁹¹ Minister of Agriculture; Government Produce Department; Annual Report; 1903-04; P 20.
- ¹⁹² Australia High Commission; UK; website.
- ¹⁹³ Minister of Agriculture; Government Produce Department; Annual Report; 1919-20; P 74.
- ¹⁹⁴ "South Australia New London Headquarters"; The Telegraph (Brisbane) 21 May 1935; P 8
- ¹⁹⁵ "V2 Near SA Office in London"; The News Adelaide; 21 March 1945; P3
- ¹⁹⁶ Unpublished Manuscript: The History of the Government Produce Department and the Produce Industries of SA 1893 1927; G A W Pope; 1927; P 31.
- ¹⁹⁷ Minister of Agriculture; Government Produce Department; Annual Report; 1919-20; P 73.
- ¹⁹⁸ Minister of Agriculture; Government Produce Department; Annual Report; 1934-35; P 54.
- ¹⁹⁹ Minister of Agriculture; Government Produce Department; Annual Report; 1933-34; P 54.
- ²⁰⁰ Minister of Agriculture; Government Produce Department; Annual Report; 1937-38; P 53.
- ²⁰¹ Minister of Agriculture; Government Produce Department; Annual Report; 1933-34; P53.
- ²⁰² Minister of Agriculture; Government Produce Department; Annual Report; 1938-39; P 52.
- ²⁰³ Minister of Agriculture; Government Produce Department; Annual Report; 1901-02; P 27.
- ²⁰⁴ Minister of Agriculture; Government Produce Department; Annual Report; 1914-15; P85.
- ²⁰⁵ Minister of Agriculture; Government Produce Department; Annual Report; 1939-40; P 38.
- ²⁰⁶ Minister of Agriculture; Government Produce Department; Annual Report; 1941-42; P 21.
- ²⁰⁷ Minister of Agriculture; Government Produce Department; Annual Report; 1943-44; P 25.

- ²⁰⁸ Minister of Agriculture; Government Produce Department; Annual Report; 1944-45: P 21.
- ²⁰⁹ Minister of Agriculture; Government Produce Department; Annual Report;1922-23; P 75.
- ²¹⁰ Minister of Agriculture; Government Produce Department; Annual Report; 1932-33 P 55.
- ²¹¹ Hancock J & Richards E; "McCann, Sir Charles Francis (1880 1951)"; Australian Dictionary of Biography; Vol 10, 1986.
- ²¹² Minister of Agriculture; Government Produce Department; Annual Report; 1947-48; P 41.
- ²¹³ Minister of Agriculture; Government Produce Department; Annual Report; 1943-44; P 27.
- ²¹⁴ The Mail; 19 July 1947; P 4.
- ²¹⁵ SA Public Service Board Docket 358D/1975.
- ²¹⁶ The Advertiser; 11 September 1985, P16.
- ²¹⁷ Minister of Agriculture; Government Produce Department; Annual Report; 1935-36: P 55.
- ²¹⁸ Minister of Agriculture; Government Produce Department Annual Report; 1937-38; P 46.
- ²¹⁹ Minister of Agriculture; Government Produce Department; Annual Report; 1930-31: P39.
- ²²⁰ Minister of Agriculture; Government Produce Department; Annual Report; 1944-45; P 26.
- ²²¹ Minister of Agriculture; Government Produce Department; Annual Report; 1957-58; P 62.
- ²²² Parliamentary Paper; Government Produce Department; Annual Report; 1967-68; P 10
- ²²³ SA Department of Agriculture; Docket No 509/1970.
- ²²⁴ SA Public Service Board Docket No 358C/73.
- ²²⁵ Parliamentary Papers 4; Government Produce Department; Annual Report; 1974-75.
- ²²⁶ South Australian Meat Corporation Act Amendment Bill 1976.
- ²²⁷ Dept of Service and Supply; Docket No PSB338B/73; 8 Feb 1980.
- ²²⁸ SA Department of Agriculture; Government Produce Department; Minute 9/73.
- ²²⁹ House of Assembly 24 Nov 1976; P 2447.
- ²³⁰ Australian Abattoirs website; Chronological History of Australian Abattoirs and Meatworks; Category Archives; Factors Affecting Operations; Gepps Cross; P 26/39.