TRADE, TRANSPORT, AND COMMUNICATIONS

Retail Trade

Census of Retail Establishments

General

Statistics of retail sales have been compiled for the years 1947–48, 1948–49, 1952–53, 1956–57, and 1961–62 from returns supplied by all retail establishments in Australia.

In general terms, these Censuses have covered the trading activities of establishments which normally sell goods at retail to the general public from shops, rooms, kiosks, and yards. Particulars of retail sales obtained from these Censuses are designed principally to cover sales to the final consumer of new and second-hand goods generally used for household and personal purposes. For this reason, sales of building materials, farm and industrial machinery and equipment, earth-moving equipment, etc., have been excluded from this and previous Censuses. For the same reason, and also because of difficulties in obtaining reliable and complete reporting, sales of builders' hardware and supplies, business machines and equipment, grain, feed, fertilizers and agricultural supplies, and tractors have been excluded from the 1961–62 Census. Retail sales of motor vehicles, parts, etc., are included whether for industrial, commercial, farm, or private use.

In order to make a comparison between the 1956–57 and 1961–62 Retail Census results, it has been necessary to revise some figures for 1956–57 published previously to take account of the changes in scope in the 1961–62 Census mentioned above.

The first table of the two Censuses shows the number of establishments selling goods in each of 30 broad commodity groups, the value of these sales, and the value of sales per head of population. The numbers shown for each commodity group represent the total number of Census returns which recorded sales in that particular commodity group. Some retailers selling small quantities of particular commodities may not show these sales separately in their returns. Therefore, the particulars of number of establishments which sold goods in each commodity group should not be regarded as more than an approximate indication of the pattern of retail outlets for those commodity groups. In general, this factor would not have a significant effect on particulars of the value of sales for each commodity group.

VICTORIA—CENSUSES OF RETAIL ESTABLISHMENTS: ESTABLISHMENTS AND SALES BY COMMODITY GROUPS*

			Value	of Retail	Sales of C	Goods
Commodity Group†	Numb Establis	er of hments	To	tal	Per H Popu	ead of lation
	1956–57	1961–62	1956–57	1961-62	1956–57	1961–62
			\$'0	00	\$	3
Foodstuffs—		0.010	100.000		60.6	70 6
Groceries	8,134	8,819	180,068	232,608 123,854	68.6 38.4	78.6 41.8
Butchers' Meat	2,589	3,674	100,528	56,748	17.4	19.2
Fresh Fruit and Vegetables Bread, Cakes and Pastry	3,683 6,127	4,429 7,725	45,726 43,652	54,898	16.6	18.6
0 6	8,634	10,434	55,806	75,484	21.2	25.6
Other Types of Food	3,952	5,606	26,850	38,418	10.2	13.0
Beer, Tobacco, etc.—	3,552	2,000	20,030	50,110	10.2	10.0
Beer, Wine and Spirits	2,119	2,106	126,992	151,702	48.4	51.2
Tobacco and Cigarettes	13,450	16,003	58,460	73,170	22.2	24.8
Clothing, Drapery, etc.—	10,.50	70,000	20,400	75,170		
Clothing-Men's and Boys' Wear	2,303	2,376	66,872	78,082	25.4	26.4
Clothing-Women's, Girls', and	.,	_,	,	,		
Infants' Wear	3,589	3,502	110,586	126,298	42.2	42.6
Drapery, Piece Goods, etc	1,796	2,327	41,978	54,310	16.0	18.4
Footwear-Men's and Boys'	1,509	1,724	12,518	15,774	4.8	5.4
Footwear-Women's, Girls', and	· ·	,	12,010	,		
Infants'	1,306	1,453	22,352	31,328	8.6	10.6
Hardwaret, Electrical Goods, etc			,			
Domestic Hardware, etc	2,713	3,247	34,272	39,904	13.0	13.4
Radios, Radiograms, etc.	1,262	1,244	10,046	8,560	3.8	2.8
Television and Accessories	777	1,226	19,696	27,584	7.6	9.4
Musical Instruments, etc	539	503	5,536 14,242	5,460	2.2	1.8
Domestic Refrigerators	1,160	1,175	14,242	18,828	5.4	6.4
Other Electrical Goods, etc	2,142	2,303	20,976	34,058	8.0	11.6
Furniture and Floor Coverings-	1.000	4.075			١	
Furniture (Including Mattresses)	1,002	1,076	37,782	44,700	14.4	15.0
Floor Coverings	738	827	18,906	21,452	7.2	7.2
Other Goods—	2 971	2 000	42.562	72 600	16.2	24.8
Chemists' Goods	2,871 3,026	3,990 3,524	42,562	73,688 51,708	16.2 16.4	17.4
Newspapers, Books and Stationery	3,026	3,324	43,002	31,708	10.4	17.4
Sporting Requisites and Travel	1 107	1,275	0.504	11110	3.2	3.8
Jewellery, Watches, and Clocks	1,197 1,254	1,396	8,584	11,140	6.0	6.0
Other Goods	2,997	3,500	15,886 38,554	17,576 49,828	14.6	16.8
Other Goods	2,331	3,500	36,334	49,828	14,0	10.6
Total (Excluding Motor Vehicles,						
etc.)	§.	§.	1,202,432	1,517,160	458.0	512.6
	·	.				
Motor Vehicles, etc						
New	847	852	136,490	171,500	52.0	58.0
Used	1,068	1,130	74,198	114,990	28.2	38.8
Motor Parts, Accessories, etc	2,763	3,795	38,890	50,696	14.8	17.2
Petrol, Oils, etc.	3,536	4,262	70,212	94,046	26.8	31.8
Total Motor Vehicles	§	§	319,790	431,232	121.8	145.8
GRAND TOTAL	24.7545	27.2695	1 522 222	1,948,392	579.8	658.4
GRAND IOTAL	34,754¶	7,208 ا	1,522,222	1,946,392	319.8	030.4

^{*} The figures refer to establishments with total retail sales of \$1,000 or more.

The second table shows the number of establishments and the value of retail sales for the years 1956-57 and 1961-62, and the value of stocks on hand at 30 June for each of these years. All establishments were classified according to type of business. For the purposes of such classification, reference was made to the type of goods sold as indicated by the commodity sales recorded on the Census

[†] Only main commodities descriptive of the particular groupings are shown. details see Retail Census Bulletins. For further

[‡] Excludes basic building materials, builders' hardware and supplies (such as tools of trade, paints, etc.).

§ Not available.

^{||} Excludes tractors, farm machinery and implements, earth-moving equipment, ctc.

[¶] Total number of individual establishments. Many establishments showed sales in more than one commodity group. Thus the number of establishments selling goods in each commodity group does not add down to the total number of individual establishments.

returns. In the case of some types of business, the descriptions given by the proprietors were also taken into account. For most types of business the procedures used in 1961–62 followed those used in 1956–57. Four types of business which were included in 1956–57 are not applicable in 1961–62 because of the change in scope. The types of business concerned are Builders' Hardware Stores, Grain and Produce Merchants, Business Machine Firms, and Tractor Dealers. In addition, a separate type of business classification has been included for department stores and figures for 1956–57 have been revised to incorporate this change in classification.

VICTORIA—CENSUSES OF RETAIL ESTABLISHMENTS: ESTABLISHMENTS, SALES, AND STOCKS ACCORDING TO TYPE OF BUSINESS*

Type of Business	Re	ber of tail shments	Valu Retail	e of Sales†	Value of Retail Stocks at 30 June—‡	
	1956–57	1961–62	1956–57	1961-62	1957	1962
			\$'0	ю (\$*0	00
Food Stores, etc.—	5 044	4 004	010.074	070 666	24.000	25.052
Grocers	5,244	4,381	213,074	272,666	24,068	27,052
Butchers	2,242	2,628	100,240	122,210	1,046	986
Fruiterers	2,038	2,135	46,580	55,272	902	960
Bakers	1,371	1,350	34,032	40,904	768	1,044
Confectioners and Milk Bars	3,129	4,007	63,430	105,352	3,428	5,484
Cafés	693	675	7,084	5,516	422	444
Fishmongers and Poulterers	504	730	7,996	11,386	72	176
Other Food Stores	467	811	12,206	26,424	546	1,038
Hotels, Tobacconists, etc.—	1 045	1 700	121 706	154754	4 000	5.063
Hotels, Wine Saloons, etc	1,845	1,798	131,796	154,754	4,082	5,062
Tobacconists	377	414	7,492	7,074	722	634
Tobacconists and Hairdressers	1,133	1,125	10,488	6,714	1,018	790
Department Stores, Clothiers, Drapers,					ĺ	
etc.—	35	47	117.006	164 706	20.404	25 606
Department Stores		47	117,006	164,796	20,484 44,454	25,606
Footwear Stores	4,162	4,123	179,234	196,686		51,376 9,874
Hardware, Electrical Goods and Furniture Stores, etc.—	711	818	24,610	31,638	8,544	9,014
Domestic Hardware Stores	997	1.078	18,998	22,846	5,312	6,472
Electrical Goods, etc., Stores	1.057	1,108	55,876	72,988	9,950	14,190
Furniture, etc., Stores	710	739	50,876	54,838	12,554	13,374
Other Goods Stores—	, ,,,	137	30,070	34,030	12,557	13,374
Chemists	1,174	1,390	35,572	62,336	6,684	10,484
Newsagents and Booksellers	931	922	38,400	45,292	4,660	5,762
Sports Goods Stores	181	234	6,022	7,686	1,506	1,970
Watchmakers and Jewellers	561	528	13,080	12,996	6,398	6.156
Cycle Stores	208	156	2,626	1.956	562	434
Florists and Nurserymen	385	437	4,608	5,970	334	534
Other Types of Business	1,205	1,259	21,982	27,486	4,744	5,526
	-,205		21,702	27,700	,,,,,,,	
Total (Excluding Motor Vehicle Dealers)	31,360	32,893	1,203,308§	1,515,786§	163,260	195,428
Motor Vehicle Dealers—						
New Motor Vehicle Dealers, Garages						
and Service Stations	2,887	3,717	265,040	355,766	27,726	34,052
Used Motor Vehicle Dealers	258	308	39,606	58,696	4,384	6,468
Motor Parts and Tyre Dealers	249	350	14,268	18,144	2,804	2,918
Total Mater Valida Budan						
Total Motor Vehicle Dealers,	2 204	4 255	240.0445	420 606	24.014	42 420
Garages and Service Stations, etc.	3,394	4,375	318,914¶	432,606¶	34,914	43,438
GRAND TOTAL	34,754	27.260	1 500 000	1.040.202	100 174	220 066
GRAND TOTAL	34,734	37,268	1,522,222	1,948,392	198,174	238,866

[•] The figures refer to establishments with total retail sales of \$1,000 or more.

[†] Total value of all commodities sold by retail.

[‡] Total value of all goods held for retail sale (including stocks of materials for use in repairs to customers' goods and foodstuffs for the provision of meals and refreshments).

[§] Figures differ from those contained in the table on page 728 in that they include retail sales of motor vehicles, etc., made by establishments whose main type of business is other than motor vehicles, and exclude retail sales of goods, other than motor vehicles, made by establishments whose main type of business is motor vehicles.

[¶] See note § above.

The third table shows a comparison of the number of retail establishments and the value of retail sales in Statistical Divisions in Victoria for the years 1956–57 and 1961–62:

VICTORIA—CENSUSES OF RETAIL ESTABLISHMENTS: RETAIL SALES IN STATISTICAL DIVISIONS*

			No. of Est	ablishments	Value of Retail Sales		
Stati	stical D	ivision	1956-57	1961-62	1956-57	1961-62	
					\$'(000	
Metropolitan			 21,932	23,781	1,027,448	1,339,066	
Central			 2,797	3,014	100,604	127,130	
North-Central			 1,010	1,031	28,630	32,582	
Western			 2,544	2,574	108,030	128,888	
Wimmera			 941	927	32,716	37,166	
Mallee			 835	900	35,146	44,370	
Northern			 2,159	2,241	79,750	102,820	
North-Eastern			 976	1,038	37,080	46,574	
Gippsland	• •	• •	 1,560	1,762	72,818	89,796	
Total			 34,754	37,268	1,522,222	1,948,392	

Note.—For boundaries of Statistical Divisions, see map inside back cover.

The table which follows shows, for the year 1961-62, the number of retail establishments and the value of retail sales classified according to total retail sales size:

VICTORIA—CENSUS OF RETAIL ESTABLISHMENTS, 1961–62: SIZE OF RETAIL ESTABLISHMENTS *

	Establ	ishments	Value of	Retail Sales
Total Retail Sales Size	Number	Percentage in Each Group	\$'000	Percentage in Each Group
Under \$2,000 \$2,000 and under \$6,000 \$6,000 and under \$10,000	997	2·7	1,444	0·1
	3,834	10·3	14,676	0·7
	3,439	9·2	27,058	1·4
Under \$10,000 \$10,000 and under \$20,000	8,270	22·2	43,178	2·2
	7,718	20·7	113,018	5·8
Under \$20,000 \$20,000 and under \$40,000	15,988	42·9	156,196	8·0
	10,053	27·0	288,380	14·8
Under \$40,000 \$40,000 and under \$100,000	26,041	69·9	444,576	22·8
	8,062	21·6	482,664	24·8
Under \$100,000	34,103	91·5	927,240	47·6
\$100,000 and under \$200,000	1,896	5·1	258,032	13·2
Under \$200,000 \$200,000 and under \$500,000	35,999	96·6	1,185,272	60·8
	927	2·5	280,100	14·4
Under \$500,000	36,926	99·1	1,465,372	75·2
\$500,000 and over	342	0·9	483,020	24·8
Total	37,268	100.0	1,948,392	100.0

^{*} Table refers to establishments with total retail sales of \$1,000 or more.

^{*} Table refers to establishments with total retail sales of \$1,000 or more.

Traders were also asked to supply details of the number of persons working at the establishment on the last pay day in June 1962. They were requested to provide separate details of persons working mainly on retail activities and others engaged on wholesaling, manufacturing, etc. Persons who were normally working in the business but were absent through sickness or on holidays were included in the figures. The following table shows the number of males, females, and the total number of persons working mainly on retail activities on the last pay day in June 1962, classified according to the main type of business and category of employment:

VICTORIA—NUMBER OF PERSONS WORKING MAINLY ON RETAIL ACTIVITIES ON THE LAST PAY DAY IN JUNE 1962

		(Category of 1	Employmen	ı		
Main Type of Business		Members	Paid		Total		
	Owners	of Family	Employees †	Full Time	Part Time	Total	
			Male	5			
Food Stores-		1					
Grocers Butchers Fruiterers Bakers Confectioners and Milk	3,223 2,103 2,190 881	320 85 163 63	5,218 5,636 951 2,381	8,038 7,449 2,945 3,180	723 375 359 145	8,761 7,824 3,304 3,325	
Bars All Other Food Stores	3,082 1,984	523 135	882 1,521	3,466 3,236	1,021 404	4,487 3,640	
Hotels, etc.—							
Hotels, Wine Saloons, etc.	1,314	198	8,064	6,251	3,325	9,576	
Department Stores, Clothiers, Drapers, etc.— Department Stores Clothiers and Drapers Footwear Stores	2 1,560 417		6,004 4,765 869	5,913 5,572 1,197	93 849 111	6,006 6,421 1,308	
Hardware, Electrical Goods, etc.—							
Domestic Hardware Stores Electrical Goods, Radio and Musical Instrument	579	46	978	1,372	231	1,603	
Stores Furniture and Floor	663	40	2,925	3,434	194	3,628	
Coverings Stores	404	30	2,244	2,572	106	2,678	
Other Goods Stores-							
Newsagents and Book- sellers	766 1,138 3,338	66 24 197	924 1,328 3,259	1,455 1,882 6,052	301 608 742	1,756 2,490 6,794	
Total (Excluding Motor Vehicle Dealers, Garages and Service Stations, etc.)	23,644	2,008	47,949	64,014	9,587	73,601	
Total Motor Vehicle Dealers, Garages and Service Stations, etc	3,484	299	18,791	20,401	2,173	22,574	
Total	27,128	2,307	66,740	84,415	11,760	96,175	

For footnotes see end of this table on page 733.

VICTORIA—NUMBER OF PERSONS WORKING MAINLY ON RETAIL ACTIVITIES ON THE LAST PAY DAY IN JUNE 1962—continued

			Category of	Employmen	it	
Main Type of Business		Members	Paid		Total	
	Owners	of Family	Employees	Full Time	Part Time	Total
Food Stores—			FEMAL	.ES		
Grocers	2,314 420 1,072 708	619 171 477 190	5,478 1,083 2,457 2,262	6,697 1,125 2,347 2,307	1,714 549 1,659 853	8,411 1,674 4,006 3,160
Bars All Other Food Stores	3,063 1,181	813 376	3,586 4,103	5,097 3,697	2,365 1,963	7,462 5,660
Hotels, etc.— Hotels, Wine Saloons, etc.	1,022	342	6,587	5,967	1,984	7,951
Department Stores, Clothiers, Drapers, etc.— Department Stores Clothiers and Drapers Footwear Stores	2,227 209	297 59	8,393 12,660 1,460	7,357 11,158 1,356	1,036 4,026 372	8,393 15,184 1,728
Hardware, Electrical Goods, etc.— Domestic Hardware Stores Electrical Goods, Radio and Musical Instrument	345	85	776	895	311	1,206
Stores Furniture and Floor	193	79	1,419	1,450	241	1,691
Coverings Stores	138	41	970	1,009	140	1,149
Other Goods Stores— Newsagents and Booksellers Chemists Other.	515 204 1,215	128 99 444	1,694 3,410 2,557	1,865 2,848 3,149	472 865 1,067	2,337 3,713 4,216
Total (Excluding MotorVehicle Dealers, Garages and Service Stations, etc.)	14,826	4,220	58,895	58,324	19,617	77,941
Total Motor Vehicle Dealers, Garages and Service Stations, etc	811	363	2,819	3,315	678	3,993
Total	15,637	4,583	61,714	61,639	20,295	81,934
		_	Person	NS		
Food Stores— Grocers	5,537 2,523 3,262 1,589 6,145	939 256 640 253 1,336	10,696 6,719 3,408 4,643 4,468	14,735 8,574 5,292 5,487	2,437 924 2,018 998 3,386	17,172 9,498 7,310 6,485 11,949
All Other Food Stores	3,165	511	5,624	8,563 6,933	2,367	9,300
Hotels, etc.— Hotels, Wine Saloons, etc.	2,336	540	14,651	12,218	5,309	17,527
Department Stores, Clothiers, Drapers, etc.— Department Stores Clothiers and Drapers Footwear Stores	3,787 626	393 81	14,397 17,425 2,329	13,270 16,730 2,553	1,129 4,875 483	14,399 21,605 3,036

VICTORIA—NUMBER OF PERSONS WORKING MAINLY ON RETAIL ACTIVITIES ON THE LAST PAY DAY IN JUNE 1962—continued

		Category of Employment							
Main Type of Business		Members	Paid		Total				
	Owners	of Family	Employees †	Full Time	Part Time	Total			
Hardware, Electrical Goods,			Perso	ons		,			
Domestic Hardware Stores	924	131	1,754	2,267	542	2,809			
Stores	856	119	4,344	4,884	435	5,319			
Furniture and Floor Coverings Stores	542	71	3,214	3,581	246	3,827			
Other Goods Stores— Newsagents and Booksellers	1,281 1,342 4,553	194 123 641	2,618 4,738 5,816	3,320 4,730 9,201	773 1,473 1,809	4,093 6,203 11,010			
Total (Excluding MotorVehicle Dealers, Garages and Service Stations, etc.)	38,470	6,228	106,844	122,338	29,204	151,542			
Total Motor Vehicle Dealers, Garages and Service Stations, etc	4,295	662	21,610	23,716	2,851	26,567			
Total	42,765	6,890	128,454	146,054	32,055	178,109			

^{*} Includes members of owner's family and friends assisting in the business but not receiving a definite wage for their work.

The next table shows, for each State, particulars of the number of retail establishments and the value of retail sales for the year ended 30 June 1962, together with the value of stocks of goods on hand at 30 June 1962:

AUSTRALIA—CENSUS OF RETAIL ESTABLISHMENTS*: ESTABLISHMENTS, SALES, AND STOCKS, 1961–62

		Va	Value of		
State	Number of Retail Es- tablishments	Excluding Motor Vehicles, etc.	Motor Vehicles, etc.†	Total	All Retail Stocks at 30 June, 1962
			\$'	000	
New South Wales Victoria Queensland South Australia Western Australia Tasmania Total	 46,209 37,268 17,065 11,812 8,559 4,270 125,183	2,060,412 1,517,160 701,642 451,564 360,304 166,060 5,257,142	623,082 431,232 218,010 143,144 133,854 53,872 1,603,194	2,683,494 1,948,392 919,652 594,708 494,158 219,932	328,128 238,866 114,284 75,406 61,184 30,130 847,998

^{*}Table refers to establishments with total retail sales of \$1,000 or more. Excludes Australian Capital Territory and Northern Territory.

[†] Includes friends and relatives who are paid a definite wage.

[†] Includes new and used motor vehicles, motor parts and accessories, petrol, lubricating oils, tyres, tubes, etc.

Survey of Retail Establishments

During the period between Censuses, estimates of the value of retail sales are made on the basis of returns received from a representative sample of retail establishments. Sample returns are supplied by retail businesses which account for approximately 45 per cent of all retail sales in Australia. Estimated totals are calculated by methods appropriate to a stratified sample.

The following table shows the value of retail sales of goods in Victoria in each of the commodity groups specified for the years 1963-64 to 1967-68:

VICTORIA—VALUE OF RETAIL SALES* (\$m)

Commodity Comm		Year	Ended 30 J	une	
Commodity Group	1964	1965	1966	1967	1968
Groceries	259.3	283.8	302.2	323.9	351.7
Butchers' Meat	139.4	153.9	168.4	175.2	187.0
Other Food†	244.5	258.5	265.4	282.6	296.6
Total Food and Groceries	643.2	696.2	736.0	781.7	835.3
Beer, Wine, and Spirits††	167.4	178.9	198.4	217.7	240.6
Clothing and Drapery	290.0	310.3	316.1	331.1	356.5
Footwear	52.0	54.4	54.7	60.5	63.4
Domestic Hardware, China, etc.‡	42.8	46.5	47.9	51.1	55.4
Electrical Goods§	103.6	110.7	108.9	112.5	119.5
Furniture and Floor Coverings	77.0	84.5	86.7	90.6	96.3
Chemists' Goods	84.2	90.4	95.8	101.8	107.1
Newspapers, Books and Stationery	61.1	64.5	68.0	73.1	76.8
Other Goods	171.4	183.1	199.6	210.4	212.6
Total (Excluding Motor Vehicles, Parts, Petrol, etc.)	1,692.7	1,819.5	1,912.1	2,030.5	2,163.5
Motor Vehicles, Parts, Petrol, etc.¶	584.5	644.6	651.3	667.7	746.0
GRAND TOTAL	2,277.2	2,464.1	2,563.4	2,698.2	2,909.5

^{*} Compiled on the basis comparable with the 1961-62 Retail Census.

[†] Includes fresh fruit and vegetables, confectionery, soft drinks, ice cream, cakes, pastry, fish, etc., but excludes some delivered milk and bread.

^{††} Excludes sales made by licensed clubs, canteens, etc.

[‡] Excludes basic building materials, builders' hardware and supplies.

[§] Includes radios, television and accessories, musical instruments, domestic refrigerators.

^{||} Includes tobacco, cigarettes, sporting goods, jewellery, etc.

[¶] Excludes tractors, farm machinery and implements, earth-moving equipment, etc.

Retailing in Victoria since 1957

The value of retail sales in Victoria (excluding motor vehicles, petrol, parts, etc.) has increased during the period 1957 to 1967 at an average rate of about 5½ per cent a year. During the same decade, retail sales in Melbourne rose by nearly 2 per cent a year and population by a little less than 2 per cent annually. The money value of retail sales has increased slightly more than the combined effect of population growth and price increases. Over the same period personal incomes in Victoria have risen by nearly 7 per cent annually, suggesting that consumers are tending to spend their rising incomes in more diverse ways. An increasing percentage of personal expenditure is going to the purchase of motor vehicles, petrol, etc.

Sales of food and drink account for a little less than half the total retail turnover. It is, therefore, not surprising that food retailing has made considerable progress in its methods. The modern supermarket illustrates the form of capital investment in retailing today. Most shopping centres, large or small, include a supermarket which concentrates mainly on food and groceries. The supermarket combines the function of the grocer, the greengrocer, the butcher, and the delicatessen under one roof. Other retail stores have accepted the necessity to modernise buildings, fixtures, and techniques, with the result that Victorian retailing in cities, suburbs, or country towns has become modern in method and presentation.

Since the establishment of the first regional shopping centre in Australia at Chermside, Brisbane, in 1957, there has been a marked tendency towards planned development of all shopping facilities. Victoria, a small State in area and served by a good network of roads, has recognised that most shoppers use motor vehicles for their shopping excursions, and centres have been developed to cater for the automobile. Chadstone, the first regional centre in Victoria, provided parking space for 3,000 vehicles; Northland, opened in October 1966, provided for 4,000. Established shopping centres in the older suburbs and in country towns have found it necessary to acquire land convenient to the shops for the provision of off-street parking. Some hotels have also modified their bottle departments to provide a drive-in service for the sale of liquor.

While Chadstone, opened in a densely populated Melbourne suburb in October 1960, was the first regional centre established in Victoria, smaller neighbourhood centres had already been built at Heidelberg and Mentone. Following the success of Chadstone, a smaller regional centre was built at Forest Hill in Melbourne in 1964; this was followed

by further suburban development at Croydon and Glenroy. Other newer suburbs such as Mount Waverley, had planned central shopping areas close to the railway station and to various services.

A major regional centre was opened at Ringwood late in 1967, and another large regional centre was opened at Cheltenham (Melbourne) in September 1968. Plans are in hand for at least another thirteen smaller centres in various Melbourne suburbs.

Melbourne had a population of 2,110,336 at 30 June 1966 and the Metropolitan Area as such held approximately two-thirds of Victoria's population. Consequently the major capital expansion in retailing has been in the Metropolitan Area where a concentrated market exists. However, considerable re-development of retailing has occurred in the major provincial cities of Geelong, Ballarat, Bendigo, Warrnambool, and Shepparton, while other country shopping centres show the evidence of up-to-date facilities.

Apart from the planned centres there has been a rapid growth in the number of free-standing supermarkets. These vary in size up to 20,000 sq ft, and devote a large proportion of their selling space to food retailing. The selling principle is entirely self-service with cash check-outs. The supermarkets stock a small quantity of merchandise other than food, but they rarely venture into the department store type of merchandising. Most of the traditional grocery stores have also been converted to modern self-service units.

The most significant characteristic of retailing in the decade ended 1967 has been to bring the merchandise to the customer, rather than the customer to the merchandise. The central city area of Melbourne once commanded over 30 per cent of the total value of retail sales in Victoria; today decentralisation of shopping has reduced this to about 18 per cent.

Overseas and Interstate Trade

Overseas Trade: Legislation and Agreements

General

Of the three components of Victoria's trade, namely, transactions within the State, those with other Australian States, and those with countries outside Australia, the first two are, in practice, free of control or restriction; trade with overseas countries is subject to the customs laws of the Commonwealth Government.

By the Commonwealth of Australia Constitution Act, the power to make laws about trade and commerce with other countries was conferred on the Federal Parliament, and by the same Act, the collection and control of customs and excise duties passed to the Executive Government of the Commonwealth on 1 January 1901.

The first Commonwealth Customs Tariff was introduced by Resolution on 8 October 1901, from which date uniform duties came into effect throughout Australia. The Australian Customs Tariff has been developed in conformity with the policy of protecting economic and efficient Australian industries, and of granting preferential treatment to certain imports from countries of the Commonwealth. Some goods, generally those of a luxury nature, are subject to duty for revenue purposes. Customs collections are a major source of revenue, and the protective character of the tariff has an important influence on the Australian economy.

The present tariff provides for general and preferential rates of duty, and its structure is based on the "Brussels Nomenclature" which has its origins in the Convention on Nomenclature for the Classification of Goods in Customs Tariffs, signed in Brussels on 15 December 1950. Australia has operated a "Brussels-type" tariff since 1 July 1965.

Preferential rates apply to goods, the produce or manufacture of the United Kingdom, Ireland, Canada, New Zealand, Papua and New Guinea, and certain goods, the produce or manufacture of specified countries, provided that such goods comply with the laws in force at the time affecting the grant of preference.

General rates apply to goods from all countries which do not qualify for preferential rates of duty under a particular tariff classification.

Primage Duty

In addition to duties imposed by the Customs Tariff 1965, ad valorem duties at 5 per cent or 10 per cent are charged on some goods according to the type of goods and their origin. Goods produced or manufactured by New Zealand, Norfolk Island, Fiji, Cocos (Keeling) Islands, Christmas Island (Indian Ocean), and the Territory of Papua and New Guinea are exempt from primage duty.

Tariff Board

The Tariff Board is set up under the provisions of the Tariff Board Act to advise the Commonwealth Government on matters relating to the protection and encouragement of Australian industry.

Bilateral Trade Agreements

Australia has numerous trade agreements with overseas countries, the principal agreements being outlined below:

Country		Main Features of Agreement
United Kingdo	om	Dated 1956. Preservation of security for Australian exports in United Kingdom markets. Lowering of obligatory margins of preference which Australia extends to the United Kingdom.
Canada	••	Dated 1960. Mutual accord of preferential tariff treatment with certain specified exceptions as for 1931 agreement plus concessions granted in 1932 and 1937.
New Zealand		Dated 1966. Provides for free trade in certain scheduled goods. Provision is made for addition of items to the schedule. The 1933 Agreement continues in force as part of the 1966 Agreement except as superseded or modified by it.
Malaysia	••	Dated 1958. Agreement negotiated with the Federation of Malaya and applies only to that part of Malaysia formerly comprising the Federation. Records exchange of preferential treatment with special protection for Australia's wheat and flour markets in Malayan States, and for Malayan rubber and tin in Australia.
Indonesia		Dated 1959. Records desirability of expanding trade between Australia and Indonesia. Gives recognition to importance of flour trade from Australia to Indonesia.
Japan		Dated 1963. Mutual exchange of most-favoured-nation treatment. Japan to accord preferential treatment to Australian wool and wheat as well as expanded opportunities for imports into Japan of other Australian primary produce and motor vehicles. Australia to consult Japan on temporary protection cases affecting Japanese products.
Philippines		Dated 1965. Provides for an exchange of non-discriminatory treatment while recognising existing preferences.
South Korea		Dated 1965. Provides for an exchange of non-discriminatory treatment with allowances for existing preferences. Both Governments undertake to endeavour to increase volume of trade with each other.
U.S.S.R.		Dated 1965. Provides for an exchange of non-discriminatory treatment and for consultation on request about any matter affecting the operation of the Agreement.
Poland		Dated 1966. Provides for an exchange of non-discriminatory treatment with allowances for existing preferences. Both Governments undertake to endeavour to increase volume of trade with each other.
Romania		Dated 1967. Provides for an exchange of non-discriminatory treatment with allowances for existing preferences.
Hungary		Dated 1967. Provides for an exchange of non-discriminatory treatment with allowances for existing preferences.

General Agreement on Tariffs and Trade (G.A.T.T.)

The General Agreement on Tariffs and Trade, to which Australia was one of the original contracting parties, is an international trade agreement which has been in operation since 1 January 1948. At the end of January 1968, seventy-five countries, whose foreign trade represented over 80 per cent of the total volume of world trade, were full contracting parties to the Agreement, three had acceded provisionally, eight applied the Agreement on a de facto basis, and one participated under special arrangements.

Six series of tariff negotiations have been conducted, as a result of which Australia has obtained tariff concessions on almost all the principal products of which Australia is an actual or potential exporter to the individual countries concerned.

Excise Tariff

The Excise Tariff applies to certain articles which can only be manufactured under licence and subject to certain conditions. The tariff relates to beer, spirits, amylic alcohol and fusel oil, saccharin, liqueurs, flavoured spirituous liquors, tobacco, cigars, cigarettes, snuff, coal, certain petroleum, shale, or coal tar distillates, playing cards, cigarette papers, matches, wine (certain types), wireless valves, and canned fruit.

Customs (Import Licensing) Regulations

Import licensing, introduced at the beginning of the Second World War, was relaxed progressively after the war so that by March 1952, goods from the non-dollar area (except Japan, to which special conditions applied until 1957) were virtually free from import licensing controls. A fall in the price of wool and a large increase in imports in the year 1951–52 so endangered Australia's external financial position that in March 1952 the import restrictions were again intensified. The war-time regulations were subsequently replaced by regulations made under the *Customs Act* 1901–1954.

Between March 1952 and February 1960, import restrictions were varied broadly in line with Australia's balance of trade position.

After the changes made in February 1960, only about 10 per cent of imports remained subject to control. The remaining restrictions were removed in October 1962, for all commodities, with the exception of a small group which were retained under control for reasons of association with the protection of the Australian industries concerned.

Export Controls and Incentives

The Customs Act makes provision for the prohibition of exportation of certain goods from Australia either absolutely, or to a certain place, or unless prescribed conditions are complied with. The *Banking Act* 1959 contains provisions to ensure that the full proceeds of exports are received into the Australian banking system in the currency and in the manner prescribed by the Reserve Bank of Australia.

The Commonwealth Government provides taxation concessions as financial incentives to export. A special Income Tax allowance, equal and additional to the ordinary allowable deduction in respect of specified expenses, is designed to encourage firms to incur promotion expenditure in advance of export sales. Rebates of pay-roll tax are also granted to employers whose export sales have increased above their average annual level in a base period.

Australian Trade Missions

During the last decade, trade missions have become an integral part of the Commonwealth Department of Trade and Industry's campaign to develop and expand Australia's export trade. They have proved successful in creating an awareness, especially in new markets, of Australia as a producer of quality primary and secondary commodities, in establishing Australia as a source of supply, in establishing a basis for long-term business, and in producing valuable export business from "on the spot" trading. Trade missions have been directly responsible for substantial and permanent increases in export earnings.

Trade missions may be of the survey or selling type. The general survey mission is designed to carry out a survey of a particular area, obtain market information, and assess the market potential for Australian products. The specialised survey mission undertakes a market survey on behalf of a particular industry or for specific commodities. A survey mission usually comprises about five members, The Government selects suitable specialists and meets the full cost of the project. The mission reports back and recommends appropriate follow-up trade promotional activity.

The general selling mission is a planned "hard sell" overseas visit of a group of businessmen whose products have market prospects in the countries to which the mission will travel. Membership is usually about twenty although numbers have been as high as forty and as low as seven members. The specialised selling mission is similar to the general selling mission in relation to the responsibilities of members and the facilities provided by the Government but differs in that it is concerned with specific industries, normally is smaller, and sometimes is backed up by small displays at selected centres to give additional impact.

As members of a selling mission, businessmen pay their own fares and accommodation and contribute towards the cost of mission entertainment. The Government meets the costs of a leader and manager, determines the itinerary, makes all necessary arrangements in Australia, and through Trade Commissioners in the countries being visited, organises government and business contacts, press receptions, and supporting advertising and publicity for the mission while it is away. A report on the mission's findings and recommendations is published and distributed.

Since 1954, Australia has sent overseas three general and twelve specialised survey missions, seventeen general, and three specialised selling missions, and five trade ships. The areas visited include Africa and the Rhodesias, South-east Asia, New Zealand, India and Ceylon, North America and Canada, the Pacific Islands, the Middle East and Mediterranean, South America and the Carribean, and Britain and Northern Europe.

Victoria's Pattern of Trade, 1964

Overseas Trade: Recorded Value of Imports and Exports

The recorded value of goods imported is the actual money price paid plus any special deduction or the current domestic value of the goods, whichever is the higher, plus all charges ordinarily payable for placing the goods free on board (f.o.b.) at the port of export. When the invoiced value of the imported goods is in a currency other than Australian, the equivalent value in Australian currency is recorded. The recorded value of exports, if sold before export, is equivalent to the f.o.b. value of the goods. If shipped on consignment, the value recorded is the Australian f.o.b. equivalent of the current price offering for similar goods of Australian origin in the principal markets of the country to which the goods are consigned for sale. With regard to wool shipped on consignment, the f.o.b. equivalent of the current price ruling in Australia approximates sufficiently to the f.o.b. equivalent of the price ultimately received. For information about the law relating to exports, see page 572 of the Victorian Year Book 1968.

Overseas Trade of Victoria

General

Statistics of Australia's overseas trade passing through Victorian ports are compiled from documents obtained under the Customs Act, and are presented in the following series of tables.

The total values of the overseas trade of Victoria for each of the five years 1962–63 to 1966–67 are set out below. Exports do not include the value of stores shipped at Victorian ports on board overseas ships.

VICTORIA—OVERSEAS TRADE: RECORDED VALUES OF IMPORTS INTO AND EXPORTS FROM VICTORIAN PORTS (\$'000 f.o.b.)

Year I				Excess		
30 Ju	ne—	Imports	Australian Produce	Re-exports	Total	of Imports
1963 1964 1965 1966 1967	 	780,058 833,847 1,026,834 1,017,360 1,072,514	588,210 736,388 708,395 753,514 785,462	8,670 10,252 14,652 14,549 15,725	596,880 746,640 723,047 768,063 801,187	183,178 87,207 303,787 249,297 271,327

That portion of the value of Australian trade handled at Victorian ports for each of the five years 1962-63 to 1966-67 is shown in the following table :

VALUE OF AUSTRALIAN TRADE, AND PORTION HANDLED AT VICTORIAN PORTS

Year E	A	Australian Trade Proportion of Australian Tra Handled at Victorian Ports			Proportion of Australian To Handled at Victorian Por	
	 Imports	Exports	Total	Imports	Exports	Total
	 	\$'000 f.o.b			per cent	
1963	 2,162,670	2,151,812	4,314,482	36⋅1	27.8	32.0
1964	 2,372,658	2,782,460	5,155,118	35 · 1	26.8	30.7
1965	 2,904,703	2,651,449	5,556,152	35 · 4	27.3	31.5
1966	 2,939,492	2,720,953	5,660,445	34.6	28.2	31.5
1967	 3,045,341	3,023,925	6,069,266	35.2	26.5	30.9

Classification of Overseas Imports and Exports

From July 1965, imports have been classified according to the new Australian Import Commodity Classification. This classification is based on the Standard International Trade Classification, Revised (S.I.T.C.), which is closely related to the Brussels Tariff Nomenclature used in the new Australian Customs Tariff. A new Australian Export Commodity Classification based on S.I.T.C. was introduced in July 1966. The following table shows the value of imports for 1965–66 and 1966–67 and value of exports for 1966–67. Comparable figures for years prior to these are not available.

VICTORIA—CLASSIFICATION OF OVERSEAS IMPORTS AND EXPORTS
(\$'000 f.o.b.)

Div- ision	December 1	Impo	orts	Exports
No.	Description	1965–66	1966–67	1966–67
00	Live animals	909	781	823
01	Meat and meat preparations	230	221	89,664
02	Dairy products and eggs	1,449	1,636	80,127
03	Fish and fish preparations	8,941	8,376	4,138
04	Cereals and cereal preparations	730	1,053	89,466
05	Fruit and vegetables	6,011	6,264	56,227
06	Sugar and sugar preparations and honey	772	916	535
07	Coffee, tea, cocoa, spices and manu-			
	factures thereof	18,186	17,967	243
08	Feeding-stuff for animals (except un-			
00	milled cereals)	335	988	3,111
09	Miscellaneous preparations chiefly for	465		0=4
11	food	465	630	874
11	Beverages	1,470	1,658	1,292
12	Tobacco and tobacco manufactures	12,800	13,742	493
21	Hides, skins and fur skins, undressed.	1,589	1,138	39,022
22	Oil-seeds, oil nuts and oil kernels	1,379	495	4
23	Crude rubber (including synthetic and	44.004	42.525	
24	reclaimed)	11,924	13,626	449
24	Wood, timber and cork	5,772	6,479	146
25	Pulp and waste paper	7,016	7,772	72
26	Textile fibres and their waste	21,927	21,721	260,798
27	Crude fertilizers and crude minerals			
	(except coal, petroleum and precious	14.001	10.54	
20	stones)	14,261	18,764	233
28	Metalliferous ores and metal scrap	414	448	11,136
29	Crude animal and vegetable materials,	2 001	2.550	
22	n.e.s	2,991	3,570	6,542
32	Coal, coke and briquettes	29	27	88
33	Petroleum and petroleum products	72,888	80,739	8,546
34	Petroleum gases and other gaseous		.	
41	hydrocarbons	2	1	3
41	Animal oils and fats	117	86	6,523
42	Fixed vegetable oils and fats	3,629	3,422	21
43	Animal and vegetable oils and fats,			
	processed, and waxes of animal or	522	501	270
-1	vegetable origin	533	591	279
51	Chemical elements and compounds	23,513	26,449	1,920
52	Mineral tar and crude chemicals from	2.025	1 001	_
53	coal, petroleum and natural gas	2,025	1,881	9
33	Dyeing, tanning and colouring materials	7,557	9,134	682

VICTORIA—CLASSIFICATION OF OVERSEAS IMPORTS AND EXPORTS—(continued)

(\$'000 f.o.b.)

Div-		Imp	ports	Exports
ision No.	Description	1965–66	1966–67	1966–67
54 55	Medicinal and pharmaceutical products Essential oils and perfume materials; toilet, polishing and cleansing pre-	10,058	10,645	3,442
	parations	3,305	3,659	680
56	Fertilizers, manufactured	2,126	2,820	8
57	Explosives and pyrotechnic products	1,522	1,008	1,706
58	Plastic materials, regenerated cellulose and artificial resins	35,253	38,012	3,736
59	Chemical materials and products, n.e.s.	11,336	13,531	10,484
61	Leather, leather manufactures, n.e.s.,	11,550	10,501	10,.01
	and dressed fur skins	2,439	2,833	1,954
62	Rubber manufactures, n.e.s	7,812	8,863	952
63	Wood and cork manufactures (except furniture)	2 701	2 776	453
64	Paper, paperboard and manufactures	3,781	3,776	433
04	thereof	28,646	30,627	2,385
65	Textile yarn, fabrics, made-up articles			_,
	and related products	95,736	100,188	4,699
66	Non-metallic mineral manufactures,	17 702	19 220	1 220
67	n.e.s	17,793 30,119	18,329 27,214	1,229 1,011
68	Non-ferrous metals	6,108	6,376	15,538
69	Manufactures of metal, n.e.s	25,131	23,062	8,832
71	Machinery (except electric)	190,706	192,558	18,848
72	Electrical machinery, apparatus and			
70	appliances	55,201	60,013	6,247
73	Transport equipment	142,322	156,934	25,627
81	Sanitary, plumbing, heating and lighting fixtures and fittings	1,459	1,574	533
82	Furniture	1,393	1,079	168
83	Travel goods, handbags and similar	1,575	1,0,7	100
	articles	835	1,021	27
84	Clothing and clothing accessories;		0.006	
85	articles of knitted or crocheted fabric	8,127	8,906	1,503
65	Footwear, gaiters, and similar articles and parts therefor	1,811	2,367	92
86	Professional, scientific and controlling	1,011	2,507	
	instruments; photographic and optical			
	goods, watches and clocks	28,853	29,318	3,970
89	Miscellaneous manufactured articles,	24 620	20 052	3,943
9A	n.e.s	34,630	38,852	3,943
711	chandise trade, not elsewhere classi-			
	fied	35,567	31,497	7,628
	Total Merchandise	1 011 025	1 065 627	700 150
	Total Merchandise	1,011,935	1,065,637	789,158
9 B	Commodities and transactions not in-	5 405	6 077	10.006
	cluded in merchandise trade	5,425	6,877	12,026
	Total	1,017,360	1,072,514	801,187

Trade with Countries

The value of trade with overseas countries from 1964-65 to 1966-67 is shown in the following table:

VICTORIA—OVERSEAS IMPORTS AND EXPORTS: COUNTRIES OF ORIGIN AND CONSIGNMENT (\$'000 f.o.b.)

	Exports	
196465	1965–66	1966–67
1,214	1.210	1.580
150	134	143
2.165	3,649	5.012
756	727	1.053
11,454	10,484	10,000
14,921	19,367	22,143
7,638	7,083	6,092
27,382	37,109	17,621
4,720	6,549	6,020
3,536	2,506	2,135
42,788	47.344	40,988
232	360	358
23,096	23,658	22,977
6,486	3,609	4,220
12,782	11,368	11,792
22,753	9,445	15,234
2,020	1,888	2,140
2,685	2,578	6.517
707	757	837
24,308	33,484	38,403
96,911	105,703	137,841
29,242	14,983	24,228
6,474	5,450	6,720
5,287	6,585	8,499
44,025	51,135	47,785
5,165	4,604	8,588
7,229	9,740	11,215
8,562	8,311	10,260
4,680	5,216	8,675
	11,795	19,741
10,447	9,331	11,761
2,565	3,202	2,756
568	833	962
4,345	4,425	7,256
148,472	130,702	117,320
18,934	16,303	3,677
57,422	85,525	83,399
5,182	7,101	9,384
55,744	63,810	65,855
723,047	768,063	801,187
-		

^{*} Singapore included with Malaysia from 1 July 1964 to 30 September 1965.

Interstate Trade

Statistics of trade between Victoria and other Australian States are incomplete and relate mainly to seaborne trade. Although a substantial quantity of freight is carried by road and rail transport between Victoria and neighbouring States, no details of this traffic are available. A small tonnage of freight is carried interstate by air (see page 793).

Interstate Trade by Sea

In relation to quantity, the principal cargoes carried interstate by ship to and from Victorian ports are coal, oils, steel, sugar, and timber. In addition, however, there is a considerable trade in foodstuffs, motor vehicles, and other manufactured goods particularly through the Port of Melbourne.

The following tables show tonnages of the principal commodities of interstate origin or destination handled in the Ports of Melbourne and Geelong, respectively, during the five years 1963 to 1967. Some cargoes, as indicated, are recorded in tons weight, while others are recorded in units of 40 cu ft, which measurement is taken as the equivalent of 1 ton.

VICTORIA—PORT OF MELBOURNE: PRINCIPAL INTERSTATE EXPORTS
('000)

Commodity and Unit of Quantity	1963	1964	1965	1966	1967
Ale, Beer and Stout 40 cu ft	9	11	8	9	15
Fruit, Fresh and Preserved 40 cu ft	33	32	36	31	32
Groceries 40 cu ft	17	16	17	16	29
Malt ton	8	16	22	17	17
Machinery ton	19	22	12	16	22
Motor Vehicles 40 cu ft	113	133	131	116	126
Motor Parts and Accessories 40 cu ft	24	18	11	6	2
Oils—					
Aviation Spirit (Bulk) 40 cu ft	14	12	14	12	4
Aviation Turbine Fuel (Bulk) 40 cu ft	6		3	1	8
Fuel Oil (Bulk) 40 cu ft	98	92	ğ	16	45
Motor Spirit (Bulk) 40 cu ft	114	36	83	67	152
Paper and Stationery 40 cu ft	22	20	19	20	21
Plaster ton	-8	7	8	-8	7
Scrap Metal ton	i	4	2	11	4
Steel ton	6	9	7	22	19
Tourists' Cars 40 cu ft	89	75	89	106	118
All Other ton or 40 cu ft	561	535	531	544	627
Total	1,142	1,038	1,002	1,018	1,248

VICTORIA—PORT OF MELBOURNE: PRINCIPAL INTERSTATE IMPORTS ('000)

Comn	nodity a	and Uni	t of Quan	tity	1963	1964	1965	1966	1967
Barley				ton	16	15	15	55	38
Coal				ton	423	453	363`	357	295
Gypsum				ton	121	127	119	116	115
Iron				ton	43	42	58	31	35
Molasses				ton	35	31	48	22	30
Oils—									
Fuel Oil				40 cu ft	253	229	176	169	7
Kerosene				40 cu ft	11	37	19	19	19
Motor Sp	irit (E	Bulk)		40 cu ft	281	273	305	123	114
Paper and S				40 cu ft	134	132	144	143	158
Pyrites				ton	37	62	48	73	56
Steel				ton	237	216	245	189	239
Sugar				ton	168	217	207	203	197
Timber				40 cu ft	143	126	179	148	171
Tourists' Ca				40 cu ft	79	80	69	96	97
All Other			ton or	40 cu ft	524	735	802	793	789
7	otal				2,505	2,775	2,797	2,537	2,360

VICTORIA—PORT OF GEELONG: PRINCIPAL INTERSTATE EXPORTS AND IMPORTS

(000)

Commodity and	Unit of	Quanti	ty	1963	1964	1965	1966	1967
								•
Bitumen			ton	3 (27	44	18	18
Explosives	• •		ton	5	4	4	5	5
Refined Oils		• •	40 cu ft	803	839	760	476	557
Wheat			ton	2	4	3	4	10
Wire and Steel		• •	ton	ī l	'	9	11	12
Other Cargo	tor	or 4		*	*	1	1	*
Total Ex	ports			814	874	821	515	602
			Імро	RTS				
Alumina			ton	1	38	77 I	82	79
Cement Clinkers			ton	70	74	57	28	
Coal			ton	215	224	222	206	205
Oils (Various)			40 cu ft	99	124	102	31	208
Pig Iron and Steel			ton	64	130	147	126	155
Sulphate of Ammon	ia		ton	6	7	9	14	8
Superphosphate			ton				19	••
Other Cargo	to	or 4	0 cu ft	3	1	*	*	9
Total Im	ports			457	598	614	506	664

*Under 500 tons.

Trade of Victoria with Western Australia and Tasmania

Details of trade between Victoria and other States are available only for trade with Western Australia and trade by sea with Tasmania.

Western Australia

Exports from Victoria to Western Australia are valued in terms of landed cost (i.e., c.i.f. basis) at port of entry. Imports from Western Australia are valued at the f.o.b. equivalent at the port of shipment of the price at which the goods were sold. The small proportion of goods received by rail is valued at the f.o.r. equivalent.

For the year 1966-67, the value of exports from Victoria to Western Australia totalled \$194.9m. Transport equipment (\$30.3m), Machinery other than electric machinery (\$22.4m), Clothing and clothing accessories (\$22.4m), Rubber manufacturers (\$9.5m), and Tobacco and tobacco manufactures (\$8.3m) were the main types of commodities included in this total.

Imports from Western Australia during the same period were valued at \$35.7m. Iron and steel (\$7.2m), Petroleum and petroleum products (\$7.2m), Inorganic chemical elements and compounds (\$6.6m) were the main types of commodities imported.

Detailed statistics of this trade appear in the publications External Trade, 1966-67 and Interstate Trade of Western Australia, 1966-67 issued by the Deputy Commonwealth Statistician, Perth.

Tasmania

Details of trade between Victoria and Tasmania are available only for trade by sea. Both exports and imports are valued on an f.o.b. basis.

In 1966-67, exports by sea from Victoria to Tasmania were valued at \$135.5. Transport equipment (\$20.8m), Petroleum products (\$11.4m), Tobacco and tobacco manufactures (\$11.3m) were the main types of commodities. The value of tourists' motor vehicles included in this total was approximately \$17m.

Imports from Tasmania during this period amounted to \$107.3m. Timber (\$10.9m) and Preserved vegetables (\$11.4m) were the main commodities imported. The value of tourists' motor vehicles included in the total was approximately \$16m.

Additional details of trade by sea between Victoria and Tasmania are available from the Deputy Commonwealth Statistician, Hobart.

Customs and Excise Revenue

The total gross customs duties collected by the Commonwealth in Victoria in each of the three years 1964–65 to 1966–67 was \$104,780,390, \$104,786,642, and \$108,565,998, respectively. Collections include duty received on account of goods transferred to other States for consumption and exclude duty in respect of goods imported into other States but consumed in Victoria.

The principal commodities produced in Victoria on which the Commonwealth imposes excise duty are set out in the table below, together with the gross amount of duty collected on account of each item for each of the three years 1964–65 to 1966–67. As with customs duties, collections include duty levied on goods exported to other States for consumption and exclude duty in respect of goods produced in other States, but consumed in Victoria.

VICTORIA—GROSS EXCISE DUTY COLLECTED ON
PRINCIPAL COMMODITIES

Article and Unit of Quantity				y on Whic as Collecte		Gross Excise Duty Collected		
			1964-65 1965-66 1966-67 1964-65 1965-66			1965-66	1966–67	
			ı	'000	l		\$'000	l
Beer* Spirits (Potable) Tobacco Cigars and Cigarettes Petrol All Other Articles	proof	gal gal lb lb gal	601 2,075 18,958 467,501	561 1,994 19,595 487,784	547 1,843 18,563 527,357	* 4,074 4,152 68,270 45,644 79,843 201,983	5,059 4,363 79,907 57,492 95,095	5,416 4,128 77,962 64,865 102,062

^{*} Not available. Excise duty collected on Beer included under "All Other Articles".

The overseas trade and the gross revenue collected at Victorian ports during the year 1966-67 are shown in the following table:

VICTORIA—OVERSEAS TRADE AND GROSS REVENUE COLLECTED AT VICTORIAN PORTS, 1966–67 (\$'000)

Particulars		Melbourne*	Geelong	Portland	Westernport	Total
Overseas Trade— Imports Exports		985,371 720,660	60,188 79,025	13,906 1,502	13,049	1,072,514 801,187
Total		1,706,031	139,213	15,408	13,049	1,873,701
Gross Revenue— Customs Excise Total	::	106,593 244,961 351,554	1,096 5,204 6,300	863 4,268 5,131	14	108,566 254,433 362,999

^{*} Includes Port of Melbourne, Essendon Airport, and Parcels Post.

AUSTRALIA—VALUE OF OVERSEAS TRADE, GROSS CUSTOMS, AND EXCISE DUTY COLLECTED BY STATES, 1966–67 (\$'000)

			Excess of	Gross Duty	Collected
State	Imports	Imports Exports		Customs	Excise
New South Wales . Victoria	. 1,323,597	878,446	-445,151	140,386	309,192 254,433
Ousepaland	. 1,072,514	801,187 499,968	-271,327 $306,291$	108,566 19.784	100.109
South Australia .	. 196,771	325,170	128,399	16,763	66,219
	. 159,390	421,325	261,935	13,569	58,176
Morthern Torritory	. 85,572 7.386	88,835 8,968	3,263 1,582	3,430 1,166	21,070 2,218
Australian Capita	al		,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	,	_,
Territory	. 6,434	26	6,408	66	14
Australia	. 3,045,341	3,023,925	-21,416	303,730	811,431

Note.—Minus (-) sign denotes excess of imports.

Transport

Shipping

Coastal Trade

In the post-war years, particularly since 1959, significant changes have taken place in the carriage of goods by sea around the Australian coast. The Port of Melbourne, the principal sea terminal for Victoria which is the centre of the coastal trade routes around the mainland coast and to Tasmania, has been experimenting with new methods of cargo handling and "packaging" and the introduction of new specialised ships. In the years following the Second World War, Australian shipowners revised their trading practices in the face of vigorous competition

from the land based transport operators. As a result the entire coastal trade by sea was transformed, and ships modified to make them more useful as a means of transportation around the coast.

One of the results of this was the expansion of the bulk cargo trade in which more goods (such as sugar and a variety of oils and oil products) began to be carried in bulk. Later, single bags, boxes, packages began to be packed into unit loads and containers which facilitated handling on ship and shore by means of new and improved mechanical cargo handling equipment. These new methods led to the specialised ship, exclusively designed and equipped to meet the requirements of the particular trade. These were the roll-on roll-off stern loading ships for cargo packed on road vehicles which travelled in the vessel, and the container ship designed for containerised cargo and other unit loads. The first roll-on roll-off ship in Australia was introduced in 1959 between Melbourne and Devonport in northern Tasmania.

Australia's first specially designed container ship came into service between Melbourne and Launceston in 1961, and was followed in 1964 by a larger container ship for the Melbourne–Fremantle trade. By then, between 7,000 and 8,000 containers were in transit between all States on these ships as well as on conventional and specially modified ships. These new methods are now well established and are being extended to the ports of Sydney and Brisbane.

Efforts are continuing to improve the handling and carrying of general cargo in addition to bulk cargoes which are most suitably carried by sea. More specialised and larger ships in the bulk trades are also proving valuable.

New packaging and cargo handling methods, as well as new ships, are bringing changes to port facilities, where specially designed wharves, equipment, and port modifications are matching the new concepts in ship and cargo handling around the Australian coast. These new concepts are also being extended to Australia's overseas trade.

Searoad Service between Victoria and Tasmania

The following table gives details of the searoad service operated by the Australian Coastal Shipping Commission between Victoria and Tasmania:

VICTORIA—TASMANIA: SEAROAD SERVICE,* 1966–67

Name of Vesse	el		Passengers	Accompanied Vehicles	Trade Vehicles†	Mail Vans
"Princess of Tasmania" Bass Trader"	,,	::	87,440 1,607	21,384 746	2,971 4,003	312 310
"South Esk" Other A.C.S.C. Vessels					274 744	
Total			89,047	22,130	7,992	622

^{*} Excludes commercial cargo which consists of unit loads, i.e., containers, trailers, timber packs, etc., as well as powered commercial vehicles.

[†] Motor vehicles available for sale.

Vessels Entered and Cleared

The number of vessels entering Victorian ports, the number cleared from those ports, and their total tonnage in each of the five years 1962-63 to 1966-67 were as follows:

VICTORIA—OVERSEAS AND INTERSTATE SHIPPING

		Year	Ended 30 J	une			
	Partic	uiars	1963	1964	1965	1966	1967
Entrances		No.	3,581 15,183	3,717 16,137	3,690 16,534	3,753 16,380	3,706 17,439
Clearances	••	No.	3,581 15,187	3,681 15,940	3,679 16,448	3,754 16,384	3,710 17,427

Nationality of Shipping

The countries of registration of vessels which entered or were cleared at Victorian ports during the years 1965-66 and 1966-67 were as follows:

VICTORIA—NATIONALITY OF SHIPPING ('000 Net Tons)

V 1 10		D		Vessels	Entered	Vessels	Cleared
vessels Re	gistered s	at Ports in-		1965–66	1966-67	1965–66	1966–67
Australia				3,195	3,310	3,199	3,322
Belgium				8	21	8	21
Denmark				210	278	206	278
France				341	253	339	253
Germany, Fed	ieral R	epublic o	f	569	418	528	425
Greece				549	579	553	577
Hong Kong				233	206	215	209
India				109	131	116	131
Italy				730	797	732	797
Japan				717	889	722	886
Liberia				1,059	1,205	1.067	1,196
Mexico				1,000	22	1,007	22
Netherlands				843	936	830	934
New Zealand				203	180	227	178
Norway				1.258	1.442	1,275	1,421
Pakistan		• • •		1,230	42		42
Panama		• • •	• • •	189	206	180	206
Sweden		• • •	• • •	515	701	554	696
United Kingd	om.	• • •	• • •	5,322	5,438	5,327	5,443
United States		erica	• • •	165	210	170	214
U.S.S.R.			• • •	54	17	66	17
Yugoslavia	• •	• •	• • •		24	00	24
Other		• •	• •	·i11	134	70	135
otiloi	• •		•••	111	134		133
Total				16,380	17,439	16,384	17,427

Shipping Entered at Victorian Ports

Particulars of shipping which entered each principal port of Victoria are given in the following table for the years 1965–66 and 1966–67:

VICTORIA—VESSELS ENTERED AT EACH PORT

CI. A.V.		Melb	ourne G		long	Portland		Westernport	
Class of Vessel		1965–66	1966-67	1965–66	1966–67	1965–66	1966–67	1965–66	1966-67
Overseas—			'	1	Nur	nber	,	J	
Direct		221	238	251	204	10	16		33
Other		1,574	1,588	166	214	79	95		9
Interstate	• •	1,213	1,084	220	165	19	22	• • •	38
Total		3,008	2,910	637	583	108	133		80
Overseas—				ı	'000 No	et Tons	1		•
Direct		983	902	1,969	1,765	53	85		500
Other		8,980	9,311	873	1,174	331	438		63
Interstate		2,304	2,105	772	709	115	130		256
Total		12,267	12,318	3,614	3,648	499	653		820

Cargoes Discharged and Shipped

The following tables show the tonnage of overseas and interstate cargoes discharged and shipped in Victorian ports during 1965–66 and 1966–67, as well as the tonnage of overseas cargoes discharged and shipped during the years 1964–65 to 1966–67 according to the countries of origin and consignment, and the nationalities of the vessels in which the cargoes were carried:

VICTORIA—CARGOES DISCHARGED AND SHIPPED AT EACH PORT

('000 Tons)

Particulars		Melbourne		Gee	long	Port	land	Westernport	
		1965–66	1966–67	1965–66	1966–67	1965–66	1966–67	1965–66	1966–67
14	D 	1,718 830	1,466 677	558 1	490	79	88		57
		3,220 1,550	3,527 1,538	3,867 27	4,138 18	23	12		1,223
SHIPPED Interstate— Weight Measure		440 702	389 789	758 2	593 3		1		389
Overseas— Weight Measure	. <i>.</i>	1,017 675	1,239 590	1,461	1,377	69	165 1		100

VICTORIA—OVERSEAS CARGOES DISCHARGED AND SHIPPED ACCORDING TO COUNTRY OF ORIGIN AND CONSIGNMENT

('000 Tons)

Country of Origin	1964	1–65	1965	5–66	1960	6–67
or Consignment	Dis- charged	Shipped	Dis- charged	Shipped	Dis- charged	Shipped
Arabian States	3,516	18	3,212	16	3,693	10
Canada	297	84	342	106	252	49
China (Mainland)	16	386	21	634	22	262
Christmas and Cocos	10					
Islands	248	5	233	4	300	3
Germany, Federal						
Republic of	307	134	278	113	108	68
Hong Kong	248	127	63	99	49	69
India	73	304	48	125	30	152
Indonesia	351	131	331	77	230	231
Iran	177	7	356	54	1,154	42
Iraq	897	10	984	11	1,224	1
Italy	16	17	34	23	45	96
Japan	295	362	334	296	393	527
Nauru	381	22	256	24	470	31
Netherlands	21	23	22	3	77	74
New Zealand	95	143	134	205	85	155
Pakistan	2	69	11	12	21	114
United Kingdom	532	448	570	389	429	327
United States of America	684	61	712	87	874	102
Other	605	1,056	744	948	999	1,167
Total	8,760	3,406	8,687	3,225	10,457	3,479

VICTORIA—OVERSEAS CARGOES DISCHARGED AND SHIPPED ACCORDING TO NATIONALITIES OF VESSELS ('000 Tons)

Vessels Registered		1964-65		196	5-66	1966–67		
at P	orts in-	ered 	Dis- charged	Shipped	Dis- charged	Shipped	Dis- charged	Shipped
Australia Belgium Denmark France Germany, Republic	 of	Federal	57 237 396 607	9 1 55 9	3 100 647 500	49 40 7	8 54 286 454 310	1 44 18
Greece		:	70	280	122	322	247	298

VICTORIA—OVERSEAS CARGOES DISCHARGED AND SHIPPED ACCORDING TO NATIONALITIES OF VESSELS—continued

('000 Tons)

Vessele Desistant	1964	1-65	1965	5-66	1966–67	
Vessels Registered at Ports in—	Dis- charged	Shipped	Dis- charged	Shipped	Dis- charged	Shipped
Hong Kong	. 44	131	85	67	127	84
India	. 55	21	45	26	78	65
Italy	. 432	53	224	4	73	5
Ianan	209	120	314	134	438	180
Liberia	1,112	82	1,277	130	186	234
Mexico	'		1,2		16	2
Netherlands	108	342	418	244	611	429
New Zealand	0/	124	93	182	85	123
Norway	1 176	489	1,308	437	1.802	338
Pakietan			,		25	12
Danama	. 97		169	69	202	40
Sweden	226	157	231	142	333	252
United Kingdom	3 252	1.091	3,039	1,110	3.562	1,161
United States of America		34	3,039	27	46	39
Other	. 48	181	75	107	1,514	76
Total	8,760	3,406	8,687	3,225	10,457	3,479

Note.—In the two preceding tables tons measurement have been added to tons weight.

Port Phillip Sea Pilots

Thirty-six former shipmasters are licensed by the Marine Board of Victoria to perform all pilotage duty within Port Phillip Bay. One is in charge of the Williamstown office as Secretary-Treasurer; the others, in turn, take a week in command of the pilot steamer cruising off Point Lonsdale to put pilots aboard incoming ships or take them off departing vessels.

Thirty-four pilots are rostered for the various pilotage duties: from the Heads to Port Melbourne, Williamstown, Geelong, and Westernport; between Geelong and Melbourne; in the Yarra River or Victoria Dock; or elsewhere as required. Pilots for inward ships are organised by the Pilot-in-charge of the steamer; those for departing ships and ships berthing by the Williamstown office staff.

Tide is the pilot's greatest hazard at the Heads. Flowing over an uneven, rocky bottom at a rate of up to 10 knots, it creates a steep and turbulent sea at the narrowest part of the entrance. These strong tides have scoured out a deep gutter round Point Nepean, and the main stream of the tide following this gutter has the effect of setting ships sideways, towards the dangerous reefs bordering Point Nepean.

Inside the Heads is the 12-mile long South Channel for deep-loaded ships and the shorter and narrower 8-mile long West Channel for ships under 17 ft draught. From the end of these channels, vessels may proceed either to the Port of Geelong or to the Port of Melbourne.

Vacancies in the Pilot Service are filled by shipmasters with a pilotage exemption certificate who have traded regularly to the Port. Each pilot must purchase a share in the pilot vessels and other necessary plant. Pilotage dues are set and collected by the Marine Board. Ten per cent of these are taken out for expenses and contributions to the Pilots Sick and Superannuation Fund, the balance of 90 per cent being paid to the pilots for disbursements, crew and staff wages, and for pilots' remuneration.

The following table shows the number of ships (sailing inwards and outwards) piloted through Port Phillip Heads during the years 1958 to 1967:

VICTORIA—NUMBER OF SHIPS PILOTED THROUGH PORT PHILLIP HEADS

Year		No. of Ships		Year		No. of Ships	
1958			3,311	1963	•••		4,333
1959		[3,593	1964			4,505
1960			3,768	1965			4,738
1961			4,228	1966			4,759
1962			4,177	1967			4,606

Further Reference, 1963

Melbourne Harbor Trust

Administration

The Melbourne Harbor Trust Commissioners are a financially independent, corporate body operating under the provisions of the Melbourne Harbor Trust Act of 1876, and subsequent amendments and variations. The land and waters of the 10½ square mile port area are vested in the six Commissioners who are appointed by the Governor in Council. They comprise a full-time chairman who also is virtually the port's managing director, and five part-time commissioners who, in accordance with the Act, must be associated with various port activities, i.e., shipping, primary production, imports, exports, and port labour.

The Melbourne Harbor Trust Commissioners are both the Port Authority and the Conservancy Authority of the Port of Melbourne. The Trust maintains, improves, and develops the port, and is empowered under its Act to make regulations for the management and financing of the port subject to the approval of the Governor in Council.

Finance

The Port of Melbourne is self supporting, and does not receive any financial grants from the State Government. The Trust is financed by the users of the port, and it derives its income from a number of charges, principally wharfage rates, levied on each ton of cargo landed

in, or shipped out, of the port, and tonnage rates levied on the gross registered tonnage of ships and the time they spend in port. Other charges cover rent of sheds, hire of port owned cargo handling equipment, general port services, and rental of land reserved for essential long term port development. Expenditure is on port maintenance, reconstruction, modernisation, and development, with any surplus put back into port development. In 1966, the Trust had more than \$70m invested in port assets. Capital works are financed out of revenue and out of loans, which, mainly privately arranged, are raised and financed by the Trust itself, and which are guaranteed by the Trust's income from wharfage and tonnage. The Trust is required to pay into the Consolidated Revenue of the State Government approximately one-fifth of its revenue from wharfage and tonnage.

Further References, 1961–1968; Changing Trends in Port Development, 1968 Port Facilities

Three distinctive types of facilities for the transfer of cargo between ship and shore have now become established in Melbourne. The first is for bulk cargo, i.e., cargo of a homogeneous nature handled loose and either wet, such as crude oil, and other petroleum products, and dry, such as phosphate, rock, sulphur, gypsum, sugar, and coal. The second is for specialised general cargo which is a heterogeneous variety of goods and products packed into containers, and unit-loads of multi-ton capacity. The third is for conventional general cargo which is cargo packed in a variety of packages, boxes, or bags each of which is handled individually on ship and shore.

Since 1958, methods of handling general cargo in the port's coastal trade with other Australian ports have undergone a transition from the conventional to the specialised methods which is now almost complete. Special port facilities have been in operation for many years to cater for these cargo handling methods. A similar transition in cargo handling methods has begun in the overseas general cargo trade through the port, and all future planning and construction of new berths and wharves is being directed towards catering for similar specialised methods.

Bulk Cargo

At Williamstown there are two berths for tanker ships handling crude oil, including one for ships up to 95,000 dwt and 950 ft in length; on the lower reaches of the River Yarra, seven berths for petroleum products, petrochemicals, chemicals, raw sugar, phosphate, rock, soda ash, sulphur ammonia, molasses and lubricating oils; at Appleton Dock, two berths for scrap metal, coal, and phosphate; and on the upper reaches of River Yarra, two berths, one for bulk cement, and one for gypsum.

Specialised General Cargo

At the River Entrance there are two berths handling more than 1 mill. tons of unit load and container cargo a year in the Melbourne-Northern Tasmania trade. A third berth was being completed in 1968 to cater for an increase in existing services and an extension of specialised services to Queensland and the Northern Territory. Cargo is transferred by roll-on/roll-off and lift-on/lift-off methods.

On the Yarra River South Bank there are two berths: one catering for container and unit load cargo in the Launceston-Melbourne trade, and the other handling a variety of iron and steel, in unit loads and bulk.

On the Yarra River North Bank container and unit load cargo are transferred by roll-on/roll-off and lift-on/lift-off methods in the Hobart-Melbourne trade. A second berth, adjacent, was being completed in 1968 for the introduction of container, unit load cargo trade between Melbourne and New Zealand ports with cargo being transferred by the roll-on/roll-off methods.

On the Maribyrnong River facilities consist of a container unit load and livestock general cargo in the trade between King Island and Melbourne.

Passenger Traffic

In the Port Melbourne area there is a four berth dual purpose pier, the principal overseas passenger terminal with upper level facilities for passengers and lower level cargo and vehicular traffic and railway area. At the River Entrance area separate passenger facilities are available at the specialised cargo handling terminal for passengers on the Devonport-Melbourne service.

Conventional General Cargo

Yarra River North Bank: 12 berths.

Yarra River South Bank: 19 berths including two specially reconstructed for timber handling.

Victoria Dock: 23 berths including one used at regular fortnightly intervals for the all-container cargo trade between Fremantle and Melbourne, and three reconstructed berths which are used for both conventional and container, unit load cargo.

Appleton Dock: three berths which in the overseas cargo transition period are used for both unit load and container cargo as well as conventional cargo.

Port Melbourne area: one four-berth pier used exclusively for general cargo, and the passenger terminal.

Miscellaneous

The port also has a number of berths for use by small craft, such as fishing boats, yachts, etc., tugs, and dredging plant.

The following table shows particulars of the financial operations of the Melbourne Harbor Trust for the years 1963 to 1967:

VICTORIA—MELBOURNE HARBOR TRUST: REVENUE, EXPENDITURE, ETC. (\$'000)

Particulars	1963	1964	19 65	19 6 6	1967
Revenue					
Wharfage and Tonnage Rates	5,442	7,145	7,058	6,393	6,692
Rent of Sheds	326	637	606	572	586
Special Berth Charges	428	456	431	317	381
Rent of Lands	662	666	725	949	965
Crane Fees	1,436	1,613	1,800	1,672	1,793
Other	676	796	814	792	796
Total Revenue	8,970	11,312	11,434	10,695	11,213
EXPENDITURE AND APPROPRIATIONS	,				
Administration and General Expenses	500	710	784	874	908
Port Operating Expenses	1,916	2,160	2,413	2,422	2,642
Maintenance—		1	'	1	'
Dredging	846	1,326	508	265	203
Harbour	90	75	123	110	116
Wharves	494	502	648	638	581
Approaches	78	90	117	125	152
Railways	32	44	51	79	80
Cargo Handling Equipment	288	304	325	342	358
Other Decementing	48	38	62	93	54
Y - 4 4	1,440	1,482	1,465	1,551	1,706
15	1,386	1,647	1,486	1,584	1,427
v	160	165	96	1,304	103
	458		928	160	435
Sinking Fund	458	1,150	800	900	1.037
General Reserve	1 100	1 427			
Payments to Consolidated Revenue	1,100	1,437	1,420	1,287	1,346
Other	20		11	2	2
Total Expenditure and Appropriations	8,856	11,132	11,226	10,530	11,150
CAPITAL OUTLAY				404	204
Land and Property	82	253	224	106	201
Reclamation	56	23	32	312	408
Deepening Waterways	592	154	786	1,239	1,235
Wharves and Sheds Construction	970	1,423	1,709	1,760	2,095
Cargo Handling Equipment	116	294	359	1,252	91
Approaches Construction	142	361	464	303	355
Floating Plant	152	59	11	95	51
Other Works, etc	306	253	768	675	769
Total Capital Outlay	2,416	2,821	4,352	5,742	5,205
Loan Indebtedness at 31 December	29,836	29,773	30,473	32,247	34,484

[•] Under \$500

Geelong Harbor Trust

The Port of Geelong is under the control of the Geelong Harbor Trust which was constituted under an Act of 1905. The Trust consists of three Commissioners appointed by the Governor in Council.

Entrance to the port is by 15 miles of channel dredged to a depth of 36 ft and a width of 400 ft.

There are nineteen effective berths in the port and two berths at the Commonwealth Explosives Pier, Point Wilson—owned and operated

by the Commonwealth. Maximum water depths are 36 ft at eight berths, 32 ft at ten berths (all within the inner harbour), and three outer harbour berths of 30 ft. Special berths are provided for the handling of coal, grain, phosphatic rock and sulphur, oil, frozen meat, and alumina. The bulk grain terminal has a 26 mill. bushel storage capacity, and is capable of loading ships at the rate of 1,600 tons per hour.

Refinery Pier can accommodate simultaneously four oil tankers with maximum drafts of 34 ft. The Harbor Trust cool stores have a storage capacity of 900,000 cu ft. Adequate open coal storage is available. The port has good clearance facilities, with direct rail loading at seven berths and road clearance at all berths.

A modern dry bulk berth equipped with four $7\frac{1}{2}$ ton kangaroo cranes giving an initial discharge rate of 1,000 tons per hour was commenced in 1966, the adjoining Kings Wharf having been strengthened in the meantime to accommodate the cranes which are now in operation. The new berth is expected to be in operation by March 1969.

The Harbor Trust has floating plant which includes seven tugs, six barges, and one diesel-powered floating crane.

Particulars of the financial operations of the Geelong Harbor Trust for the years 1963 to 1967 are shown in the following table:

VICTORIA—GEELONG HARBOR TRUST: REVENUE, EXPENDITURE, ETC.

(\$'000)

Particulars	1963	1964	1965	1966	1967
REVENUE Wharfage, Tonnage, and Special Berth Rates Shipping Services Rents, Fees, and Licences Freezing Works and Abattoirs Other	2,156 517 36 44 79	2,284 615 38 50 115	2,238 722 43 63 159	2,373 838 45 64 120	2,464 851 47 64 53
Total Revenue	2,832	3,102	3,225	3,440	3,479
EXPENDITURE AND APPROPRIATIONS Management Expenses	252 464 82 78 10 22 320 60 394 54	272 516 70 78 24 22 344 72 414 	344 622 77 85 10 18 390 77 432	366 647 102 71 13 17 401 76 515 1,007	382 614 89 81 16 26 400 77 603 500 66
Total Expenditure and Appropriations	1,736	1,914	2,127	3,277	2,854

VICTORIA—GEELONG HARBOR TRUST: REVENUE, EXPENDITURE, ETC.—continued (\$'000)

Particulars		1963	1964	1965	1966	1967
Capital Outlay (Net))					
Floating Plant		178	592	100		651
Land and Property		84	104	294	70	138
Deepening Waterways		636	228	500	69	1,942
Wharves and Approaches		498	898	2,332	431	553
Other		34	30	46	11	36
Total Capital Outlay		1,430	1,852	3,272	581	3,320
Loan Indebtedness at 3 December	31					
State Government	••	234	228	193	124	118
Public		5,878	6,958	7,490	7,404	7,618
Total Loan Indebted	ness	6,112	7,186	7,683	7,528	7,736

Portland Harbor Trust

Situated on the south-west coast of Victoria, the Port of Portland has been administered by the Portland Harbor Trust Commissioners since 1951 and serves an area of about 40,000 sq miles of western Victoria and the south-east of South Australia. The Port is within a few miles of the main overseas and coastal shipping routes with deep water approaches right up to the entrance of the harbour basin.

Two breakwaters enclose an area of 250 acres of sheltered water to form the harbour basin, while all cargo berths have rail and road access to main Victorian and interstate traffic routes.

The highlight of activity within the Port during 1966–67 was centred around negotiations with a major fertilizer company for the establishment of a multi-million dollar fertilizer complex on 23 acres of reclaimed land adjacent to the main shipping berths. By March 1967 reclamation of an initial area was completed and construction of the fertilizer complex commenced. Reclamation of the remaining area was virtually complete at the end of 1966–67.

Establishment of this new industry at Portland is expected to provide an added stimulus to a growing port trade through the importation of large tonnages of raw materials required for manufacturing purposes.

Construction of the Trust's new bulk shipping berth, designed primarily to handle imports associated with fertilizer manufacture, proceeded on schedule during 1966–67 and was completed early in 1968.

New records for the quantity of cargo handled and the number of vessels berthed in the Port were established during 1966-67, when the volume of imports and exports rose to 446,678 tons; an increase of 40.5 per cent over the previous year.

The number of ships using the Port for all purposes during 1966–67 was 291, an increase of 164 over the previous year. This major growth resulted largely from activity created through the off-shore search for oil and gas in the Otway Basin.

Particulars of the financial operations of the Portland Harbor Trust for the years 1962-63 to 1966-67 are set out in the following table:

VICTORIA—PORTLAND HARBOR TRUST: REVENUE, EXPENDITURE, ETC. (\$'000)

Particulars 1962-63 1963-64 1964-65 1965-66 1966-67 REVENUE Wharfage Rates Tonnage Rates . . 156 126 130 117 137 22 22 24 21 26 Shipping Services 44 42 84 63 108 ٠. State Government Grant 576 615 498 646 711 ٠. Grain Terminal.. ... 82 207 ٠. Other .. 64 86 53 46 57 926 994 925 Total Revenue ... 754 1,169 EXPENDITURE AND APPROPRIATIONS Administration ... 68 76 58 64 60 78 Maintenance 80 67 66 Shipping Services 70 74 92 61 88 27 Depreciation .. 12 14 16 26 Interest on Loans 739 562 562 622 677 Sinking Fund .. 52 42 47 50 42 . . 33 36 Loan Redemption Grain Terminal (excl. Depreciation) 35 73 2 8 Total Expenditure and 834 814 911 1,032 1,159 Appropriations CAPITAL OUTLAY Port Rail System 49 30 Reclamation 2 315 114 . . Grain Terminal.. 133 1,036 ·111 131 . . 50 51 Deepening Waterways 30 51 ٠. . . 395 173 Wharves and Sheds 302 386 68 ٠. 42 Breakwater Construction 160 70 18 . . 185 Other .. 46 48 131 196 978 Total .. 560 352 1,388 1,048 Loan Indebtedness at 30 June-State Government .. 4,092 4,083 4.092 4,083 4,083 13,027 13,939 Public 10,952 12,310 10,274 18,022 16,393 17,110 Total Loan Indebtedness ... 14,366 15,044

Lighthouses, 1964

Westernport

Westernport is eastward of and adjacent to Port Phillip, and is separated from it by the nine-mile wide Mornington Peninsula. The port is sheltered from Bass Strait by Phillip Island at its southerly end, and the waters between the western side of this island and the mainland form the entrance to the port. The entrance to the port contains some extensive sand banks; however, a deep water channel exists close in to the island with depths as great as 17 fathoms. This navigable channel extending from the Western Entrance to Crib Point is 14½ miles long with low water depths of 47 ft in the Northern Arm and 49 ft in the Western Arm. Tidal rises are of the order of 9 to 10 ft springs and 7 ft 6 in neaps.

The Westernport (Oil Refinery) Act, passed by the Victorian Government in June 1963, gave effect to an agreement between the State and B.P. Refinery (Westernport) Pty Ltd, for the establishment of a refinery and associated port facilities at Crib Port. A marine terminal capable of berthing tankers of 100,000 tons deadweight has since been established and during 1966–67 was used by some eighty tankers. The terminal provides two berthing heads, the northern one being capable of taking tankers up to 100,000 tons deadweight, and the southern one 40,000 ton tankers.

The Westernport Development Act, passed by the Victorian Government in December 1967, gives effect to an agreement between the State and Hematite Petroleum Pty Ltd, and Esso Exploration and Production Inc. The agreement provides for the establishment of a fractionation plant to process petroleum recovered in waters adjacent to the State and the construction of additional port facilities.

A single berth marine terminal, which has been designed for the berthing of tankers up to 100,000 tons deadweight, is at present under construction at Long Island Point abutting the site of the Esso fractionation plant. Channel dredging to 40 ft depth below datum is being provided in the first instance with 42 ft alongside the berth. It is anticipated that dredging to 47 ft in the channel and 52 ft alongside the berth to provide for 100,000 tons deadweight tankers will be carried out at a later date.

Port maintenance facilities are centred around the existing jetty at Stony Point (2 miles south of Crib Point). At the root of the jetty an area of 4 acres has been reclaimed providing an area for a depot for the servicing of buoys, navigation lights, tugs, and pilot launch. It also includes administrative offices and radio-telephonic equipment. Maritime V.H.F. radio is established at the maintenance depot at Stony Point, with remote control to the Harbour Master's quarters at Crib Point.

To facilitate berthing two ocean-going tugs—each of 1,500 h.p. and with a bollard pull of 20 tons—are provided. The tugs are fitted with fire-fighting equipment and lifting gear capable of handling the 6 ton navigation buoys in service at the port. A 200 ft extension to Stony Point Jetty provides a berth for these tugs and a new parallel jetty is used to berth smaller craft.

Pilotage for the port is undertaken by the Port Phillip Sea Pilots. Large tankers coming from the west generally take on their pilot at the Pilot Boarding Station off Port Phillip Heads; small coastal tankers from the east take on their pilot off Flinders, where a 36 ft pilot launch is provided.

Further Reference 1967, 1968

Railways

Geographical Factors

The Victorian transport system, generally, is centred around Melbourne, the capital of the State. The existence of considerable gaps in the Great Dividing Range has allowed the railway system to fan out to the main agricultural and pastoral areas like the spokes of a wheel.

The line to the north-east and Sydney passes through the Kilmore gap; through the Woodend gap goes the northern line to Bendigo and beyond; the Geelong line crosses the basalt plains to the south-west; and to the east, the Gippsland valley (between the Dividing Range and the Strzelecki Ranges) provides a convenient path for the electrified main line handling the vast brown coal resources of the Latrobe Valley.

In the north-western part of the State—the Mallee region—the railway has stimulated development of what was previously regarded as arid, worthless land into prosperous farm lands. It also links the Metropolis with Mildura, centre of the dried fruit industry.

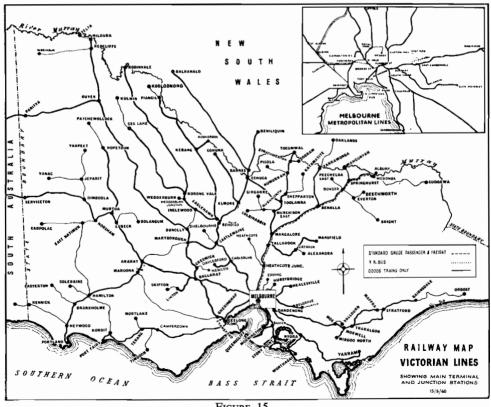


FIGURE 15.

Historical Development

The first proposed railway for Victoria dates back to March 1839, when Robert Hoddle, Government Surveyor at Port Phillip, marked out a town site at the Beach (Port Melbourne) and planned a line from Melbourne. Seven years later, Geelong residents proposed the construction of a 200 mile line from Geelong to the vicinity of Portland and Hamilton in the Western District. In 1852–53, private railway companies were formed in Victoria and given Government approval to build lines

Australia's first steam railway was operated between Flinders Street and Sandridge (now Port Melbourne) on 12 September 1854, and was opened by the Hobson's Bay Railway Company for public traffic the following day. The first Victorian country railway—Melbourne to Geelong—was opened on 25 June 1857, and private companies' lines were built from Melbourne to Windsor, Brighton Beach, and Hawthorn between 1859 and 1861.

In 1862, Government lines were opened to Ballarat and Bendigo, and two years later, from Bendigo to Echuca. (The Geelong-Melbourne railway had been purchased by the Government in 1860.)

In less than a decade, Victoria saw fulfilled the promise of building the main trunk railways. Through the 1870s, construction proceeded to the south-west from Geelong and to the south-east from Melbourne. In 1870, contracts were let for building the line from Essendon to Wodonga. The north-eastern railway, opened in sections, reached Wodonga in 1873. Nearly ten years elapsed before junction was made with the New South Wales system at Albury on 14 June 1883. This was the beginning of the break of gauge, which persisted to plague New South Wales and Victoria until 79 years later, when the standard gauge track between Melbourne and Albury was opened for traffic in 1962.

Administration and Functions

The Victorian Railways Department was established on 19 March 1856. It is administered by a Board of three Commissioners, appointed by and responsible to the Government through the Minister of Transport. Each Commissioner gives special attention to particular branches of railway operation. They are also responsible for a number of sections of railway constructed in New South Wales under the Border Railways Agreement. The lines in the Riverina district are extensions of Victorian lines.

Main Locations of Tracks

The main interstate lines are the north-east to Sydney, comprising both broad (5 ft 3 in) and standard (4 ft $8\frac{1}{2}$ in) gauge tracks to the border city of Albury (190 $\frac{1}{2}$ miles), and the north-western broad

gauge line linking Melbourne with Adelaide. The Victorian terminal station on this line is Serviceton (287 miles). The north-east line branches at Mangalore to serve the Goulburn Valley. The north-western line branches at Ballarat (74 miles) to Maryborough (112 miles), thence to Mildura (351 miles—the State's longest country main line), and at Ararat to Portland, the Western District's new port (251½ miles).

The Gippsland line is electrified as far as Traralgon (97½ miles), and thence is diesel operated to Bairnsdale (171 miles). The goods service, also diesel operated, is continued through to Orbost (231 miles). Lines branch from Dandenong to Nyora and from there to Wonthaggi (86 miles) and Yarram (136 miles), in South Gippsland.

Other main lines are Melbourne-Bendigo (101 miles—known as the "main line") from where lines branch further north; and Melbourne-Geelong (45 miles), continuing to Warrnambool (166 miles) and to Port Fairy (186½ miles).

Main Types of Rolling Stock and Services

Diesel-electric locomotives—the S class and X class (1,800 hp) and B class (1,600 hp)—haul Victorian Railways fast passenger and freight trains. The T class (950-1,050 hp) diesel-electric locomotive is mainly a freight train operator, but it also hauls selected passenger The Y class (650 hp) diesel-electric locomotive hauls branch line freight trains and is also used on freight yard work. The W class (650 hp) diesel-hydraulic locomotive and the F class (350 hp) diesel-electric are almost exclusively used on shunting and transfer work. The L class (2,400 hp) electric locomotive hauls passenger and freight trains on the Gippsland line-Victoria's longest electrified track. Country passenger train services are supplemented by 102 hp, 153 hp, and 280 hp diesel, and 260 hp diesel-electric rail-cars. Only a small number of steam locomotives now haul freight trains. multiple-unit saloon type suburban electric trains are progressively replacing obsolete swing-door compartment type trains on the suburban electric service.

Most carriages on interstate and many on mainline country trains are of steel construction and air-conditioned; but a number of excursion and corridor compartment-type, non air-conditioned carriages of wooden construction are also used for country passenger traffic.

Freight wagons are of the fixed wheel or bogie types. They include many types of wagons and vans, up to 57-ton capacity, and a wide variety of specially designed wagons to carry loads ranging up to 170 tons.

Suburban Tracks

Victoria's first section of 5 ft 3 in gauge suburban line was built from Flinders Street station to Sandridge (now Port Melbourne) in 1854 for Australia's first train. Construction of other lines was as follows: Flinders Street to St. Kilda (1857); Footscray to Williams-

town (1859); Princes Bridge to Hawthorn, Richmond to Brighton Beach (1859–61); Melbourne to Essendon (1860); Essendon to Broadmeadows (1872); South Yarra to Dandenong (1877–1879); Caulfield to Frankston (1881–1882); Hawthorn to Lilydale (1882); Brighton Beach to Sandringham (1887); North Melbourne to Somerton (1884–1889); Collingwood to Heidelberg (1888); Ringwood to Upper Ferntree Gully, Clifton Hill to Preston (1889); Burnley to Darling and Camberwell to Ashburton (1890); Princes Bridge to Collingwood (1901); Heidelberg to Eltham (1902); Eltham to Hurstbridge (1912); Darling to Glen Waverley (1929–30); Ashburton to Alamein (reconditioned and reopened in 1948); Fawkner to Upfield (reopened in 1959); Upper Ferntree Gully to Belgrave (converted to broad gauge and electrified in 1962); and Lalor to Epping (reopened in 1964).

Australia's first electric train ran from Newmarket to Flemington Racecourse on Sunday 6 October 1918. However, electric traction for passengers did not start until the following year.

The line from Essendon to Sandringham was first converted from steam to electric traction, and four years later the electrification of Melbourne suburban railways, as originally planned, was completed. Since then electric traction has been extended to several sections of the outer suburban area. Victoria which was first with the steam train was also first with electric traction in Australia.

Passenger and Goods Traffic, Fares, and Freight Rates

The general conditions under which goods and livestock are carried by rail are published in the Goods Rates Book, and for rating purposes, goods are classified alphabetically into twenty main class rates, whilst special rates are provided for livestock. Relatively low rates are applicable to agricultural produce and concessions are provided for country industries.

Competitive freight contract rates to meet road transport activities operate in the main Victorian country towns, particularly those close to the borders where road competition is intense.

Special rates, under agreement with forwarding agents and manufacturers, provide for the transport of goods in specified wagon-loads between the capital cities and also for the carriage of goods in various containers, including Flexi-Vans.

The bulk of the passenger revenue is derived from the operation of the suburban electrified service; traffic on this has fallen slightly in recent years. However, additional trains are needed to handle a growing long distance load. In 1946, the number of trains required for the peak service was 109; in 1968 it was 138. Following elimination of break of gauge at Albury for passenger trains since April 1962, a significant gain has been recorded in passenger traffic between Melbourne and Sydney, and interstate passenger business generally has been active. Introduction of air-conditioned carriages on several country lines in recent years has also resulted in improved services.

The ordinary fares are competitive and attractive concessions are available, e.g., to students travelling on vacation, and party travel.

Parcels sent by passenger trains are a large revenue earner.

Standardisation of Gauge in Australian Network

The track mileage of the standard gauge line between Melbourne and Albury, including loops, departmental sidings, and dual gauge, but not including private sidings, is 243 miles.

Linking of Sydney with Perth, by an all standard gauge route when the existing gaps—Broken Hill to Port Pirie and Kalgoorlie to Perth—are filled, will not be to the disadvantage of Victoria. Melbourne consignors have direct access to the Sydney standard gauge line connecting with every station in New South Wales and with Brisbane, and to the broad gauge line to Adelaide, connecting with practically every important centre of population in South Australia. These connections give direct rail access to about three-quarters of the population of Australia.

Bogie Exchange

The exchange of bogies which was pioneered by the Victorian Railways, has proved of great assistance to standard gauge operation. It is now an essential part of interstate railway operation, whereby loaded rail wagons travel over different gauge lines of Australian railways—between Kalgoorlie (Western Australia) and Brisbane (Oueensland).

Bogie exchange has been responsible for many improvements, such as: faster transport of freight, less chance of loss through pilfering (the contents of the vehicles do not require handling), better use of rolling stock, better use of existing staff, and improved customer relations.

Bogie exchange was a sequel to the completion in 1962 of the standard gauge railway from Wodonga to Melbourne that extended the New South Wales standard gauge network interstate to Melbourne. Passengers no longer need to change trains at Albury, nor does freight have to be transferred there.

However, a considerable tonnage of Victorian and overland broad gauge traffic still required transfer at either Albury, or Melbourne, to travel in New South Wales and through to Brisbane. As a result of investigations into methods of reducing this transfer time, it was decided to experiment with bogie exchange.

A temporary installation was established at Dynon freight terminal on the fringe of Melbourne, with a 3-rail section of dual-gauge. It was soon proved that bogie exchange was a practical and economic method of transfer, but it was obvious that a properly planned permanent centre was necessary if the available and new traffic stemming from the elimination of manual transfer were to be handled efficiently. Consequently, a bogie exchange centre was established on a $4\frac{1}{2}$ acre site at South Dynon.

The bogie exchange operation itself is quick and simple. A vehicle coming in on its arrival gauge is raised off its bogies by four 25-ton electric jacks, simultaneously operated from one control point. The arrival bogies are wheeled out, and others of different gauge are then wheeled under the raised vehicle. After the bogies are in position, the jacks lower the vehicle, which, after final adjustments to brake gear, etc., is ready to depart on the chosen gauge.

Bogies can be changed under a loaded vehicle in much shorter time than that taken for transhipping goods from one wagon to another at break-of-gauge terminals. The South Dynon bogie exchange centre can handle 200 vehicles per day, allowing up to 7,000 tons of freight to move undisturbed over both gauges.

The success of the Dynon installation was responsible for a smaller bogie exchange centre being established at Wodonga to handle the traffic between the northern States and northern and north-eastern Victoria. A similar installation followed at Port Pirie, South Australia, to transfer vehicles between the South Australian and Commonwealth railway systems.

With direct loading of vehicles between Brisbane and Kalgoorlie, rolling stock of all four systems—New South Wales, Victoria, South Australia and Commonwealth—can now be seen together in any of these States. Bogie exchange also gives the benefits of a direct multi-State link to both country and metropolitan districts in Victoria, New South Wales, and South Australia.

With bogie exchange, the tonnage of overland traffic handled by rail in Victoria is very much greater than that handled in 1962, and it continues to show a steady annual increase.

Gauge standardisation projects at present in course will give direct loading facilities from Brisbane to Perth, via Sydney and Broken Hill, but bogie exchange will still be required for vehicles dispatched from many New South Wales and Victorian stations to Adelaide and Perth.

Developmental Programme

The Victorian Railways are pursuing a policy within the limits of available finance, of modernising the system by purchasing more diesel-electric locomotives, suburban electric trains, and other rolling stock, and are continuing the programme of track relaying and duplication in suburban and country districts.

The current financial programme provides for further work to proceed on the Melbourne Goods Yard re-arrangement project (including an automated shunting hump), additional suburban track work, automatic signalling improvements, etc.

Money has been made available also to eliminate more level crossings by grade separation and protect other crossings with flashing light signals and boom barrier installations.

Additional amounts have been allocated for building vehicles for general merchandise and to handle specialised traffic, such as flexivans, steel sections, motor cars, bulk cement, and freight consignments of unusual length.

Further References, 1961-1968

The following tables relate to the State railways and road motor services under the control of the Victorian Railways Commissioners. Certain border railways in New South Wales are, by agreement between the Victorian and New South Wales Governments, under the control of the Victorian Railways Commissioners. Particulars of these have been included with those of the State railways being operated within the State. Details of the operations of the road motor services are shown on page 774.

Capital Cost of Railways and Equipment

The capital cost of all lines constructed and in course of construction, and of all works, rolling-stock and equipment of the Railway Department as at 30 June of each of the five years 1963 to 1967 is shown in the following table:

VICTORIA—TOTAL CAPITAL COST OF RAILWAYS, ETC., EQUIPMENT AND ROLLING-STOCK (\$'000)

				Rail	ways	Road	Total
At 30 June—			e—	Lines Opened	Lines in Process of Construction	Motor Services	Capital Cost*
1963				 302,402	2,224	14	304,856
1964		••		 312,512	2,478	47	315,172
1965				 322,259	2,686	38	325,053
1966				 332,956	2,693	61	335,710
1967				 345,813	389	45	346,247
				_			,

^{*} Written down in accordance with Railways (Finances Adjustment) Act 1936, and allowing for depreciation since 1 July 1937. Particulars are exclusive of the cost of stores and materials on hand and in course of manufacture.

At 30 June 1967, the capital cost of the broad gauge rolling-stock, after being written down in accordance with the *Railways* (*Finances Adjustment*) Act 1936, and allowing for depreciation was \$96.9m; of the narrow gauge \$0.01m; and of the uniform gauge \$6.6m.

Loan Liability and Interest

The face value of stock and bonds allocated to the Railways Department, as reduced in accordance with the *Railways* (Finances Adjustment) Act 1936, amounted to \$379.4m at 30 June 1967.

After deducting the value of securities purchased from the National Debt Sinking Fund and cancelled (\$50.5m.), the net liability on current loans outstanding at that date was \$328.9m.

The total liability of the State for railways construction, etc., at 30 June 1967 (which includes the liability referred to in the previous paragraph) was \$441.1m. Deduction of securities purchased from the National Debt Sinking Fund and cancelled (\$72.1m) together with cash at credit in the Fund (\$0.2m) reduced the amount outstanding at the end of the year to a net liability of \$368.8m.

The Railways (Funds) Act 1961 provided that interest and other charges on moneys borrowed for the purposes of the Railways Act 1958 should not henceforth be included in the accounts of the Victorian Railways, but would be charged against the revenues of the State. However, the Railways (Funds) Act 1964 reimposed on the Railways, with effect from 1 July 1964, the obligation to pay interest and debt charges on moneys borrowed for the purposes of the Railways Act 1958 on and after 1 July 1960. The total annual interest payable on the liability of \$368.8m at 30 June 1967, amounted to \$17.5m at an average rate of \$4.758 per cent. Of this amount, the Victorian Railways are liable for \$5.3m. In addition, the State is required to pay a contribution of \$3.2m at a rate of \$4.50 per cent on cancelled securities.

Additional funds, which amounted to \$50.5m at 30 June 1967, have been provided for railway construction, equipment, stores, etc., out of Consolidated Revenue, the National Recovery Loan, the Uniform Railway Gauge Trust Fund, and other funds. No interest is charged against railway revenue on these amounts with the exception that interest at 5 per cent is payable to the Commonwealth on the repayable principal amount outstanding in respect of expenditure on the uniform gauge. (See page 621 of the Victorian Year Book 1966.)

Railways Staff

The number of officers and employees in the Railways Service (including casual labour and butty-gang workers), and the amount of salaries and wages (including travelling and incidental expenses) paid in each of the five financial years 1962–63 to 1966–67 are shown in the following table:

VICTORIA—RAILWAYS STAFF: NUMBERS, SALARIES, ETC.

				Number of	Salaries, Wages,		
Year Ended 30 June—			Permanent	Supernumerary and Casual	Total	and Travelling Expenses	
							\$'000
1963				18,047	11,202	29,249	66,156
1964				17,848	10,349	28,197	69,087
1965			'	16,859	10,604	27,463	75,760
1966				16,158	11,473	27,631	77,980
1967				15,704	11,038	26,742	79,464

Railways Route Mileage

The route mileage of the railways (exclusive of road motor service route mileage) for each of the years 1962-63 to 1966-67 is given in the following table.

It should be noted that the Victorian Railways operate certain services in New South Wales. At 30 June 1967, the total length of these services was 204 route miles. This distance is included in the Single Track Broad Gauge Section of the table.

VICTORIA—RAILWAYS ROUTE MILEAGE (EXCLUDING ROAD MOTOR SERVICES)

P. Calan	At 30 June—					
Particulars	1963	1964	1965	1966	1967	
LINES OPEN FOR TRAFFIC	route miles					
Single Track—Broad Gauge* Narrow Gauge Double Track—Broad Gauge* Other Multi-Track—Broad Gauge*	3,756 8 426 75	3,700 8 425 77	3,694 8 431 78	3,671 8 431 78	3,711 8 431 79	
Total Route Mileage	4,265	4,210	4,211	4,188	4,230	

Broad gauge refers to 5ft 3 in gauge track and includes 4 ft 8½ in gauge track and dual track.

Railways Rolling Stock

The following table provides a description of the various types of rolling stock in service (exclusive of road motor rolling stock) for each of the years 1962–63 to 1966–67:

VICTORIA—RAILWAYS ROLLING STOCK IN SERVICE (EXCLUDING ROAD MOTOR SERVICES)

Delline Steele to S	Rolling Stock in Service				At 30 June—						
Rolling Stock in S	ervice		1963	1964	1965	1966	1967				
ocomotives											
Steam	• •		258	246	220	181	132				
Electric	• •		35	35	35	35	35				
Diesel Electric		• •	105	139	161	185	199				
Other*	• •	• •	83	84	87	85	87				
Total			481	504	503	486	453				
assenger Coaches—											
Electric Suburban			1,080	1,074	1.080	1,089	1,116				
Other†			732	724	712	698	675				
Total			1,812	1,798	1,792	1,787	1,791				
Goods Stock ‡			21,761	21,792	21,891	21,914	21,725				
service Stock			1,667	1,660	1,676	1,659	1,625				

Other locomotives comprise diesel hydraulic locomotives, cranes, rail motor diesel power units, and non-passenger carrying rail tractors.

[†] Passenger coaches owned jointly with New South Wales and South Australia have been included.

[‡] All parcels and brake vans and standard gauge stock have been included.

Railways Traffic

The traffic of the railways (exclusive of road motor traffic) for each of the years 1962-63 to 1966-67 is shown in the table below:

VICTORIA—RAILWAYS TRAFFIC (EXCLUDING ROAD MOTOR SERVICES)

	During Year Ended 30 June-					
Traffic	1963	1964	1965	1966	1967	
Traffic Train Mileage—Country '000 Suburban '000 Goods '000	4,829 8,303 6,345	4,835 8,369 6,909	4,836 8,480 7,172	4,738 8,458 6,949	4,798 8,504 6,733	
Total '000	19,477	20,113	20,488	20,145	20,035	
Passenger Journeys—Country '000 Suburban '000	5,140 147,587	5,082 148,313	4,907 144,846	4,793 144,332	4,674 141,593	
Total '000	152,727	153,396	149,753	149,125	146,267	
Goods and Livestock Carried '000 tons	10,841	12,132	12,596	12,156	12,075	

The tonnage of various classes of goods and the total tonnage of livestock carried by the Victorian Railways for each of the years 1962–63 to 1966–67 are shown in the following table:

VICTORIA—RAILWAYS GOODS AND LIVESTOCK TRAFFIC (Excluding Road Motor Goods Services) ('000 Tons)

	Class of Go	ods			Qu	antity Carr	ied	
				1962–63	1963-64	196465	1965–66	1966–67
Butter			·	85	86	90	82	69
Grain—								
Barley				177	177	215	210	196
Wheat				1,887	2,368	2,235	2,035	1,869
Other				318	307	343	220	322
Flour				168	218	197	153	145
Bran, Pollar	d, and Sh	narps		67	82	76	53	51
Fruit—								
Fresh				111	109	110	92	86
Dried				65	67	71	74	103
Beer				119	124	129	134	140·
Briquettes				1,526	1,586	1,594	1,571	1,487
Cement				468	573	731	782	807
Coal—								
Black				205	219	214	195	213
Brown				390	483	389	363	363
Galvanised 1	fron			80	111	111	104	116
Iron, Steel	Bar Roo	ds. etc	Un-					
prepared		,		404	448	473	424	462
Manures				818	951	1,077	1,154	1.171
Motor Cars	and Bodi			140	175	192	182	197
Petrol, Benz				207	195	155	133	145
Pulpwood				97	83	109	124	124
Pulp and Pa	per			141	128	129	125	135
Timber				234	264	292	272	252
Wool				115	132	136	133	141
All Other G	oods			2,726	2,934	3,169	3,303	3,322
Tot	al Goods			10,548	11,820	12,237	11,917	11,916
	al Livesto			293	312	359	239	158
	nd Total	Goods	and	10,841	12,132	12,596	12,156	12,075

Railways Revenue and Expenditure

The revenue and expenditure of the Railways Department during each of the five financial years 1962-63 to 1966-67 were as follows:

VICTORIA—RAILWAYS REVENUE AND EXPENDITURE (\$'000)

	(\$000)				
D. d. L.		Year	Ended 30 J	une	_
Particulars	1963	1964	1965	1966	1967
Revenue					
Passenger, etc., Business-					
Passenger Fares	25,104 2,894 80	25,201 3,044 77	27,455 3,376 87	27,826 3,630 163	30,162 4,135 88
Goods, etc., Business—					
Goods Livestock Miscellaneous	50,470 1,988 628	56,121 1,941 677	60,488 2,158 722	59,276 1,478 692	61,531 1,026 769
Miscellaneous—					
Dining Car and Refreshment Services	3,004 1,568 828 210 206	2,964 1,588 828 219 219	3,058 1,653 920 208 201	3,345 1,710 1,054 211 234	3,464 1,880 1,053 228 241
Total Revenue	86,980	92,878	100,326	99,619	104,579
Expenditure					
Working Expenses—					
Way and Works Rolling Stock	17,068 24,246 27,958 4,234 1,206 4,658 1,520 400	17,633 26,388 28,857 4,328 1,277 4,797 1,566 400	18,851 29,071 31,743 4,471 1,406 4,870 1,343 400	19,633 28,997 32,939 4,563 1,426 4,945 1,173 400	19,940 28,740 34,611 4,427 1,563 5,073 1,146 400
and Fire Insurance Fund Pay-roll Tax	1,100 1,586 1,010 2,142	1,163 1,647 1,236 2,344	1,533 1,803 1,371 2,606	1,315 1,744 1,353 2,664	1,441 1,852 1,521 2,846
Total Working Expenses	87,128	91,636	99,470	101,151	103,560
Net Revenue	-148	+1,243	+856	-1,532	+1,019

For footnotes see next page.

VICTORIA—RAILWAYS REVENUE AND EXPENDITURE—continued (\$'000)

Particulars		Year 1	Ended 30th .	June	
r at ticulars	1963	1964	1965	1966	1967
Expenditure—continued					
Debt Charges—					
Interest Charges and Expenses†	ן	1	2,918§	3,726	4,546
Exchange on Interest Payments and Redemption	 	} ‡	131§	129	132
Contribution to National Debt Sinking Fund)]	137§	176	213
Net Result for Year			-2,330	-5,563	-3,872
		i	Per Cent		
Proportion of Working Expenses to Revenue	100 · 2	98.7	99 · 1	101 · 5	99.0

^{*} Including interest paid to Commonweath under Railways Standardisation Agreement viz., 1963, \$216,832; 1964, \$234,692; 1965, \$229,796; 1966, \$224,898, and 1967, \$220,000

Revenue for 1966–67 increased by \$4,960,295 compared with 1965–66. Total working expenses increased by \$2,408,448 as compared with the previous year.

Under the provisions of the Railways (Funds) Act 1961, an account was created in the Trust Fund and called the "Railway Equalisation Account". The Act provided for the annual appropriation out of the Consolidated Revenue and the payment into the Equalisation Account of any excess of railway income over railway operating expenses for the preceding year. Moneys standing to the credit of the Account were to be available for the purpose of supplementing railway income in the event of its falling short of railway operating expenses. The amounts paid into the Equalisation Account were \$1,840,692 for the year 1960-61, \$7,318 for 1961-62, and \$740,758 for 1963-64. To offset deficits for the years 1962-63 and 1964-65, amounts of \$419,168 and \$2,169,601, respectively, were transferred to Railway Revenue from the Equalisation Account, the latter transfer extinguishing the balance in the Account. The calculation of these amounts was based on Treasury figures (which on the income side are mainly cash records) and not on net revenue shown in the previous table.

[†] Including Loan Conversion Expenses.

[‡] Under provisions of the Railways (Funds) Act 1961, interest and other charges on borrowed moneys were not charged to Railways Accounts during the years 1962-63 and 1963-64.

[§] Under the provisions of the Railways (Funds) Act 1964, interest and debt charges on moneys borrowed on and after 1 July 1960 became chargeable against Railway Revenue with effect from 1 July 1964.

The earnings, expenses charged to railway revenue, and gross revenue per average mile of railway worked for each of the five years 1962–63 to 1966–67 were as shown in the following table:

VICTORIA—RAILWAYS REVENUE AND EXPENDITURE PER AVERAGE MILE OPEN (EXCLUDING ROAD MOTOR SERVICES)

	Year Ended 30 June—						
Particulars	1963	1964	1965	1966	1967		
Average Number of Miles Open for Traffic	4,265	4,242	4,211	4,189	4,218		
Open \$	20,376	21,878	23,807	23,765	23,601		
Working Expenses per Average Mile Open \$	20,398	21,572	23,590	24,112	24,519		

Road Motor Services

The following table gives, for each of the five years 1962-63 to 1966-67, particulars of the operations of the road motor services under the control of the Railways Commissioners:

VICTORIA—ROAD MOTOR SERVICES (Under the Control of the Railways Commissioners)

Particular.			Year Ended 30 June—							
Particulars		1963	1964	1965	1966	1967				
Car Mileage		321,680	341,304	329,635	314,337	283,201				
Passenger Journeys		1,252,167	1,243,820	1,154,104	1,060,324	1,033,774				
Gross Revenue	\$	73,648	72,800	73,274	68,925	70,287				
Working Expenses	\$	128,262	122,132	133,138	145,393	136,571				
Capital Expenditure End of Year (Depreciation V ten Off)		14,452	46,962	38,156	60,859	44,990				

Note.—The apparent discrepancy between the amount of working expenses and revenue was brought about by revenue not having received a proportion of combined rail and road services earnings, while working expenses have been charged with road motor operating cost in full.

Tramway and Omnibus Services

Melbourne and Metropolitan Tramways Board

The Melbourne and Metropolitan Tramways Act provides for a Board consisting of chairman, deputy chairman, and member appointed by the Governor in Council. Subject to the direction of the Minister, the Board controls, manages, operates, and maintains the tramways of the Metropolitan Area, and a fleet of buses plying on routes permitted by the Transport Regulation Board.

As the community grows and the use of private motor vehicles extends, passengers using public transport become fewer and this causes financial strain. Notwithstanding this, the Board has a policy of expansion and in 1961 acquired a privately owned network of buses in the rapidly developing suburbs of Box Hill, Nunawading, Ringwood, Mitcham, Doncaster, Bulleen, and Warrandyte, and extended some other services.

Details of the revenue and expenditure of the Melbourne and Metropolitan Tramways Board for the years 1963-64 to 1966-67 are shown in the following table:

VICTORIA—MELBOURNE AND METROPOLITAN TRAMWAYS BOARD: REVENUE, EXPENDITURE, ETC.

	(\$,000)			
Post 1		Year Ende	d 30 June—	
Particulars	1964	1965	1966	1967
Revenue				
Traffic Receipts	16,474	17,580	17,421	19,060
Miscellaneous Operating Receipts	166	171	177	176
Non-operating Receipts	297	290	356	312
Total Revenue	16,937	18,041	17,954	19,548
Expenditure				
Traffic Operation Costs Maintenance—	7,819	8,311	8,430	9,096
Permanent Way	770	910	924	960
Tramcars	2,055	2,229	2,315	2,457
Buses	744	773	774	765
Electrical Equipment of Lines and				
Sub-stations	433	483	501	474
Buildings and Grounds	254	257	229	206
Electric Traction Energy	908	889	884	874
Fuel Oil for Buses	213	200	171	184
Bus Licence and Road Tax Fees	21	25	27	25
General Administration and Stores				
Department Costs	996	1,172	1,183	1,178
Pay-roll Tax	297	320	326	346
Workers Compensation Payments	328	359	338	496
Depreciation	902	922	1,013	1,014
Non-operating Expenses	52	59	63	65
Provisions—				
Long Service Leave	225	240	318	290
Retiring Gratuities	434	436	587	527
Accrued Sick Leave	36	46	57	56
Public Risk Insurance	207	230	234	286
Interest on Loans	945	1,035	1,129	1,222
Obsolescence in Stores Stock	8	6	7	8
Total Expenditure	17,647	18,902	19,509	20,529
Net Surplus (+) or Deficit (-)	-710	-861	-1.555	-981
Capital Outlay	1,101	2,886	1,442	1,317
Loan Indebtedness at 30 June	18,497	20,950	22,396	23,397
,	•			, , , , ,

Particulars relating to the tramway systems under the control of the Melbourne and Metropolitan Tramways Board are shown for each of the years 1962–63 to 1966–67 in the following table:

VICTORIA—MELBOURNE AND METROPOLITAN TRAMWAYS BOARD: TRAMWAYS

Year Ended 30 June	Track Open at 30 June—		Tram	Passenger	Operating	Operating	At 30 June		
	Double	Single	Mileage	Journeys	Receipts	Operating Expenses	Rolling- Stock	Persons Em- ployed	
	miles		°000		\$'000		No.		
963	135	4	17,708	162,692	13,860	13,764	712	4,204	
964	134	4	17,575	160,479	13,630	14,011	712	3,968	
965	134	4	16,920	147,891	14,552	15,047	703	3,793	
966	134	4	16,609	140,556	14,727	15,636	693	3,786	
967	134	4	16,571	131,876	15,921	16,440	693	3,745	

In the following table, the operations of the motor omnibus systems of the Melbourne and Metropolitan Tramways Board are shown for each of the years 1962–63 to 1966–67:

VICTORIA—MELBOURNE AND METROPOLITAN TRAMWAYS BOARD: MOTOR OMNIBUS SYSTEMS

						At 30 1	lune
Year Ended 30 June— Route Miles		Bus Mileage	Passenger Journeys	Operating Receipts	Operating Expenses	Rolling- Stock	Persons Em- ployed
		'0	00 	\$.000		No.	
1963	123	7,341	32,634	3,036	3,544	238	918
1964	123	7,283	32,426	3,010	3,583	232	869
1965	123	7,267	29,812	3,199	3,797	223	842
1966	123	6,763	25,120	2,871	3,809	231	828
1967	126	6,931	25,107	3,315	4,024	223	817

The following tables give an analysis of operating receipts, operating expenses, etc., for each of the five years 1962-63 to 1966-67:

VICTORIA—MELBOURNE AND METROPOLITAN TRAMWAYS BOARD: TRAMWAYS: OPERATING RECEIPTS, OPERATING EXPENSES, ETC., PER MILE, ETC.

			Ope	rating Rece	eipts	Operatin	g Expenses	Ratio Operating	
	Year Ended 30 June—		Amount	Per Vehicle Mile	Per Passenger	Amount	Per Vehicle Mile	Expenses to Operating Receipts	
			\$'000	cents	cents	\$,000	cents	%	
1963			13,860	78.27	8.52	13,764	77.73	99·31	
1964			13,630	77.55	8.49	14,011	79.72	102.80	
1965			14,552	86.01	9.84	15,047	88.93	103 · 40	
1966			14,727	88.67	10.48	15,636	94.15	106 · 17	
1967	• •		15,921	96.08	11.96	16,440	99.21	103 · 11	

VICTORIA—MELBOURNE AND METROPOLITAN TRAMWAYS BOARD: MOTOR OMNIBUS SYSTEMS: OPERATING RECEIPTS, OPERATING EXPENSES, ETC., PER MILE, ETC.

			Оре	rating Reco	eipts	Operating	Expenses	Ratio Operating
	Year Ended 30 June—		Amount	Per Vehicle Mile	Per Passenger	Amount	Per Vehicle Mile	Expenses to Operating Receipts
			\$,000	cents	cents	\$,000	cents	%
1963	• •		3,036	41.36	9.30	3,544	48.28	116.73
1964	• •		3,010	41.33	9.28	3,583	49.20	119.04
1965			3,199	44.02	10.73	3,797	52.24	118 · 69
1966		٠.	2,871	42.45	11.43	3,809	56.32	132.67
1967			3,315	47.83	13.10	4,024	58.06	121 - 23

Private Motor Omnibus Services

The following table contains particulars of the operations of Victorian private omnibus services. In addition to details of route operations, charter, school and other special services are included. In the year 1966–67, route operations accounted for 61 per cent of total mileage travelled, while charter, school, and other special services accounted for 10, 27, and 2 per cent, respectively.

VICTORIA—PRIVATE MOTOR OMNIBUS SERVICES

Posts I			Year	Ended 30 J	une	
Particulars		1963	1964	1965	1966	1967
Number of Vehicles		2,195 31,361 10,954	2,376 33,024 12,998	2,549 35,355 14,196	2,843 35,669 16,461	2,701 35,114 16,713
Total Mileage .		42,315	46,022	49,551	52,130	51,826
Revenue		13,769	15,513	\$'000 17,364	18,476	19,628
Repairs and Maintenance . Depreciation		4,460 1,999 1,300 4,523	4,965 2,093 1,550 5,096	5,531 2,182 1,758 5,653	6,068 2,268 1,887 6,203	6,273 2,431 1,910 6,620
Total Expenditure .	.	12,282	13,704	15,124	16,426	17,234
O4h A4-		3,977 4,517	6,583 5,105	4,680 6,136	5,403 7,081	5,199 7,444
Total Assets	.	8,495	11,688	10,816	12,484	12,643
Comital		2,537 5,958	2,842 6,926	3,896 6,920	4,417 8,068	4,534 8,110

Tramways in Extra-Metropolitan Cities

The cities, other than the Metropolis, having electric tramway systems are: Ballarat, with 13.84 miles of lines (2.33 double and 11.51 single track) and Bendigo, with 8.64 miles of lines (2.43 double and 6.21 single track). Both of these systems are operated by the State Electricity Commission of Victoria.

The traffic particulars of these lines for each of the five years 1962-63 to 1966-67 are summarised in the following table:

VICTORIA—TRAMWAYS IN EXTRA-METROPOLITAN CITIES

Year Ended 30 June—	Track	Open Single	Tram Mileage	Passenger Journeys	Traffic Receipts	Operating Expenses	Rolling Stock	Persons Em- ployed
1963	mi 5	18	839	00 5,583	210	558	46	o.
1964 1965 1966 1967	5 5 5 5	18 18 18 18	840 828 830 836	4,945 4,728 4,333 3,861	244 230 248 282	605 661 720 755	46 46 46 48	191 184 187 184

Motor Vehicles

Registration, Licences, etc.

Every motor car and motor cycle must be registered with the Chief Commissioner of Police if used on Victorian roads. All trailers (except certain small trailers for private use and agricultural implements), fore-cars, and sidecars drawn by or attached to motor cars or motor cycles must also be registered.

The following is a brief summary of the annual fees applicable at I March 1968, in respect of the principal types of registration and for the licensing of drivers and riders:

Type of Registration or Licence	Annual Rate
REGISTRATION—	
Motor Cycle (without trailer, etc.)	\$4.10
Motor Cycle (with trailer, etc., attached)	\$6.10
Motor Car (private use)	\$0.60 for each power-weight unit*
Motor Car (private and business use)	\$0.75 for each power-weight unit*
Trailer (attached to motor car)	From \$2.50 each, according to the unladen weight and use
Motor Car (Commercial Passenger Vehicle) operating on a stage omnibus service or a temporary school service licence.	\$15.00
Motor Car (used for carrying passengers or goods for hire or in the course of trade).	From \$1.10 to \$2.30 for each power- weight unit* according to the unladen weight and the type of tyres
Motor Car (constructed for the carriage of goods owned by primary producers and used solely in connection with their business).	From \$0.30 to \$1.30 for each power-weight unit* according to the number of wheels and the type of tyres. (When more than one motor car is so owned, the rate shall apply to one motor car only.)
Mobile Crane, self-propelled (used otherwise than for lifting and towing vehicles).	\$27.10 (Unless a lower fee would otherwise have been payable.)
LICENCE—	
Driver or Rider Licence	\$6.00 issued for a three year period (An additional fee of \$2.00 is payable by all applicants for new licences.)
Instructors' Licences	\$20.00 issued for a three year period

^{*} The number of power-weight units is that number which is equal to the sum of the horsepower and the weight in hundredweights of a motor car unladen and ready for use.

Note.—The minimum annual fee for the registration of any motor vehicle other than a motor cycle is \$12.00.

The following table shows the number of motor vehicles on the register by type at the end of each of the years 1955, 1962 (census years), 1965, 1966, and 1967. Particulars of Commonwealth-owned vehicles with the exception of Defence Service vehicles are included. Tractor-type vehicles, plant, and trailers are excluded.

VICTORIA—MOTOR VEHICLES ON THE REGISTER ACCORDING TO TYPE

Type of Vehicle		At 31 December—									
		1955	1962	1965	1966	1967					
Cars* Station Wagons Utilities Panel Vans Trucks† Omnibuses		422,543 5,690 75,721 19,913 70,362 2,580	611,496 69,528 94,470 31,328 79,482 3,409	706,067 131,128 93,414 33,648 87,870 3,979	731,647 146,032 92,216 34,253 89,713 4,145	763,585 159,915 91,615 35,300 90,606 4,266					
Total (Excluding Me Cycles)	otor	596,809	889,713	1,056,106	1,098,006	1,145,287					
Motor Cycles§		26,406	15,802	12,095	11,811	13,601					
GRAND TOTAL		623,215	905,515	1,068,201	1,109,817	1,158,888					

^{*} Includes ambulances and hearses.

The following tables show, for each of the years 1962-63 to 1966-67, the number of drivers' and riders' licences in force, and the total revenue received at the Motor Registration Branch of the Police Department:

VICTORIA—DRIVERS' AND RIDERS' LICENCES IN FORCE AT 30 JUNE

Type of Licence		1963	1964	1965	1966	1967	
Drivers'			1,084,931	1,133,387	1,185,050	1,227,990	1,280,459
Riders'		••	27,819	29,061	30,385	31,487	32,832
	Total	••	1,112,750	1,162,448	1,215,435	1,259,477	1,313,291

VICTORIA—GROSS REVENUE COLLECTED BY MOTOR REGISTRATION BRANCH (\$'000)

Particulars	1962–63	1963–64	1964–65	1965–66	1966–67	
Registrations and Drivers' Licences Other	Tax	23,792 1,288 252	26,038 1,222 356	29,714 1,824 605	41,052 2,872 581	43,299 2,746 612
Total		25,332	27,616	32,143	44,505	46,657

[†] Includes trucks and truck-type vehicles, but excludes tractors, plant, and trailers.

[§] Includes motor-scooters.

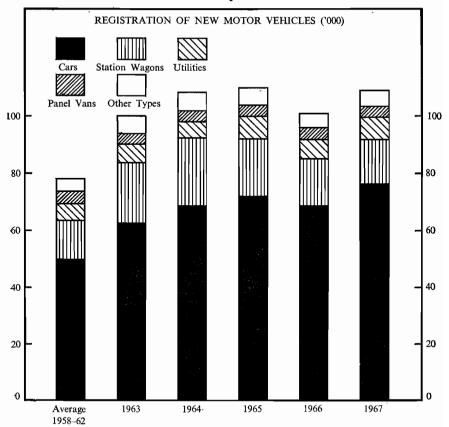


Figure 16-New Motor Vehicle Registrations 1958 to 1967

VICTORIA—REGISTRATIONS OF NEW MOTOR CARS AND STATION WAGONS ACCORDING TO MAKE

(Includes Commonwealth-owned Vehicles Other than Those of the Defence Services)

Mak			N	lotor Cars		Station Wagons			
Mar	te		1965	1966	1967	1965	1966	1967	
Austin			669	2,724	3,033	51	2	••	
Chevrolet			569	507	417	9	2	3	
Chrysler			7,162	7,557	7,935	2,706	2,265	2,268	
Datsun			581	788	2,234	148	175	551	
Fiat			388	238	328	19	6	6	
Ford			13,108	13,928	17,424	3,278	3,527	3,799	
Hillman			1,190	1,143	1,852	171	140	85	
Holden			22,673	20,777	21,365	12,760	9,431	8,490	
Humber			1,063	432	126	1			
Isuzu			536	382	288				
Mercedes Benz	• •	••	410	512	543			1	
Morris		••	8,779	5,973	5,939	6	3		
Peugeot			426	347	453	74	45	54	
Rambler			407	383	369	46	37	28	
Studebaker			344	411	9	27	44	1	
Toyota	• •		2,653	3,936	5,348	625	622	541	
Triumph	• •		371	291	355				
Vauxhall	• •		2,091	1,546	848	29	27	2	
Volkswagen	• •		5,952	4,048	3,775	619	288	334	
Wolseley	• •		540	264	8				
Other	• •	••	2,322	2,185	3,505	371	151	107	
Total		[72,234	68.372	76,154	20,940	16,765	16,270	

VICTORIA—REGISTRATIONS OF NEW MOTOR VEHICLES OTHER THAN MOTOR CARS, STATION WAGONS, AND MOTOR CYCLES ACCORDING TO MAKE

(Includes Commonwealth-owned Vehicles Other than Those of the Defence Services)

		19	66			1967				
Make	Utilities	Panel Vans	Other*	Total	Utilities	Panel Vans	Other*	Total		
Austin Bedford	1 8	2 113	354 1,668	357 1,789		3 80	325 1,582	328 1,665		
Chrysler	910			910	646	1		647		
Commer	14	248	213	475	5	212	234	451 836		
Dodge	123 1,424	36 523	514 718	673 2,665	261 1,841	38 1.003	537 701	3,545		
Holden	3,081	1,594		4,675	2,994	1,606		4,600		
International	183	48	1,116	1,347	164	59	1,226	1,449		
Land Rover	326	6	2	334	328	1	9	338		
Morris	167	608	123	898	152	703	109	964		
Toyota	423	24	309	756	448	70	484	1,002		
Volkswagen	63	396	54	513	77	384	72	533		
Other	347	95	630	1,072	323	130	637	1,090		
Total	7,070	3,693	5,701	16,464	7,242	4,290	5,916	17,448		

^{*} Other vehicles include trucks, omnibuses, milk tankers, petrol tankers, etc.

Transport Regulation Board

General

The Transport Regulation Board is a statutory authority charged with the task of regulating the operation of road transport in Victoria (see page 698 of the Victorian Year Book 1961). The Board derives its authority from the Transport Regulation Act 1958 and the Commercial Goods Vehicles Act 1958.

Any person who operates or intends to operate a vehicle for the carriage of goods or passengers for hire or reward or for any consideration or in the course of any trade or business whatsoever, must in addition to registering the vehicle as a commercial vehicle, have it licensed by the Transport Regulation Board. Licences issued by the Board are designed to meet the requirements of road transport needs. They may be grouped into two broad categories:

- (1) Those licences issued at the discretion of the Board; and
- (2) those licences issued "as of right".

All licences issued to owners of commercial passenger vehicles are issued at the discretion of the Board; the bulk of licences issued to owners of commercial goods vehicles are issued "as of right". The holder of a discretionary licence must operate the vehicle in a manner set down in the conditions of licence. These conditions of licence are

set by the Board. The holder of an "as of right" licence must also operate under the terms of his licence but here the terms of licence are written into legislation.

There was an increase of 3,529 in the number of licences issued for commercial goods vehicles during 1966–67; of these, 3,149 were issued "as of right".

Omnibus services were relatively stable during 1966-67, although there were further increases in costs, particularly wages, petrol and insurance. There were no general increases in fares nor were there sufficient reductions of service to bring about any notable change in the pattern of omnibus operations.

The number of permits—temporary authority to operate vehicles outside conditions of licence—issued during 1966–67 was 141,672—a decrease of 1,675 from the previous year.

Motor Boats

The Board was appointed under the *Motor Boating Act* 1961 as the registration authority for motor boats, and at 30 June 1967, 36,275 boats were registered. Registration fees collected by the Board are paid, less cost of collection, to the Tourist Development Authority for use "in the provision of facilities for motor boating in Victorian waters".

Tow Trucks and Drivers' Certificates

At 30 June 1967, there were 699 tow trucks specially licensed in Victoria. During the year, 512 applications were received from tow truck drivers wishing to be issued with driving certificates. A number of these was refused because the applicants were under the required minimum age of 21 years and not fully employed by or apprenticed in some capacity to a tow truck operator, or the Board did not consider the applicants "fit and proper" persons within the meaning of the Transport Consolidated Regulations.

Drivers of all types of commercial passenger vehicles must be in possession of a driver's certificate. This certificate is a separate and additional authority to the motor car driver's licence issued by the police. The test for a driver's certificate includes as well as a medical and eyesight test a suitable character and traffic record which is subject to police check.

A total of 2,535 applications for drivers' certificates were received during the year.

The following table shows the number of passenger vehicle licences and the discretionary goods vehicle licences current at the end of each year, the number of goods vehicle licences issued "as of right", and brief details of the financial activities of the Transport Regulation Board during the years 1962–63 to 1966–67:

VICTORIA—TRANSPORT REGULATION BOARD: LICENCES ISSUED: SUMMARY OF FINANCIAL OPERATIONS

Particulars		Year	Ended 30	June—	
r articulars	1963	1964	1965	1966	1967
T	_	ł	No.		ļ
Temporary Licences— Commercial Passenger Vehicles	172	192	223	1 221	214
Commercial Goods Vehicles	1,187	1,224	1,502	963	756
Permanent "Discretionary" Licences—	1,107	1,-21	1,002		' '
Commercial Passenger Vehicles	5,832	5,871	6,101	6,269	6.576
Commercial Goods Vehicles	8,044	8,516	10,333	10,995	11,582
Licences Issued "As of Right"— To operate for hire or reward within 25 miles of	1			1	
the G.P.O. or P.O.—					l
Melbourne	13,140	13,466	14,067	14,798	14,831
Ballarat	ln í	'		'	
Bendigo	1,527	1,594	1,618	1,537	1,512
Geelong	ļλ				
Within 20 miles of place of business of the owner; generally outside the radius of 25	1				1
miles from the G.P.O. or P.O. Melbourne,			1		
Ballarat, Bendigo, and Geelong	7,066	7,171	7,018	6,714	6,821
Primary Producers (vehicles over 2 tons	.,	'			l . _
capacity)	15,857	16,680	17,086	17,080	17,414
Commercial Goods Vehicles owned by butter	0.5	787	750	708	694
and cheese factories Commercial Goods Vehicles authorised to carry	915	101	758	/ '00 .	054
goods in connection with the owner's business			1		
(50 miles radius—vehicles up to 80 cwt				1	
capacity)	40,756	42,108	45,756	47,218	49,498
Commercial Goods Vehicles being used as-	1				
Carriers of all "Third Schedule" goods		1			J
Racehorse Floats	9,930	10,857	11,434	12,203	12,548
products	9,930	10,037	11,434	12,203	12,540
Commercial Travellers' Cars	11				
Commercial Goods Vehicles operated by					
authorised decentralised industries]	223*	507	679	768
Additional Licences to Commercial Goods	70	64	56	52	46
Vehicles to carry passengers	72	04	56	32	40
Total Licences Issued	104,498	108,753	116,459	119,437	123,260
		•	\$'000	'	
Financial Transactions—					
Revenue	1,542	1,680	1,749	2,025†	2,383
Expenditure (including payments to local			1		
authorities for road maintenance, comfort stations, and bus shelters)	1,296	1,390	1,475	1,636	1,860
stations, and bus shelters)	1,290	1,390	1,473	1,030	1,000
Balance	246	290	274	389	523
Road charges collected and transferred direct to					
Country Roads Board	4,924	5,630	5,927	6,378	6,733
Motor Boat registration fees collected and	1		1.00	150	100
paid to Tourist Fund	110	134	163	179	193
Log Book Feest	1	٠.		· · ·	3

- * Amendment to Commercial Goods Vehicles Act, December 1963.
- † Includes amount recouped from Country Roads Board for road charges collected.
- ‡ As from 15 May 1967, all collections paid to Country Roads Board.

Traffic Commission

General

The Traffic Commission is constituted by the provisions of the Road Traffic Act 1958 and consists of three Members—one nominated by the Police Department, one by the Country Roads Board, and one by the Melbourne and Metropolitan Board of Works. The function of the Commission is to advise the Governor in Council on any matter for the improvement of traffic conditions and control of traffic and to make such inquiries as it thinks fit in that behalf.

The Commission draws up the Road Traffic Regulations and recommends them to the Governor in Council. These Regulations not only prescribe rules to be observed by persons using roads, but also require highway authorities to obtain the Commission's approval before erecting any major traffic control item such as a stop sign, traffic signal, pedestrian crossing, etc.

The Commission keeps the State traffic accident records and uses information obtained from these to recommend the improvement of traffic conditions.

Clearways

In 1965, a scheme to create "clearway" conditions on 108 miles of kerbside on arterial routes throughout Melbourne was begun. Previously, kerbside parking had been banned at peak periods on the worst traffic bottlenecks on arterial roads throughout Melbourne. There were, however, many long stretches of busy arterial roads on which parking was permitted, and with increasing traffic, congestion on these lengths was becoming intolerable.

Investigations carried out by the Commission showed that wherever the one-way traffic volume on one chain streets with trams exceeded 800 vehicles per hour, traffic congestion became unreasonable. On one chain streets without trams, the critical figure was found to be 1,200 vehicles per hour. The Commission, therefore, proposed that kerbside parking on the busy side of a street should be banned during peak periods whenever the one-way volume exceeded 800 vehicles per hour on one chain streets with trams and exceeded 1,200 vehicles per hour on other one chain wide streets. Higher volumes were required before a ban was required in wider streets.

Surveys carried out by the Commission showed that banning of kerbside parking in accordance with these principles would lead to an additional 108 miles (one side) of kerbside being freed of parked vehicles during peak hours. All municipal councils concerned were asked to erect the signs necessary to implement these parking prohibitions. The signs erected consisted of normal "No Standing" signs together with 2 ft by 3 ft special "Clearway" signs at half-mile intervals along the length of road on which parking was to be prohibited.

The Commission's proposals affected twenty-two councils and if the estimated cost of erection of the signs exceeded \$200, each council was offered a 4 to 1 subsidy towards meeting the cost of their erection. All municipalities affected, except one, agreed to erect route marking signs throughout their municipal district. By June 1967, some 90 per cent of all signs required had been erected and the metropolitan route scheme was for practical purposes in effective operation. In June 1966, the Road Traffic Regulations were amended to make it an offence to drive a horse-drawn vehicle on a clearway.

Major Traffic Control Items

At 30 June 1967, the following major traffic control items were installed in Victoria: Intersection Control Signals, 392, Pedestrian-operated Signals, 258, Pedestrian Crossings, 296, and School Crossings, 1,260.

Lower Yarra Crossing Authority

The Lower Yarra Crossing Authority was formed in October 1965. Two months later it was given power under the Lower Yarra Crossing Authority Act 1965 to construct and operate a toll crossing on the Lower Yarra between Graham Street, Port Melbourne and Williamstown Road, Spotswood.

The estimated cost of the eight lane bridge and traffic interchanges is \$42m. The overall length will be 8,472 ft, including a five span cable-stayed girder bridge of 2,782 ft. The main span will be 1,102 ft in length and at its highest point, the bottom of the girder will be 176 ft above the low water mark of the navigational channel.

Work on the project commenced on 9 April 1968 and is expected to be completed in early 1971.

Road Traffic Accidents

The following tables include particulars of all road traffic accidents reported by the Victoria Police during the periods specified, which satisfied the following conditions:

- (1) That the accident occurred on any road, street, lane, thoroughfare, footpath or place open to or used by the public by right or custom, at the time of the accident;
- (2) that it involved:
 - (i) any road vehicle which, at the time of the accident, was in motion; or
 - (ii) any animal which, at the time of the accident, was in motion and was being used for the purpose of transportation or travel; or
 - (iii) any train passing over a level crossing for the time being open to the public; and
- (3) that the accident resulted in:
 - (i) death of any person within a period of thirty days after the accident; or
 - (ii) bodily injury to any person to an extent requiring surgical or medical treatment.

The tables do not include figures of accidents on railway lines (except at level crossings), or on private property. For these and other reasons, the total number of deaths shown in these tables is not comparable with those shown on page 169.

VICTORIA—ROAD TRAFFIC ACCIDENTS INVOLVING CASUALTIES: NUMBER OF PERSONS KILLED OR INJURED

					Per 100,000 of Mean Population			
Year 3	ended ine—	Number of Accidents	Persons Killed	Persons Injured	Number of Accidents	Persons Killed	Persons Injured	
1953		10,098	515	12,564	428	22	532	
1954	• •	10,537	569	13,351	435	23	551	
1955	• •	10,217	528	12,833	405	21	509 525	
1956 1957		10,606	582	13,483	414	23	535	
1957	• •	10,804 11,233	589 571	14,120 15,015	409 418	22 21	559	
1959	• •	12,462	661	16,784	449	24	605	
1960	• •	12,462	698	16,784	430	24	582	
1961	• •	12,140	773	16,757	420	27	579	
1962		11,639	818	16,074	393	28	543	
1963		12,330	803	17,149	408	27	568	
1964		13,067	838	18,401	423	27	595	
1965		14,432	907	20,482	455	29	646	
1966		14,110	933	20,277	442	29	636	
1967		14,077	963	19,994	433	30	616	

The table which follows provides a description of types of road users killed or injured in road traffic accidents occurring during the years 1964-65 to 1966-67:

VICTORIA—ROAD TRAFFIC ACCIDENTS INVOLVING CASUALTIES: DESCRIPTION OF PERSONS KILLED OR INJURED

Description	1964	1-65	1965	-66	1966–67		
	Killed	Injured	Killed	Injured	Killed	Injured	
Drivers of Motor Vehicles	349	7,722	356	8,005	343	7,858	
Motor Cyclists	10	423	16	356	12	381	
Passengers (Any Type).	253	8,386	274	8,314	300	8,201	
Pedestrians	234	2,757	246	2,543	265	2,570	
Pedal Cyclists	. 52	1,105	39	985	37	939	
Other	. 9	89	2	74	6	45	
Total .	. 907	20,482	933	20,277	963	19,994	

Particulars of victims of road traffic accidents during the years 1964-65 to 1966-67 are shown according to age in the following table:

VICTORIA—ROAD TRAFFIC ACCIDENTS INVOLVING CASUALTIES: AGE OF PERSONS KILLED OR INJURED

Age Group (Year	s)	1964	1–65	1965	5-66	1966–67		
	,	Killed	Injured	Killed	Injured	Killed	Injured	
Under 5		25	780	26	725	43	709	
5 and under 7		12	434	12	392	11	412	
7 and under 17		66	2,497	72	2,371	74	2,283	
17 and under 21		133	3,911	154	4,182	150	4,163	
21 and under 30		141	4,422	165	4,397	191	4,301	
30 and under 40		104	2,670	99	2,590	115	2,411	
40 and under 50]	99	2,180	109	2,201	104	2,130	
50 and under 60		122	1,640	93	1,587	90	1,636	
60 and over		196	1,621	203	1,510	183	1,532	
Not Stated		9	327		322	2	417	
Total		907	20,482	933	20,277	963	19,994	

Australian Road Safety Council, 1966; Melbourne Transportation Committee, 1968

Civil Aviation

Control of Aviation

The Victorian State Air Navigation Act 1958 prescribes that control of aviation within the State shall be vested in the Commonwealth. The Air Navigation Act and Regulations in Victoria are consequently administered by the Department of Civil Aviation through its Regional Director in Melbourne.

The functions performed by the Department include the following:

- (1) The registration and marking of aircraft;
- (2) the determination and enforcement of airworthiness requirements for aircraft and the issue of certificates of airworthiness, certificates of type approval, and supervision of aircraft design;
- (3) the licensing of pilots, navigators, aircraft radio operators, flight engineers, and aircraft maintenance engineers;
- (4) the licensing of airline, aerial work, and charter operators, and supervision of their activities;

- (5) the provision and maintenance of aeronautical communications, navigation aids, aerodromes, and landing grounds;
- (6) the establishment and operation of Air Traffic Control, Aeronautical Information, and Search and Rescue Services: and
- (7) the investigation of aircraft accidents, incidents, and defects.

Aerodromes

Victoria is served by Commonwealth Government owned aerodromes at Melbourne (Essendon and Moorabbin), Avalon, Bacchus Marsh, Benalla, Echuca, Mallacoota, Mangalore, and Sale, and by licensed aerodromes at Ararat, Ballarat, Bairnsdale, Corryong, Grovedale, Hamilton, Horsham, Kerang, Latrobe Valley, Mildura, Nhill, Shepparton, Swan Hill, Warracknabeal, Warrnambool, Yarram, Portland, Birchip, Orbost, Stawell, St Arnaud, and Wycheproof.

Construction of a new \$40m airport for Melbourne to accommodate international and domestic aircraft is nearing completion at Tullamarine. This is now officially titled Melbourne Airport.

All the licensed aerodromes, except the Grovedale aerodrome, are licensed to the local government authority. Under the Aerodrome Local Ownership Plan assistance is given to local authorities to maintain licensed aerodromes on a \$1 for \$1 basis. Similar assistance is given the local authority to develop and maintain aerodromes which are or will be served by a regular public transport service. Local authorities which have received developmental assistance include Corryong, Horsham, Mildura, Portland, Warracknabeal, and Warrambool. The assistance authorised by the Commonwealth to Victorian local authorities for aerodrome works in the year ending 30 June 1969, amounts to \$136,817 for development and \$64,000 for maintenance works.

In addition to these main aerodromes, there are hundreds of authorised landing grounds which serve the needs of the growing numbers of light aircraft users throughout the State.

Private Operations

In this category, aircraft are used for the personal purposes of the owner. The extent of this activity within the State may be gauged from the fact that there are 214 aircraft registered in the private category and approximately 2,253 licensed private aeroplane pilots in Victoria.

Aerial Work Operations

Aerial survey, spotting, agricultural operations, advertising, flying training, aerial ambulance operations, and flying for government purposes are examples of the operations included in this category. In terms of hours flown, the most significant operations are agricultural (see page 793) and flying training. In 1967, 98,700 training hours were flown by training organisations in Victoria. In the interests of

encouraging flying for defence and commercial purposes, training organisations receive financial assistance from the Commonwealth. They receive direct assistance in the form of subsidy payments and provision of facilities and indirect assistance through the Australian Flying Scholarship Scheme under which, in 1966–67, 35 Victorian resident pilots commenced flying training.

Charter Operations

These consist of flights for the carriage of passengers or cargo for hire or reward, but which may not be notified to the general public as being operated between fixed terminals or to fixed schedules, or for the carriage of passengers or cargo between fixed terminals to fixed schedules in circumstances in which the accommodation in the aircraft is not available to members of the public. During the 1950s most charter operations were conducted in single engine aircraft, but there is now an increasing use of the modern small twin engine "executive" aircraft. There were eighty Victorian based operators licensed to conduct charter operations and flying hours have increased, over an eight-year period, from 1,825 in 1959 to 28,400 in 1967.

Commuter Services

Country or feeder air services within Victoria since the Second World War have been conducted by several organisations. These intra-state operations, mainly between Melbourne and the major country centres, have tended to prove uneconomic. This has been due largely to low traffic volume, competition from surface transport, and the short distances involved. Many of the routes were in the order of between 130 and 150 miles. Two airlines operated in competitive services on a number of Victorian routes during 1957 and 1958. These operations proved uneconomic and one of them, which operated 15-passenger Heron and 8-passenger Dove aircraft, finally ceased commercial operations in November 1958.

In a bid to improve the economics of Victorian intra-state services and stimulate traffic, the other airline introduced special "coach services". These were operated by high-density seating DC3 aircraft with a basic cabin service. Fares were set deliberately low to be competitive with surface transport. However, apart from one or two routes, the service failed to win sufficient support.

The Victorian Air Coach Service as it was known was discontinued but services to some of the centres were maintained. This has been achieved by operating normal type airline services using Fokker Friendship aircraft with fares set at the level charged by most intrastate airlines throughout Australia. Services have tended to concentrate in the western, south-western, and northern area of the State. The towns served have been Mildura, Warrnambool, Portland, Warrack-nabeal, Hamilton, and Swan Hill. There have been attempts to provide services to the Gippsland area, but once again, due to the short distances between the major Gippsland towns and Melbourne, they were short lived. Areas which between 1957 and 1966 experienced the convenience and desirability of an air service were then left with either none or one that was a financial liability to the company concerned.

In 1966, the Commonwealth Government felt the need for a fresh approach to providing an air service to many towns in Victoria and other parts of the Commonwealth. Normal, regular public transport services having failed, it became evident that it would be necessary for an operator to provide a service that not only bore close resemblance to an airline type operation but also maintained that high degree of safety in keeping with other sophisticated branches of aviation. There would also be the overriding factor that such services must prove economical. It was felt that this standard of service could be provided by charter operators but the Air Navigation Regulations would prevent them operating to a fixed schedule. It was decided that by granting an exemption under the Regulations a charter operator who met appropriate additional requirements and standards would be permitted to operate air services between centres to a fixed schedule and on a regular basis.

Standards and procedures were promulgated by June 1967 and interested operators were invited to submit their proposals for consideration. A number of operators within Victoria did this and submitted plans for services linking the capital and numerous country centres.

By October 1967, exemptions under the regulations had been granted to three operators. Using single and light twin engined aircraft capable of carrying six to thirteen passengers, these operators were approved to operate services to Stawell, Ararat, Ballarat, Kerang, Swan Hill, Echuca, Shepparton, Latrobe Valley, West Sale, and Bairnsdale, and to the interstate centres of Albury and Merimbula. Some of these services commenced in November 1967 with the others to follow as local and company arrangements were finalised.

Soon after these services commenced, applications had been made for new services by these operators and additional operators had submitted details of proposed services. Thus, in fact, a new era in Victorian aviation development has been reached.

Tullamarine Airport

A major aviation development affecting Victoria is the transfer of airline operations from Melbourne's existing airport at Essendon to the new airport now under construction at Tullamarine. The Federal Government is spending over \$40m at Tullamarine which is scheduled to be in use for international services in late 1969 and for domestic services in late 1970. The new airport will replace Essendon which is incapable of extension because of topography and surrounding residential development.

The Tullamarine project involves the construction of an entirely new airport on 5,300 acres of land about 12 miles from the city centre. The new airport will have two runways of 8,500 ft and 7,500 ft and a combined international-domestic terminal supported by the latest air safety aids and long range radar. There will be emphasis on domestic operations because of Melbourne's position as the centre of Australia's domestic airline network, but there will be adequate provision for international operations. International services into Melbourne during the past few years have been limited mainly to turbe-prop Electra services across the Tasman to New Zealand, because the present airport's runways (5,500 ft and 6,100 ft) cannot

accommodate commercial operations by large jet transport aircraft of the Boeing 707 and Douglas DC8 type. This situation will be remedied by the change to the new airport at Tullamarine.

It is not expected that Melbourne will supplant Sydney as Australia's major international terminal (because of Sydney's geographic position as the logical entry point for international services) but Melbourne will undoubtedly become a major international air terminal in the 1970s as it is certain that a number of the international airlines now serving Australia, principally through Sydney, will also run some services to Melbourne.

It is estimated that international traffic at the new Melbourne airport will exceed 150,000 passengers by 1970 and 250,000 passengers by 1980. (These estimates do not take into account the recent cuts in fares on international services and the stimulus these will give to traffic).

The corresponding forecasts for domestic traffic are 1,750,000 passengers by 1970 and 2,500,000 by 1980. The Department of Civil Aviation intends to retain the present Essendon Airport "as long as it has a legitimate aviation use" and its role in the system of airports serving the Melbourne Metropolitan Area will be more clearly defined when Melbourne's new airport is commissioned.

Passenger movements which represent the total number of passengers embarking on and disembarking from regular public transport services are given below for 1967 for each Victorian aerodrome to which a regular public transport service operates:

VICTORIA—PASSENGER	MOVEMENTS	1967
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Airport	Passenger Movements	Airport		Passenger Movements
Essendon-		Mildura		19,181
Domestic	1,961,690	Portland		8,273
International	48,445	Swan Hill		756
Corryong Hamilton	5,172 9,117	Warracknabeal		2,650
Iorsham	3,864	Warrnambool		8,620

Essendon Airport continues to be unique in having the only regular public transport helicopter service between a capital city airport and the city area.

Gliding Clubs

Gliding is carried out mainly by clubs which operate at Bacchus Marsh, Benalla, Colac, Horsham, and Mildura. A Commonwealth subsidy is granted to clubs through the Gliding Federation of Australia.

Air Traffic Control

Control of air traffic is maintained by the Department of Civil Aviation through its Air Traffic Control organisation. This embraces the closely co-ordinated sections of Operational Control which concerns each individual flight; Airport Control which applies to all movements on or within 20 miles of an aerodrome; and Area Control which controls aircraft along the main air routes to ensure collision

avoidance. In conjunction with Air Traffic Control, the Department maintains a wide range of Air Navigation Aids and a comprehensive Search and Rescue Organisation. This is described in detail on pages 773–775 of the *Victorian Year Book* 1965.

Aircraft Parts and Materials

There are about 130 organisations in Victoria which have been approved by the Department of Civil Aviation to distribute aircraft parts, materials, and fuel.

Aerial Agricultural Operations

As shown in the following table, aircraft are being increasingly used for appropriate agricultural operations. These include the spreading of fertilizer, seed, and insecticides. The table shows Victorian statistics for the period 1963 to 1967.

VICTORIA—AERIAL AGRICULTURE

Particulars	1963	1964	1965	1966	1967
Superphosphate ('000 acres) Seed Sown ('000 acres) Insecticides, Herbicides ('000 acres) Other Treatment ('000 acres) Total Area ('000 acres) Aircraft Hours Flown	817 19 291 63 1,190 10,400	1,232 148 359 75 1,814 12,490	1,510 55 717 130 2,412 18,797	1,690 17 386 106 2,199 18,020	2,337 19,343

^{*} Not available.

Civil Aviation Statistics

The following table shows particulars for 1967 of regular interstate and intrastate air services terminating in Victoria:

VICTORIA—REGULAR INTERSTATE AND INTRASTATE AIR SERVICES TERMINATING IN VICTORIA, 1967

Part	iculars		Interstate	Intrastate	Total
Miles Flown		 ,000	21,417	207	21,624
Paying Passengers		 '000	2,208	21	2,229
Passenger Miles		 ,000	860,506	3,424	863,930
Freight			,		,
Short Tons		 	46.888	52	46,940
Ton Miles	• • •	 '000	19,603	J ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~	19,612
Mail—		000	13,000	_	,
Short Tons .		 	4,708	19	4,727
Ton Miles		 '000	2,167	3	2,170

The first of the following tables deals with aircraft registered and licences issued by the Department of Civil Aviation in Victoria, and the second with details of Essendon Airport activities:

VICTORIA—CIVIL AVIATION

Particulars	1963	1964	1965	1966	1967
Registered Aircraft Owners	210	238	236	332	370
Registered Aircraft	387	395	510	630	742
Student Pilot Licences	1,005	1,500	1,726	2,574	2,672
Private Pilot Licences	866	1,210	1,271	1,927	2,253
Commercial Pilot Licences	214	266	259	481	515
Airline Pilot Licences	591	506	510	501	533
Aircraft Maintenance Engineers	"				
Licences	651	662	728	757	864

VICTORIA—ESSENDON AIRPORT

Particulars	1964	1965	1966	1967
Domestic Aircraft Movements Domestic Passengers Embarked Domestic Passengers Disembarked International Aircraft Movements Passengers Arriving/Departing Overseas	46,918	47,938	48,243	49,939
	743,352	856,536	890,043	976,779
	753,155	849,203	898,493	984,911
	1,085	1,201	1,120	1,036
	37,929	43,306	42,784	48,445

History of Civil Aviation, 1962; Classification of Flying Activities, 1964; Radio Aids to Air Navigation in Victoria, 1965; Aerial Agricultural Operations, 1966; Flying Training in Victoria, 1967; Regular Public Transport, 1968.

Communications

Posts, Telegraphs, Telephones, Radio, and Television: Australian Post Office

Introduction

In 1837, Mr E. J. Foster, Clerk to the Bench at the Port Phillip Settlement, was officially permitted to act as Postmaster in addition to performing his normal duties. Since that date, the Postmaster-General's Department in Victoria has developed from a staff of one in a crude bark hut to an organisation employing about 29,500 persons located throughout the State.

The complexity of modern communications requires specialisation in activities, and to meet these requirements the Victorian Administration is divided into six major sectors: the Postal Services Division, Engineering Division, Telecommunications Division, Personnel Branch, Supply Branch, Finance and Accounting Branch. Each of these sectors has numerous sections and sub-sections

At 30 June 1967, approximately 26,000 permanent officers and 3,500 part-time employees were employed by the Department in Victoria. There were 332 official and 1,702 non-official post offices, 473 small country automatic telephone exchanges, 102 large country automatic and 824 country manual exchanges, and 103 metropolitan automatic exchanges. These offices and installations ensure that departmental services were within the reach of all but the most isolated homes.

To maintain the operating staff at desirable levels, large numbers of trainees are recruited each year. In 1967, 429 technicians-intraining began their five year course at the Departmental training schools in Tooronga, Wendouree, and Bendigo; 164 linemen-in-training commenced a two year period at their training schools in Port Melbourne and Wendouree; 98 Postal Clerks-in-training were trained for eight months at the Postal Training School in Melbourne and thirty-four apprentices commenced the first year of their five year course in Melbourne.

As well as providing postal, telephone, and telegraphic services, the Department also makes available transmitting and other technical facilities to the national broadcasting and television services. The general supervision of broadcasting stations and television stations,

however, is vested in the Australian Broadcasting Control Board under the *Broadcasting and Television Act* 1942–1956, while, under the same Act, the Australian Broadcasting Commission controls the activities of the National Broadcasting Service and National Television Service.

The following information is mainly devoted to those branches and divisions of the Postmaster-General's Department that are associated with services directly available to the public.

Post Offices Branch

During the financial year 1966–67, new post office buildings were opened at Murchison, Northcote, Richmond, Doveton, Warragul, and Ferntree Gully. Modern and attractive in appearance, yet strictly functional and planned to meet future needs, they provide facilities for the latest mail handling techniques as well as improved amenities for staff. The two storeyed building at Waragul has accommodation not only for the post office on the ground floor, but also offices for the District Postal Manager and his staff on the upper floor.

For the convenience of travellers, an automatic postal sales unit was installed on the main pedestrian concourse at Spencer Street Railway Station.

Mail Exchange Branch

The ever-increasing volume of mail passing through Melbourne, led, in 1964, to the commencement of a programme to modernise, and extend, the use of mail handling machinery. This programme was completed during 1966–67, and was largely responsible for the handling of some 911 million postal articles that passed through the Melbourne Mail Exchange in the twelve months ending 30 June 1967. A further development in mail handling systems began in mid-1967 when the Postmaster-General introduced Postcode.

Postcode

Postcode is designed to ensure the speedy and efficient sorting of mail by electronic processes. Electronic sorting equipment was first installed in the Redfern Mail Exchange, New South Wales, and similar machinery will be progressively installed in all Mail Exchange Branches throughout Australia. Although the equipment and the method are based on overseas systems, the Australian-named Postcode is an improved version. The electronic machinery was designed and built in Australia, and modifications were made after prolonged testing under normal working loads in the Redfern Mail Exchange. The advanced design of the equipment has aroused the interest of many countries abroad whose representatives are studying the first installation in Sydney with a view to adopting the Australian Postcode system themselves.

Postcode is a new four digit postal address code which will provide a fast and reliable mail service, notwithstanding the increasing volume of mail handled each year. The Postcode system is a nation-wide scheme, and all post towns and localities in the Commonwealth have been allocated a particular code. The first digit indicates the State in which the place name is located, i.e., 2000 series—New South Wales (including A.C.T.); 3000 series—Victoria; 4000 series—Queensland; 5000 series—South Australia and Northern Territory; 6000 series—Western Australia; and 7000 series—Tasmania.

In mid-1967, all householders and business organisations in Australia were given a copy of the Postcode Directory which lists the Postcode number of locations where there is reasonable mail traffic. Lists of all other locations are held in the Postcode Advisory Centre, a section of the Mail Exchange Branch, from whom further information can be obtained either personally or by a free telephone call.

At present, mail sorters are required to know thousands of placenames, and in many cases mail must be handled several times. Postcode eliminates both this and the uncertainty of postal locality boundaries. The success of this new and faster mail handling depends largely on the widespread use of Postcode numbers by all sections of the community, both in the addressing of mail and in the return address usually shown on all letterheads and on envelopes.

Whilst all the electronic equipment has not yet been installed in Melbourne, the employment of the Postcode numerical system on all letters to New South Wales is essential in order to use fully the equipment already operating there. It has been found that even the old manual sorting system has been simplified and hastened by the use of Postcode, so that this system is already helping to expedite the mails in Victoria.

Electronic Sorting

Small and medium sized letters, already faced-up and postmarked, arrive at the coding units by high speed conveyor belts which feed them automatically, as required, to each of the 150 coding units which are arranged in suites of thirty. Each coding unit incorporates a keyboard and a visual panel at eye level, in which the letters appear one at a time with the address side of the envelope in the correct reading position. Each unit works at its operator's speed, and another letter does not appear in the presentation panel until the operator has processed the previous one.

For suburban and country mail, the operator presses keys which register either the numeric code address shown on the letter or an alphabetical code which is mentally extracted from the address. When the code is keyed, it is translated by a central electronic memory unit into a combination of bar impressions which are printed in a luminescent material on the back of the envelope. As these letters are coded, they are deposited automatically into the correct one of thirty conveyor belts, running under the coding suites, and carried outside the coding area to one of the twenty electronic decoding machines where the luminescent code marks on the back of each envelope are scanned by ultra violet light. According to the coding impressions thereon, which are identified by the electronic memory unit of the decoder, the letters are then directed automatically to the correct final collection points from which they are placed in bags ready for dispatch.

Letters for city, interstate, and overseas destinations are directed by the coding operator, who presses a key or keys, to the appropriate section of the mail exchange, where they are sorted on existing types of mail handling equipment.

A small proportion of letters cannot be processed by the coding operator and must be diverted, by pressing the appropriate key, to the "reject" collection point at the end of each coding suite. The operator is required to use the reject key in cases where the placename or the numeric code is indecipherable or the letter, presented for coding, is re-addressed to another placename. Mail reaching the "reject" collection point is placed in containers and transferred outside the coding area where it is sorted manually.

Transport Branch

This Branch has a fleet of 427 vehicles and a staff of 379 officers. This includes 319 motor drivers who are employed largely on rostered shifts and who transport mails, clear public telephone coin boxes, and street letter receivers throughout the Metropolitan Area. The Transport Branch also provides a pool of sedan cars for authorised Departmental staff, and undertakes the movement of bulk equipment, stores, cable, and poles by semi-trailer or truck to specified locations. In some areas mails are conveyed by private contractors. There are 1,196 of these services operating in Victoria at a cost of \$1,419,164 per annum. They travel an annual mileage of 12,701,703 miles—equivalent to half the total mileage covered annually by the combined fleet of 3,200 vehicles belonging to the Department in Victoria. The majority of the services operated under private contract serve the more sparsely populated areas.

Telecommunication Services

These services are the joint responsibility of the Engineering Division and the Telecommunications Division. The Engineering Division provides and maintains the technical facilities for telephone and telegraph services and for the national radio and television networks. It allots frequencies, monitors transmissions, and issues licences for privately operated radio services. The Telecommunications Division makes telephone and telegraph facilities available to the public, orders new services, provides customer advice, issues telephone directories, and deals with a host of other telecommunications administrative matters.

Subscriber Trunk Dialling (S.T.D.)

S.T.D. facilities which enable a telephone subscriber to dial distant subscribers direct, without the assistance of a Post Office operator, have continued to expand rapidly. During the year ended 30 June 1967, ninety-five exchanges in Victoria provided 300,227 services with access to S.T.D. This represents 43·31 per cent of the total services in operation in the State. Additional centres to which S.T.D. became available included Adelaide, Launceston, Belgrave, Colac, Warburton, and Warrnambool.

Automatic Telex

Automatic Telex is basically similar to S.T.D, but the typewritten message from the teleprinter and not the spoken word is communicated. During the year ended 30 June 1967, an additional

216 Telex services were connected, bringing the total services in operation to 924. Victorian Telex subscribers now have access to more than 3,100 services in Australia, and to some 100 countries overseas.

Telephone Services—Development

Telephone service connections to Victorian exchanges increased by 32,160, and brought the total at 30 June 1967, to 693,134. Connections made during the year totalled 96,824.

In keeping with the Department's policy, steady progress is being made towards a totally automatic telephone network. By 30 June 1967, 88 per cent of Victoria's telephone services were connected to automatic exchanges.

South-East Asian Commonwealth Cable (SEACOM)

On 30 March 1967, the SEACOM section of the Commonwealth cable was opened, providing direct links with Hong Kong, Japan, Singapore, Malaysia, the Philippines, and Madang.

Radio Telephone Facilities

From the commencement of Bass Strait survey work and oil drilling operations a few years ago, much use has been made of private telephone communication systems by the companies carrying out these operations. Such systems provide communication between the floating rigs, work ships, and land-based headquarters of the major oil companies concerned. Radio telephone facilities licensed by the Department will be used extensively in co-ordinating activities in the laying of pipe lines for conveying natural gas between the production platforms and gas terminals in the Metropolitan Area. It is expected that radio telephone facilities will be used also for tele-metering purposes when production is established. Until 30 June 1967, the Postmaster-General's Department in Victoria had granted licences to 19,828 private radio telephone stations.

Melbourne-Launceston Radio Relay System

In September 1966, commissioning tests were completed on the Melbourne-Launceston radio relay system which came into operation in November of the same year. This system, 335 miles long, features one of the world's largest microwave radio paths across water and comprises radio equipment providing the equivalent of 960 telephone channels or one television channel. It operates in the 4,000 megacycles band across land, and 2,000 megacycles band across water. To counteract the expected deep fading caused by the long transmission paths, high power transmitters, and space and frequency diversity receivers, as well as unusually large parabolic aerials 28 ft in diameter were used. The terminal points are at Surrey Hills (Melbourne), and at Launceston (Tasmania), with four repeater stations in Victoria, two in Tasmania, and one on Flinders Island.

Television

Low-power translator stations were installed in some areas during the year. These stations relay a programme from a main television station and, by amplification, improve the reception to areas where difficulties would normally be experienced.

Master Group Modulating Equipment

To extend the traffic handling capacity of the Melbourne-Sydney co-axial cable system, the first master group modulating equipment to be installed in Australia was placed into service between Melbourne and Wangaratta during 1966. This equipment enabled the capacity of the co-axial cable system to be increased to 1,260 channels, 200 more than it was designed to carry.

Re-arrangements of Departmental Plant

To relieve traffic congestion in the vicinity of St Kilda Junction, the Melbourne and Metropolitan Board of Works is carrying out a major programme of road re-arrangement in that area. This has necessitated the Postmaster-General's Department spending an estimated \$420,000 on alterations to its plant. The project requires, amongst other things, that the Department re-route the Melbourne–Morwell co-axial cable, carry out large conduit and cable jointing works, and make extensive adjustments to existing plant.

Radio Communications

All civil radio communication stations are licensed and controlled by the Radio Branch of the Engineering Division, where rigid technical standards for equipment design and performance are enforced by regular inspection, by monitoring, and by frequent transmission checks. As a member of the International Telecommunications Union, the Postmaster-General's Department in Australia observes and checks all radio transmissions received in Australia. Results of these observations are forwarded to the International Frequency Registration Board in Geneva, Switzerland. The Radio Branch investigates complaints from broadcast listeners and television viewers concerning interference to reception. On behalf of the Department of Shipping and Transport, its staff also inspect the radio installations aboard vessels in the ports of Melbourne and Geelong.

Recording of Telephone Conversations

Authority was given from 17 April 1966 to record telephone conversations if an approved tape recorder was connected to the telephone through the Department's recorder-connector unit. This unit may be rented from the Postmaster-General's Department.

When a telephone call is being received the recorder-connector transmits a recording tone on to the line. This tone is a single "beep" which is repeated every fifteen seconds during the conversation and is heard by both parties on the telephone. It protects the person on the other end of the line warning him that his conversation is being recorded. If a caller objects to being recorded, he should request the other party to stop recording. If the recording is stopped, the "beep" tone will also stop. If recording continues, despite the request, the caller should terminate the call by replacing the receiver. This is the only lawful method of recording telephone conversations. Any other form is prohibited by Telephone Regulations and the Telephonic Communications (Interception) Act.

Melbourne-Sydney Co-axial Cable, 1964; Victorian National Television Network, 1965

Post Office Statistics

Revenue and Expenditure

Particulars concerning the revenue and expenditure of the Postmaster-General's Department in Victoria for each of the years 1962-63 to 1966-67 are contained in the following table:

VICTORIA—POSTMASTER-GENERAL'S DEPARTMENT: REVENUE AND EXPENDITURE (\$'000)

Particulars		Year Ended 30 June					
		1963	1964	1965	1966	1967	
Revenue							
ostage	٠.	26,050	27,838	29,549	30,293	30,860	
Money Order Commission	}	628	654	672	695	706	
rivate Boxes and Bags	٠.	138	144	152	158	166	
Total Postal		26,816	28,636	30,373	31,146	31,732	
elegraph		3,574	3,900	4,129	4,292	4,537	
Telephone	::	52,706 144	58,735 221	68,027 209	75,800 123	82,709 88	
						-	
Total Revenue	•••	83,240	91,492	102,737	111,361	119,066	
EXPENDITURE							
alaries and Contingencies—— Salaries and Payments in the Nature of Sa	lary	27,762	29.302	32,209	34,720	38,654	
Administrative Expenses		3,440	4,135	4,785	5,543	4,093	
Stores and Material		888	936	953	1,341	3,061	
Mail Services	.::	1,994	2,098	2,214	2,535	2,670	
Engineering Services (Other than New Wo	- 1	19,280 1,150	20,499 1.539	23,409 1,971	24,857 2,166	27,427 2,194	
Rents, Repairs and Maintenance Furniture and Fittings		1,130	1,339	1,9/1	194	2,194	
Yew Works—		1	'	'	174	241	
Telegraphs, Telephones, and Wireless		31,524	34,273	39,612	43,895	48,845	
New Buildings, etc.		2,808	3,371	3,260	3,760	4,296	
Total Expenditure		88,846	96.153	108,413	119,012	131,481	

^{*}In respect of the years 1962-63 and 1963-64, amounts formerly classified as Miscellaneous revenue have been allocated to Telegraph and Telephone revenue.

†Included under New Works.

Activities

The number of post offices and telephone offices and the number of persons employed by the Postmaster-General's Department in each of the five years 1962–63 to 1966–67 were as follows:

VICTORIA—POST OFFICES, TELEPHONE OFFICES. PERSONS EMPLOYED

			Persons Employed							
At 30 June—	No. of Post Offices	No. of Telephone Offices	Permanent	Temporary and Exempt	Semi- and Non-Official Postmasters and Staffs	Mail Contractors	Other*	Total		
1963 1964 1965 1966 1967	2,197 2,174 2,136 2,094 2,044	159 141 129 109 91	16,405 16,462 16,385 16,160 16,571	8,121 8,467 9,007 9,555 9,990	2,545 2,489 2,427 2,387 2,341	1,097 1,096 998 942 1,021	723 705 783 813 812	28,891 29,219 29,600 29,857 30,735		

^{*} Includes telephone office-keepers and part-time temporary and exempt employees.

Particulars relating to the number of letters, etc., posted and received within Victoria during the years 1962-63 to 1966-67 were as follows:

VICTORIA—LETTERS, ETC., POSTED AND RECEIVED ('000)

Year Ended 30 June—		Letters, Postcards, etc.	Registered Articles (Except Parcels)	Newspapers and Packets	Parcels (Including Those Registered)
	Pos	TED FOR DELIVI	ERY WITHIN THE C	OMMONWEALTH	1
1963	1	519,132	2,961	78,411	4,773
1964		555,636	2,498	84,536	4,789
1965		542,554	2,313	89,312	5,183
1966		577,379	2,414	99,611	4,943
1967		604,213	2,475	104,711	5,168
Disp	TCHED T	O AND RECEIVED	FROM PLACES BEY	OND THE COM	MONWEALTH
1963		56,794	932	13,415	448
1964		62,816	982	14,379	477
1965		71,489	1,059	16,348	544
966		76,393	1,062	16,102	625
1967	::	82,866	1,087	16,137	672
		TOTAL	POSTED AND REC	EIVED	
1963		575,926	3,893	91,826	5,221
1964	,	618,452	3,480	98,915	5,266
1965		614,042	3,372	105,660	5,726
	I	653,773	3,476	115,714	5,568
1966					

The following table shows the total number and value of money orders and postal notes issued and paid in each of the five years 1962–63 to 1966–67:

VICTORIA—MONEY ORDERS AND POSTAL ORDERS*

			Money	Orders	l	Postal Orders				
Year Ended 30 June—		Issued		Paid		Issued		Paid		
		No.	Value	No.	Value	No.	Value	No.	Value	
		'000	\$'000	'000	\$'000	'000	\$,000	,000	\$.000	
1963 1964 1965 1966 1967	 	2,829 2,943 3,031 3,230 3,070	82,430 89,614 100,446 107,608 112,445	2,721 2,800 2,922 2,980 2,883	82,324 90,068 99,174 107,197 111,563	4,145 4,029 3,818 3,846 3,239	4,218 4,167 4,019 3,863 4,343	5,730 5,589 5,334 4,918 4,472	5,282 5,256 5,056 4,747 5,147	

[•] From 1 June 1966 Postal Orders replaced Postal Notes.

Of the money orders issued in 1966–67, 2,931,617 for \$111,557,720 were payable in the Commonwealth of Australia and 138,369 for \$886,853 in other countries. The orders paid included 2,830,916 for \$110,667,568 issued in the Commonwealth, and 51,959 for \$895,763 in other countries.

Information relating to the telephone service is given below for the years 1962-63 to 1966-67:

VICTORIA-	-TELEPHONE	SERVICES

Partic	Year Ended 30 June—						
			1963	1964	1965	1966	1967
Telephone Exchanges Public Telephones Services in Operation Instruments Connected Instruments per 1,000 of	 f Population		1,723 6,829 568,946 772,565 252·8	1,680 7,121 601,714 819,037 261 · 6	1,625 7,279 631,950 860,438 268 · 2	1,565 7,292 660,974 904,925 281 · 2	1,506 7,344 693,134 957,668 292 • 7

The number of radio communication stations authorised in Victoria at 30 June in each of the years 1964 to 1967 is shown in the following table. Figures relate to radio communication (radio-telegraph and radio-telephone) stations only.

VICTORIA—RADIO COMMUNICATION STATIONS AUTHORISED

	At 30 June						
Class of Station	1964	1965	1966	1967			
Transmitting and Receiving— Fixed Stations*— Aeronautical	4	4	4	4			
Services with Other Countries Other	13 221	13 222	4 13 241	12 216			
Land Stations†— Aeronautical Base Stations—	16	20	23	27			
Land Mobile Services Harbour Mobile Services Coast‡ Special Experimental	1,061 18 14 135	1,158 24 15 135	1,279 22 15 150	1,453 21 16 141			
Mobile Stations§— Aeronautical	274	316	362	422			
Land Mobile Services Harbour Mobile Services Ships Amateur Stations	11,049 142 370 1,454	13,128 162 407 1,511	14,655 150 473 1,567	16,633 159 526 1,648			
Total Transmitting and Receiving	14,771	17,115	18,954	21,278			
Receiving Only— Fixed Stations*	177	193	198	197			
Grand Total	14,948	17,308	19,152	21,475			

^{*} Stations established at fixed locations for communication with other stations similarly established.

[†] Stations established at fixed locations for communication with mobile stations.

[‡] Land stations for communication with ocean going vessels.

[§] Equipment installed in motor vehicles and harbour vessels.

Broadcast and Television Licences in Force

The number of stations licensed for broadcasting and television, and the number of holders of Broadcast Listeners' and Television Viewers' Licences in Victoria at the end of each of the years 1962–63 to 1966–67 are shown below:

VICTORIA—NUMBER OF BROADCASTING AND TELEVISION LICENCES IN FORCE

	At 30 June—							
Class of Licence	1963	1964	1965	1966	1967			
Broadcasting Stations*	20	20	20	20	20			
Television Stations†	6	6	8	9	9			
Broadcast Receiver	607,036	622,663	512,205	141,639	114,778			
Television Receiver	530,256	581,286	488,583	87,640	92,822			
Combined Broadcast and Television Receiver;			132,413	574,955	598,035			
Amateur	1,414	1,454	1,511	1,567	1,648			

^{*} Exclusive of eight broadcasting stations (including three shortwave), operated by the National Broadcasting Service.

Overseas Telecommunications Commission

General

The Overseas Telecommunications Commission (Australia) is the authority responsible for Australia's external telecommunication services by cable and radio.

The Commission was established in August 1946 under the Overseas Telecommunications Act. This Act implemented, in Australia, a recommendation of the 1945 Commonwealth Telecommunications Conference for national ownership of the external telecommunication services of the British Commonwealth countries concerned and for establishment of a representative advisory board, the Commonwealth Telecommunications Board, to co-ordinate their development.

[†] Exclusive of eight television stations operated by the National Television Service.

[‡] Combined Licences were introduced on 1 April 1965.

The Commission provides telegraph, telex, phototelegraph and, in conjunction with the Postmaster-General's Department, telephone services with overseas countries and Australian territories. Leased one-way and two-way circuits are also provided for large commercial users. In addition, it operates the Australian coastal radio services for communication with ships at sea in Australian waters and high frequency radio services in communication with ships in any part of the world. The Commission's coastal radio stations also provide certain services to a number of remote stations within Australia and its territories.

To meet Australia's increasing demand for overseas communication channels, and because of limitations to performance and capacity inherent in current forms of telegraph cables and high frequency radio systems, the Commission, in partnership with the overseas telecommunications authorities of Britain, Canada, and New Zealand, has installed a large capacity co-axial cable across the Pacific Ocean connecting Australia, New Zealand, and Canada via Suva and Honolulu.

The cable (COMPAC) was opened in December 1963, and forms part of a British Commonwealth large capacity cable scheme in which a complementary cable between Britain and Canada was opened late in 1961. The Commonwealth cable system feeds into the United States of America network at Hawaii and into the European network at London.

The last stage of the system, the South-East Asia cable project (SEACOM), extends the large capacity telephone cable from Sydney to Singapore and Kuala Lumpur via Cairns, Madang, Guam, Hong Kong, and Jesselton. It was opened for service on 30 March 1967.

The Commonwealth Cable Management Committee, comprising representatives of the partner Governments, Britain, Canada, Australia, New Zealand, Malaysia, and Singapore, administers COMPAC and SEACOM.

Two years of international discussion and negotiations were climaxed by the signing in August 1964, by a number of countries, including Australia, of agreements to establish the first global commercial communications satellite system, of which the "space segment" is estimated to cost \$U.S.200m. "Space segment" is a broad description

of the communications satellites and the tracking, control, command, and related facilities required to support operation of the satellites. Australian ground stations, owned and operated by the Overseas Telecommunications Commission, have been built at Carnarvon, Western Australia, and Moree, New South Wales at a cost of almost \$7m. These stations operate into communications satellite INTELSAT II launched in January 1967 and positioned in geostationary orbit 22,300 miles above the equator at longitude 175° E.

The following tables give statistics of Australia's overseas radiotelephone services, and overseas cable and radio telegraph services over a five-year period. Statistics of services with the Australian Territories are not included.

AUSTRALIA—OVERSEAS TELECOMMUNICATIONS COMMISSION: OVERSEAS RADIOTELEPHONE SERVICES: NUMBER OF PAID MINUTES

(000)

Particular	_		Year Ended 31 March—						
Particular			1963	1964	1965	1966	1967		
British Commonwealt	h Coun	tries—							
From Australia			260	431	774	935	1,246		
To Australia	••		338	557	893	1,114	1,381		
Total	••		598	988	1,667	2,048	2,628		
Non-British Countries	s								
From Australia			131	184	371	503	679		
To Australia			135	204	350	468	580		
Total			266	387	722	972	1,260		
All Countries—									
From Australia			391	615	1,146	1,438	1,926		
To Australia	••		473	761	1,243	1,582	1,962		
Total			864	1,376	2,389	3,020	3,888		

AUSTRALIA—OVERSEAS TELECOMMUNICATIONS COMMIS-SION: INTERNATIONAL TELEGRAPH SERVICES (CABLE AND RADIO): NUMBER OF WORDS TRANSMITTED ('000)

Destination	Particulars -					Year Ended 31 March—						
Particulars	· 	_	1963	1964	1965	1966	1967					
British Commonwealth From Australia	Coun	tries—	25,588	23,978	24,370	27,948	28,662					
To Australia			26,723	27,039	29,706	26,870	26,075					
Total			52,311	51,016	54,076	54,817	54,737					
Non-British Countries- From Australia To Australia	 		14,789 12,844	16,191 13,830	17,671 15,724	19,434 17,259	21,912 19,037					
Total			27,633	30,021	33,395	36,693	40,949					
All Countries— From Australia To Australia	::		40,377 39,567	40,168 40,869	42,041 45,430	47,382 44,128	50,574 45,112					
Total			79,944	81,037	87,471	91,510	95,686					

Further References, 1962 Commonwealth Year Book, 1946