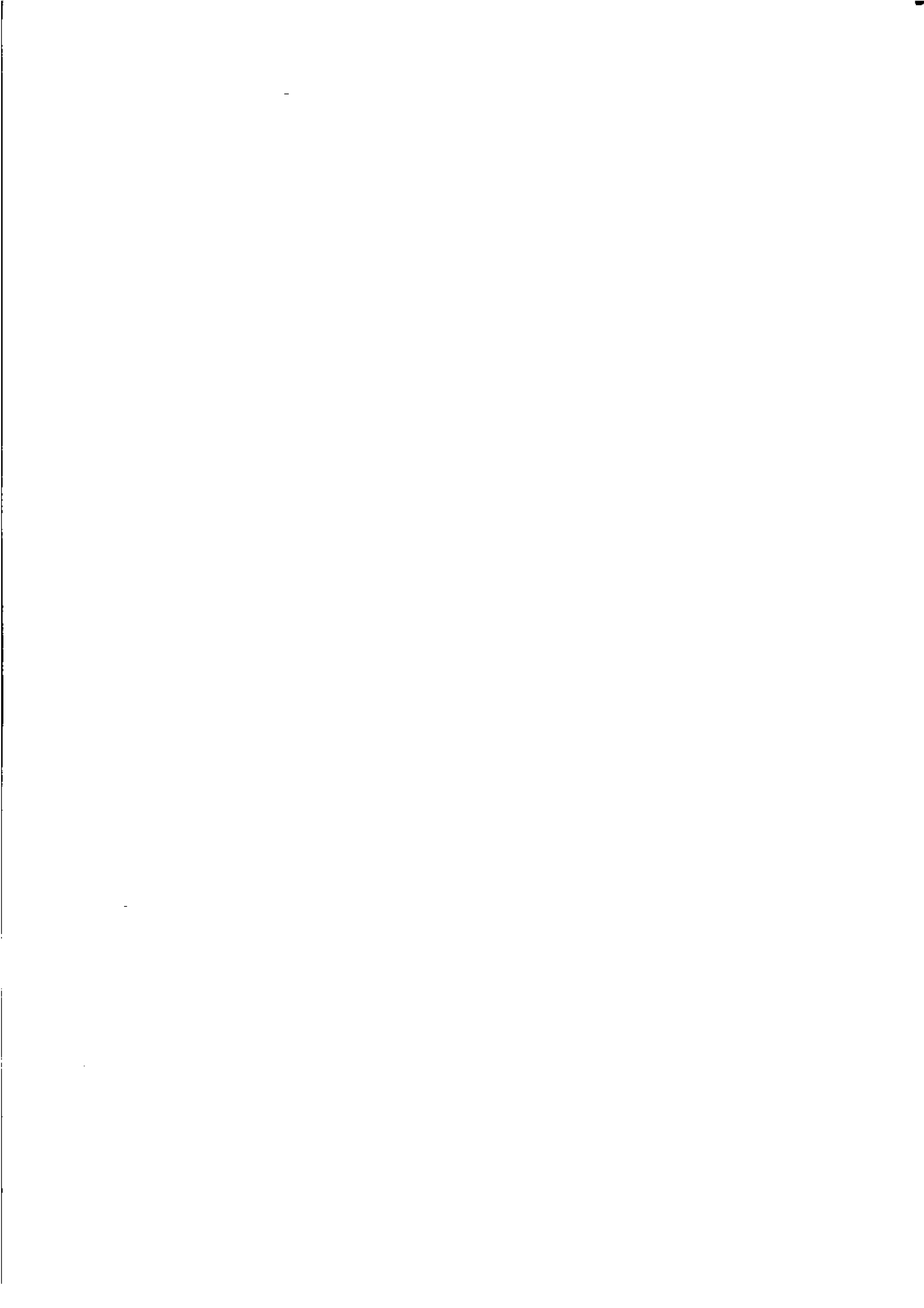




1991-92
Manufacturing Industry
South Australia

Catalogue No. 8221.4

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EMBARGOED UNTIL 11.00 A.M. 31 OCTOBER 1994

**MANUFACTURING INDUSTRY
SOUTH AUSTRALIA
1991-92**

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Deputy Commonwealth Statistician
and Government Statist**

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INQUIRIES

- *for further information about statistics in this publication and the availability of related unpublished statistics, contact Mark Wise on Sydney (02) 268 4541 or any other ABS office.*
- *for information about other ABS statistics and services please refer to the back page of this publication.*

INTRODUCTION

This publication contains detailed industry statistics compiled from a census of manufacturing establishments conducted in respect of 1991–92 and some comparative statistics for earlier years. It provides more detailed information on manufacturing in South Australia than was published in the previous publications from this census — *Manufacturing Industry, Australia, 1991–92, Preliminary* (8201.0), which was released on 25 May 1993 and *Manufacturing Industry, Australia, 1991–92* (8221.0), which was released on 21 February 1994.

The 1990–91 census data presented in this publication generally differ from those published in the 1990–91 issue of this publication. This is due to further processing of that year's data. All time series statistics presented in this publication show these revised data. Further details about the extent of these revisions can be obtained by contacting ABS NSW — see previous page for contact details.

For the 1991–92 manufacturing census, information on only employment, wages and salaries paid and turnover were collected. However, as with the 1990–91 census, the 1991–92 census also included some questions related to environmental protection by manufacturers. The environmental protection issues covered in 1991–92 were different to those covered in 1990–91. These data are presented in Table 6. Information at the ASIC class level showing both current and capital expenditure on environmental protection are presented in Table 7. This expands on the information collected in 1990–91.

This publication has also brought together data from sources other than the manufacturing census to provide a more complete picture of the manufacturing industry, as follows:

- Census of Population and Housing (1991) data are presented in Tables 2 and 3. This includes information on the characteristics of persons employed in the manufacturing industry.
- A concordance between the ASIC and ANZSIC industry classifications is presented in Table 9. For a detailed explanation of this concordance, see the introduction to Table 9.

The standard units definitions employed in the system of integrated economic censuses have undergone revisions, which were first reflected in the 1988–89 manufacturing census results. In the 1988–89 census, the revisions were partially in place on the ABS central business register. By the 1989–90 census, the revised units definitions were in place for all large businesses. The 1990–91 and 1991–92 census results reflect the full implementation of the revised units definitions.

Unpublished data

A considerable amount of data from the manufacturing census exists in unpublished form. More detailed information to satisfy individual user requirements may be available on request. Further details can be obtained by contacting ABS NSW — see previous page for contact details.

SUMMARY OF FINDINGS

Overview

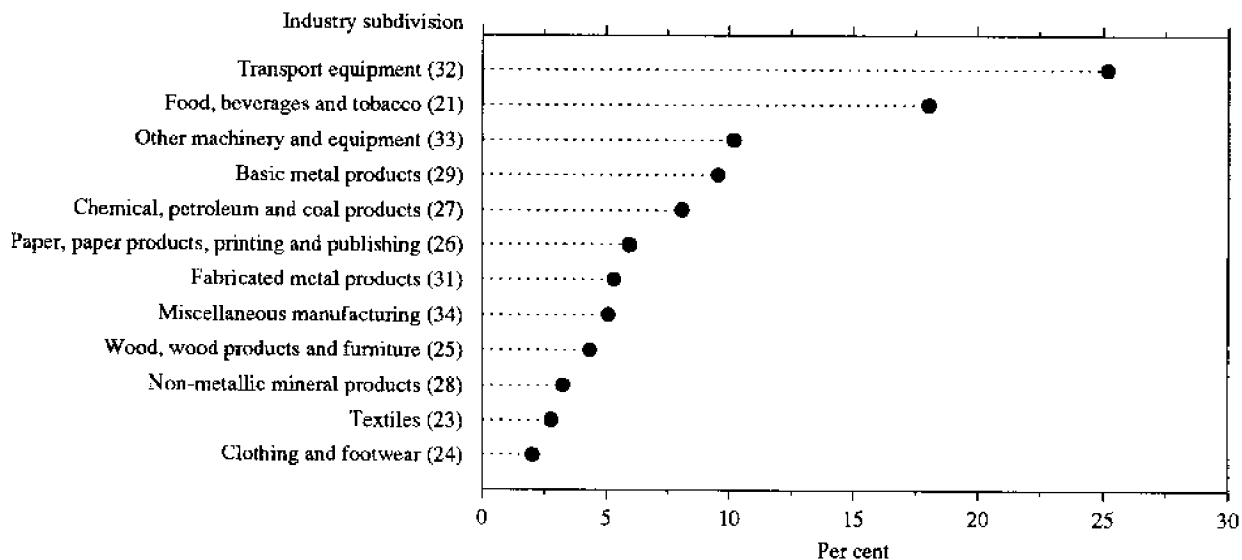
Turnover for the year 1991–92 by manufacturing establishments operating in South Australia was \$15,501.4 million. This represents a 2.4 per cent decrease, in current price terms, from the \$15,885.7 million in turnover recorded for the year 1990–91. Since the ABS began collecting integrated economic statistics (in respect of 1968–69), this is the first time that turnover at current prices in the manufacturing industry in South Australia has fallen compared to the previous year. Manufacturing employment at the end of June 1992 was 86,601, some 7.2 per cent lower than 12 months earlier.

Turnover (Tables 1 and 4)

The chart below ranks industry subdivisions from the largest to the smallest contributor for 1991–92 manufacturing turnover. Transport equipment continues to be the largest contributor with 25.3 per cent of total turnover. Food, beverages and tobacco (17.8%) continues as the second largest contributor ahead of Other machinery and equipment (10.2%). Clothing and footwear (2.1%) and Textiles (2.8%) continue to be the smallest contributors to total turnover.

Turnover of manufacturing establishments decreased, in current price terms, by 2.4 per cent between 1990–91 and 1991–92. Seven industry subdivisions recorded decreases and five recorded increases. The largest percentage decreases were recorded by Chemical, petroleum and coal products (down 12.7% — from \$1,444.4m to \$1,260.9m) and Miscellaneous manufacturing (down 8.1% — from \$864.6m to \$794.9m). The largest percentage increases were recorded by Textiles (up 10.8% — from \$393.1m to \$435.6m) and Paper, paper products, printing and publishing (up 5.7% — from \$879.3m to \$929.5m).

DISTRIBUTION OF TURNOVER, SOUTH AUSTRALIA, 1991–92



The percentage contribution by South Australia to total Australian manufacturing turnover in 1991–92 was 9.3 per cent. This is the same percentage contribution as reported in 1990–91. The percentage contribution to turnover by the other States and Territories in 1991–92 was: New South Wales 34.6 per cent; Victoria 31.6 per cent; Queensland 13.7 per cent; Western Australia 7.7 per cent; Tasmania 2.3 per cent; the Northern Territory 0.4 per cent; and the Australian Capital Territory 0.3 per cent.

Longer term trends (1988–89 to 1991–92)

Turnover for the manufacturing industry in South Australia increased by 17.5 per cent over the period 1988–89 to 1991–92 in current price terms. While analyses of turnover data over the longer term in current prices are affected by movements in prices and quantities produced, some indications of relative growth across manufacturing industries can still be produced. Nine industry subdivisions recorded increases and three recorded decreases. Chemical, petroleum and coal products (up 144.2% — from \$516.4m to \$1,260.9m) (see paragraph 29 of the Explanatory Notes for comparability of these data over time) and Transport equipment (up 35.5% — from \$2,891.0m to \$3,916.6m) showed the largest percentage growth in turnover over the period. The largest percentage decreases were recorded in Wood, wood products and furniture (down 9.3% — from \$749.1m to \$679.1m) and Non-metallic mineral products (down 8.3% — from \$554.2m to \$508.1m).

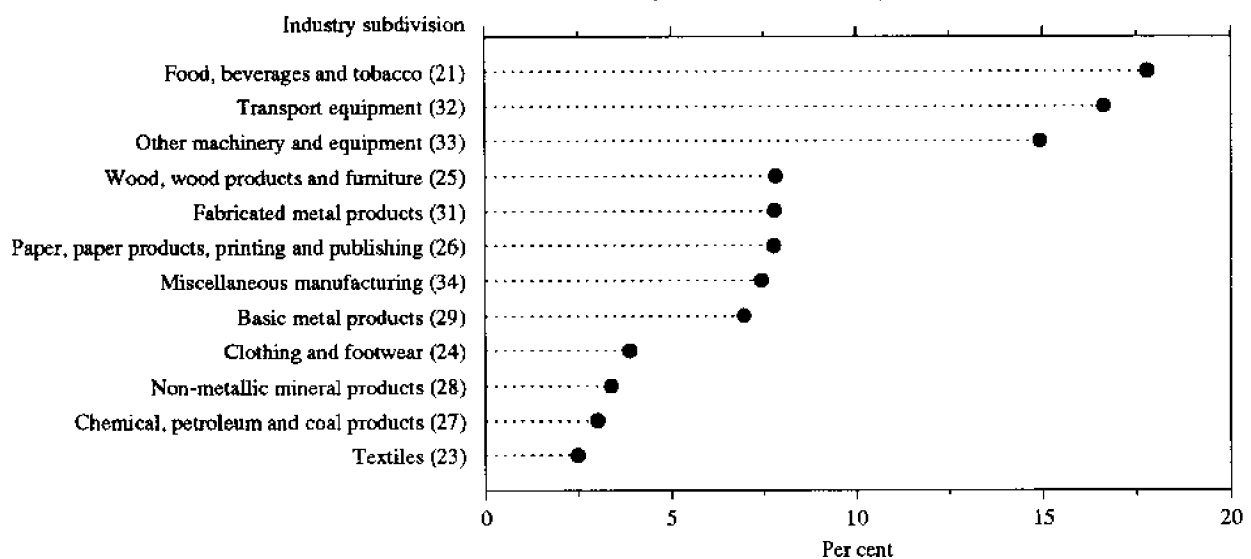
The percentage contribution by South Australia to total Australian manufacturing turnover has increased since 1988–89, increasing by 0.7 percentage points to 9.3 per cent. Other States to increase their percentage share of turnover were: Western Australia (up 0.7 percentage points to 7.7%); New South Wales (up 0.5 percentage points to 34.6%); and Queensland (up 0.5 percentage points to 13.7%). Victoria's percentage share of turnover decreased over this period (down 2.4 percentage points to 31.6%), as did Tasmania's percentage share (down 0.2 percentage points to 2.3%). Both the Northern Territory (0.4%) and the Australian Capital Territory (0.3%) held their percentage share.

Employment (Tables 1 and 4)

Employment was more evenly distributed across industry subdivisions than was turnover, with Food, beverages and tobacco (17.6%) and Transport equipment (16.7%) once again being the major contributors to employment in the manufacturing industry. Other machinery and equipment (15.0%) remains the third largest contributor. Textiles (2.5%) and Chemical, petroleum and coal products (3.0%) remain the smallest contributors to employment in the manufacturing industry.

Manufacturing employment decreased by 7.2 per cent between June 1991 and June 1992. All 12 industry subdivisions recorded decreases in the level of employment over this period. Basic metal products (down 14.8% — from 7,114 persons to 6,062 persons) and Miscellaneous manufacturing (down 14.7% — from 7,581 persons to 6,466 persons) recorded the largest percentage decreases.

DISTRIBUTION OF EMPLOYMENT, SOUTH AUSTRALIA, 1991–92

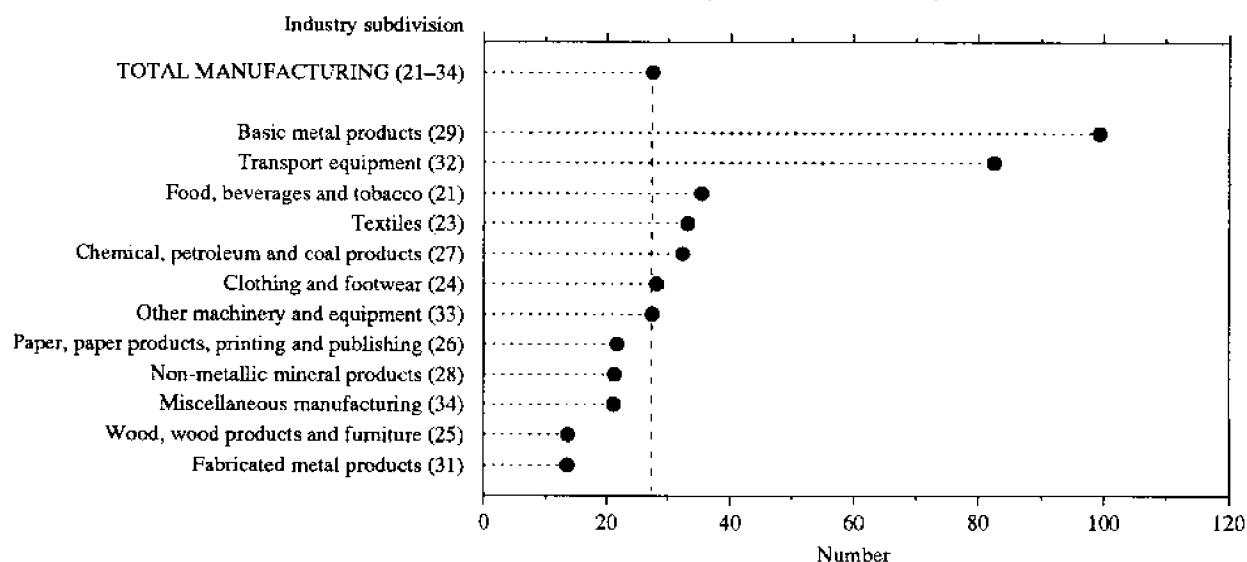


The percentage contribution by South Australia to total Australian manufacturing employment at the end of June 1992 was 9.5 per cent. This represents a decrease of 0.2 percentage points on the total contribution reported at the end of June 1991. The percentage contribution to total manufacturing employment by the other States and Territories at the end of June 1992 was: New South Wales 34.1 per cent; Victoria 32.7 per cent; Queensland 13.5 per cent; Western Australia 6.9 per cent; Tasmania 2.6 per cent; the Australian Capital Territory 0.4 per cent; and the Northern Territory 0.3 per cent.

On average, each manufacturing establishment in South Australia employed 27 persons at the end of June 1992, which continues the decline evident since June 1990 (when the average was 30 persons employed per establishment). The average fell by 2 persons over the period June 1991 to June 1992. Over the same period, however, the ratio of turnover per person employed has grown considerably. In 1988–89, the average turnover per person employed for all manufacturing establishments was \$125,500. By 1991–92, this had risen to \$179,000, a growth of 42.6 per cent. This is well above the 17.5 per cent increase in turnover and suggests significant productivity growth.

As the chart on the following page shows, the number of persons employed per establishment varied greatly across industry subdivisions, ranging from 14 persons for both Fabricated metal products and Wood, wood products and furniture to an average of 99 persons for Basic metal products.

PERSONS EMPLOYED PER ESTABLISHMENT, SOUTH AUSTRALIA, 1991-92



Chemical, petroleum and coal products comprised a substantially larger share of turnover than of employment, which resulted in this subdivision recording a substantially higher value of turnover per person employed (\$481,400) than other subdivisions in the manufacturing industry. Clothing and footwear recorded the lowest value for this ratio (\$94,700). Turnover per person employed for total manufacturing in 1991-92 was \$179,000. Various factors affect the magnitude of turnover per person employed. In general, industries which are labour intensive will record lower values of turnover per person employed than will those industries which are capital intensive. This ratio may also be influenced by commodity prices.

Longer term trends (June 1989 to June 1992)

Employment in the South Australian manufacturing industry decreased by 18,462 persons (down 17.6% — from 105,063 persons to 86,601 persons) over the period June 1989 to June 1992. All but one of the industry subdivisions recorded decreases over this period, with Fabricated metal products (down 26.7% — from 9,258 persons to 6,786 persons), Non-metallic metal products (down 26.5% — from 3,989 persons to 2,931 persons) and Transport equipment (down 23.5% — from 18,868 persons to 14,425 persons) recording the largest percentage decreases. The industry subdivision to record an increase was Chemical, petroleum and coal products (up 10.9% — from 2,361 persons to 2,619 persons).

All States and Territories recorded decreases in manufacturing employment between June 1989 and June 1992. The largest decrease in both absolute and percentage terms was recorded by Victoria, where employment decreased by 78,201 persons (down 20.9% — from 374,309 persons to 296,108 persons). The decreases recorded by the other States and Territories were: the Northern Territory (down 16.8% — from 3,392 persons to 2,821 persons); New South Wales (down 16.6% — from 370,436 persons to 309,124 persons); Western Australia (down 16.1% — from 74,500 persons to 62,475 persons); Tasmania (down 15.4% — from 27,532 persons to 23,303 persons); Queensland (down 11.0% — from 137,479 persons to 122,424 persons); and the Australian Capital Territory (down 10.0% — from 4,099 persons to 3,691 persons).

The percentage contribution by South Australia to Australian manufacturing employment has declined since June 1989, decreasing 0.1 percentage points to 9.5 per cent. Victoria (down 1.4 percentage points to 32.7%) also decreased its percentage share of employment over this period. States to show increases in their percentage share of employment over this period were: Queensland (up 1.0 percentage points to 13.5%); New South Wales (up 0.3 percentage points to 34.1%); Western Australia (up 0.1 percentage points to 6.9%); and Tasmania (up 0.1 percentage points to 2.6%). The Australian Capital Territory (0.4%) and the Northern Territory (0.3%) both held their percentage share of employment over this period.

1991 Census of Population and Housing (Tables 2 and 3)

The 1991 Census of Population and Housing provides additional information to the manufacturing census on the characteristics of persons employed in the manufacturing industry. It shows that employment at August 1991 among manufacturing sole proprietors and partnerships not employing others was 4,086. (Note: These persons are excluded from the scope of the manufacturing census — see paragraph 9 of the Explanatory Notes.) The population census also recorded 83,329 'other' persons employed in the manufacturing industry in South Australia at August 1991. (Note: Whilst these population census figures are conceptually similar to the data collected in the manufacturing census, there are many reasons why the data do not agree — see paragraphs 32 to 35 of the Explanatory Notes.)

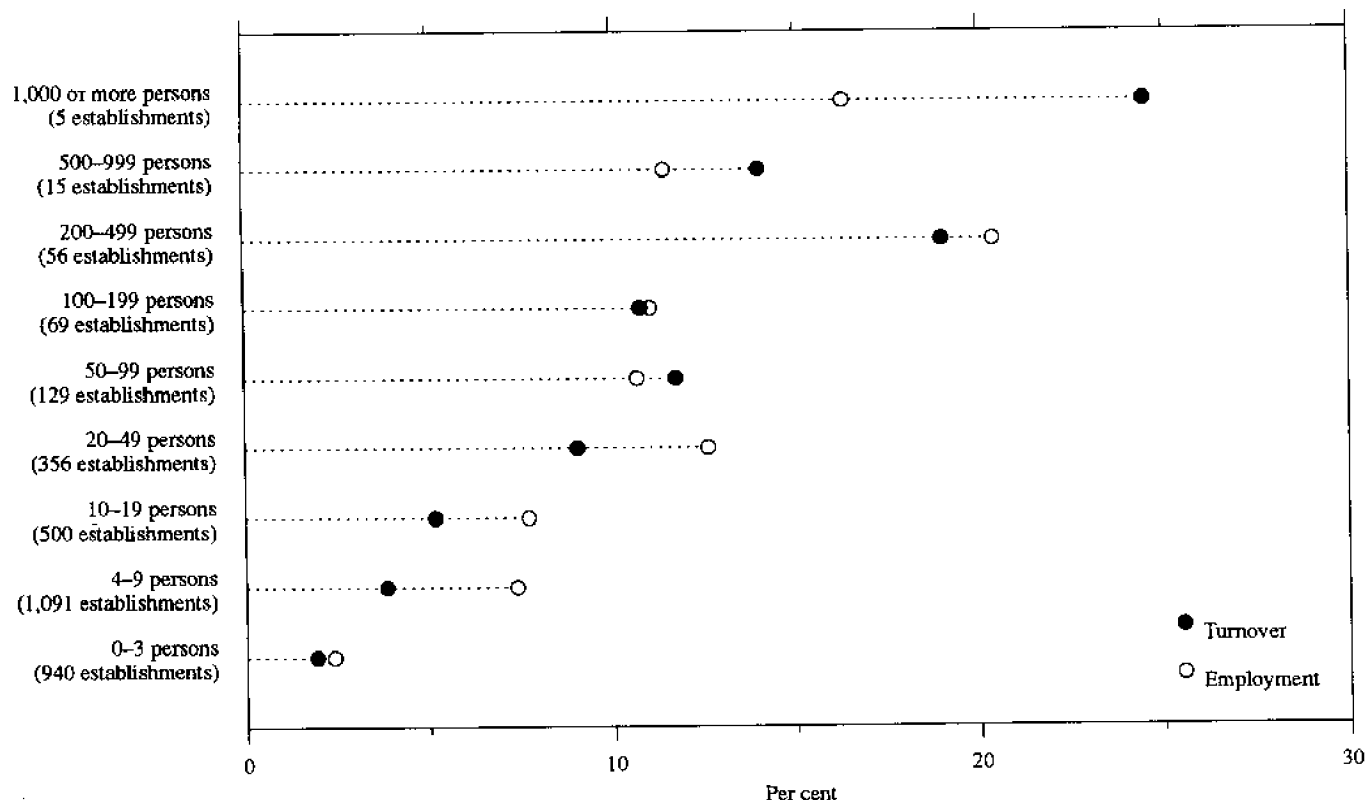
A breakdown of the age composition of persons employed in the manufacturing industry shows that it has a similar distribution as for all industries combined. However, there are relatively fewer people working in manufacturing in the older age groups (42.6% aged 35–54 years compared with 44.4% for all industries and 8.8% aged 55 and over compared with 10.2% for all industries). A slightly higher proportion of persons are employed in manufacturing in the age group 25–34 years (28.9% compared with 26.1%). The age distribution across the manufacturing industry subdivisions is more variable, but still broadly consistent with the average for all manufacturing industry. The major variations to this pattern were the younger employment recorded in Wood, wood products and furniture (where 26.2% of persons employed were in the age group 15–24 years, with 37.1% in the age group 35–54 years) and Chemical, petroleum and coal products (where the corresponding percentages were 13.1% and 49.0% respectively) where the average age of persons employed was much higher.

The proportion of those employed in the manufacturing industry who were male was 74.1 per cent, whilst females made up 25.9 per cent. These are substantial differences from the average for all industries (males — 56.9%; females — 43.1%), showing the significance of male employment in the manufacturing industry. The highest concentration of male employment in the manufacturing industry was in Basic metal products, where 92.5 per cent of persons employed were male. The highest incidence of female employment in the manufacturing industry was, by far, in Clothing and footwear, where 70.5 per cent of persons employed were female.

Employment size (Table 5)

Of the 3,161 manufacturing establishments operating at 30 June 1992, 145 were large establishments (employing 100 or more persons). While comprising only 4.6 per cent of all establishments, they accounted for 68.3 per cent of manufacturing turnover for 1991–92 and 59.3 per cent of employment at the end of June 1992. Although establishments employing 0–19 persons comprised 80.1 per cent of manufacturing establishments in South Australia at 30 June 1992, they accounted for only 10.9 per cent of turnover and 17.4 per cent of employment. There were five manufacturing establishments employing 1,000 or more persons at the end of June 1992. They employed 16.3 per cent of all persons working in the manufacturing industry in South Australia and contributed 24.5 per cent of all manufacturing turnover.

DISTRIBUTION OF MANUFACTURING TURNOVER AND EMPLOYMENT BY EMPLOYMENT SIZE, SOUTH AUSTRALIA, 1991–92

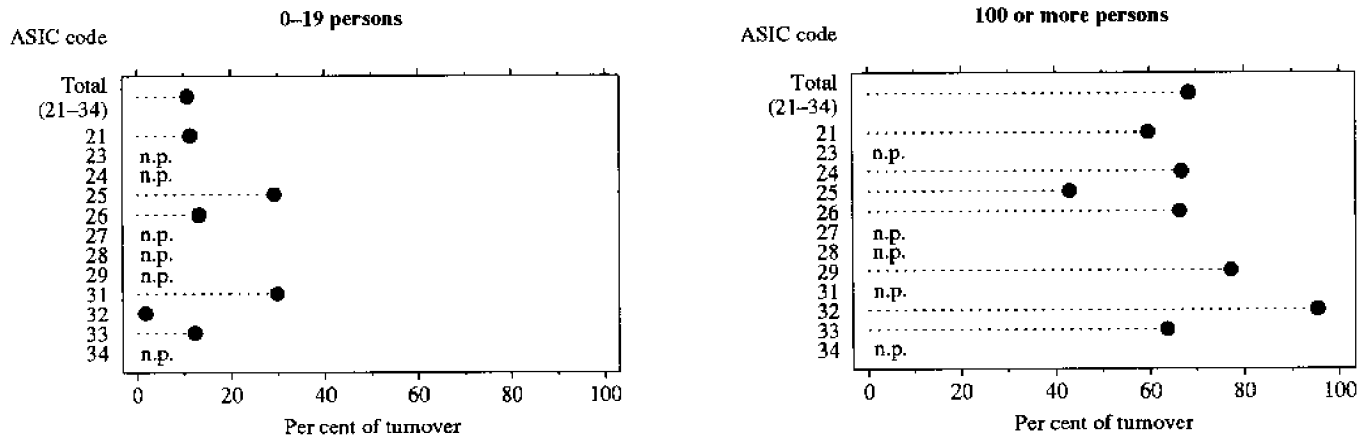


For 1991-92, the percentage distribution of turnover by employment size for the manufacturing industry was:

0-19 persons	10.9 per cent
20-49 persons	9.0 per cent
50-99 persons	11.7 per cent
100 or more persons	68.3 per cent

Large establishments (employing 100 or more persons) contributed more than 75 per cent of turnover for the industry subdivisions Transport equipment (95.4%) and Basic metal products (77.2%). For five of the ten remaining industry subdivisions, turnover for large establishments ranged from 43.1 per cent to 66.9 per cent. (Data for the other five industry subdivisions are not available for publication.) Small establishments (employing 0-19 persons) made relatively significant contributions to turnover for Fabricated metal products (29.9%) and Wood, wood products and furniture (29.2%).

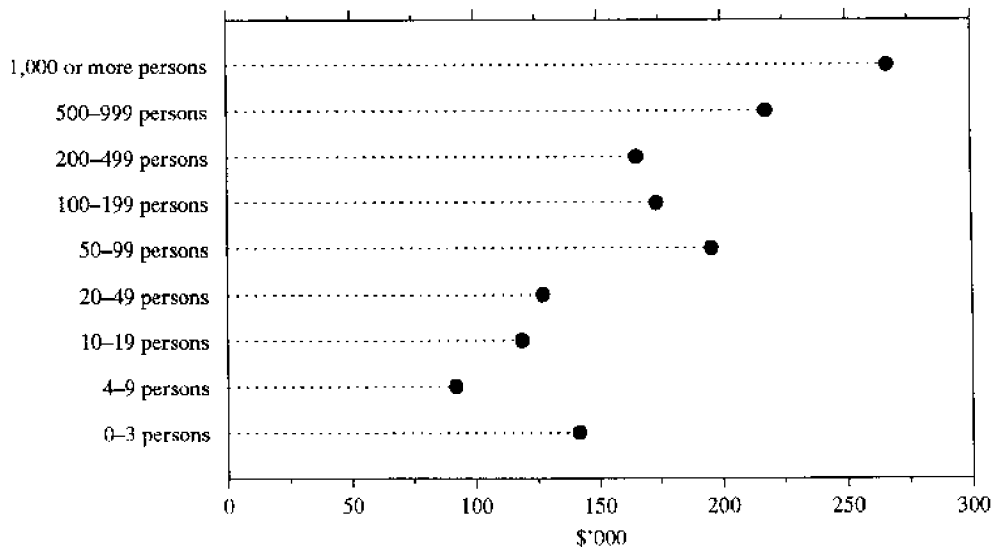
DISTRIBUTION OF TURNOVER BY EMPLOYMENT SIZE AND INDUSTRY SUBDIVISION (a), SOUTH AUSTRALIA, 1991-92



(a) Refer to graphs on pages 1 to 3 for ASIC subdivision descriptions.

Whilst establishments employing 0-3 persons recorded a relatively high ratio of average turnover per person employed at the end of June 1992 (\$141,900), small establishments (ie. those employing 0-19 persons) displayed a much lower overall ratio of average turnover per person employed at the end of June 1992 (\$111,000) than establishments in the larger size categories. Large establishments (employing 100 or more persons) recorded an average turnover per person employed at the end of June 1992 of \$205,200, with establishments employing 1,000 or more persons having a ratio of \$266,800. It should be remembered that the data include all manufacturing industries and that somewhat different patterns may emerge through analysis of individual industries.

TURNOVER PER PERSON EMPLOYED BY EMPLOYMENT SIZE, SOUTH AUSTRALIA, 1991-92



Environmental protection (Tables 6 and 7)

General issues associated with environmental impact assessments or audits, return of containers or packaging, and marketing or production of goods or services relating to the environment

The 1991-92 manufacturing census included questions related to environmental protection. The following three questions were asked of all manufacturers:

- During 1991-92, did this business conduct any environmental impact assessments (for proposed new production) or any environmental audits (on existing production processes)?
- Does this business permit and/or encourage the return of its own packaging (e.g. returnable bottles, cardboard boxes, polystyrene, etc.)?
- Does this business market or produce any goods or services for monitoring, maintaining or improving the environment?

In determining the proportion of the manufacturing industry for which these environmental issues are applicable, two measures have been calculated. The first is the proportion of establishments undertaking these activities to the total number of manufacturing establishments. The second measure is the proportion of total manufacturing turnover contributed by those establishments that reported a positive response to the environmental issues. For two of the three environmental issues raised, the percentage contribution to total turnover was generally higher than the proportion of total establishments. This indicates that larger establishments generally make up a relatively higher proportion of manufacturing establishments involved in these environmental protection activities.

In all, 5 per cent of manufacturing establishments in South Australia reported conducting environmental impact assessments or audits in 1991-92. These establishments contributed 26 per cent of total manufacturing turnover, reflecting the substantially higher incidence of environmental impact assessments or audits being conducted by larger establishments. The highest proportion of establishments which conducted environmental impact assessments or audits occurred in Basic metal products and Chemical, petroleum and coal products, where 11 per cent and 10 per cent (respectively) of all establishments conducted these studies. Other industry subdivisions with a relatively high incidence of the conduct of these studies were Food, beverages and tobacco and Textiles (both 9%). Apart from Clothing and footwear, in which no environmental impact assessments or audits were reported as being conducted, the lowest incidence of the conduct of these studies occurred in Miscellaneous manufacturing (1%) and Wood, wood products and furniture (3%).

In terms of the proportion of total turnover covered by establishments conducting environmental impact assessments or audits, Chemical, petroleum and coal products with 71 per cent was the highest, followed by Basic metal products (58%). The smallest contribution was recorded in Transport equipment (2%).

Overall, 26 per cent of all manufacturing establishments permitted and/or encouraged the return of their own containers or packaging. Those establishments contributed 34 per cent of total manufacturing turnover. The highest incidence of the return of containers or packaging was reported in Chemical, petroleum and coal products, where 48 per cent of all establishments did so. Those establishments were also likely to be the larger ones, as they contributed 55 per cent of turnover in that industry, the highest proportion of total turnover in any industry subdivision. Similarly, the 24 per cent of establishments in Miscellaneous manufacturing which allowed the return of containers or packaging contributed 48 per cent of the industry's turnover.

Only 6 per cent of all manufacturing establishments reported that they were engaged in the marketing or production of goods or services for monitoring, maintaining or improving the environment. Those establishments contributed 3 per cent of total manufacturing turnover. The results show that the size of the businesses marketing or producing environmental goods or services varied depending on the industry subdivision. The incidence of larger businesses marketing or producing goods or services to monitor, maintain or improve the environment was higher in Paper, paper products, printing and publishing, with the 12 per cent of manufacturing establishments marketing or producing these goods or services contributing 15 per cent of the turnover in the industry. The incidence of smaller businesses undertaking these activities was high in Basic metal products (where the 8 per cent of all establishments involved contributed only 1 per cent of the industry's turnover), Textiles (where the corresponding percentages were 7% and 1%) and Transport equipment (where the corresponding percentages were 4% and nil).

Expenditure on Environmental Protection

All manufacturers (with the exception of single establishment businesses with less than four persons employed) were also asked to provide information on their total current and capital expenditure related to environmental protection.

In selected industries, the following breakdowns were also requested:

- Current expenditure on environmental protection in respect of:
 - (i) Government and council fees, charges and taxes relating to pollution abatement and control;
 - (ii) Purchased services (eg payments to non-government contractors to remove and dispose of wastes); and
 - (iii) Other current expenditure on environmental protection.
- Current expenditure on environmental protection in respect of:
 - (i) Research and development carried out by individual businesses; and
 - (ii) Research and development carried out for individual businesses by other businesses.
- Current expenditure on environmental protection in respect of:
 - (i) Expenditure incurred on environmental impact assessments (for proposed new production);
 - (ii) Expenditure incurred on environmental audits (for existing production processes); and
 - (iii) Expenditure incurred on energy audits.
- Capital expenditure by individual businesses for new plant, machinery or equipment designed to abate or control water, hazardous and non-hazardous solid wastes, air, noise and other pollutants through:
 - (i) end-of-line techniques; and
 - (ii) change-in-production processes.

In 1991–92, total current expenditure by manufacturing establishments in South Australia on environmental protection was \$31.0m. This amounts to 0.2 per cent of the total manufacturing industry turnover for the year. Of the total current expenditure on environmental protection, 34.5 per cent was spent by manufacturers in just one industry subdivision — Basic metal products (\$10.7m).

In 1991–92, total capital expenditure by manufacturers to abate pollution in South Australia was \$39.9m. Of this total expenditure, 77.7 per cent was spent by manufacturers in two industry subdivisions — Chemical, petroleum and coal products (\$16.2m) and Basic metal products (\$14.8m).

At the ASIC class level, relatively substantial amounts were spent by the Iron and steel basic products (ASIC class 2941) industry — \$3.6m on current expenditure on environmental protection (which was 0.5% of the industry's turnover) and \$9.6m on capital expenditure to abate pollution. In nearly all industries, less than 1.0 per cent of total turnover for that industry was spent on ongoing environmental protection.

Further information on the environmental protection issues covered in the 1991–92 manufacturing census will be published in *Cost of Environment Protection, Australia, 1991–92* (4603.0).

Regional manufacturing activity (Table 8)

The Adelaide Statistical Division continued to dominate manufacturing activity in South Australia in 1991–92. It contributed 79.0 per cent of all locations at 30 June 1992, 79.3 per cent of employment at the end of June 1992 and 79.7 per cent of turnover for 1991–92. The only other statistical division to contribute significantly was Northern (5.7% of employment and 7.6% of turnover).

The Adelaide Statistical Division was also the leading contributor, by far, in eleven of the 12 industry subdivisions. The Basic metal products subdivision was the exception, where Northern Statistical Division was greater than Adelaide in terms of employment, wages and salaries paid and turnover. For this industry subdivision, Northern Statistical Division contributed 3,969 persons employed and \$1,071.6m in turnover, whereas Adelaide Statistical Division contributed 2,087 persons employed and \$414.2m in turnover. Transport equipment was the largest industry subdivision, by far, within Adelaide Statistical Division, contributing 14,162 persons employed and \$3,888.3m in turnover.

For the five remaining statistical divisions, an analysis of the percentage contribution to turnover by industry subdivisions shows that Food, beverages and tobacco contributed more than 50 per cent of total turnover in three of these regions. Of these, the statistical divisions that had the highest percentage contribution by Food, beverages and tobacco for their region were Murray Lands (77.4%) and Outer Adelaide (71.9%).

An analysis of data from 1988–89 to 1991–92 shows that there has been some change in the geographic distribution of manufacturing activity throughout South Australia over that period. Adelaide Statistical Division increased its percentage share of turnover by 3.4 percentage points to 79.7 per cent, whilst its share of employment decreased by 0.7 percentage points to 79.3 per cent. Outer Adelaide Statistical Division decreased its percentage share of turnover

by 1.3 percentage points to 3.7 per cent, whilst its share of employment increased by 0.5 percentage points to 4.6 per cent. Murray Lands' percentage share of turnover fell to 3.4 per cent (down 0.5 percentage points), whilst its percentage share of employment increased by 0.6 percentage points to 3.5 per cent. Northern Statistical Division's percentage share of turnover fell to 7.6 per cent (down 1.2 percentage points) and its percentage share of employment fell to 5.7 per cent (down 0.8 percentage points).

Australian and New Zealand Standard Industrial Classification (ANZSIC) (Table 9)

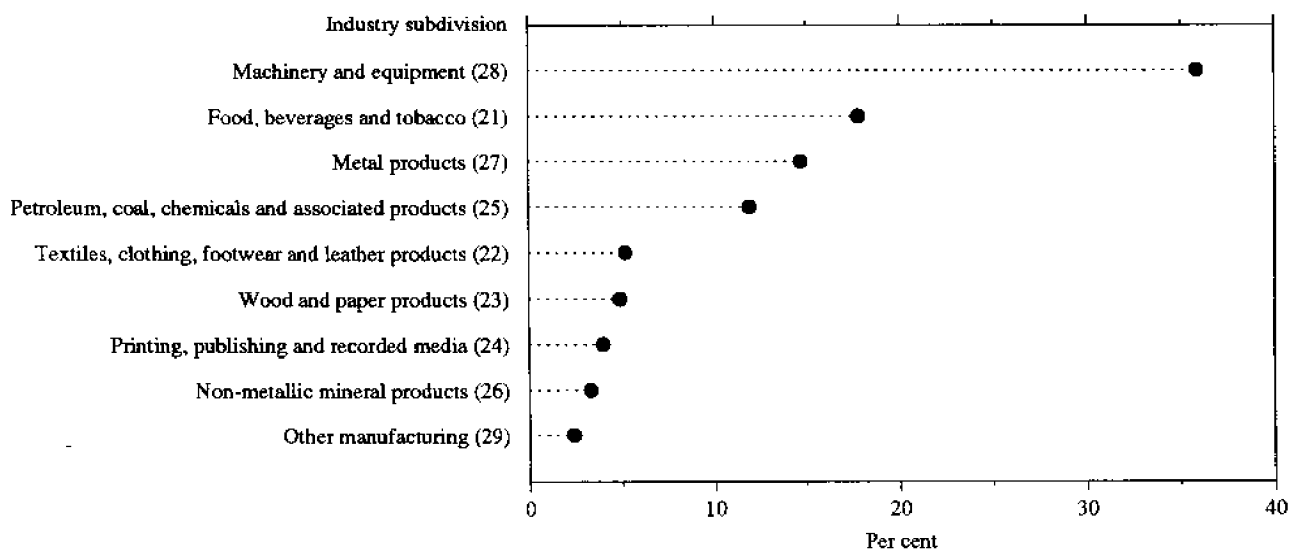
As explained in the introduction to Table 9, a new industry classification called the Australian and New Zealand Standard Industrial Classification (ANZSIC) is being introduced to replace the ASIC currently in use. Table 9 presents a concordance of data between those two industry classifications in respect of the 1991-92 reference year.

At the total manufacturing level, there is very little difference in the figures reported for South Australia under the two industry classifications. Under ANZSIC, there are 1.7 per cent fewer establishments in the manufacturing industry, 1.2 per cent fewer persons employed and 0.5 per cent less turnover than under ASIC. This is because, on balance, there are more establishments classified to industries other than manufacturing under ANZSIC than under ASIC.

The major differences between the two classifications becomes apparent in examining turnover at the industry subdivision level. As the chart below shows, under ANZSIC the largest industry subdivision now contributes more than one third of total manufacturing turnover in South Australia, compared with just over one quarter under ASIC (see the chart on page 1). There are now three industry subdivisions each contributing between 10 per cent and 20 per cent of total turnover in the State, compared with two under ASIC. The remaining five industry subdivisions under ANZSIC each contribute less than 6 per cent to total turnover in the State, compared to less than 10 per cent for each of the remaining nine industry subdivisions under ASIC.

The chart below ranks ANZSIC industry subdivisions from the largest to the smallest contributor for 1991-92 manufacturing turnover. With the introduction of this new industry classification, Machinery and equipment is now the largest contributor to South Australian manufacturing industry turnover with 36.0 per cent of the total turnover. Food, beverages and tobacco (17.5%), Metal products (14.7%) and Petroleum, coal, chemicals and associated products (11.9%) were, by far, the next highest contributors. The remaining five industry subdivisions each contributed 5.2 per cent or less to total turnover, with Other manufacturing (2.4%) being the smallest.

DISTRIBUTION OF TURNOVER, ANZSIC SUBDIVISIONS, SOUTH AUSTRALIA, 1991-92



Detailed tabulations of data included in this publication, classified according to ANZSIC, are available on request. The contact officer for these data is Mark Wise on Sydney (02) 268 4541.

**TABLE 1. MANUFACTURING ESTABLISHMENTS (a): SUMMARY OF OPERATIONS BY INDUSTRY SUBDIVISION
SOUTH AUSTRALIA, 1988-89 TO 1991-92 (b)**

<i>Industry subdivision</i>		<i>Establishments at 30 June</i>	<i>Employment at end of June</i>	<i>Wages and salaries</i>	<i>Turnover</i>	<i>Persons employed per establishment</i>	<i>Turnover per person employed</i>	
<i>ASIC code</i>	<i>Description</i>	<i>(c) (No.)</i>	<i>(d) ('000)</i>	<i>(e)(f) (\$m)</i>	<i>(f) (\$m)</i>	<i>(No.)</i>	<i>(f) (\$'000)</i>	
21	Food, beverages and tobacco	1991-92	437	15.3	385.2	2,759.1	35	180.8
		1990-91 (g)	409	16.3	381.8	2,728.8	40	167.2
		1989-90	424	16.1	376.9	2,644.9	38	164.6
		1988-89	450	16.5	349.6	2,482.2	37	150.7
23	Textiles	1991-92	65	2.2	70.2	435.6	33	202.3
		1990-91 (g)	70	2.5	64.3	393.1	35	159.3
		1989-90	64	2.7	61.0	348.7	42	128.3
		1988-89	59	2.5	55.3	379.6	43	150.6
24	Clothing and footwear	1991-92	120	3.4	76.6	319.1	28	94.7
		1990-91 (g)	132	3.7	78.3	318.1	28	85.3
		1989-90	130	n.p.	n.p.	n.p.	n.p.	n.p.
		1988-89	140	4.2	73.7	274.8	30	64.9
25	Wood, wood products and furniture	1991-92	496	6.8	155.2	679.1	14	99.8
		1990-91 (g)	537	7.1	167.6	726.9	13	102.8
		1989-90	557	8.0	166.0	714.2	14	89.2
		1988-89	595	8.5	156.4	749.1	14	88.6
26	Paper, paper products, printing and publishing	1991-92	311	6.8	213.4	929.5	22	137.6
		1990-91 (g)	299	7.2	213.9	879.3	24	122.0
		1989-90	310	7.4	206.1	845.3	24	114.9
		1988-89	330	8.1	199.6	842.6	24	104.6
27	Chemical, petroleum and coal products	1991-92	81	2.6	93.2	1,260.9	32	481.4
		1990-91 (g)	73	2.7	89.1	1,444.4	37	528.3
		1989-90	66	n.p.	n.p.	n.p.	n.p.	n.p.
		1988-89	63	2.4	62.8	516.4	37	218.7
28	Non-metallic mineral products	1991-92	138	2.9	89.1	508.1	21	173.4
		1990-91 (g)	149	3.1	98.8	545.0	21	174.4
		1989-90	165	3.8	110.0	594.8	23	156.3
		1988-89	165	4.0	96.6	554.2	24	138.9
29	Basic metal products	1991-92	61	6.1	247.5	1,486.2	99	245.2
		1990-91 (g)	60	7.1	238.8	1,447.2	119	203.4
		1989-90	60	7.1	220.9	1,498.9	119	210.8
		1988-89	57	7.7	218.5	1,444.7	135	187.7
31	Fabricated metal products	1991-92	499	6.8	172.8	831.2	14	122.5
		1990-91 (g)	515	7.6	188.6	848.6	15	112.1
		1989-90	522	8.6	192.7	866.0	16	100.7
		1988-89	584	9.3	184.2	875.5	16	94.6
32	Transport equipment	1991-92	174	14.4	444.1	3,916.6	83	271.5
		1990-91 (g)	174	15.3	455.7	4,095.8	88	268.1
		1989-90	187	16.8	460.1	4,187.5	90	249.8
		1988-89	203	18.9	445.1	2,891.0	93	153.2
33	Other machinery and equipment	1991-92	474	13.0	360.2	1,581.1	27	121.9
		1990-91 (g)	468	13.1	360.8	1,593.9	28	121.5
		1989-90	459	14.1	337.4	1,467.6	31	104.1
		1988-89	486	15.6	334.8	1,426.3	32	91.5
34	Miscellaneous manufacturing	1991-92	305	6.5	171.6	794.9	21	122.9
		1990-91 (g)	293	7.6	192.9	864.6	26	114.1
		1989-90	295	7.4	175.1	777.1	25	104.9
		1988-89	323	7.6	156.7	752.0	23	99.5
21-34	Total manufacturing	1991-92	3,161	86.6	2,479.1	15,501.4	27	179.0
		1990-91 (g)	3,179	93.3	2,530.7	15,885.7	29	170.2
		1989-90	3,239	98.6	2,463.6	15,331.2	30	155.4
		1988-89	3,455	105.1	2,333.1	13,188.6	30	125.5

(a) See paragraph 30 of the Explanatory Notes. (b) For comparability of data over the time periods shown, see paragraphs 27 to 29 of the Explanatory Notes. (c) See paragraphs 4 to 10 and 28 of the Explanatory Notes. (d) Includes working proprietors. (e) Excludes the drawings of working proprietors. (f) Value data are at current prices and, therefore, do not discount the impact of price changes. (g) Data presented for 1990-91 have undergone extensive revision due to further processing of that year's data and, therefore, generally differ from those previously published.

TABLE 2. MANUFACTURING EMPLOYMENT INCLUDING SOLE PROPRIETORS AND PARTNERSHIPS NOT EMPLOYING OTHERS BY INDUSTRY SUBDIVISION, SOUTH AUSTRALIA, 1991

Industry subdivision		Manufacturing employment, August 1991 (a)		
		Sole proprietors and partnerships not employing others (No.)	Total other (b) (No.)	Manufacturing census employment at end of June 1991 (b) (No.)
ASIC code	Description			
21	Food, beverages and tobacco	474	14,001	16,316
23	Textiles	107	2,328	2,467
24	Clothing and footwear	243	3,293	3,728
25	Wood, wood products and furniture	544	5,914	7,071
26	Paper, paper products, printing and publishing	349	7,602	7,207
27	Chemical, petroleum and coal products	74	2,594	2,734
28	Non-metallic mineral products	317	2,867	3,125
29	Basic metal products	62	5,191	7,114
31	Fabricated metal products	307	6,033	7,569
32	Transport equipment	222	13,545	15,276
33	Other machinery and equipment	335	10,962	13,123
34	Miscellaneous manufacturing	482	5,392	7,581
..	Manufacturing undefined (c)	570	3,607	..
21-34	Total manufacturing	4,086	83,329	93,311

(a) Source: 1991 Census of Population and Housing. (b) Includes working proprietors with employees. For an explanation of the differences between 'Total other' and 'Manufacturing census employment at end of June 1991', see paragraphs 18,19 and 32 to 35 of the Explanatory Notes. (c) Those persons who indicated that they were employed in the manufacturing industry but the description given was insufficient to enable them to be attributed to a specific industry subdivision.

TABLE 3. DEMOGRAPHIC CHARACTERISTICS OF PERSONS EMPLOYED BY INDUSTRY SUBDIVISION SOUTH AUSTRALIA, AUGUST 1991 (Per cent)

Industry		Proportion of industry					
		Sex		Age group (years)			
ASIC code	Description	Males	Females	15-24	25-34	35-54	55 and over
MANUFACTURING—							
21	Food, beverages and tobacco	65.9	34.1	20.4	28.9	42.1	8.6
23	Textiles	56.5	43.5	15.4	28.8	47.0	8.7
24	Clothing and footwear	29.5	70.5	21.6	30.0	42.1	6.4
25	Wood, wood products and furniture	82.8	17.2	26.2	28.2	37.1	8.5
26	Paper, paper products, printing and publishing	68.3	31.7	19.7	27.8	44.2	8.3
27	Chemical, petroleum and coal products	74.2	25.8	13.1	30.4	49.0	7.5
28	Non-metallic mineral products	80.2	19.8	14.5	28.0	47.2	10.3
29	Basic metal products	92.5	7.5	16.7	29.9	43.2	10.2
31	Fabricated metal products	81.8	18.2	20.8	29.4	40.7	9.1
32	Transport equipment	84.7	15.3	19.2	27.7	43.0	10.1
33	Other machinery and equipment	72.9	27.1	19.0	29.6	42.8	8.5
34	Miscellaneous manufacturing	70.2	29.8	19.8	32.1	40.1	8.0
..	Manufacturing undefined (a)	82.4	17.6	20.2	27.3	43.6	8.9
21-34	Total manufacturing	74.1	25.9	19.6	28.9	42.6	8.8
01-99	ALL INDUSTRIES	56.9	43.1	19.3	26.1	44.4	10.2

Source: 1991 Census of Population and Housing.

(a) Those persons who indicated that they were employed in the manufacturing industry but the description given was insufficient to enable them to be attributed to a specific industry subdivision.

TABLE 4. MANUFACTURING ESTABLISHMENTS (a): SUMMARY OF OPERATIONS BY INDUSTRY CLASS
SOUTH AUSTRALIA, 1991-92

Industry class		Establishments at 30 June	Employment at end of June	Wages and salaries	Turnover	Persons employed per establishment	Turnover per person employed
ASIC code	Description	(b) (No.)	(c) (No.)	(d) (\$m)	(\$m)	(No.)	(\$'000)
FOOD, BEVERAGES AND TOBACCO—							
Meat products—							
2115	Meat (except smallgoods or poultry)	42	2,782	70.4	397.3	66	142.8
2116	Poultry	11	n.p.	n.p.	n.p.	n.p.	n.p.
2117	Bacon, ham and smallgoods n.e.c.	18	n.p.	n.p.	n.p.	n.p.	n.p.
211	<i>Total</i>	71	4,263	101.8	603.7	60	141.6
Milk products—							
2121	Liquid milk and cream	5	202	n.p.	n.p.	40	n.p.
2122	Butter	1	n.p.	n.p.	n.p.	n.p.	n.p.
2123	Cheese	8	370	10.2	96.5	46	260.9
2124	Ice cream and frozen confections	3	41	n.p.	n.p.	14	n.p.
2125	Milk products n.e.c.	1	n.p.	n.p.	n.p.	n.p.	n.p.
212	<i>Total</i>	18	n.p.	n.p.	n.p.	n.p.	n.p.
Fruit and vegetable products—							
2131	Fruit products	12	623	18.3	171.7	52	275.6
2132	Vegetable products	7	183	4.8	45.9	26	251.0
213	<i>Total</i>	19	806	23.1	217.7	42	270.0
214	<i>Margarine and oils and fats n.e.c.</i>	1	n.p.	n.p.	n.p.	n.p.	n.p.
Flour mill and cereal food products—							
2151	Flour mill products	6	n.p.	n.p.	n.p.	n.p.	n.p.
2152	Starch, gluten and starch sugars	—	—	—	—	—	—
2153	Cereal foods and baking mixes	13	n.p.	n.p.	n.p.	n.p.	n.p.
215	<i>Total</i>	19	438	11.0	126.5	23	288.9
Bread, cakes and biscuits—							
2161	Bread	83	1,576	n.p.	n.p.	19	n.p.
2162	Cakes and pastries	53	n.p.	26.4	86.9	n.p.	75.3
2163	Biscuits	4	n.p.	n.p.	n.p.	n.p.	n.p.
216	<i>Total</i>	140	3,271	76.9	266.7	23	81.5
Other food products—							
2171	Raw sugar	—	—	—	—	—	—
2173	Confectionery and cocoa products	12	174	n.p.	n.p.	15	n.p.
2174	Processed seafoods	18	581	10.0	145.2	32	249.9
2175	Prepared animal and bird foods	13	234	5.7	80.4	18	343.4
2176	Food products n.e.c.	18	768	n.p.	n.p.	43	n.p.
217	<i>Total</i>	61	1,757	37.9	372.4	29	211.9
Beverages and malt—							
2185	Soft drinks, cordials and syrups	14	n.p.	n.p.	n.p.	n.p.	n.p.
2186	Beer	2	n.p.	n.p.	n.p.	n.p.	n.p.
2187	Malt	4	87	3.6	59.8	22	686.8
2188	Wine and brandy	88	2,565	66.3	454.9	29	177.3
2189	Alcoholic beverages n.e.c.	—	—	—	—	—	—
218	<i>Total</i>	108	3,971	113.7	887.8	37	223.6
219	<i>Tobacco products</i>	—	—	—	—	—	—
21	<i>Total food, beverages and tobacco</i>	437	15,258	385.2	2,759.1	35	180.8

For footnotes see end of table.

TABLE 4. MANUFACTURING ESTABLISHMENTS (a): SUMMARY OF OPERATIONS BY INDUSTRY CLASS
SOUTH AUSTRALIA, 1991-92—continued

Industry class		Establishments at 30 June	Employment at end of June	Wages and salaries	Turnover	Persons employed per establishment	Turnover per person employed
ASIC code	Description	(b) (No.)	(c) (No.)	(d) (\$m)	(\$m)	(No.)	(\$'000)
TEXTILES—							
Textile fibres, yarns and woven fabrics—							
2341	Cotton ginning	—	—	—	—	—	—
2342	Wool scouring and top making	1	n.p.	n.p.	n.p.	n.p.	n.p.
2343	Man-made fibres and yarns	—	—	—	—	—	—
2344	Man-made fibre broadwoven fabrics	2	n.p.	n.p.	n.p.	n.p.	n.p.
2345	Cotton yarns and broadwoven fabrics	1	n.p.	n.p.	n.p.	n.p.	n.p.
2346	Worsted yarns and broadwoven fabrics	1	n.p.	n.p.	n.p.	n.p.	n.p.
2347	Woolen yarns and broadwoven fabrics	2	n.p.	n.p.	n.p.	n.p.	n.p.
2348	Narrow woven and elastic textiles	—	—	—	—	—	—
2349	Textile finishing	5	89	1.5	8.4	18	94.5
234	Total	12	1,355	48.6	342.3	113	252.7
Other textile products—							
2351	Household textiles	8	n.p.	n.p.	n.p.	n.p.	n.p.
2352	Textile floor coverings	3	27	n.p.	n.p.	9	n.p.
2353	Felt and felt products	1	n.p.	n.p.	n.p.	n.p.	n.p.
2354	Canvas and associated products n.e.c.	35	238	5.2	24.2	7	101.5
2355	Rope, cordage and twine	—	—	—	—	—	—
2356	Textile products n.e.c.	6	130	n.p.	n.p.	22	n.p.
235	Total	53	798	21.6	93.3	15	116.9
23	Total textiles	65	2,153	70.2	435.6	33	202.3
CLOTHING AND FOOTWEAR—							
Knitting mills—							
2441	Hosiery	—	—	—	—	—	—
2442	Cardigans and pullovers	4	85	1.7	3.8	21	44.7
2443	Knitted goods n.e.c.	7	158	2.9	12.1	23	76.6
244	Total	11	243	4.5	15.9	22	65.4
Clothing—							
2451	Men's trousers and shorts; work clothing	7	680	17.0	112.9	97	166.0
2452	Men's suits and coats; waterproof clothing	7	80	1.7	5.5	11	68.5
2453	Women's outerwear n.e.c.	34	872	17.6	72.6	26	83.3
2454	Foundation garments	—	—	—	—	—	—
2455	Underwear and infants' clothing n.e.c.	5	280	6.5	13.2	56	47.3
2456	Headwear and clothing n.e.c.	43	340	6.9	23.1	8	68.0
245	Total	96	2,252	49.7	227.3	23	100.9
246	Footwear	13	875	22.4	75.9	67	86.7
24	Total clothing and footwear	120	3,370	76.6	319.1	28	94.7
WOOD, WOOD PRODUCTS AND FURNITURE—							
Wood and wood products—							
2531	Log sawmilling	19	n.p.	n.p.	n.p.	n.p.	n.p.
2532	Resawn and dressed timber	8	525	13.9	86.6	66	164.9
2533	Veneers and manufactured boards of wood	5	n.p.	n.p.	n.p.	n.p.	n.p.
2534	Wooden doors	4	71	1.5	9.8	18	138.6
2535	Wooden structural fittings and joinery n.e.c.	148	1,503	31.0	133.8	10	89.0
2536	Wooden containers	16	137	3.3	17.2	9	125.3
2537	Hardwood woodchips	—	—	—	—	—	—
2538	Wood products n.e.c.	40	223	3.9	15.9	6	71.3
253	Total	240	4,148	100.4	451.4	17	108.8
Furniture and mattresses—							
2541	Furniture (except sheet metal)	247	2,459	n.p.	n.p.	10	n.p.
2542	Mattresses (except rubber)	9	200	n.p.	n.p.	22	n.p.
254	Total	256	2,659	54.8	227.7	10	85.6
25	Total wood, wood products and furniture	496	6,807	155.2	679.1	14	99.8

For footnotes see end of table.

TABLE 4. MANUFACTURING ESTABLISHMENTS (a): SUMMARY OF OPERATIONS BY INDUSTRY CLASS
SOUTH AUSTRALIA, 1991-92—continued

Industry class		Establishments at 30 June (b) (No.)	Employment at end of June (c) (No.)	Wages and salaries (d) (\$m)	Turnover (\$m)	Persons employed per establishment (No.)	Turnover per person employed (\$'000)
ASIC code	Description						
PAPER, PAPER PRODUCTS, PRINTING AND PUBLISHING—							
Paper and paper products—							
2631	Pulp, paper and paperboard	4	11	0.2	0.6	3	55.3
2632	Paper bags (including textile bags)	4	215	5.8	43.6	54	202.7
2633	Solid fibreboard containers	2	n.p.	n.p.	n.p.	n.p.	n.p.
2634	Corrugated fibreboard containers	5	n.p.	n.p.	n.p.	n.p.	n.p.
2635	Paper products n.e.c.	6	842	n.p.	n.p.	140	n.p.
263	<i>Total</i>	<i>21</i>	<i>1,541</i>	<i>59.1</i>	<i>315.3</i>	<i>73</i>	<i>204.6</i>
Printing and allied industries—							
2641	Publishing	32	192	3.6	17.6	6	91.7
2642	Printing and publishing	39	1,640	59.2	220.3	42	134.3
2643	Paper stationery	33	1,210	35.1	165.4	37	136.7
2644	Printing and bookbinding	150	1,910	50.4	194.0	13	101.5
2645	Printing trade services n.e.c.	36	264	6.0	16.9	7	64.1
264	<i>Total</i>	<i>290</i>	<i>5,216</i>	<i>154.3</i>	<i>614.2</i>	<i>18</i>	<i>117.8</i>
26	Total paper, paper products, printing and publishing	311	6,757	213.4	929.5	22	137.6
CHEMICAL, PETROLEUM AND COAL PRODUCTS—							
Basic chemicals—							
2751	Chemical fertilisers	7	n.p.	n.p.	n.p.	n.p.	n.p.
2752	Industrial gases	2	n.p.	n.p.	n.p.	n.p.	n.p.
2753	Synthetic resins and rubber	4	67	n.p.	n.p.	17	n.p.
2754	Organic industrial chemicals n.e.c.	2	n.p.	n.p.	n.p.	n.p.	n.p.
2755	Inorganic industrial chemicals n.e.c.	16	599	21.7	197.7	37	330.0
275	<i>Total</i>	<i>31</i>	<i>1,169</i>	<i>41.9</i>	<i>365.6</i>	<i>38</i>	<i>312.8</i>
Other chemical products—							
2761	Ammunition, explosives and fireworks	2	n.p.	n.p.	n.p.	n.p.	n.p.
2762	Paints	8	n.p.	n.p.	n.p.	n.p.	n.p.
2763	Pharmaceutical and veterinary products	10	465	12.9	66.2	47	142.4
2764	Pesticides	1	n.p.	n.p.	n.p.	n.p.	n.p.
2765	Soap and other detergents	9	n.p.	n.p.	n.p.	n.p.	n.p.
2766	Cosmetics and toilet preparations	4	n.p.	n.p.	n.p.	n.p.	n.p.
2767	Inks	4	32	n.p.	n.p.	8	n.p.
2768	Chemical products n.e.c.	7	52	1.6	11.4	7	218.5
276	<i>Total</i>	<i>45</i>	<i>1,107</i>	<i>n.p.</i>	<i>n.p.</i>	<i>25</i>	<i>n.p.</i>
277	<i>Petroleum refining</i>	<i>3</i>	<i>n.p.</i>	<i>n.p.</i>	<i>n.p.</i>	<i>n.p.</i>	<i>n.p.</i>
278	<i>Petroleum and coal products n.e.c.</i>	<i>2</i>	<i>n.p.</i>	<i>n.p.</i>	<i>n.p.</i>	<i>n.p.</i>	<i>n.p.</i>
27	Total chemical, petroleum and coal products	81	2,619	93.2	1,260.9	32	481.4

For footnotes see end of table.

TABLE 4. MANUFACTURING ESTABLISHMENTS (a): SUMMARY OF OPERATIONS BY INDUSTRY CLASS
SOUTH AUSTRALIA, 1991-92—continued

Industry class		Establishments at 30 June (b) (No.)	Employment at end of June (c) (No.)	Wages and salaries (d) (\$m)	Turnover (\$m)	Persons employed per establishment (No.)	Turnover per person employed (\$'000)
NON-METALLIC MINERAL PRODUCTS—							
285	Glass and glass products	11	496	n.p.	n.p.	45	n.p.
Clay products and refractories—							
2861	Clay bricks	7	264	8.4	42.3	38	160.3
2862	Refractories	2	n.p.	n.p.	n.p.	n.p.	n.p.
2863	Ceramic tiles and pipes	2	n.p.	n.p.	n.p.	n.p.	n.p.
2864	Ceramic goods n.e.c.	20	108	1.5	4.2	5	38.4
286	<i>Total</i>	31	444	11.3	53.3	14	120.1
Cement and concrete products—							
2871	Cement	3	n.p.	n.p.	n.p.	n.p.	n.p.
2872	Ready mixed concrete	19	328	11.5	84.5	17	257.7
2873	Concrete pipes and box culverts	1	n.p.	n.p.	n.p.	n.p.	n.p.
2874	Concrete products n.e.c.	40	788	n.p.	n.p.	20	n.p.
287	<i>Total</i>	63	1,522	48.7	298.1	24	195.9
Other non-metallic mineral products—							
2881	Plaster products and expanded minerals	10	n.p.	n.p.	n.p.	n.p.	n.p.
2882	Stone products	16	114	2.7	12.9	7	112.9
2883	Glass wool and mineral wool products	2	n.p.	n.p.	n.p.	n.p.	n.p.
2884	Non-metallic mineral products n.e.c.	5	126	n.p.	n.p.	25	n.p.
288	<i>Total</i>	33	469	n.p.	n.p.	14	n.p.
28	Total non-metallic mineral products	138	2,931	89.1	508.1	21	173.4
BASIC METAL PRODUCTS—							
Basic iron and steel—							
2941	Iron and steel basic products	19	3,263	146.3	699.2	172	214.3
2942	Iron casting	8	n.p.	n.p.	n.p.	n.p.	n.p.
2943	Steel casting	4	136	4.1	14.9	34	109.5
2944	Iron and steel forging	1	n.p.	n.p.	n.p.	n.p.	n.p.
2945	Steel pipes and tubes	6	386	n.p.	n.p.	64	n.p.
294	<i>Total</i>	38	4,248	175.3	828.2	112	195.0
Basic non-ferrous metals—							
2951	Copper smelting, refining	2	n.p.	n.p.	n.p.	n.p.	n.p.
2952	Silver, lead, zinc smelting, refining	2	n.p.	n.p.	n.p.	n.p.	n.p.
2953	Alumina	—	—	—	—	—	—
2954	Aluminium smelting	—	—	—	—	—	—
2955	Nickel smelting, refining	—	—	—	—	—	—
2956	Non-ferrous metals n.e.c. smelting, refining	2	n.p.	n.p.	n.p.	n.p.	n.p.
2957	Secondary recovery and alloying of non-ferrous metals n.e.c.	7	n.p.	n.p.	n.p.	n.p.	n.p.
295	<i>Total</i>	13	n.p.	n.p.	n.p.	n.p.	n.p.
Non-ferrous metal basic products—							
2961	Aluminium rolling, drawing, extruding	—	—	—	—	—	—
2962	Non-ferrous metals n.e.c. rolling, drawing, extruding	—	—	—	—	—	—
2963	Non-ferrous metal casting	10	n.p.	n.p.	n.p.	n.p.	n.p.
296	<i>Total</i>	10	n.p.	n.p.	n.p.	n.p.	n.p.
29	Total basic metal products	61	6,062	247.5	1,486.2	99	245.2

For footnotes see end of table.

TABLE 4. MANUFACTURING ESTABLISHMENTS (a): SUMMARY OF OPERATIONS BY INDUSTRY CLASS
SOUTH AUSTRALIA, 1991-92—continued

Industry class		Establishments at 30 June (b) (No.)	Employment at end of June (c) (No.)	Wages and salaries (d) (\$m)	Turnover (\$m)	Persons employed per establishment (No.)	Turnover per person employed (\$'000)
ASIC code	Description						
FABRICATED METAL PRODUCTS—							
Structural metal products—							
3141	Fabricated structural steel	111	1,275	37.9	216.6	11	169.9
3142	Architectural aluminium products	71	962	25.5	139.7	14	145.2
3143	Architectural metal products n.e.c.	27	257	5.9	33.3	10	129.6
314	<i>Total</i>	209	2,494	69.4	389.6	12	156.2
Sheet metal products—							
3151	Metal containers	4	n.p.	n.p.	n.p.	n.p.	n.p.
3152	Sheet metal furniture	7	n.p.	n.p.	n.p.	n.p.	n.p.
3153	Sheet metal products n.e.c.	80	876	21.5	88.1	11	100.5
315	<i>Total</i>	91	1,136	27.7	110.7	12	97.4
Other fabricated metal products—							
3161	Cutlery and hand tools n.e.c.	11	n.p.	n.p.	n.p.	n.p.	n.p.
3162	Springs and wire products	22	471	10.4	47.9	21	101.8
3163	Nuts, bolts, screws and rivets	12	167	3.2	12.4	14	74.1
3164	Metal coating and finishing	59	619	13.5	42.9	10	69.2
3165	Non-ferrous steam, gas and water fittings	5	n.p.	n.p.	n.p.	n.p.	n.p.
3166	Boiler and plate work	12	136	4.6	50.0	11	367.4
3167	Metal blinds and awnings	2	n.p.	n.p.	n.p.	n.p.	n.p.
3168	Fabricated metal products n.e.c.	76	1,581	40.0	164.0	21	103.7
316	<i>Total</i>	199	3,156	75.7	330.9	16	104.8
31	Total fabricated metal products	499	6,786	172.8	831.2	14	122.5
TRANSPORT EQUIPMENT—							
Motor vehicles and parts—							
3231	Motor vehicles	4	8,569	n.p.	n.p.	2,142	n.p.
3232	Motor vehicle bodies, trailers, caravans	33	591	14.3	51.2	18	86.6
3233	Motor vehicle instruments and electrical equipment n.e.c.	8	102	6.9	32.6	13	319.9
3234	Motor vehicle parts n.e.c.	71	3,829	103.7	432.2	54	112.9
323	<i>Total</i>	116	13,091	n.p.	n.p.	113	n.p.
Other transport equipment—							
3241	Ships	5	n.p.	n.p.	n.p.	n.p.	n.p.
3242	Boats	29	164	2.7	12.3	6	75.1
3243	Railway rolling stock and locomotives	—	—	—	—	—	—
3244	Aircraft	15	96	5.4	20.5	6	213.5
3245	Transport equipment n.e.c.	9	n.p.	1.4	7.4	n.p.	n.p.
324	<i>Total</i>	58	1,334	n.p.	n.p.	23	n.p.
32	Total transport equipment	174	14,425	444.1	3,916.6	83	271.5

For footnotes see end of table.

**TABLE 4. MANUFACTURING ESTABLISHMENTS (a): SUMMARY OF OPERATIONS BY INDUSTRY CLASS
SOUTH AUSTRALIA, 1991-92—continued**

Industry class		Establishments at 30 June (b) (No.)	Employment at end of June (c) (No.)	Wages and salaries (d) (\$m)	Turnover (\$m)	Persons employed per establishment (No.)	Turnover per person employed (\$'000)
ASIC code	Description						
OTHER MACHINERY AND EQUIPMENT—							
Photographic, professional and scientific equipment—							
3341	Photographic and optical goods	11	n.p.	n.p.	n.p.	n.p.	n.p.
3342	Photographic film processing	49	n.p.	n.p.	n.p.	n.p.	n.p.
3343	Measuring, professional and scientific equipment n.e.c.	8	199	6.6	19.8	25	99.6
334	<i>Total</i>	68	853	23.3	76.1	13	89.2
Appliances and electrical equipment—							
3351	Radio and TV receivers; audio equipment	2	n.p.	n.p.	n.p.	n.p.	n.p.
3352	Electronic equipment n.e.c.	43	1,815	71.0	181.1	42	99.8
3353	Refrigerators and household appliances	25	2,221	60.1	352.4	89	158.7
3354	Water heating systems	5	60	n.p.	n.p.	12	n.p.
3355	Electric and telephone cable and wire	1	n.p.	n.p.	n.p.	n.p.	n.p.
3356	Batteries	2	n.p.	n.p.	n.p.	n.p.	n.p.
3357	Electrical machinery and equipment n.e.c.	59	3,501	80.5	422.5	59	120.7
335	<i>Total</i>	137	8,184	228.3	1,120.8	60	136.9
Industrial machinery and equipment—							
3361	Agricultural machinery	50	600	13.6	60.0	12	100.0
3362	Construction machinery	10	128	3.2	14.6	13	114.2
3363	Materials handling equipment	23	364	9.2	34.8	16	95.6
3364	Wood and metal working machinery	18	316	9.2	24.9	18	78.9
3365	Pumps and compressors	10	147	3.8	42.0	15	285.9
3366	Commercial space heating and cooling equipment	5	50	1.1	5.5	10	110.4
3367	Dies, saw blades and machine tool accessories	50	529	13.9	33.6	11	63.5
3368	Food processing machinery	6	57	1.4	3.7	10	64.7
3369	Industrial machinery and equipment n.e.c.	97	1,739	53.2	165.0	18	94.9
336	<i>Total</i>	269	3,930	108.6	384.2	15	97.8
33	Total other machinery and equipment	474	12,967	360.2	1,581.1	27	121.9
MISCELLANEOUS MANUFACTURING—							
Leather and leather products—							
3451	Leather tanning and fur dressing	11	225	6.7	50.4	20	224.1
3452	Leather and leather substitute goods n.e.c.	8	35	0.7	2.4	4	68.1
345	<i>Total</i>	19	260	7.4	52.8	14	203.1
Rubber products—							
3461	Rubber tyres, tubes, belts, hose and sheets	13	899	n.p.	n.p.	69	n.p.
3462	Rubber products n.e.c.	7	437	n.p.	n.p.	62	n.p.
346	<i>Total</i>	20	1,336	42.6	160.4	67	120.1
Plastic and related products—							
3471	Flexible packaging and abrasive papers	13	n.p.	n.p.	n.p.	n.p.	n.p.
3472	Rigid plastic sheeting	1	n.p.	n.p.	n.p.	n.p.	n.p.
3473	Hard surface floor coverings n.e.c.	—	—	—	—	—	—
3474	Plastic products n.e.c.	103	2,223	60.0	316.0	22	142.1
347	<i>Total</i>	117	2,863	77.6	410.9	24	143.5
Other manufacturing—							
3481	Ophthalmic articles	10	1,079	24.2	75.2	108	69.7
3482	Jewellery and silverware	31	156	3.2	15.3	5	97.8
3483	Brooms and brushes	6	189	4.6	32.7	32	173.2
3484	Signs and advertising displays	65	350	6.9	24.3	5	69.4
3485	Sporting equipment	11	n.p.	n.p.	n.p.	n.p.	n.p.
3486	Writing and marking equipment	2	n.p.	n.p.	n.p.	n.p.	n.p.
3487	Manufacturing n.e.c.	24	108	2.1	10.7	5	98.7
348	<i>Total</i>	149	2,007	44.0	170.7	13	85.1
34	Total miscellaneous manufacturing	305	6,466	171.6	794.9	21	122.9
21-34	TOTAL MANUFACTURING	3,161	86,601	2,479.1	15,501.4	27	179.0

(a) See paragraph 30 of the Explanatory Notes. (b) See paragraphs 4 to 10 of the Explanatory Notes. (c) Includes working proprietors. (d) Excludes the drawings of working proprietors.

TABLE 5. MANUFACTURING ESTABLISHMENTS (a): SUMMARY OF OPERATIONS BY EMPLOYMENT SIZE AND INDUSTRY SUBDIVISION, SOUTH AUSTRALIA, 1991-92

Employment size group	Establishments at 30 June (b)		Employment at end of June (c)		Wages and salaries (d) (e)		Turnover (e)	
	Number	Proportion (Per cent)	Number	Proportion (Per cent)	(\$m)	Proportion (Per cent)	(\$m)	Proportion (Per cent)
FOOD, BEVERAGES AND TOBACCO								
0 - 3 persons	90	20.6	207	1.4	3.4	0.9	24.2	0.9
4 - 9 persons	143	32.7	819	5.4	12.7	3.3	85.7	3.1
10 - 19 persons	87	19.9	1,162	7.6	23.9	6.2	209.8	7.6
20 - 49 persons	57	13.0	1,753	11.5	40.8	10.6	328.3	11.9
50 - 99 persons	30	6.9	2,126	13.9	51.8	13.4	481.4	17.5
Total less than 100 persons	407	93.1	6,067	39.8	132.6	34.4	1,129.3	40.9
100 - 199 persons	11	2.5	1,413	9.3	37.1	9.6	314.5	11.4
200 - 499 persons	15	3.4	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
500 - 999 persons	4	0.9	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
1000 or more persons	—	—	—	—	—	—	—	—
Total 100 or more persons	30	6.9	9,191	60.2	252.5	65.6	1,628.7	59.1
Total	437	100.0	15,258	100.0	385.1	100.0	2,758.0	100.0
TEXTILES								
0 - 3 persons	16	24.6	36	1.7	0.5	0.7	2.6	0.6
4 - 9 persons	24	36.9	148	6.9	2.8	4.4	10.9	2.6
10 - 19 persons	13	20.0	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
20 - 49 persons	4	6.2	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
50 - 99 persons	3	4.6	263	12.2	7.9	12.2	39.3	9.6
Total less than 100 persons	60	92.3	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
100 - 199 persons	2	3.1	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
200 - 499 persons	2	3.1	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
500 - 999 persons	1	1.5	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
1000 or more persons	—	—	—	—	—	—	—	—
Total 100 or more persons	5	7.7	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
Total	65	100.0	2,153	100.0	64.8	100.0	411.6	100.0
CLOTHING AND FOOTWEAR								
0 - 3 persons	35	29.2	75	2.2	0.7	0.9	4.1	1.3
4 - 9 persons	43	35.8	248	7.4	3.7	4.8	15.7	5.0
10 - 19 persons	13	10.8	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
20 - 49 persons	16	13.3	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
50 - 99 persons	5	4.2	427	12.7	9.1	11.9	37.0	11.7
Total less than 100 persons	112	93.3	1,473	43.7	28.4	37.4	105.0	33.1
100 - 199 persons	3	2.5	398	11.8	9.4	12.3	61.7	19.5
200 - 499 persons	5	4.2	1,499	44.5	38.1	50.3	150.7	47.5
500 - 999 persons	—	—	—	—	—	—	—	—
1000 or more persons	—	—	—	—	—	—	—	—
Total 100 or more persons	8	6.7	1,897	56.3	47.5	62.6	212.4	66.9
Total	120	100.0	3,370	100.0	75.9	100.0	317.4	100.0
WOOD, WOOD PRODUCTS AND FURNITURE								
0 - 3 persons	177	35.7	399	5.9	5.3	3.4	25.8	3.8
4 - 9 persons	182	36.7	1,038	15.2	18.3	11.8	74.5	11.0
10 - 19 persons	77	15.5	1,016	14.9	22.5	14.5	97.7	14.4
20 - 49 persons	36	7.3	1,005	14.8	23.4	15.1	107.2	15.8
50 - 99 persons	12	2.4	769	11.3	21.1	13.6	80.5	11.9
Total less than 100 persons	484	97.6	4,227	62.1	90.5	58.4	385.7	56.9
100 - 199 persons	6	1.2	822	12.1	20.5	13.2	90.4	13.3
200 - 499 persons	6	1.2	1,758	25.8	43.9	28.4	202.2	29.8
500 - 999 persons	—	—	—	—	—	—	—	—
1000 or more persons	—	—	—	—	—	—	—	—
Total 100 or more persons	12	2.4	2,580	37.9	64.4	41.6	292.6	43.1
Total	496	100.0	6,807	100.0	155.0	100.0	678.3	100.0

For footnotes see end of table.

TABLE 5. MANUFACTURING ESTABLISHMENTS (a): SUMMARY OF OPERATIONS BY EMPLOYMENT SIZE AND INDUSTRY SUBDIVISION, SOUTH AUSTRALIA, 1991-92—continued

Employment size group	Establishments at 30 June (b)		Employment at end of June (c)		Wages and salaries (d) (e)		Turnover (e)	
	Number	Proportion (Per cent)	Number	Proportion (Per cent)	(\$m)	Proportion (Per cent)	(\$m)	Proportion (Per cent)
PAPER, PAPER PRODUCTS, PRINTING AND PUBLISHING								
0 - 3 persons	91	29.3	211	3.1	3.5	1.7	14.6	1.6
4 - 9 persons	106	34.1	635	9.4	12.4	5.9	49.0	5.3
10 - 19 persons	54	17.4	687	10.2	15.4	7.3	57.4	6.3
20 - 49 persons	39	12.5	1,192	17.6	28.9	13.7	107.7	11.8
50 - 99 persons	9	2.9	649	9.6	17.6	8.3	78.8	8.6
<i>Total less than 100 persons</i>	<i>299</i>	<i>96.1</i>	<i>3,374</i>	<i>49.9</i>	<i>77.8</i>	<i>36.9</i>	<i>307.4</i>	<i>33.6</i>
100 - 199 persons	7	2.3	880	13.0	27.9	13.3	178.4	19.5
200 - 499 persons	3	1.0	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
500 - 999 persons	2	0.6	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
1000 or more persons	—	—	—	—	—	—	—	—
<i>Total 100 or more persons</i>	<i>12</i>	<i>3.9</i>	<i>3,383</i>	<i>50.1</i>	<i>132.8</i>	<i>63.1</i>	<i>608.6</i>	<i>66.4</i>
Total	311	100.0	6,757	100.0	210.5	100.0	916.0	100.0
CHEMICAL, PETROLEUM AND COAL PRODUCTS								
0 - 3 persons	22	27.2	44	1.7	1.0	1.1	8.0	0.6
4 - 9 persons	24	29.6	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
10 - 19 persons	8	9.9	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
20 - 49 persons	14	17.3	417	15.9	11.7	12.6	76.3	6.1
50 - 99 persons	7	8.6	527	20.1	18.1	19.4	302.7	24.0
<i>Total less than 100 persons</i>	<i>75</i>	<i>92.6</i>	<i>n.p.</i>	<i>n.p.</i>	<i>n.p.</i>	<i>n.p.</i>	<i>n.p.</i>	<i>n.p.</i>
100 - 199 persons	2	2.5	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
200 - 499 persons	4	4.9	1,092	41.7	45.7	49.1	708.8	56.2
500 - 999 persons	—	—	—	—	—	—	—	—
1000 or more persons	—	—	—	—	—	—	—	—
<i>Total 100 or more persons</i>	<i>6</i>	<i>7.4</i>	<i>n.p.</i>	<i>n.p.</i>	<i>n.p.</i>	<i>n.p.</i>	<i>n.p.</i>	<i>n.p.</i>
Total	81	100.0	2,619	100.0	93.1	100.0	1,260.8	100.0
NON-METALLIC MINERAL PRODUCTS								
0 - 3 persons	48	34.8	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
4 - 9 persons	39	28.3	223	7.6	4.5	5.0	29.6	5.8
10 - 19 persons	16	11.6	210	7.2	5.7	6.4	28.4	5.6
20 - 49 persons	17	12.3	527	18.0	13.5	15.1	71.7	14.1
50 - 99 persons	11	8.0	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
<i>Total less than 100 persons</i>	<i>131</i>	<i>94.9</i>	<i>n.p.</i>	<i>n.p.</i>	<i>n.p.</i>	<i>n.p.</i>	<i>n.p.</i>	<i>n.p.</i>
100 - 199 persons	5	3.6	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
200 - 499 persons	2	1.4	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
500 - 999 persons	—	—	—	—	—	—	—	—
1000 or more persons	—	—	—	—	—	—	—	—
<i>Total 100 or more persons</i>	<i>7</i>	<i>5.1</i>	<i>n.p.</i>	<i>n.p.</i>	<i>n.p.</i>	<i>n.p.</i>	<i>n.p.</i>	<i>n.p.</i>
Total	138	100.0	2,931	100.0	89.0	100.0	507.5	100.0
BASIC METAL PRODUCTS								
0 - 3 persons	16	26.2	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
4 - 9 persons	12	19.7	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
10 - 19 persons	9	14.8	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
20 - 49 persons	8	13.1	214	3.5	6.0	2.4	31.8	2.1
50 - 99 persons	6	9.8	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
<i>Total less than 100 persons</i>	<i>51</i>	<i>83.6</i>	<i>906</i>	<i>14.9</i>	<i>28.6</i>	<i>11.6</i>	<i>338.8</i>	<i>22.8</i>
100 - 199 persons	5	8.2	693	11.4	24.6	9.9	269.9	18.2
200 - 499 persons	3	4.9	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
500 - 999 persons	—	—	—	—	—	—	—	—
1000 or more persons	2	3.3	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
<i>Total 100 or more persons</i>	<i>10</i>	<i>16.4</i>	<i>5,156</i>	<i>85.1</i>	<i>218.9</i>	<i>88.4</i>	<i>1,147.4</i>	<i>77.2</i>
Total	61	100.0	6,062	100.0	247.5	100.0	1,486.2	100.0

For footnotes see end of table.

TABLE 5. MANUFACTURING ESTABLISHMENTS (a): SUMMARY OF OPERATIONS BY EMPLOYMENT SIZE AND INDUSTRY SUBDIVISION, SOUTH AUSTRALIA, 1991-92—continued

Employment size group	Establishments at 30 June (b)		Employment at end of June (c)		Wages and salaries (d) (e)		Turnover (e)	
	Number	Proportion (Per cent)	Number	Proportion (Per cent)	(\$m)	Proportion (Per cent)	(\$m)	Proportion (Per cent)
FABRICATED METAL PRODUCTS								
0 - 3 persons	134	26.9	302	4.5	4.6	2.7	22.3	2.7
4 - 9 persons	205	41.1	1,208	17.8	25.0	14.7	106.8	13.1
10 - 19 persons	82	16.4	1,147	16.9	27.8	16.4	114.0	14.0
20 - 49 persons	58	11.6	1,770	26.1	46.7	27.6	226.3	27.8
50 - 99 persons	14	2.8	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
Total less than 100 persons	493	98.8	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
100 - 199 persons	4	0.8	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
200 - 499 persons	1	0.2	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
500 - 999 persons	1	0.2	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
1000 or more persons	—	—	—	—	—	—	—	—
Total 100 or more persons	6	1.2	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
Total	499	100.0	6,786	100.0	169.4	100.0	813.3	100.0
TRANSPORT EQUIPMENT								
0 - 3 persons	53	30.5	109	0.8	2.3	0.5	12.0	0.3
4 - 9 persons	56	32.2	310	2.1	6.2	1.4	25.7	0.7
10 - 19 persons	31	17.8	399	2.8	9.0	2.0	33.2	0.9
20 - 49 persons	15	8.6	497	3.4	13.2	3.0	63.7	1.6
50 - 99 persons	4	2.3	290	2.0	7.9	1.8	44.5	1.1
Total less than 100 persons	159	91.4	1,605	11.1	38.6	8.8	179.2	4.6
100 - 199 persons	4	2.3	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
200 - 499 persons	7	4.0	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
500 - 999 persons	2	1.1	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
1000 or more persons	2	1.1	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
Total 100 or more persons	15	8.6	12,820	88.9	400.7	91.2	3,713.1	95.4
Total	174	100.0	14,425	100.0	439.2	100.0	3,892.2	100.0
OTHER MACHINERY AND EQUIPMENT								
0 - 3 persons	142	30.0	304	2.3	5.4	1.5	23.7	1.5
4 - 9 persons	160	33.8	964	7.4	20.9	5.8	74.0	4.7
10 - 19 persons	70	14.8	955	7.4	24.7	6.9	95.4	6.0
20 - 49 persons	62	13.1	1,964	15.1	54.1	15.1	203.8	12.9
50 - 99 persons	18	3.8	1,313	10.1	35.2	9.8	177.2	11.2
Total less than 100 persons	452	95.4	5,500	42.4	140.4	39.0	574.0	36.4
100 - 199 persons	13	2.7	1,940	15.0	58.5	16.3	225.8	14.3
200 - 499 persons	5	1.1	1,687	13.0	48.5	13.5	286.4	18.1
500 - 999 persons	3	0.6	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
1000 or more persons	1	0.2	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
Total 100 or more persons	22	4.6	7,467	57.6	219.2	61.0	1,004.7	63.6
Total	474	100.0	12,967	100.0	359.5	100.0	1,578.7	100.0
MISCELLANEOUS MANUFACTURING								
0 - 3 persons	116	38.0	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
4 - 9 persons	97	31.8	564	8.7	10.9	6.4	55.0	6.9
10 - 19 persons	40	13.1	530	8.2	12.6	7.4	71.9	9.1
20 - 49 persons	30	9.8	895	13.8	22.5	13.1	125.4	15.8
50 - 99 persons	10	3.3	654	10.1	17.0	9.9	84.5	10.7
Total less than 100 persons	293	96.1	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
100 - 199 persons	7	2.3	1,137	17.6	35.9	21.0	193.5	24.4
200 - 499 persons	3	1.0	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
500 - 999 persons	2	0.7	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
1000 or more persons	—	—	—	—	—	—	—	—
Total 100 or more persons	12	3.9	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
Total	305	100.0	6,466	100.0	171.2	100.0	792.5	100.0

For footnotes see end of table.

TABLE 5. MANUFACTURING ESTABLISHMENTS (a): SUMMARY OF OPERATIONS BY EMPLOYMENT SIZE AND INDUSTRY SUBDIVISION, SOUTH AUSTRALIA, 1991-92—continued

Employment size group	Establishments at 30 June (b)		Employment at end of June (c)		Wages and salaries (d) (e)		Turnover (e)	
	Number	Proportion (Per cent)	Number	Proportion (Per cent)	(\$m)	Proportion (Per cent)	(\$m)	Proportion (Per cent)
TOTAL MANUFACTURING								
0 - 3 persons	940	29.7	2,065	2.4	32.4	1.3	293.1	1.9
4 - 9 persons	1,091	34.5	6,375	7.4	123.0	5.0	589.3	3.8
10 - 19 persons	500	15.8	6,666	7.7	154.9	6.3	794.6	5.2
20 - 49 persons	356	11.3	10,923	12.6	274.7	11.2	1,391.9	9.0
50 - 99 persons	129	4.1	9,247	10.7	256.3	10.4	1,810.1	11.7
<i>Total less than 100 persons</i>	<i>3,016</i>	<i>95.4</i>	<i>35,276</i>	<i>40.7</i>	<i>841.3</i>	<i>34.2</i>	<i>4,878.9</i>	<i>31.7</i>
100 - 199 persons	69	2.2	9,567	11.0	285.4	11.6	1,661.1	10.8
200 - 499 persons	56	1.8	17,685	20.4	514.0	20.9	2,932.4	19.0
500 - 999 persons	15	0.5	9,917	11.5	336.4	13.7	2,163.0	14.0
1000 or more persons	5	0.2	14,156	16.3	483.0	19.6	3,777.2	24.5
<i>Total 100 or more persons</i>	<i>145</i>	<i>4.6</i>	<i>51,325</i>	<i>59.3</i>	<i>1,618.9</i>	<i>65.8</i>	<i>10,533.7</i>	<i>68.3</i>
Total	3,161	100.0	86,601	100.0	2,460.2	100.0	15,412.6	100.0

(a) See paragraphs 30, 31 and 36 of the Explanatory Notes. (b) See paragraphs 4 to 10 of the Explanatory Notes. (c) Includes working proprietors. (d) Excludes the drawings of working proprietors. (e) Figures may differ slightly from those presented in other tables, because they exclude those manufacturing establishments which operated during 1991-92 but were not operating at 30 June 1992. See paragraph 36 of the Explanatory Notes.

TABLE 6. MANUFACTURING ESTABLISHMENTS (a): ENVIRONMENTAL PROTECTION ISSUES (b), SUMMARY STATISTICS BY INDUSTRY SUBDIVISION
SOUTH AUSTRALIA, 1991-92

Industry subdivision (c) ASIC code	Description	Establishments that conducted environmental impact assessments or environmental audits			Establishments that encouraged the return of their own containers or packaging			Establishments engaged in the marketing or production of goods or services for monitoring, maintaining or improving the environment		
		Number	Proportion of total establishments (d) (Per cent)	Proportion of total turnover (e) (Per cent)	Number	Proportion of total establishments (d) (Per cent)	Proportion of total turnover (e) (Per cent)	Number	Proportion of total establishments (d) (Per cent)	Proportion of total turnover (e) (Per cent)
21	Food, beverages and tobacco	38	9	32	145	33	38	13	3	1
23	Textiles	6	9	n.p.	15	22	9	5	7	1
24	Clothing and footwear	—	—	—	25	20	4	—	—	—
25	Wood, wood products and furniture	14	3	21	75	15	17	13	3	1
26	Paper, paper products, printing and publishing	16	5	30	108	34	28	39	12	15
27	Chemical, petroleum and coal products	8	10	71	39	48	55	10	12	10
28	Non-metallic mineral products	10	7	21	40	29	34	9	6	4
29	Basic metal products	7	11	58	13	21	10	5	8	1
31	Fabricated metal products	27	5	23	133	27	30	36	7	3
32	Transport equipment	7	4	2	49	28	40	7	4	—
33	Other machinery and equipment	18	4	21	111	23	40	50	10	6
34	Miscellaneous manufacturing	2	1	n.p.	73	24	48	18	6	2
21-34	Total manufacturing	153	5	26	826	26	34	205	6	3

(a) See paragraph 30 of the Explanatory Notes. (b) See paragraph 37 of the Explanatory Notes. Establishments which did not respond to the environmental protection issues are treated as not participating in the relevant issue. (c) Data are also available on request by ASIC class. (d) Proportion of total establishments which operated at any time during 1991-92. (e) See paragraph 24 of the Explanatory Notes.

Note: The 1991-92 manufacturing census included a number of questions related to environmental protection. The following three questions were asked of all manufacturers:

- During 1991-92, did this business conduct any environmental impact assessments (for proposed new production) or any environmental audits (on existing production processes)?
- Does this business permit and/or encourage the return of its own containers or packaging (eg returnable bottles, cardboard boxes, polystyrene, etc)?
- Does this business market or produce any goods or services for monitoring, maintaining or improving the environment?

TABLE 7. MANUFACTURING ESTABLISHMENTS (a): EXPENDITURE ON ENVIRONMENTAL PROTECTION (b)
BY INDUSTRY CLASS, SOUTH AUSTRALIA, 1991-92

Industry class		Current expenditure on environmental protection		Capital expenditure to abate pollution
ASIC code	Description	(\$'000)	Proportion of total turnover (c) (Per cent)	(\$'000)
FOOD, BEVERAGES AND TOBACCO—				
Meat products—				
2115	Meat (except smallgoods or poultry)	777	0.2	n.p.
2116	Poultry	n.p.	n.p.	n.p.
2117	Bacon, ham and smallgoods n.e.c.	n.p.	n.p.	n.p.
211	<i>Total</i>	1,333	0.2	475
Milk products—				
2121	Liquid milk and cream	77	n.p.	n.p.
2122	Butter	n.p.	n.p.	n.p.
2123	Cheese	131	0.1	300
2124	Ice cream and frozen confections	10	n.p.	—
2125	Milk products n.e.c.	n.p.	n.p.	n.p.
212	<i>Total</i>	n.p.	n.p.	n.p.
Fruit and vegetable products—				
2131	Fruit products	359	0.2	n.p.
2132	Vegetable products	93	0.2	n.p.
213	<i>Total</i>	452	0.2	451
214	<i>Margarine and oils and fats n.e.c.</i>	n.p.	n.p.	n.p.
Flour mill and cereal food products—				
2151	Flour mill products	n.p.	n.p.	n.p.
2152	Starch, gluten and starch sugars	—	—	—
2153	Cereal foods and baking mixes	n.p.	n.p.	n.p.
215	<i>Total</i>	47	—	n.p.
Bread, cakes and biscuits—				
2161	Bread	150	n.p.	51
2162	Cakes and pastries	n.p.	n.p.	n.p.
2163	Biscuits	n.p.	n.p.	n.p.
216	<i>Total</i>	261	0.1	64
Other food products—				
2171	Raw sugar	—	—	—
2173	Confectionery and cocoa products	5	n.p.	n.p.
2174	Processed seafoods	48	—	72
2175	Prepared animal and bird foods	150	0.2	n.p.
2176	Food products n.e.c.	291	n.p.	n.p.
217	<i>Total</i>	494	0.1	82
Beverages and malt—				
2185	Soft drinks, cordials and syrups	n.p.	n.p.	n.p.
2186	Beer	n.p.	n.p.	n.p.
2187	Malt	49	0.1	—
2188	Wine and brandy	233	0.1	72
2189	Alcoholic beverages n.e.c.	—	—	—
218	<i>Total</i>	577	0.1	189
219	<i>Tobacco products</i>	—	—	—
21	<i>Total food, beverages and tobacco</i>	3,453	0.1	1,760

For footnotes see end of table.

TABLE 7. MANUFACTURING ESTABLISHMENTS (a): EXPENDITURE ON ENVIRONMENTAL PROTECTION (b)
BY INDUSTRY CLASS, SOUTH AUSTRALIA, 1991-92—continued

Industry class		Current expenditure on environmental protection		Capital expenditure to abate pollution
ASIC code	Description	(\$'000)	Proportion of total turnover (c) (Per cent)	(\$ '000)
TEXTILES—				
Textile fibres, yarns and woven fabrics—				
2341	Cotton ginning	—	—	—
2342	Wool scouring and top making	n.p.	n.p.	n.p.
2343	Man-made fibres and yarns	—	—	—
2344	Man-made fibre broadwoven fabrics	n.p.	n.p.	n.p.
2345	Cotton yarns and broadwoven fabrics	n.p.	n.p.	n.p.
2346	Worsted yarns and broadwoven fabrics	n.p.	n.p.	n.p.
2347	Woollen yarns and broadwoven fabrics	n.p.	n.p.	n.p.
2348	Narrow woven and elastic textiles	—	—	—
2349	Textile finishing	11	0.1	n.p.
234	<i>Total</i>	588	0.2	88
Other textile products—				
2351	Household textiles	n.p.	n.p.	n.p.
2352	Textile floor coverings	n.p.	n.p.	n.p.
2353	Felt and felt products	n.p.	n.p.	n.p.
2354	Canvas and associated products n.e.c.	16	0.1	—
2355	Rope, cordage and twine	—	—	—
2356	Textile products n.e.c.	10	n.p.	n.p.
235	<i>Total</i>	74	0.1	n.p.
23	Total textiles	662	0.2	n.p.
CLOTHING AND FOOTWEAR—				
Knitting mills—				
2441	Hosiery	—	—	—
2442	Cardigans and pullovers	—	—	—
2443	Knitted goods n.e.c.	5	0.1	—
244	<i>Total</i>	5	—	—
Clothing—				
2451	Men's trousers and shorts; work clothing	132	0.1	—
2452	Men's suits and coats; waterproof clothing	n.p.	n.p.	—
2453	Women's outerwear n.e.c.	61	0.1	—
2454	Foundation garments	—	—	—
2455	Underwear and infants' clothing n.e.c.	—	—	—
2456	Headwear and clothing n.e.c.	n.p.	n.p.	n.p.
245	<i>Total</i>	202	0.1	n.p.
246	<i>Footwear</i>	21	—	—
24	Total clothing and footwear	228	0.1	n.p.
WOOD, WOOD PRODUCTS AND FURNITURE—				
Wood and wood products—				
2531	Log sawmilling	n.p.	n.p.	n.p.
2532	Resawn and dressed timber	190	0.2	n.p.
2533	Veneers and manufactured boards of wood	n.p.	n.p.	n.p.
2534	Wooden doors	n.p.	n.p.	—
2535	Wooden structural fittings and joinery n.e.c.	265	0.2	73
2536	Wooden containers	12	0.1	n.p.
2537	Hardwood woodchips	—	—	—
2538	Wood products n.e.c.	11	0.1	—
253	<i>Total</i>	809	0.2	221
Furniture and mattresses—				
2541	Furniture (except sheet metal)	418	n.p.	n.p.
2542	Mattresses (except rubber)	8	n.p.	n.p.
254	<i>Total</i>	426	0.2	86
25	Total wood, wood products and furniture	1,235	0.2	307

For footnotes see end of table.

TABLE 7. MANUFACTURING ESTABLISHMENTS (a): EXPENDITURE ON ENVIRONMENTAL PROTECTION (b)
BY INDUSTRY CLASS, SOUTH AUSTRALIA, 1991-92—continued

Industry class		Current expenditure on environmental protection		Capital expenditure to abate pollution (\$ '000)
		(\$ '000)	Proportion of total turnover (c) (Per cent)	
ASIC code	Description			
PAPER, PAPER PRODUCTS, PRINTING AND PUBLISHING—				
Paper and paper products—				
2631	Pulp, paper and paperboard	—	—	—
2632	Paper bags (including textile bags)	74	0.2	—
2633	Solid fibreboard containers	n.p.	n.p.	n.p.
2634	Corrugated fibreboard containers	n.p.	n.p.	n.p.
2635	Paper products n.e.c.	839	n.p.	n.p.
263	<i>Total</i>	1,989	0.6	2,489
Printing and allied industries—				
2641	Publishing	12	0.1	n.p.
2642	Printing and publishing	123	0.1	n.p.
2643	Paper stationery	273	0.2	78
2644	Printing and bookbinding	122	0.1	28
2645	Printing trade services n.e.c.	41	0.3	n.p.
264	<i>Total</i>	571	0.1	151
26	Total paper, paper products, printing and publishing	2,560	0.3	2,640
CHEMICAL, PETROLEUM AND COAL PRODUCTS—				
Basic chemicals—				
2751	Chemical fertilisers	n.p.	n.p.	n.p.
2752	Industrial gases	n.p.	n.p.	n.p.
2753	Synthetic resins and rubber	n.p.	n.p.	—
2754	Organic industrial chemicals n.e.c.	n.p.	n.p.	n.p.
2755	Inorganic industrial chemicals n.e.c.	1,812	0.9	n.p.
275	<i>Total</i>	2,150	0.6	n.p.
Other chemical products—				
2761	Ammunition, explosives and fireworks	n.p.	n.p.	n.p.
2762	Paints	n.p.	n.p.	n.p.
2763	Pharmaceutical and veterinary products	n.p.	n.p.	—
2764	Pesticides	n.p.	n.p.	n.p.
2765	Soap and other detergents	n.p.	n.p.	n.p.
2766	Cosmetics and toilet preparations	n.p.	n.p.	n.p.
2767	Inks	n.p.	n.p.	—
2768	Chemical products n.e.c.	21	0.2	—
276	<i>Total</i>	289	n.p.	112
277	<i>Petroleum refining</i>	n.p.	n.p.	n.p.
278	<i>Petroleum and coal products n.e.c.</i>	n.p.	n.p.	n.p.
27	Total chemical, petroleum and coal products	3,256	0.3	16,244

For footnotes see end of table.

TABLE 7. MANUFACTURING ESTABLISHMENTS (a): EXPENDITURE ON ENVIRONMENTAL PROTECTION (b)
BY INDUSTRY CLASS, SOUTH AUSTRALIA, 1991-92—continued

Industry class		Current expenditure on environmental protection		Capital expenditure to abate pollution (\$ '000)
		(\$'000)	Proportion of total turnover (c) (Per cent)	
ASIC code	Description			
NON-METALLIC MINERAL PRODUCTS—				
285	Glass and glass products	45	n.p.	n.p.
Clay products and refractories—				
2861	Clay bricks	64	0.2	n.p.
2862	Refractories	n.p.	n.p.	n.p.
2863	Ceramic tiles and pipes	n.p.	n.p.	n.p.
2864	Ceramic goods n.e.c.	n.p.	n.p.	—
286	Total	70	0.1	n.p.
Cement and concrete products—				
2871	Cement	n.p.	n.p.	n.p.
2872	Ready mixed concrete	204	0.2	266
2873	Concrete pipes and box culverts	n.p.	n.p.	n.p.
2874	Concrete products n.e.c.	227	n.p.	—
287	Total	1,159	0.4	n.p.
Other non-metallic mineral products—				
2881	Plaster products and expanded minerals	n.p.	n.p.	n.p.
2882	Stone products	53	0.4	45
2883	Glass wool and mineral wool products	n.p.	n.p.	n.p.
2884	Non-metallic mineral products n.e.c.	n.p.	n.p.	n.p.
288	Total	163	n.p.	310
28	Total non-metallic mineral products	1,437	0.3	639
BASIC METAL PRODUCTS—				
Basic iron and steel—				
2941	Iron and steel basic products	3,607	0.5	9,575
2942	Iron casting	n.p.	n.p.	n.p.
2943	Steel casting	n.p.	n.p.	—
2944	Iron and steel forging	n.p.	n.p.	n.p.
2945	Steel pipes and tubes	n.p.	n.p.	n.p.
294	Total	4,367	0.5	n.p.
Basic non-ferrous metals—				
2951	Copper smelting, refining	n.p.	n.p.	n.p.
2952	Silver, lead, zinc smelting, refining	n.p.	n.p.	n.p.
2953	Alumina	—	—	—
2954	Aluminium smelting	—	—	—
2955	Nickel smelting, refining	—	—	—
2956	Non-ferrous metals n.e.c. smelting, refining	n.p.	n.p.	n.p.
2957	Secondary recovery and alloying of non-ferrous metals n.e.c.	n.p.	n.p.	n.p.
295	Total	n.p.	n.p.	n.p.
Non-ferrous metal basic products—				
2961	Aluminium rolling, drawing, extruding	—	—	—
2962	Non-ferrous metals n.e.c. rolling, drawing, extruding	—	—	—
2963	Non-ferrous metal casting	n.p.	n.p.	n.p.
296	Total	n.p.	n.p.	n.p.
29	Total basic metal products	10,692	0.7	14,773

For footnotes see end of table.

**TABLE 7. MANUFACTURING ESTABLISHMENTS (a): EXPENDITURE ON ENVIRONMENTAL PROTECTION (b)
BY INDUSTRY CLASS, SOUTH AUSTRALIA, 1991-92—continued**

<i>Industry class</i>		<i>Current expenditure on environmental protection</i>		<i>Capital expenditure to abate pollution</i>
<i>ASIC code</i>	<i>Description</i>	<i>(\$'000)</i>	<i>Proportion of total turnover (c) (Per cent)</i>	<i>(\$ '000)</i>
FABRICATED METAL PRODUCTS—				
Structural metal products—				
3141	Fabricated structural steel	69	—	n.p.
3142	Architectural aluminium products	278	0.2	n.p.
3143	Architectural metal products n.e.c.	23	0.1	n.p.
314	<i>Total</i>	370	0.1	39
Sheet metal products—				
3151	Metal containers	n.p.	n.p.	n.p.
3152	Sheet metal furniture	n.p.	n.p.	n.p.
3153	Sheet metal products n.e.c.	113	0.1	40
315	<i>Total</i>	252	0.2	88
Other fabricated metal products—				
3161	Cutlery and hand tools n.e.c.	n.p.	n.p.	n.p.
3162	Springs and wire products	46	0.1	7
3163	Nuts, bolts, screws and rivets	60	0.5	47
3164	Metal coating and finishing	331	0.8	78
3165	Non-ferrous steam, gas and water fittings	n.p.	n.p.	n.p.
3166	Boiler and plate work	n.p.	n.p.	n.p.
3167	Metal blinds and awnings	n.p.	n.p.	n.p.
3168	Fabricated metal products n.e.c.	239	0.2	190
316	<i>Total</i>	702	0.2	330
31	<i>Total fabricated metal products</i>	1,324	0.2	457
TRANSPORT EQUIPMENT—				
Motor vehicles and parts—				
3231	Motor vehicles	n.p.	n.p.	—
3232	Motor vehicle bodies, trailers, caravans	69	0.2	n.p.
3233	Motor vehicle instruments and electrical equipment n.e.c.	n.p.	n.p.	n.p.
3234	Motor vehicle parts n.e.c.	1,106	0.3	697
323	<i>Total</i>	1,809	n.p.	712
Other transport equipment—				
3241	Ships	n.p.	n.p.	n.p.
3242	Boats	n.p.	n.p.	n.p.
3243	Railway rolling stock and locomotives	n.p.	n.p.	n.p.
3244	Aircraft	n.p.	n.p.	—
3245	Transport equipment n.e.c.	n.p.	n.p.	—
324	<i>Total</i>	16	n.p.	47
32	<i>Total transport equipment</i>	1,825	0.1	759

For footnotes see end of table.

TABLE 7. MANUFACTURING ESTABLISHMENTS (a): EXPENDITURE ON ENVIRONMENTAL PROTECTION (b)
BY INDUSTRY CLASS, SOUTH AUSTRALIA, 1991-92—continued

Industry class		Current expenditure on environmental protection		Capital expenditure to abate pollution (\$ '000)
		(\$'000)	Proportion of total turnover (c) (Per cent)	
ASIC code	Description			
OTHER MACHINERY AND EQUIPMENT—				
Photographic, professional and scientific equipment—				
3341	Photographic and optical goods	n.p.	n.p.	n.p.
3342	Photographic film processing	n.p.	n.p.	n.p.
3343	Measuring, professional and scientific equipment n.e.c.	n.p.	n.p.	—
334	<i>Total</i>	29	0.1	n.p.
Appliances and electrical equipment—				
3351	Radio and TV receivers; audio equipment	n.p.	n.p.	n.p.
3352	Electronic equipment n.e.c.	120	0.1	113
3353	Refrigerators and household appliances	465	0.1	57
3354	Water heating systems	9	n.p.	—
3355	Electric and telephone cable and wire	n.p.	n.p.	n.p.
3356	Batteries	n.p.	n.p.	n.p.
3357	Electrical machinery and equipment n.e.c.	210	0.1	45
335	<i>Total</i>	1,079	0.1	n.p.
Industrial machinery and equipment—				
3361	Agricultural machinery	76	0.1	15
3362	Construction machinery	n.p.	n.p.	—
3363	Materials handling equipment	29	0.1	—
3364	Wood and metal working machinery	14	0.1	—
3365	Pumps and compressors	n.p.	n.p.	n.p.
3366	Commercial space heating and cooling equipment	n.p.	n.p.	—
3367	Dies, saw blades and machine tool accessories	46	0.2	n.p.
3368	Food processing machinery	4	0.1	—
3369	Industrial machinery and equipment n.e.c.	211	0.1	958
336	<i>Total</i>	397	0.1	1,000
33	<i>Total other machinery and equipment</i>	1,505	0.1	1,529
MISCELLANEOUS MANUFACTURING—				
Leather and leather products—				
3451	Leather tanning and fur dressing	n.p.	n.p.	n.p.
3452	Leather and leather substitute goods n.e.c.	n.p.	n.p.	—
345	<i>Total</i>	223	0.5	n.p.
Rubber products—				
3461	Rubber tyres, tubes, belts, hose and sheets	n.p.	n.p.	n.p.
3462	Rubber products n.e.c.	n.p.	n.p.	—
346	<i>Total</i>	1,775	1.1	n.p.
Plastic and related products—				
3471	Flexible packaging and abrasive papers	n.p.	n.p.	n.p.
3472	Rigid plastic sheeting	n.p.	n.p.	n.p.
3473	Hard surface floor coverings n.e.c.	—	—	—
3474	Plastic products n.e.c.	526	0.2	n.p.
347	<i>Total</i>	614	0.2	108
Other manufacturing—				
3481	Ophthalmic articles	47	0.1	182
3482	Jewellery and silverware	44	0.5	n.p.
3483	Brooms and brushes	15	0.1	—
3484	Signs and advertising displays	27	0.1	n.p.
3485	Sporting equipment	n.p.	n.p.	n.p.
3486	Writing and marking equipment	n.p.	n.p.	n.p.
3487	Manufacturing n.e.c.	33	0.5	n.p.
348	<i>Total</i>	173	0.1	204
34	<i>Total miscellaneous manufacturing</i>	2,785	0.4	682
21-34	TOTAL MANUFACTURING	30,962	0.2	39,915

(a) Data in this table exclude expenditure by single establishment businesses with less than four persons employed. (b) See paragraph 38 of the Explanatory Notes. Establishments which did not respond to the questions are treated as having nil expenditure. (c) See paragraph 24 of the Explanatory Notes.

**TABLE 8. MANUFACTURING LOCATIONS (a): SUMMARY OF OPERATIONS IN STATISTICAL DIVISIONS
BY INDUSTRY SUBDIVISION, SOUTH AUSTRALIA, 1991-92**

<i>Industry subdivision</i>		<i>Locations at 30 June</i>	<i>Employment at end of June</i>	<i>Wages and salaries</i>	<i>Turnover</i>
<i>ASIC Code</i>	<i>Description</i>	<i>(a) (No.)</i>	<i>(b) (No.)</i>	<i>(c) (\$m)</i>	<i>(\$m)</i>
ADELAIDE STATISTICAL DIVISION					
21	Food, beverages and tobacco	231	8,295	218.8	1,558.7
23	Textiles	62	1,919	n.p.	n.p.
24	Clothing and footwear	110	3,153	n.p.	n.p.
25	Wood, wood products and furniture	405	4,423	97.3	433.8
26	Paper, paper products, printing and publishing	268	5,189	159.3	689.3
27	Chemical, petroleum and coal products	69	2,311	85.7	1,164.5
28	Non-metallic mineral products	113	2,536	77.5	451.6
29	Basic metal products	50	2,087	62.4	414.2
31	Fabricated metal products	418	6,039	156.1	740.3
32	Transport equipment	148	14,162	438.2	3,888.3
33	Other machinery and equipment	410	12,076	343.3	1,494.3
34	Miscellaneous manufacturing	283	6,325	169.3	781.6
21-34	Total manufacturing	2,567	68,515	1,944.3	12,319.8
OUTER ADELAIDE STATISTICAL DIVISION					
21	Food, beverages and tobacco	80	2,471	59.5	407.8
23	Textiles	3	141	n.p.	n.p.
24	Clothing and footwear	4	9	0.1	0.4
25	Wood, wood products and furniture	41	336	5.8	26.5
26	Paper, paper products, printing and publishing	13	184	3.5	10.1
27	Chemical, petroleum and coal products	4	51	n.p.	n.p.
28	Non-metallic mineral products	17	212	7.2	32.3
29	Basic metal products	1	n.p.	n.p.	n.p.
31	Fabricated metal products	28	260	5.6	49.8
32	Transport equipment	7	57	0.9	4.4
33	Other machinery and equipment	14	248	4.2	18.2
34	Miscellaneous manufacturing	6	n.p.	n.p.	n.p.
21-34	Total manufacturing	218	3,987	91.4	567.2
YORKE AND LOWER NORTH STATISTICAL DIVISION					
21	Food, beverages and tobacco	25	327	5.1	21.1
23	Textiles	—	—	—	—
24	Clothing and footwear	2	n.p.	n.p.	n.p.
25	Wood, wood products and furniture	7	17	0.1	0.9
26	Paper, paper products, printing and publishing	7	102	1.6	3.5
27	Chemical, petroleum and coal products	3	155	3.3	62.3
28	Non-metallic mineral products	4	n.p.	n.p.	n.p.
29	Basic metal products	—	—	—	—
31	Fabricated metal products	13	74	1.4	6.9
32	Transport equipment	—	—	—	—
33	Other machinery and equipment	14	69	1.2	5.9
34	Miscellaneous manufacturing	—	—	—	—
21-34	Total manufacturing	75	778	13.3	102.9
MURRAY LANDS STATISTICAL DIVISION					
21	Food, beverages and tobacco	37	2,109	55.9	409.2
23	Textiles	1	n.p.	n.p.	n.p.
24	Clothing and footwear	—	—	—	—
25	Wood, wood products and furniture	12	42	0.5	2.6
26	Paper, paper products, printing and publishing	10	217	n.p.	n.p.
27	Chemical, petroleum and coal products	2	n.p.	n.p.	n.p.
28	Non-metallic mineral products	6	21	0.5	2.7
29	Basic metal products	1	n.p.	n.p.	n.p.
31	Fabricated metal products	15	70	2.0	9.6
32	Transport equipment	7	39	0.7	3.2
33	Other machinery and equipment	21	422	8.0	46.6
34	Miscellaneous manufacturing	7	53	0.8	5.1
21-34	Total manufacturing	119	3,000	76.1	528.8

For footnotes see end of table.

**TABLE 8. MANUFACTURING LOCATIONS (a): SUMMARY OF OPERATIONS IN STATISTICAL DIVISIONS
BY INDUSTRY SUBDIVISION, SOUTH AUSTRALIA, 1991-92—continued**

<i>Industry subdivision</i>		<i>Locations at 30 June</i>	<i>Employment at end of June</i>	<i>Wages and salaries</i>	<i>Turnover</i>
<i>ASIC Code</i>	<i>Description</i>	<i>(a) (No.)</i>	<i>(b) (No.)</i>	<i>(c) (\$m)</i>	<i>(\$m)</i>
SOUTH EAST STATISTICAL DIVISION					
21	Food, beverages and tobacco	33	1,193	28.5	235.7
23	Textiles	2	n.p.	n.p.	n.p.
24	Clothing and footwear	1	n.p.	n.p.	n.p.
25	Wood, wood products and furniture	26	1,915	50.2	210.1
26	Paper, paper products, printing and publishing	12	932	n.p.	n.p.
27	Chemical, petroleum and coal products	1	n.p.	n.p.	n.p.
28	Non-metallic mineral products	11	34	0.8	5.2
29	Basic metal products	1	n.p.	n.p.	n.p.
31	Fabricated metal products	14	119	2.4	8.9
32	Transport equipment	7	n.p.	n.p.	n.p.
33	Other machinery and equipment	9	49	1.0	6.2
34	Miscellaneous manufacturing	7	20	0.4	3.1
21-34	Total manufacturing	124	4,527	128.7	678.0
EYRE STATISTICAL DIVISION					
21	Food, beverages and tobacco	19	416	6.8	49.3
23	Textiles	—	—	—	—
24	Clothing and footwear	3	11	n.p.	n.p.
25	Wood, wood products and furniture	4	16	0.1	0.3
26	Paper, paper products, printing and publishing	4	41	n.p.	n.p.
27	Chemical, petroleum and coal products	1	n.p.	n.p.	n.p.
28	Non-metallic mineral products	4	19	0.4	2.8
29	Basic metal products	—	—	—	—
31	Fabricated metal products	8	39	0.8	3.3
32	Transport equipment	7	114	n.p.	n.p.
33	Other machinery and equipment	5	23	0.4	2.3
34	Miscellaneous manufacturing	2	n.p.	n.p.	n.p.
21-34	Total manufacturing	57	690	12.7	88.6
NORTHERN STATISTICAL DIVISION					
21	Food, beverages and tobacco	17	319	7.4	43.2
23	Textiles	1	n.p.	n.p.	n.p.
24	Clothing and footwear	2	n.p.	n.p.	n.p.
25	Wood, wood products and furniture	10	50	0.9	4.2
26	Paper, paper products, printing and publishing	7	92	n.p.	n.p.
27	Chemical, petroleum and coal products	3	63	n.p.	n.p.
28	Non-metallic mineral products	6	n.p.	n.p.	n.p.
29	Basic metal products	9	3,969	185.0	1,071.6
31	Fabricated metal products	17	190	4.6	13.6
32	Transport equipment	2	n.p.	n.p.	n.p.
33	Other machinery and equipment	9	57	1.5	4.7
34	Miscellaneous manufacturing	7	38	0.6	3.3
21-34	Total manufacturing	90	4,887	206.7	1,177.9
SOUTH AUSTRALIA EXCLUDING ADELAIDE STATISTICAL DIVISION					
21	Food, beverages and tobacco	211	6,835	163.2	1,166.2
23	Textiles	7	232	n.p.	n.p.
24	Clothing and footwear	12	210	n.p.	n.p.
25	Wood, wood products and furniture	100	2,376	57.7	244.6
26	Paper, paper products, printing and publishing	53	1,568	54.2	240.2
27	Chemical, petroleum and coal products	14	303	7.3	95.8
28	Non-metallic mineral products	48	355	10.3	56.5
29	Basic metal products	12	3,975	185.1	1,072.1
31	Fabricated metal products	95	752	16.9	92.1
32	Transport equipment	30	263	5.9	28.3
33	Other machinery and equipment	72	868	16.3	83.8
34	Miscellaneous manufacturing	29	132	2.0	12.5
21-34	Total manufacturing	683	17,869	529.0	3,143.4

For footnotes see end of table.

**TABLE 8. MANUFACTURING LOCATIONS (a): SUMMARY OF OPERATIONS IN STATISTICAL DIVISIONS
BY INDUSTRY SUBDIVISION, SOUTH AUSTRALIA, 1991-92—continued**

<i>Industry subdivision</i>		<i>Locations at 30 June</i>	<i>Employment at end of June</i>	<i>Wages and salaries</i>	<i>Turnover</i>
<i>ASIC Code</i>	<i>Description</i>	<i>(a) (No.)</i>	<i>(b) (No.)</i>	<i>(c) (\$m)</i>	<i>(b) (\$m)</i>
SOUTH AUSTRALIA					
21	Food, beverages and tobacco	442	15,130	382.0	2,724.9
23	Textiles	69	2,151	70.2	435.5
24	Clothing and footwear	122	3,363	76.3	319.1
25	Wood, wood products and furniture	505	6,799	155.0	678.4
26	Paper, paper products, printing and publishing	321	6,757	213.4	929.5
27	Chemical, petroleum and coal products	83	2,614	93.0	1,260.4
28	Non-metallic mineral products	161	2,891	87.8	508.1
29	Basic metal products	62	6,062	247.5	1,486.2
31	Fabricated metal products	513	6,791	173.0	832.4
32	Transport equipment	178	14,425	444.1	3,916.6
33	Other machinery and equipment	482	12,944	359.6	1,578.0
34	Miscellaneous manufacturing	312	6,457	171.3	794.1
21-34	Total manufacturing	3,250	86,384	2,473.3	15,463.3

(a) See paragraphs 10 and 39 to 41 of the Explanatory Notes. (b) Includes working proprietors. (c) Excludes the drawings of working proprietors.

INTRODUCTION OF THE ANZSIC INDUSTRY CLASSIFICATION INTO MANUFACTURING STATISTICS

The Australian and New Zealand Standard Industrial Classification (ANZSIC) has been developed for use in both Australia and New Zealand for the production and analysis of industrial statistics. ANZSIC replaces the Australian Standard Industrial Classification (ASIC) previously used. The data in Table 9 present a concordance between the outgoing ASIC and the ANZSIC for data collected in respect of the 1991-92 reference year. Data presented in Tables 1 to 8 of this publication are ASIC-based.

The ASIC classification was first released in 1969 and underwent an extensive revision in 1978 and a partial revision in 1983. In 1985, a major review of the ASIC commenced. The principal objectives were to improve the alignment of the ASIC with the International Standard Industrial Classification (ISIC), to achieve a better balance across the classification by giving more attention to the services sector (including segments relating to culture, entertainment and other recreational industries), and to take into account the effects of technological changes and changes in structure of the industry generally since the previous edition.

A succession of economic agreements between Australia and New Zealand have operated since 1922. The most recent of these (the Australia - New Zealand Closer Economic Relations Trade Agreement [CER]) became effective from 1 January 1983. This has resulted in joint working relationships being set up to harmonise statistics wherever possible. This ultimately resulted in the ANZSIC being developed and adopted as the standard industry classification in both countries.

The major change between ASIC and ANZSIC for the manufacturing division is that the number of industry subdivisions has decreased from twelve to nine. In very broad terms, the three industry subdivisions (or parts thereof) under ASIC that have been merged in ANZSIC are:

- Textiles and Clothing and footwear have been combined to form the Textiles, clothing, footwear and leather industry subdivision.
- Basic metal products and Fabricated metal products have been combined to form the Metal products industry subdivision.
- Transport equipment has been combined with Other machinery and equipment to form the Machinery and equipment industry subdivision.

There have been further changes at the industry group and industry class levels, which were made to address changes in technology and structure in the manufacturing industry.

In addition, a small number of activities which were classified to the manufacturing industry under ASIC have been classified to non-manufacturing industries under ANZSIC. The reverse has also occurred.

From the 1992-93 reference year onwards, the manufacturing industry publications 8201.0 and 8221.0 to 8221.7 will be ANZSIC-based. Manufacturing collections dating back to the 1989-90 reference year have been coded using both classifications to assist in time series analysis in future years. In the meantime, these data are available as unpublished data. There is also a range of ANZSIC-based data (in addition to the following concordance) which is available as unpublished data from the 1991-92 manufacturing census.

TABLE 9. MANUFACTURING ESTABLISHMENTS (a): ASIC-ANZSIC CONCORDANCE (b) BY INDUSTRY SUBDIVISION, SOUTH AUSTRALIA, 1991-92

Industry subdivision ASIC code	Description	ANZSIC subdivision description and code										Total manufacturing 21-29 ANZSIC	Non- manufacturing (under ANZSIC)	Total ASIC		
		Food, beverages and tobacco 21	Textiles, clothing, and leather products 22	Wood and paper products 23	Printing, publishing and recorded media 24	Petroleum, coal, chemicals and associated products 25	Non- metallic mineral products 26	Metal products 27	Machinery and equipment 28	Other manufacturing 29						
ESTABLISHMENTS AT 30 JUNE (c) (No.)																
21	Food, beverages and tobacco	383	—	—	—	3	—	—	—	—	—	—	—	—	51	437
23	Textiles	—	65	—	—	—	—	—	—	—	—	—	—	—	—	65
24	Clothing and footwear	—	120	—	—	—	—	—	—	—	—	—	—	—	—	120
25	Wood, wood products and furniture	—	1	228	—	—	—	—	—	—	—	—	—	267	—	496
26	Paper, paper products, printing and publishing	—	—	21	290	—	—	—	—	—	—	—	—	—	—	311
27	Chemical, petroleum and coal products	—	—	—	—	81	—	—	—	—	—	—	—	—	—	81
28	Non-metallic mineral products	—	—	—	—	—	138	—	—	—	—	—	—	—	—	138
29	Basic metal products	—	—	—	—	3	—	58	—	—	—	—	—	—	—	61
31	Fabricated metal products	—	—	—	—	—	—	472	—	—	174	—	—	—	—	499
32	Transport equipment	—	—	—	—	—	—	—	—	—	425	—	—	—	—	174
33	Other machinery and equipment	—	—	—	—	—	—	—	—	—	—	—	—	—	—	474
34	Miscellaneous manufacturing	—	19	—	—	138	—	—	—	—	17	—	—	126	5	305
21-34	Total manufacturing	383	205	249	290	225	138	530	616	420	420	3,056	105	3,161		
	Non-manufacturing (under ASIC)	7	—	—	—	—	—	—	45	—	—	52	—	—	—	
	Total ANZSIC	390	205	249	290	225	138	530	661	420	420	3,108	—	3,108	—	
EMPLOYMENT AT END OF JUNE (d) ('000)																
21	Food, beverages and tobacco	14.4	—	—	—	—	—	—	—	—	—	—	—	—	0.8	15.3
23	Textiles	—	2.2	—	—	—	—	—	—	—	—	—	—	—	—	2.2
24	Clothing and footwear	—	3.4	—	—	—	—	—	—	—	—	—	—	—	—	3.4
25	Wood, wood products and furniture	—	—	4.1	—	—	—	—	—	—	—	—	—	2.7	—	6.8
26	Paper, paper products, printing and publishing	—	—	1.5	5.2	—	—	—	—	—	—	—	—	—	—	6.8
27	Chemical, petroleum and coal products	—	—	—	—	2.6	—	—	—	—	—	—	—	—	—	2.6
28	Non-metallic mineral products	—	—	—	—	—	2.9	—	—	—	—	—	—	—	—	2.9
29	Basic metal products	—	—	—	—	—	—	6.0	—	—	—	—	—	—	—	6.1
31	Fabricated metal products	—	—	—	—	—	—	6.4	—	0.4	—	—	—	—	—	6.8
32	Transport equipment	—	—	—	—	—	—	—	14.4	—	—	—	—	—	—	14.4
33	Other machinery and equipment	—	—	—	—	—	—	—	12.6	—	—	—	—	—	0.4	13.0
34	Miscellaneous manufacturing	—	0.3	—	—	4.2	—	—	1.1	—	—	—	—	0.8	—	6.5
21-34	Total manufacturing	14.4	5.8	5.6	5.2	6.9	2.9	12.5	28.1	3.9	3.9	85.3	1.3	86.6		
	Non-manufacturing (under ASIC)	—	—	—	—	—	—	—	0.2	—	—	0.2	—	—	—	
	Total ANZSIC	14.5	5.8	5.6	5.2	6.9	2.9	12.5	28.3	3.9	3.9	85.6	—	85.6	—	

For footnotes see end of table.

TABLE 9. MANUFACTURING ESTABLISHMENTS (a): ASIC-ANZSIC CONCORDANCE (b) BY INDUSTRY SUBDIVISION, SOUTH AUSTRALIA, 1991-92—continued

Industry subdivision ASIC code	Description	ANZSIC subdivision description and code											Total manufacturing 21-29	Non-manufacturing (under ANZSIC)	Total ASIC		
		Food, beverages and tobacco 21	Textiles, clothing, footwear and leather products 22	Wood and paper products 23	Printing, publishing and recorded media 24	Petroleum, coal, chemicals and associated products 25	Non-metallic mineral products 26	Metal products 27	Machinery and equipment 28	Other manufacturing 29							
WAGES AND SALARIES (c) (\$m)																	
21	Food, beverages and tobacco	365.6	—	—	—	0.5	—	—	—	—	—	—	—	—	366.2	19.1	385.2
23	Textiles	—	70.2	—	—	—	—	—	—	—	—	—	—	—	70.2	—	70.2
24	Clothing and footwear	—	76.6	—	—	—	—	—	—	—	—	—	—	—	76.6	—	76.6
25	Wood, wood products and furniture	—	0.2	98.8	—	—	—	—	—	—	—	—	56.2	—	155.2	—	155.2
26	Paper, paper products, printing and publishing	—	—	59.1	154.3	—	—	—	—	—	—	—	—	—	213.4	—	213.4
27	Chemical, petroleum and coal products	—	—	—	—	93.2	—	—	—	—	—	—	—	—	93.2	—	93.2
28	Non-metallic mineral products	—	—	—	—	—	89.1	—	—	—	—	—	—	—	89.1	—	89.1
29	Basic metal products	—	—	—	—	0.3	—	247.2	—	—	—	—	—	—	247.5	—	247.5
31	Fabricated metal products	—	—	—	—	—	—	164.2	—	—	—	—	—	—	172.8	—	172.8
32	Transport equipment	—	—	—	—	—	—	—	—	—	—	444.1	—	—	444.1	—	444.1
33	Other machinery and equipment	—	—	—	—	—	—	—	—	—	—	352.1	—	—	352.1	—	352.1
34	Miscellaneous manufacturing	—	7.4	—	—	120.3	—	—	—	—	—	25.6	17.7	—	171.0	0.6	171.6
21-34	Total manufacturing (under ASIC)	365.6	154.4	157.9	154.3	214.3	89.1	411.4	821.7	82.5	2,451.2	27.8	2,479.1	2,479.1	2,479.1	27.8	2,479.1
	Non-manufacturing (under ASIC)	0.4	—	—	—	—	—	—	3.4	—	—	—	—	—	3.9	—	—
	Total ANZSIC	366.0	154.4	157.9	154.3	214.3	89.1	411.4	825.2	82.5	2,455.1	27.8	2,455.1	2,455.1	2,455.1	27.8	2,455.1
TURNOVER (\$m)																	
21	Food, beverages and tobacco	2,700.2	—	—	—	2.6	—	—	—	—	—	—	—	—	2,702.7	56.4	2,759.1
23	Textiles	—	435.6	—	—	—	—	—	—	—	—	—	—	—	435.6	—	435.6
24	Clothing and footwear	—	319.1	—	—	—	—	—	—	—	—	—	—	—	319.1	—	319.1
25	Wood, wood products and furniture	—	0.7	443.5	—	—	—	—	—	—	—	—	235.0	—	679.1	—	679.1
26	Paper, paper products, printing and publishing	—	—	315.3	614.2	—	—	—	—	—	—	—	—	—	929.5	—	929.5
27	Chemical, petroleum and coal products	—	—	—	—	1,260.9	—	—	—	—	—	—	—	—	1,260.9	—	1,260.9
28	Non-metallic mineral products	—	—	—	—	—	508.1	—	—	—	—	—	—	—	508.1	—	508.1
29	Basic metal products	—	—	—	—	2.6	—	1,483.6	—	—	—	—	—	—	1,486.2	—	1,486.2
31	Fabricated metal products	—	—	—	—	—	—	784.8	—	—	—	—	46.4	—	831.2	—	831.2
32	Transport equipment	—	—	—	—	—	—	—	—	—	—	3,916.6	—	—	3,916.6	—	3,916.6
33	Other machinery and equipment	—	—	—	—	—	—	—	—	—	—	1,551.6	—	—	1,551.6	—	1,551.6
34	Miscellaneous manufacturing	—	52.8	—	—	574.7	—	—	—	—	—	80.1	85.1	—	792.7	2.3	794.9
21-34	Total manufacturing (under ASIC)	2,700.2	808.2	758.7	614.2	1,840.8	508.1	2,268.4	5,548.3	366.4	15,413.4	88.1	15,501.4	15,501.4	15,501.4	88.1	15,501.4
	Non-manufacturing (under ASIC)	4.6	—	—	—	—	—	—	8.8	—	—	—	—	—	13.4	—	—
	Total ANZSIC	2,704.8	808.2	758.7	614.2	1,840.8	508.1	2,268.4	5,557.1	366.4	15,426.8	88.1	15,426.8	15,426.8	15,426.8	88.1	15,426.8

(a) See paragraph 30 of the Explanatory Notes. (b) See paragraph 42 of the Explanatory Notes. (c) Includes working proprietors. (d) Includes working proprietors. (e) Excludes the drawings of working proprietors.

EXPLANATORY NOTES

Introduction

This publication presents final statistics compiled from a census of manufacturing establishments for 1991-92, with some comparative statistics relating to preceding years. In this respect it should be noted that there have been extensive revisions to the data from the 1990-91 census, due to further processing of that year's data subsequent to the release of the previous issue of this publication.

2. For the 1991-92 manufacturing census, businesses were requested to provide data on only employment, wages and salaries paid, turnover and issues relating to environmental protection.

3. Manufacturing, as specified in Division C of the *Australian Standard Industrial Classification* (ASIC), broadly relates to the physical or chemical transformation of materials or components into new products, whether the work is performed by power-driven machines or by hand.

Scope and coverage

4. The unit for which statistics are reported in the manufacturing census is the establishment. Prior to the 1988-89 census, this unit covered, in general, all the operations carried on under the ownership of one enterprise (business) at a single physical location.

5. The standard units definitions were revised for the 1988-89 census, with the establishment now being generally delineated on the basis of availability of accounting data rather than in terms of a location (refer to paragraph 10).

6. These new definitions were progressively implemented on the ABS central business register as reporting arrangements with individual businesses were finalised. The new management unit and establishment definitions were implemented on the ABS central business register in time for the 1990-91 census for those units classified to the manufacturing industry.

7. A manufacturing establishment is one predominantly engaged in manufacturing activities, but the data collected for it cover all activities of the establishment (including non-manufacturing activities). Conversely, there are some establishments predominantly engaged in non-manufacturing activities which also undertake limited manufacturing activities and which are excluded.

8. Some of those establishments predominantly engaged in one activity are 'split' into two or more establishments, when the secondary activity exceeds a specific value. (For 1991-92, this value was \$6.6 million in terms of sales and transfers out of goods and services.) These separate establishments are then classified to the industry appropriate to their activity.

9. In general, data contained in this publication relate to all manufacturing establishments which operated in South Australia during the year ended 30 June 1992, except for sole proprietorships or family partnerships not employing staff at 30 June 1992. Information about these businesses was collected in the 1991 Census of Population and Housing, with summary employment information presented in Table 2 of this publication. As these data indicate, these businesses contribute only

marginally to statistical aggregates (other than number of establishments). In addition, the ABS attempts to obtain data for employing businesses which either commenced or ceased operation during the year, but it is not possible to obtain data for all of them.

Unit definitions

10. The standard units now in use are:

(a) *Management unit.* The management unit is the highest-level unit within a business, having regard to industry homogeneity, for which accounts are maintained; in nearly all cases, it coincides with the legal entity owning the business (that is, company, partnership, trust, sole operator, etc). In the case of large diversified businesses, however, there may be more than one management unit, each coinciding with a 'division' or 'line of business'. A division or line of business is recognised where separate and comprehensive accounts are compiled for it.

(b) *Establishment.* The establishment is the smallest accounting unit of a business, within a State or Territory, controlling its productive activities and maintaining a specified range of detailed data enabling value added to be calculated. In general, an establishment covers all operations at a physical location, but may consist of a group of locations provided they are within the same State or Territory. The majority of establishments operate at one location only.

(c) *Location.* A location is a physical unit of the establishment. It consists usually of an unbroken physical area or site, occupied by an establishment, at which, or from which, the establishment engages in productive activity on a relatively permanent basis. An establishment can consist of one or more locations. In specified circumstances, non-contiguous sites occupied by the same establishment can be combined to form a location.

Data item definitions

11. *Establishments at 30 June.* The number of establishments in operation at 30 June.

12. *Locations at 30 June.* The number of locations in operation at 30 June.

13. *Employment at end of June.* The number of working proprietors and the number of employees on the payroll for the last pay period ending in June. (Sole proprietors and partnerships not employing others are excluded.)

14. *Wages and salaries.* The gross wages and salaries of all employees of the establishment. The drawings of working proprietors are excluded.

15. *Turnover* (see Note below). Sales (exclusive of excise and sales tax) of goods whether produced by the establishment or not, plus transfers out of goods to other establishments of the same business, plus bounties and subsidies on production, plus all other operating revenue from outside the business (such as commission revenue, repair and service revenue, and rent, leasing and hiring

revenue), plus capital work done for own use, or for rental or lease. Receipts from interest, royalties, dividends and the sale of fixed tangible assets are excluded.

Note: Transfers to other establishments of the same business referred to in the definition of turnover are valued, for statistical purposes, at prices commensurate with the prices which would have been received if the establishments concerned had been under separate ownership, that is, at commercial selling price. A significant proportion of the commodities manufactured by some industries is manufactured on commission for non-manufacturing businesses from materials owned and supplied by those businesses. As a consequence, the turnover figures do not reflect the gross value of those commodities but only the commission earned relating to them.

16. *Persons employed per establishment.* Employment at the last pay period ending in June divided by the number of establishments in operation at 30 June of the same year.

17. *Turnover per person employed.* Turnover of manufacturing establishments which operated during the year ended 30 June divided by the total number of persons employed at the last pay period ending in June of the same year.

18. *Manufacturing employment, August 1991.* These statistics are from the 1991 Census of Population and Housing and represent those persons who were classified as being employed in the manufacturing industry. 'Sole proprietors and partnerships not employing others' were those persons that indicated that they were employed in the manufacturing industry in this category but they did not have any salaried employees. The 'Total other' employed were those persons who worked for employing units (ie total employment excluding sole proprietors and partnerships not employing others).

19. *Manufacturing census employment at end of June 1991.* The number of working proprietors and the number of employees on manufacturing establishments' payrolls for the last pay period ending in June 1991. (Sole proprietors and partnerships not employing others are excluded). These data are from the 1990-91 manufacturing census.

20. *Demographic characteristics of persons employed, August 1991.* The source of these data is the 1991 Census of Population and Housing. The statistics presented show (in percentage terms) the sex and age characteristics of persons employed in the manufacturing industry and for all industries.

21. *Establishments that conducted environmental impact assessments or environmental audits.* Establishments that either conducted their own environmental impact assessments or environmental audits (including energy audits) or contracted others to do so.

22. *Establishments that encouraged the return of their own containers or packaging.* Establishments that encouraged and/or permitted the return of containers or packaging used in the marketing or distribution of their product.

23. *Establishments engaged in the marketing or production of goods or services for monitoring, maintaining or improving the environment.* Establishments involved in marketing or producing goods or services specifically for monitoring, maintaining or improving the environment.

24. *Proportion of total turnover.* The percentage of total manufacturing industry turnover attributed to establishments that gave positive responses to questions on environmental protection issues (for Table 6). The percentage of total reported turnover (excluding single establishment businesses with less than four persons employed) of establishments that had current expenditure on environmental protection (for Table 7).

25. *Current expenditure on environmental protection.* Expenditure on waste management plus other operational or maintenance costs incurred in protection of the environment from pollution. Included are such expenses as government and council fees, charges and taxes relating to pollution abatement and control, charges to remove and dispose of wastes arising from an establishment's production processes, research and development expenditure on pollution abatement and control, and expenditure on environmental impact assessments and environmental audits.

26. *Capital expenditure to abate pollution.* Expenditure on new plant, machinery or equipment designed to abate or control air, water, solid waste, noise or other pollutants by using either end-of-line techniques or change-in-production processes.

Comparability with previous statistics

27. As explained above, the standard units definitions were revised for the 1988-89 census and the new definitions have been implemented on the ABS central business register for units classified to the manufacturing industry.

28. For a detailed explanation of the various factors which affected the count of 'Number of manufacturing establishments' in the years to 1989-90, see the Appendix to the 1989-90 issue of this publication. Also, as indicated in paragraph 34 of the Explanatory Notes to that issue, there was a fairly constant level of undercoverage on the ABS central business register for the years from 1982. Coverage factors to convert previous years' data (with the exception of number of establishments) to a comparable basis with 1989-90 data are shown in Table 7 of the 1989-90 issue of this publication.

29. Prior to the 1989-90 census, most commodities produced in the petroleum refining industry (ASIC class 2770) were manufactured on commission for non-manufacturing businesses from materials owned and supplied by those businesses. In these cases, manufacturing turnover reflected only the value of commission earned by manufacturing establishments involved (not the gross value of the commodities produced). In 1989-90 and again in 1990-91 (but to a lesser extent), some businesses changed their accounting practices to report gross value of commodities produced. The effect of this change was not present for this census.

30. As with the 1990-91 issue, this publication no longer makes the distinction in tables presented between

those single establishment businesses with less than four persons employed and all other establishments. All time series statistics included in this publication now reflect this change (except where indicated).

31. For users still interested in the dissection between establishments employing less than four persons and establishments employing four or more persons, attention is drawn to Table 5 and the employment size category 0 - 3 persons. This new category includes all establishments employing less than four persons. In most cases, data in this new employment size category equates to the 'old' category of less than four persons employed (the major exception being Subdivision 28). A detailed break up of the differences can be made available on request.

Comparability of manufacturing and population census data

32. There are variations between the conceptually similar population census 'Total other' and manufacturing census employment figures presented in Table 2. These variations occur because of differences in the reference periods and collection methods used.

33. The manufacturing census estimates relate to employment in the last pay period ending in June 1991. The population census estimates relate to employment during the week ended 6 August 1991.

34. The population census was conducted through self-enumeration from individual households. The manufacturing census was collected through mail forms sent to all manufacturing establishments (except for single establishment businesses not employing staff) as recorded on the ABS central business register and which operated in Australia during the year ended 30 June 1991.

35. In the processing of the population census, there were cases where the industry of employment was not stated by the householder or where it could not be classified from the response provided. In these cases, a not classified code was allocated, which accounted for 7.2 per cent of total employment (across all industries). In the manufacturing census, all businesses (and, thereby, their total employment) were industry coded.

Employment size data

36. Summary of operations data at the industry subdivision level classified by employment size are presented in Table 5. These statistics relate to only those manufacturing establishments operating at 30 June 1992. As such, the figures presented in Table 5 may be slightly less than those presented in the other manufacturing census tables. These other tables include data for those manufacturing establishments which operated at any time during 1991-92.

Environmental statistics

37. A summary of environmental protection issues data at the industry subdivision level are presented in Table 6. All manufacturing establishments were asked to provide a 'yes' or 'no' answer as to whether they participated in the environment-related activities set out. The statistics presented relate to those establishments which responded 'yes' to the relevant issues. Establishments which did not respond were treated as if they had responded 'no'.

38. Data contained in Table 7 relate to current and capital expenditure on environmental protection in the year ended 30 June 1992. Data were not collected from those single establishment businesses with less than four persons employed. Establishments which did not respond were treated as if they had no current or capital expenditure on environmental protection.

Statistical division data

39. The location data presented in Table 8 are based on additional data collected in the 1991-92 census. The extra data requested were the activity carried out at the location, the number of persons employed and the address of the location.

40. Employment data shown in this table are based on reported employment, but in the case of wages and salaries and turnover data they do not reflect reported data in all cases. This is because in those circumstances where an establishment operates at more than one location, the data have been synthesised to derive location-level wages and salaries and turnover data. (However, it should be noted that most establishments operate at only the one location.) The location-level synthesised data were derived by using the location data collected on activity and employment, and then prorating wages and salaries and turnover based on the reported employment.

41. As indicated in paragraph 7, a manufacturing establishment covers all activities of the establishment, including any non-manufacturing activities. In Table 8, the non-manufacturing locations of manufacturing establishments have been excluded. For this reason, the State totals (for location data, other than the number of locations) in Table 8 may be less than those shown in Tables 1, 4, 5 and 9 (for establishment data). However, it is also possible for the State totals in Table 8 to be greater than those shown in Tables 1, 4, 5 and 9, as a result of individual locations of establishments being allocated a different industry classification to that of the 'parent' establishment.

Introduction of ANZSIC

42. The Australian and New Zealand Standard Industrial Classification (ANZSIC) is to be fully introduced into the manufacturing statistics collection from the 1992-93 collection. This classification replaces the Australian Standard Industrial Classification currently in use. An ASIC/ANZSIC concordance of data from the 1991-92 census is presented in Table 9 as a forerunner to what users can expect in future collections. For a more detailed explanation, users attention is drawn to the introduction to Table 9 and to the *Australian and New Zealand Standard Industrial Classification, 1993* (1292.0).

Related publications

43. Users may also wish to refer to the following publications:

Cost of Environment Protection, Australia, 1991-92 (4603.0), to be released later in 1994.

Manufacturing Technology Statistics, Australia, 31 December 1991 (8123.0), released on 22 February 1993.

Quarterly Indexes of Industrial Production, Australia (8125.0).

Business Operations and Industry Performance, Australia, 1991-92 (8140.0), released on 31 August 1993.

Business Operations and Industry Performance, Australia, 1992-93 (8140.0), released on 22 June 1994.

Manufacturing Industry, Australia, 1992-93, Preliminary (8201.0), released on 25 August 1994.

Manufacturing Industry, Australia, 1991-92 (8221.0), released on 21 February 1994.

Manufacturing Production, Australia: Principal Commodities Produced, 1989-90 (8365.0), released on 4 February 1994.

Monthly and quarterly commodity data

44. A number of publications are produced each month or quarter showing monthly details of the quantity produced of an extensive range of the more important commodities manufactured in Australia (some 600 in all). These publications include *Production Statistics, Australia, Preliminary* (8301.0) and a series of ten publications each relating to a particular range of products (8357.0 to 8369.0).

Back data and unpublished statistics

45. A range of manufacturing industry statistics publications is available for previous years. As well, a considerable amount of data from the manufacturing census exists in unpublished form. More detailed information to satisfy individual user requirements may be available on request. A charge would normally be made for providing such information.

Symbols and other usages

ANZSIC	Australian and New Zealand Standard Industrial Classification
ASIC	Australian Standard Industrial Classification
n.e.c.	not elsewhere classified
n.p.	not available for publication but included in totals where applicable
..	not applicable
—	nil or rounded to zero

46. Where figures have been rounded, discrepancies may occur between totals and the sums of the component items.

Unpublished data from the Manufacturing Census

A considerable amount of data from the manufacturing census exists in unpublished form. More detailed information to satisfy individual user requirements may be available on request.

Some examples of the information available include:

Industry concentration statistics : are published at the 2 digit ASIC level for Australia and are available at more detailed levels on request.

Small business statistics : a range of data for Australia and the States are published and are available at more detailed levels on request.

Small area data : information at the two digit ASIC level are published for Statistical Divisions and are available for selected Statistical Local Areas and Statistical Subdivisions throughout Australia on request.



Further details can be obtained by contacting the Manufacturing Publishing and Consultancy Area in ABS NSW on (02) 268 4245.

Business and Industry Profiles

Business Profiles contain a core of industry averages and financial accounting ratios from the manufacturing census database at the four digit (most detailed) level of the ASIC, usually by size of business, for a single ASIC level.

Business Profiles also include industry concentration statistics and environmental data.

Business Profiles are available now.

Industry Profiles contain similar core information as in the **Business Profiles** for all the ASICs in an Industry Sub-division (two digit ASIC level).

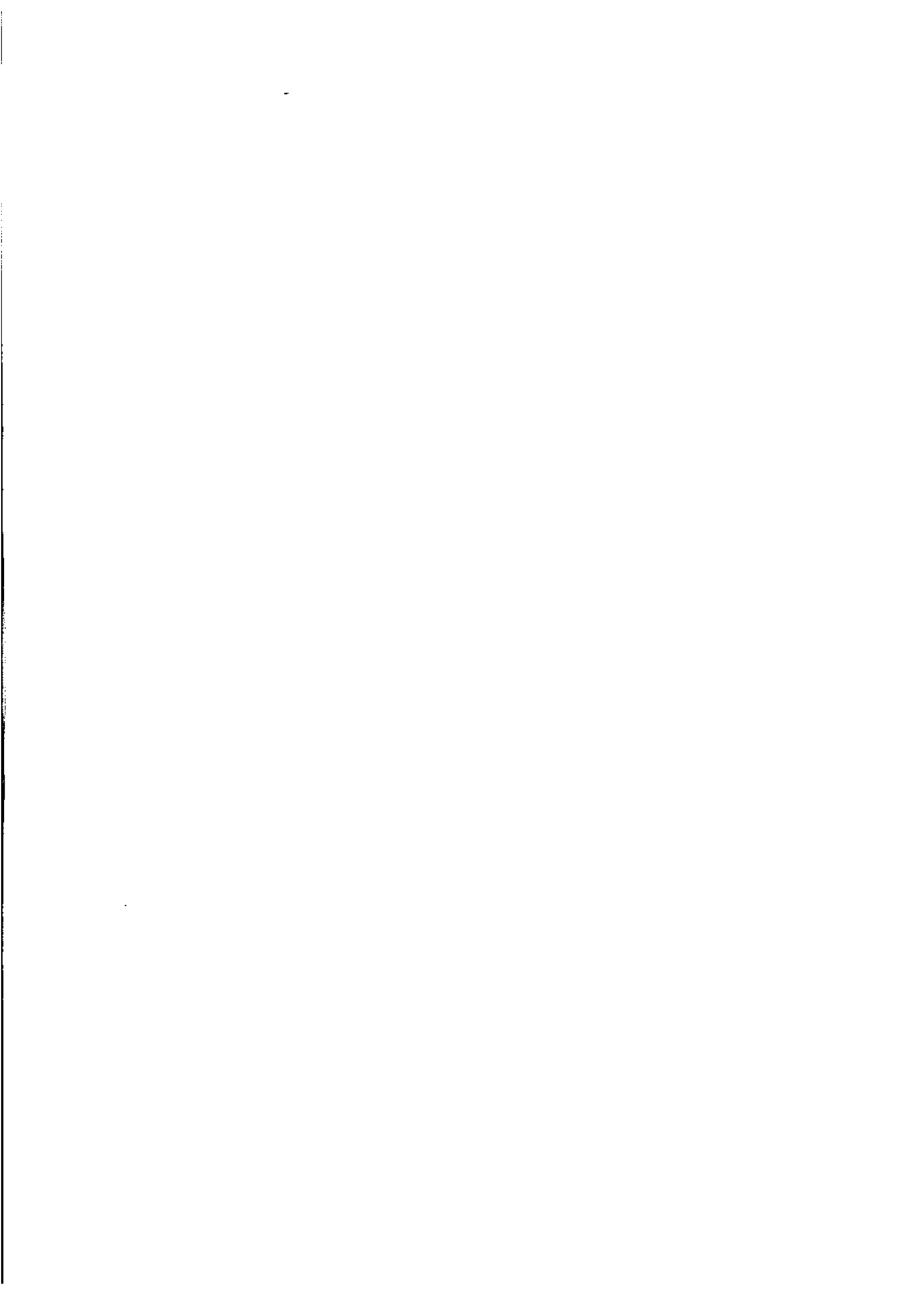
Industry Profiles also have a very wide selection of survey data from around the ABS at the lowest level of the ASIC for which it is available, either published or unpublished.

Industry Profiles contain a selection of commodity data from the manufacturing census along with imports and exports information for the same commodities.

Industry Profiles are available now.



For more information please telephone John Ridley, Manager Economic Statistics Unit in ABS NSW on (02) 268 4237.



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