## Preface

This is the ninth Bulletin in the series on Manufacturing Output, Employment and Wages and Salaries and its presents results of the Quarterly Surveys conducted by the Department for the year 2000-2003. The survey results indicate the performance of the manufacturing industry in the Tongan Economy.

## The bulletin is spread over four parts:

Part I: gives the introduction and main results of the comparative position and trend of manufacturing production, employment and wages/salaries.
Part II: has the complementary analysis on level of production, employment and wages/salaries
Part III: has all the statistical tables showing growth and trend of manufacturing production, employment and wages/salaries.

Part IV: gives the questionnaire used in the quarterly survey of manufacturing production, employment and wages/salaries and instructions for completing the questionnaire.

Staff of the Survey division of the Department is commended for their hard work in collecting the information present in this bulletin.

The Department is grateful to all manufacturing establishments that supplied the data and information published in this bulletin. The Department welcomes any comments on how this bulletin could be improved.

[^0]
## Statistics Department <br> Government of Tonga Nuku'alofa

## Tonga

Telephone: (676) 23-300, 23-913
Fax: (676) 24-303
Email: statdept@dgl.to
Website: www.spc.int/prism/country/to/stats

## Table of contents

Page number
List of tables ..... iii
List of figures ..... iv
Notes and abbreviation ..... v
Main results ..... 1

1. Introduction ..... 1-2
2. Main Results ..... 3-11
3. Complementary analysis
3.1 Production level ..... 12-14
3.2 Employment Level ..... 15
3.3 Wages/Salaries ..... 16
4. Statistical tables ..... 17-28
5. Appendices ..... 29-32

## List of Tables

Note: "All tables covers the years 2000-2003
Table No. Title Page

1. Summary of the survey results ..... 3
2. Manufacturing production by ISIC division ..... 4
3. Manufacturing production by Island division ..... 5
4. Manufacturing production by Institutional sector ..... 6
5. Manufacturing employment by ISIC division ..... 7
6. Manufacturing employment by Island division ..... 8
7. Manufacturing employment by Institutional sector ..... 8
8. Manufacturing wages and salaries by ISIC division ..... 9
9. Manufacturing wages and salaries by Island division ..... 10
10. Manufacturing wages and salaries by Institutional sector ..... 11
3.1a Average production per establishment by ISIC division ..... 13
3.1b Average production per establishment by Island division ..... 13
3.1c Average production per establishment by Institutional sector ..... 13
3.1d Average production per production worker by ISIC division ..... 14
3.1e Average production per production worker by Island division ..... 14
3.1f Average production per production worker by Institutional sector ..... 14
3.2a Number of manufacturing production workers by ISIC division ..... 15
3.2b Number of manufacturing production workers by Island division ..... 15
3.2c Number of manufacturing production workers by Institutional sector ..... 15
3.3a Average weekly wage rate per production worker by ISIC division ..... 16
3.3b Average weekly wage rate per production worker by Island division ..... 16
3.3c Average weekly wage rate per production worker by Institutional sector ..... 16
Statistical tables
4.1 Manufacturing production by ISIC division ..... 17
4.2 Manufacturing production by Island division ..... 17
4.3 Manufacturing production by Institutional sector ..... 17
4.4 Percentage distribution of manufacturing production by ISIC division ..... 18
4.5 Percentage distribution of manufacturing production by Island division ..... 18
4.6 Percentage distribution of manufacturing production by Institutional sector ..... 18
4.7 Average production per establishment by ISIC division ..... 19
4.8 Average production per establishment by Island division ..... 19
4.9 Average production per establishment by Institutional sector ..... 19
4.10 Average production per production worker by ISIC division ..... 20
4.11 Average production per production worker by Island division ..... 20
Table No. Title Page
4.12 Average production per production worker by Institutional sector ..... 20
4.13 Manufacturing employment by ISIC division ..... 21
4.14 Manufacturing employment by Island division ..... 21
4.15 Manufacturing employment by Institutional sector ..... 21
4.16 Percentage distribution of manufacturing employment by ISIC division ..... 22
4.17 Percentage distribution of manufacturing employment by Island division ..... 22
4.18 Percentage distribution of manufacturing employment by Institutional sector ..... 22
4.19 Number of manufacturing production workers by ISIC division ..... 23
4.20 Number of manufacturing production workers by Island division ..... 23
4.21 Number of manufacturing production workers by Institutional sector ..... 23
4.22 Manufacturing wages and salaries by ISIC division ..... 24
4.23 Manufacturing wages and salaries by Island division ..... 24
4.24 Manufacturing wages and salaries by Institutional sector ..... 24
4.25 Percentage distribution of manufacturing wages and salaries by ISIC division ..... 25
4.26 Percentage distribution of manufacturing wages and salaries by Island division ..... 25
4,27 Percentage distribution of manufacturing wages and salaries by Institutional sector ..... 25
4.28 Wages and salaries of production workers by ISIC division ..... 26
4.29 Wages and salaries of production workers by Island division ..... 26
4.30 Wages and salaries of production workers by Institutional sector ..... 26
4.31 Average weekly wage rate for production worker by ISIC division ..... 27
4.32 Average weekly wage rate for production worker by Island division ..... 27
4.33 Average weekly wage rate for production worker by Institutional sector ..... 27
4.34 Number of manufacturing establishments by ISIC division ..... 28
4.35 Number of manufacturing establishments by Island division ..... 28
4.36 Number of manufacturing establishments by Institutional sector ..... 28
List of GraphsNote: "All figures covers the years 2000-2003
Graph Title Page
11. Manufacturing production level ..... 3
12. Manufacturing production level by island division ..... 4
13. Manufacturing production level by institutional sector ..... 5
14. Manufacturing employment level ..... 6
15. Manufacturing employment level by island division ..... 7
16. Manufacturing employment level by institutional sector ..... 8
17. Manufacturing wages level ..... 9
Figure Title Page
18. Manufacturing wages level by island division ..... 8
19. Manufacturing wages level by institutional sector ..... 9
20. Average production per establishment ..... 12

## Notes and abbreviation

## Rounding

The sums of individual industries may not always come exactly to the totals shown, because of the effects of rounding. Discrepancies of 1 or 2 in the final digit should give no cause for concern.

ISIC International Standard Industrial Classification (Series M No.4, Rev.3)

## 1. Introduction

## Survey objective

1.1 This report presents the results of the quarterly survey of manufacturing production, employment and wages/salaries, conducted by the Statistics Department of Tonga over the period 20002003. The main objectives of the survey are:
$>$ To provide updated information on levels of production, employment and wages/salaries;
> To provide some data for the components of National accounts; and
> To provide information on the performance of Manufacturing industries for Planners, Policy makers and the general public.

## Coverage

1.2 The Statistics Department launched a regular quarterly survey of Manufacturing production, employment and wages and salaries effective from July-September 1983. The survey covered all manufacturing establishments and units, including:
(i) Those registered under the Companies Act 1912,
(ii) Those granted Development License for manufacturing under the Industrial Incentives Act 1978 and
(iii) Those engaged in manufacturing activities with a license issued by the Ministry of Labour, Commerce and Industries.
1.3 The survey did not cover enterprises, establishments and units that were engaged in (a) repair and maintenance of vehicles, machinery and equipment; (b) canning, preserving and processing of fish and fisheries products; and (c) household type of activities related to making handicrafts and the like.
1.4 An establishment was treated as manufacturing if it was engaged in the transformation (mechanical or chemical) of substances into new products whether by machines or by hand in a factory or other business premises. An establishment/unit engaged in the assembly of component parts of manufactured products was treated as engaged in manufacturing except where it undertook construction activity.
1.5 The definitions used for manufacturing businesses for the survey in question were:

Establishment: a separate operating unit (factory, store, workshop or other place, etc.) engaged in Tonga in one or predominantly one kind of economic activity at a single physical location.

Enterprises: a single business entity, Private, Government, Quasi-government, Co-operative and sole ownership, engaged in manufacturing type of activities is treated as an enterprise. There are generally two types of enterprises viz.:
i. "Single Establishment Enterprise" consisting of only one establishment and
ii. "Multiple Establishments Enterprise" consisting of more than one establishment with or without ancillary unit or one establishment plus one or more ancillary units.

## Data collection

1.6 Information was collected by personal visits of the survey staff of the Statistics Department to the manufacturing enterprises, establishments and units that were operational in the various quarters starting $1^{\text {st }}$ Quarter 2000 and subsequent to the last quarter (October-December) of 2003. This covers establishments on the four main island divisions of Tonga namely Tongatapu, Vava'u, Ha'apai and 'Eua. This tenth Bulletin on manufacturing output, employment and wages and salaries contains data for calendar years 2000-2003.

## Response rate

1.7 There is no non-response rate as one of the reason for delaying the published of the survey result is by trying to get all the returns before processing the results.

## Data processing

1.8 All data entry, editing checks and queries were done using the Access software package. Preparation of the final tables was done using Excel facility.
1.9 Manufacturing establishments have been classified into Divisions according to the International Standard Industrial Classification (ISIC) Series M No. 4, Rev. 3 for Major Divisions 15-37. The following ISIC divisions have been used.

## The following ISIC Divisions have been used:

15. Manufactured of food products and beverages (bread, sausages, soft drinks and ice-cream etc.)
16. Manufacture of textiles (t-shirt, pullovers and quilts etc.)
17. Manufacture of wearing apparel; dressing and drying of fur (dress, trousers, lavalava etc.)
18. Tanning and dressing of leather; manufacture of luggage, handbags, saddlery, harness and footwear
19. Manufacture of wood and of products of wood and cork, except furniture; manufacture of articles of straw and plaiting materials
20. Publishing, printing and reproduction of recorded media
21. Manufacture of chemicals and chemical products (tablets, paint and varnish etc.)
22. Manufacture of other non-metallic mineral products (concrete blocks and water tanks etc.)
23. Manufacture of machinery and equipment n.e.c.
24. Manufacture of electrical machinery and apparatus
25. Manufacture of radio, television and communication equipment and apparatus
26. Manufacture of medical, precision and optical instruments, watches and clocks
27. Manufacture of other transport equipment (boat, cart, bicycle etc.)
28. Manufacture of furniture
29. Recycling and other manufacture industries n.e.c.

## 2 Main results

The quarterly survey of manufacturing output, employment and wages/salaries for year 2003 was carried out by the Statistics Department of Tonga at the beginning of year 2004. The survey collects information on production, employment and wages/salaries, which include memorandum items. The survey covers all manufacturing establishments regardless of size; level of production or number of persons engaged. Due to funding constraints and the distance from the main island, the Niuas were excluded from the survey.
Table 1: Summary of the survey results for year 2000-2003:

| Item | Unit | 2000 | 2001 | 2002 |
| :--- | ---: | ---: | ---: | ---: |
| 1. Establishments covered | No. | 115 | 115 | 123 |
| 2. Total production | $T \$\left({ }^{\prime} 000\right)$ | 26407 | 28248 | 31037 |
| 3. Persons employed | No. | 1175 | 1188 | 1258 |
| 4. Wages and salaries | $T \$\left({ }^{\prime} 000\right)$ | 4031 | 4604 | 4857 |

Source: Manufacturing survey, Statistics Dept.

## Manufacturing production

In Tonga, total manufacturing production in 2003 stood at 36 million pa'anga, an increase by 17 percent from the revised Manufacturing Production of $\$ 31$ million in 2002 as reported by the Statistics Department. This increase was mainly the result of growth in production of Fabricated Metal Products, which increased by 109 percent and other Manufacturing industries by $47 \%$ also Non metallic Mineral Products by 28 \% and Food Products and Beverages by 26 \%.

Graph 1 below shows that total production has increased tremendously, from 26 million pa'anga in 2000 to 36 million in 2003. There was an increase in production of all major industries like; production of Food products and Beverages increased by 43 percent, Non-metallic mineral products by 121 percent,Fabricated metal products by 141 percent and other manufacturing industries by 101 percent.

The trend in the level of total production is shown in Graph 1 below.


Source: Manufacturing survey, Statistics Dept.

Some of the increase in production was due to the opening of new establishments. This was particularly with Food Products and Beverages and with Non Metallic and Mineral Products.
In 2003, Food Products and Beverages industries contributed 22 million pa'anga ( $61 \%$ of the total), followed by, Non-metallic mineral products with 4 million (11\%), Other manufacturing industries contributed 4 million (11\%) and Fabricated Metal Products by over 3 millions(10\%) Table 2 below shows some more detailed information on production by ISIC division.

Table 2: Manufacturing production by ISIC division for 2000-2003

| T\$('000) |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| ISIC division | 2000 | 2001 | 2002 | 2003 |
| 15 Food products and beverages | 15,573 | 16,662 | 17,640 | 22,249 |
| 22 Publishing and printing | 1,260 | 1,269 | 1,141 | 1,119 |
| 24 Chemicals and chemical products | 4,263 | 2,949 | 4,616 | 1,311 |
| 26 Non-metallic mineral products | 1,863 | 3,068 | 3,226 | 4,113 |
| 28 Fabricated metal products | 1,459 | 1,640 | 1,682 | 3,520 |
| 37 Other manufacturing industries | 1,989 | 2,660 | 2,732 | 4,007 |
| Total | 26,407 | 28,248 | 31,037 | 36,319 |

Source: Manufacturing survey, Statistics Dept. Note: ISIC 37 includes 17,18,19,20,29,30,31,35 and 36

Graph 2 shows that almost all the increase in production is accounted for by Tongatapu. Production in Tongatapu went up from 23 million pa'anga in 2000 to 27 million pa'anga in 2003.


Source: Manufacturing survey, Statistics Dept.

In Tongatapu, there was an improvements on production of major industries like; Food products and Beverages with an increase of 22 percent, Non-metallic Mineral products by 121 percent, Fabricated Metal products with 141 percent and Other manufacturing industries by 38 percent plus, new establishments with significant contribution were adding on.

Production in Vava'u seems to be growing though there was a slowing down during 2001 and 2002.
Production for both Ha'apai and 'Eua looks to be growing though 2001 was not favourable.
Table 3 below shows the share of island division on manufacturing production.

Table 3: Manufacturing production by Island division for 2000-2003

| Island division | $\mathbf{2 0 0 0}$ | $\mathbf{2 0 0 1}$ | $\mathbf{2 0 0 2}$ | $\mathbf{2 0 0 3}$ |
| :--- | ---: | ---: | ---: | ---: |
| 1 Tongatapu | 23,329 | 26,754 | 28,771 | 27,713 |
| 2 Vava'u | 2,776 | 1,226 | 1,841 | 7,945 |
| 3\&4 Ha'apai \& 'Eua | 302 | 268 | 425 | 661 |
| Total | $\mathbf{2 6 , 4 0 7}$ | $\mathbf{2 8 , 2 4 8}$ | $\mathbf{3 1 , 0 3 7}$ | $\mathbf{3 6 , 3 1 9}$ |

Source: Manufacturing survey, Statistics Dept.
In terms of institutional sector, the private sector showed an increase of 14 percent from 30 million in 2002 to 34 million pa'anga in 2003. This was a result of increased in production of Food Products and Beverages by 26 percent, non-metallic mineral products ( 28 percent), fabricated metal products (109 percent) and other manufacturing industries (47 percent).

Graph 3 below shows the trend of production level by institutional sector.


[^1]It is clear that the private sector dominates in terms of manufacturing production by 34 million pa'anga ( $94 \%$ ) in 2003, while only about 2 million (6\%) contributed by the Government and Quasi-government sector. Table 4 below shows the contribution of the institutional sectors to manufacturing production.

Table 4: Manufacturing production by Institutional sector for 2000-2003

|  |  |  | $T \$\left({ }^{\prime} 000\right)$ |  |
| :--- | ---: | ---: | ---: | ---: |
|  | Institutional sector | $\mathbf{2 0 0 0}$ | $\mathbf{2 0 0 1}$ | $\mathbf{2 0 0 2}$ |
| 1 Private | 25,147 | 26,342 | 29,994 | 34,255 |
| 2\&3 Government and quasi-government | 1,260 | 1,289 | 1,043 | 2,064 |
| Total | $\mathbf{2 6 4 0 7}$ | $\mathbf{2 7 6 3 1}$ | $\mathbf{3 1 0 3 7}$ | $\mathbf{3 6 , 3 1 9}$ |

Source: Manufacturing survey, Statistics Dept.

## Manufacturing employment

There was a total of 1,375 persons engaged in the manufacturing sector in 2003, representing a 9 percent increase from the revised figure of 1,258 employed in 2002. Over the years 2000-2003 the Manufacturing employment was increasing to 17 percent in 2003 where 28 percent for Food products and Beverages, 2 percent for Wood and Products of Wood, 13 percent for Non Metallic and Metallic Products and 16 percent for manufacture of furniture.

Graph 4 below shows the trend of manufacturing employment between the years 2000 to 2003.


Source: Manufacturing survey, Statistics Dept.
Table 5 below shows the number of person in manufacturing by ISIC Division as from 2000 to 2003

Out of every 100 persons employed in manufacturing in 2003, 55 are employed in the manufacturing of Food products and Beverages, 6 in Wood and Products of Wood, 8 in Publishing and Printing, 7 in manufacturing of furniture, 6 with wood and wood products, 6 with non-metallic mineral products and 16 with Other Manufacturing industries.
Table 5: Manufacturing employment by ISIC division for 2000-2003

|  |  |  | Number |  |
| :---: | :---: | :---: | :---: | :---: |
| ISIC division | 2000 | 2001 | 2002 | 2003 |
| 15 Food products and beverages | 595 | 656 | 704 | 761 |
| 20 Wood and products of wood | 84 | 80 | 77 | 87 |
| 22 Publishing and printing | 114 | 109 | 109 | 108 |
| 26 Non-metallic mineral products | 76 | 71 | 70 | 87 |
| 36 Manufacture of furniture | 87 | 83 | 90 | 102 |
| 37 Other manufacturing industries | 219 | 189 | 208 | 230 |
| Total | 1,175 | 1,188 | 1,258 | 1375 |

Source: Manufacturing survey, Statistics Dept. Note: ISIC 37 includes 17,18,19,24,28,29,30,31 and 35
Between 2000 and 2003, employment in manufacturing in Tongatapu increased by almost 15 percent. In contrast, manufacturing employment levels in Ha'apai together with 'Eua dropped, while there was a 61 percent increased in number of people employing in Vava'u.


Source: Manufacturing survey, Statistics Dept.
By island division, as shown in table 6 below, Tongatapu had 1104 ( $80 \%$ ) people employed in manufacturing in 2003 while Vava'u had 219(16\%) and Ha'apai together with 'Eua had 52 (4\%). Table 6 below shows more information on employment level by island division.

Table 6: Manufacturing employment by Island division for 2000-2003

| Island division | $\mathbf{2 0 0 0}$ | $\mathbf{2 0 0 1}$ | $\mathbf{2 0 0 2}$ | $\mathbf{2 0 0 3}$ |
| :--- | ---: | ---: | ---: | ---: |
| 1 Tongatapu | 957 | 990 | 1052 | 1104 |
| 2 Vava'u |  |  |  |  |
| 3\&4 Ha'apai \& 'Eua | 135 | 121 | 126 | 219 |
| Total | 83 | 77 | 80 | 52 |

Source: Manufacturing survey, Statistics Dept.
Employment in the private sector has increased by 10 percent, from 1,103 in 2002 to 1,215 in 2003. In particular, there were increases in the number employed in Food and Beverages, Non Metallic Mineral Products and in the Manufacturing of furniture. The number employed in manufacturing by the government and quasi-government sector remained around 200 between 2000 and 2003.


Source: Manufacturing survey, Statistics Dept.
In percentage terms, the private sector shows a healthier life than the government sector.

Table 7: Manufacturing employment by Institutional sector for 2000-2003

| Institutional sector | $\mathbf{2 0 0 0}$ | $\mathbf{2 0 0 1}$ | $\mathbf{2 0 0 2}$ | $\mathbf{2 0 0 3}$ |
| :--- | ---: | ---: | ---: | ---: |
| 20031 Private | 967 | 1,029 | 1103 | 1215 |
| 2\&3 Government and quasi-government | 208 | 159 | 155 | 160 |
| Total | $\mathbf{1 , 1 7 5}$ | $\mathbf{1 , 1 8 8}$ | $\mathbf{1 , 2 5 8}$ | $\mathbf{1 3 7 5}$ |

Source: Manufacturing survey, Statistics Dept.

## - Manufacturing wages/salaries

Total manufacturing wages and salaries increased by 33 percent between 2000 and year 2003, with an increase of 67 percent on wages of Food products and Beverages, 34 on Manufacturing of Furniture and 22 on other manufacturing industries.
As shown in table 7 below, total wages and salaries have increasingly raised from 4.0 million pa'anga in 2000 to 5.3 million in 2003. Over the same period, total wages/salaries increased by 67 percent for the Food products and Beverages industry, 0.1 percent for Publishing and Printing, 34 percent increases for manufacture of furniture and 22 percent for other manufacturing industries while wood and Products of wood decreased by 20 percent and 9 percent for Non Metallic mineral product wages and salaries.

Graph 7 below shows the total manufacturing wages and salaries between the years 2000-2003.


Source: Manufacturing survey, Statistics Dept.
In 2003, Wages and Salaries for Food Products and Beverages industry placed at around 2.8 million pa'anga, accounted 52 percent of the total wages and salaries, followed by Publishing and printing with 0.6 million pa'anga (11\%), manufacture of furniture with 0.5 million pa'anga (10\%).

Table 8: Manufacturing wages and salaries by ISIC division for 2000-2003

| ISIC division | $\mathbf{2 0 0 0}$ | $\mathbf{2 0 0 1}$ | $\mathbf{2 0 0 2}$ | $\mathbf{2 0 0 3}$ |
| :--- | ---: | ---: | ---: | ---: |
| 15 Food products and beverages | 1,682 | 2,238 | 2,511 | 2,804 |
| 20 Wood and products of wood | 279 | 230 | 274 | 225 |
| 22 Publishing and printing | 609 | 642 | 648 | 610 |
| 26 Non-metallic mineral products | 381 | 342 | 337 | 347 |
| $\mathbf{3 6}$ Manufacture of furniture | 414 | 490 | 390 | 555 |
| $\mathbf{3 7}$ Other manufacturing industries | 666 | 662 | 697 | 813 |
| Total |  | $\mathbf{4 , 0 3 1}$ | $\mathbf{4 , 6 0 4}$ | 4857 |

Source: Manufacturing survey, Statistics Dept. Note: ISIC 37 include 17,18,19,24,28,29,30,31 and 35

In year 2003, about 4.4 million pa'anga ( $83 \%$ ) of the total manufacturing wages and salaries were earned by those employed in Tongatapu, the main island, followed by Vava'u with around 0.8 million ( $14 \%$ ) and only 0.1 million (3\%) in combination of Ha'apai and 'Eua.

Graph 8 below shows the trend of manufacturing wages/salaries by island division for 2000-2003


Source: Manufacturing survey, Statistics Dept.
Shown on the graph below, wages and salaries of Private sector has gradually increasing from 3.2 million in 2000 to 3.9 million in 2001 , to 4.1 million and 4.7 million for 2002 and 2003 respectively.

Table 9: Manufacturing wages and salaries by Island division for 2000-2003

|  |  |  | T\$('000) |  |
| :---: | :---: | :---: | :---: | :---: |
| Island division | 2000 | 2001 | 2002 | 2003 |
| 1 Tongatapu | 3,616 | 4,253 | 4,225 | 4461 |
| 2 Vava'u | 283 | 257 | 510 | 772 |
| 3\&4 Ha'apai \& 'Eua | 133 | 95 | 121 | 121 |
| Total | 4,031 | 4,604 | 4,857 | 5354 |

Source: Manufacturing survey, Statistics Dept.
The increasing above occurred in ISIC of Food products and beverages, Publishing and printing, Manufacture of furniture and other Manufacturing Industries.

Total wages and salaries paid by the Government and Quasi-government sector has moved down from 0.8 million pa'anga in 2000 to 0.7 million in 2003.


Source: Manufacturing survey, Statistics Dept.

In 2003, manufacturing employees in the Private Sector received over 4 million pa'anga ( $88 \%$ ) in wages and salaries, while those in the Government and Quasi-Government sector received nearly 0.7 million pa'anga (12\%).

Table 10: Manufacturing wages and salaries by Institutional sector for 2000-2003

|  |  |  | T\$('000) |  |
| :---: | :---: | :---: | :---: | :---: |
| Institutional sector | 2000 | 2001 | 2002 | 2003 |
| 1 Private | 3,196 | 3,886 | 4,094 | 4,689 |
| 2\&3 Government and quasi-government | 835 | 719 | 763 | 665 |
| Total | 4,031 | 4,604 | 4,857 | 5,354 |

[^2]
## 3 Complementary analysis

### 3.1 Production level

- Average production per establishment

The average annual production per establishment for the whole of Tonga has increased by 10 percent from 252 thousand in 2002 to 279 thousand pa'anga in 2003. This involved Food products and beverages increased by 22 percent and Fabricated Products by 109 percent.
Graph 10 below shows the average annual production per establishment went up from 225 thousand pa'anga in 2000 to 279 thousand in 2003. In terms of current value, average production has generally been increasing over the 3 -years period, with the exception of Publishing and Printing , Chemical and Chemical Products and other Manufacturing industries where average production level tend to decline.


Source: Manufacturing survey, Statistics Dept.

By looking at industry level in year 2003, some industries produced far more than national average production per establishment level. This led by Fabricated Products with 502 thousand pa'anga, followed by non-metallic mineral products with 457 thousand, Food Products and Beverages with the rate of 358 thousand, Chemicals and Chemicals Products by 328 thousands ,Publishing and Printing by 280 thousand . Finally, other manufacturing industries production rate was 91 thousand.

More detailed information on average production per establishment is given in Table 4.7, 4.8 and 4.9 of this report.

Table 3.1a: Average production per establishment by ISIC division for 2000-2003
T\$('000)

| ISIC division | 2000 | 2001 | 2002 | 2003 |
| :---: | :---: | :---: | :---: | :---: |
| 15 Food products and beverages | 285 | 310 | 294 | 358 |
| 22 Publishing and printing | 420 | 423 | 380 | 280 |
| 24 Chemicals and chemical products | 853 | 737 | 1,154 | 328 |
| 26 Non-metallic mineral products | 317 | 456 | 495 | 457 |
| 28 Fabricated metal products | 208 | 234 | 240 | 502 |
| 37 Other manufacturing industries | 362 | 396 | 351 | 91 |
| Total | 225 | 240 | 252 | 279 |

Source: Manufacturing survey, Statistics Dept. Note: ISIC 37 include 17,18, 19, 20, 29, 30,31,35 and 36
In terms of annual production by island division, Tongatapu produced above the national average per establishment, with an average of 315 thousand pa'anga per establishment, Vava'u followed with 265 thousand and Ha'apai and 'Eua (combined) had an average production of 55 thousand pa'anga.

Table3.1b: Average production per establishment by Island division for 2000-2003

| Island division | $\mathbf{2 0 0 0}$ | $\mathbf{2 0 0 1}$ | $\mathbf{2 0 0 2}$ | $\mathbf{2 0 0 3}$ |
| :--- | ---: | ---: | ---: | ---: |
| 1 Tongatapu | 277 | 319 | 350 | 315 |
| 2 Vava'u | 121 | 56 | 63 | 265 |
| 3\&4 Ha'apai \& 'Eua | 30 | 24 | 39 | 55 |
| Total | $\mathbf{2 2 5}$ | $\mathbf{2 4 0}$ | $\mathbf{2 5 2}$ | $\mathbf{2 7 9}$ |

Source: Manufacturing survey, Statistics Dept.
In terms of institutional sector, average annual production during the period 2000-2003 was consistently higher for manufacturing establishments in the private sector then it was for those in the Government and Quasi-government sector.

Table 3.1c: Average production per establishment by Institutional sector for 2000-2003

|  | $T \$(\cdot 000)$ |  |  |  |
| :--- | ---: | ---: | ---: | ---: |
| Institutional sector | 2000 | 2001 | 2002 | 2003 |
| 1 Private | 227 | 242 | 256 | 275 |
| 2\&3 Government and quasi-government | 180 | 215 | 174 | 412 |
| Total | 225 | 240 | 252 | 279 |

[^3]
## Average production per production worker

The value of average production per production worker increased from 32 thousand in 2000 to 36 thousand pa'anga in year 2003. By industry level, some industries produced more than the national average production led by Fabricated Metal Products by 103 thousand Pa'anga followed by Non Metallic Mineral Products with 51 thousand, Chemicals \& Chemicals Products with 47 thousand, Food products and Beverages with 36 thousand and other manufacturing industries with 3 thousand.

Table 3.1d: Average production per production worker by ISIC division for 2000-2003

|  | T\$('000) |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| ISIC division | 2000 | 2001 | 2002 | 2003 |
| 15 Food product \& beverages | 32 | 30 | 28 | 36 |
| 24 Chemicals and chemical products | 87 | 113 | 178 | 47 |
| 26 Non-metallic mineral products | 48 | 46 | 57 | 51 |
| 28 Fabricated metal products | 46 | 47 | 49 | 103 |
| 35 Other transport equipment | 17 | 16 | 13 | 0 |
| 37 Other manufacturing industries | 80 | 80 | 71 | 3 |
| Total | 22 | 24 | 30 | 32 |

Source: Manufacturing survey, Statistics Dept. Note: ISIC 37 include 17,18, 19,20,22,29,30,31 and 36

In terms of island division, the value produced by production workers in Tongatapu was on average of about 30 thousand pa'anga, Vava'u with 47 thousand and 17 thousand for Ha'apai and 'Eua.

Table 3.1e: Average production per production worker by Island division for 2000-2003

| Island division | $\mathbf{2 0 0 0}$ | $\mathbf{2 0 0 1}$ | $\mathbf{2 0 0 2}$ | $\mathbf{2 0 0 3}$ |
| :--- | ---: | ---: | ---: | ---: |
| 20031 Tongatapu | 30 | 30 | 33 | 30 |
| 2 Vava'u | 30 | 15 | 21 | 47 |
| 3\&4 Ha'apai \& 'Eua | 8 | 7 | 10 | 17 |
| Total | $\mathbf{2 2}$ | $\mathbf{2 4}$ | $\mathbf{3 0}$ | $\mathbf{3 2}$ |

Source: Manufacturing survey, Statistics Dept.
Production worker in Private sector produced an average production of 35 thousand pa'anga while Government and Quasi-government only produced 13 thousand, which is below the national average production.

Table 3.1f: Average production per production worker by Institutional sector for 2000-2003

|  |  |  | T\$(‘000) |  |
| :---: | :---: | :---: | :---: | :---: |
| Institutional sector | 2000 | 2001 | 2002 | 2003 |
| 2001 Private | 36 | 31 | 34 | 35 |
| 2\&3 Government and quasi-government | 6 | 8 | 7 | 13 |
| Total | 22 | 24 | 30 | 32 |

[^4]
### 3.2 Employment level

The total number of production worker involved in manufacturing industries has increased by 9 percent from 1,050 number of production worker in 2002 compared to 1,146 in year 2003 with an increase of 2 percent on employment of Food Products and Beverages plus other manufacturing industries with 9 percent.
In 2003, Food products and Beverages employed 612(53\%) of production worker, publishing and printing employed 103 (9\%), Wood and Products of wood employed 87(8\%) Production Worker with Non-metallic mineral products and Other manufacturing industries each employed 80(7\%) workers.

Table 3.2a: Number of manufacturing production workers by ISIC division for 2000-2003
Number

| ISIC division | $\mathbf{2 0 0 0}$ | $\mathbf{2 0 0 1}$ | $\mathbf{2 0 0 2}$ | $\mathbf{2 0 0 3}$ |
| :--- | ---: | ---: | ---: | ---: |
| $\mathbf{1 5}$ Food products and beverages | 441 | 519 | 582 | 612 |
| 20 Wood and products of wood | 84 | 83 | 60 | 87 |
| 22 Publishing and printing | 105 | 106 | 106 | 103 |
| $\mathbf{2 6}$ Non-metallic mineral products | 53 | 70 | 61 | 80 |
| 36 Manufacture of furniture | 47 | 68 | 75 | 80 |
| $\mathbf{3 7}$ Other manufacturing industries | 163 | 155 | 168 | 184 |
| Total |  | $\mathbf{8 9 3}$ | $\mathbf{1 , 0 0 1}$ | $\mathbf{1 0 5 0}$ |

Source: Manufacturing survey, Statistics Dept. Note: ISIC 37 include 17,18, 19, 24,28,29,30,31 and 35

Tongatapu employed 937 production worker ( $82 \%$ ) of the total production worker, Vava'u got 170 (15\%) and only 39 Production worker (3\%) in Ha'apai and 'Eua.

Table 3.2b: Number of manufacturing production workers by Island division for 2000-2003

|  |  |  | Number |  |
| :---: | :---: | :---: | :---: | :---: |
| Island division | 2000 | 2001 | 2002 | 2003 |
| 1 Tongatapu | 762 | 879 | 922 | 937 |
| 2 Vava'u | 93 | 81 | 86 | 170 |
| 3\&4 Ha'apai \& 'Eua | 38 | 41 | 42 | 39 |
| Total | 893 | 1,001 | 1050 | 1146 |

Source: Manufacturing survey, Statistics Dept.
There were 986 number of production worker ( $86 \%$ ) worked for private sector and 155 (14\%) employed by government and quasi-government.

Table 3.2c: Number of manufacturing production workers by institutional sector for 2000-2003

|  | Number |  |  |  |
| :---: | :---: | :---: | :---: | ---: |
| Institutional sector | 2000 | 2001 | 2002 | 2003 |
| 1 Private | 691 | 839 | 895 | 986 |
| 2\&3 Government and quasi-government | 202 | 162 | 155 | 155 |
| Total | 893 | $\mathbf{1 , 0 0 1}$ | $\mathbf{1 0 5 0}$ | $\mathbf{1 1 4 6}$ |

[^5]
### 3.3 Wages and salaries

The average annual weekly wage rate paid to production worker in manufacturing sector has gone up by 2 percent from 71 pa'anga per week in 2002 to 73 pa'anga in 2003

From table 3.3a below, it shows that weekly wage rate of Non-metallic mineral products went down by 14 percent and fabricated metal products, down by 3 percent..
In year 2003, Publishing and Printing and Manufacture of Furniture paid the highest weekly wage rate of just over 100 pa'anga, Non-metallic mineral products, Fabricated metal products,Wood and Products of Wood and Food and Beverages paid over 70 pa'anga .

Table 3.3a: Average weekly wage rate per production worker by ISIC division for 2000-2003


Source: Manufacturing survey, Statistics Dept. Note: ISIC 37 include 17,18, 19,24,28,29,30,31 and 35

Production workers stationed in Tongatapu earned an average weekly wage rate of 73 pa'anga, Vava'u earned 77 pa'anga then Ha'apai and 'Eua ,59 pa'anga.

Table 3.3b: Average weekly wage rate per production worker by Island division for 2000-2003

| Island division |  | $T \$$ |  |  |
| :--- | :--- | :--- | :--- | :--- |
| 1 Tongatapu | $\mathbf{2 0 0 0}$ | $\mathbf{2 0 0 1}$ | $\mathbf{2 0 0 2}$ | $\mathbf{2 0 0 3}$ |
| 2 Vava'u | 68.00 | 76.00 | 74.00 | 73.00 |
| 3\&4 Ha'apai \& 'Eua | 48.00 | 41.00 | 42.00 | 77.00 |
| Total | 63.00 | 42.00 | 53.00 | 59.00 |

Source: Manufacturing survey, Statistics Dept.
By looking at sector level, government and quasi-government paid 79 pa'anga while private production worker earned only 72 pa'anga per week.

Table 3.3c: Average weekly wage rate per production worker by Institutional sector for 2000-2003

| Institutional sector | $\mathbf{2 0 0 0}$ | $\mathbf{2 0 0 1}$ | $\mathbf{2 0 0 2}$ | $\mathbf{2 0 0 3}$ |
| :--- | :--- | :--- | :--- | :--- |
| 1 Private | 63.00 | 69.00 | 66.00 | 72.00 |
| 2\&3 Government and quasi-government | 75.00 | 85.00 | 95.00 | 79.00 |
| Total | $\mathbf{6 6 . 0 0}$ | $\mathbf{7 2 . 0 0}$ | $\mathbf{7 1 . 0 0}$ | $\mathbf{7 3 . 0 0}$ |

Source: Manufacturing survey, Statistics Dept.

## 4.Statistical Tables

Table 4.1: Manufacturing production by ISIC division for 2000-2003

|  | T\$('000) |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| ISIC division | 2000 | 2001 | 2002 | 2003 |
| 15 Food products and beverages | 14,239 | 15,795 | 17,265 | 19,864 |
| 17 Manufacture of textiles | 278 | 346 | 285 | 960 |
| 18 Manufacture of wearing apparel | 250 | 338 | 668 | 354 |
| 19 Manufacture of leather products | 82 | 70 | 0 | 525 |
| 20 Wood and products of wood | 146 | 102 | 42 | 1,119 |
| 22 Publishing and printing | 1,260 | 1,269 | 1,141 | 1,236 |
| 24 Chemicals and chemical products | 4,263 | 2,949 | 4,616 | 1,311 |
| 26 Non-metallic mineral products | 2,536 | 3,190 | 3,462 | 4,113 |
| 28 Fabricated metal products | 1,459 | 1,640 | 1,682 | 3,520 |
| 35 Other transport equipment | 244 | 220 | 236 | 155 |
| 36 Manufacture of furniture | 917 | 1,570 | 1,530 | 1149 |
| 37 Other manufacturing industries | 153 | 142 | 115 | 2,013 |
| Total | 25,827 | 27,631 | 31,037 | 36,319 |

Source: Manufacturing survey, Statistics Dept. Note: ISIC 37 includes 29,30 and 31

Table 4.2: Manufacturing production by Island division for 2000-2003

|  | T\$('000) |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| Island division | 2000 | 2001 | 2002 | 2003 |
| 1 Tongatapu | 22,749 | 26,136 | 28,771 | 27714 |
| 2 Vava'u | 2,776 | 1,226 | 1,841 | 7945 |
| 3\&4 Ha'apai \& 'Eua | 302 | 268 | 425 | 660 |
| Total | 25,827 | 27,631 | 31,037 | 36,319 |

Table 4.3: Manufacturing production by Institutional sector for 2000-2003

|  | T\$('000) |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| Institutional sector | 2000 | 2001 | 2002 | 2003 |
| 1 Private | 24,567 | 26,342 | 29,994 | 34,255 |
| 2\&3 Government and quasi-government | 1,260 | 1,289 | 1,043 | 2,064 |
| Total | 25,827 | 27,631 | 31,037 | 36,319 |

Source: Manufacturing survey, Statistics Dept.

Table 4.4: Percentage distribution of manufacturing production by ISIC division for 2000-2003

| ISIC division | 2000 | 2001 | Percentages |  |
| :---: | :---: | :---: | :---: | :---: |
|  |  |  | 2002 | 2003 |
| 15 Food products and beverages | 55.1 | 57.2 | 55.6 | 55.0 |
| 17 Manufacture of textiles | 1.1 | 1.3 | 1.0 | 2.6 |
| 18 Manufacture of wearing apparel | 1.0 | 1.2 | 2.2 | 1.0 |
| 19 Manufacture of leather products | 0.3 | 0.3 | 0.0 | 1.4 |
| 20 Wood and products of wood | 0.6 | 0.4 | 0.1 | 3.1 |
| 22 Publishing and printing | 4.9 | 4.6 | 4.0 | 3.4 |
| 24 Chemicals and chemical products | 16.5 | 10.7 | 14.9 | 3.6 |
| 26 Non-metallic mineral products | 9.8 | 11.5 | 11.2 | 11.3 |
| 28 Fabricated metal products | 5.6 | 5.9 | 5.4 | 9.6 |
| 35 Other transport equipment | 0.9 | 0.8 | 0.8 | 0.4 |
| 36 Manufacture of furniture | 3.5 | 5.7 | 4.9 | 3.1 |
| 37 Other manufacturing industries | 0.6 | 0.5 | 0.4 | 5.5 |
| Total | 100.0 | 100.0 | 100.0 | 100.0 |

Source: Manufacturing survey, Statistics Dept. Note: ISIC 37 includes 29,30 and 31

Table 4.5: Percentage distribution of manufacturing production by Island division for 2000-2003
Percentages

|  | Island division | $\mathbf{2 0 0 0}$ | $\mathbf{2 0 0 1}$ | $\mathbf{2 0 0 2}$ |
| :--- | ---: | ---: | ---: | ---: |
| 1 Tongatapu | 88.1 | 94.6 | 92.7 | $\mathbf{2 0 0 3}$ |
| 2 Vava'u | 10.7 | 4.4 | 5.9 | 21.9 |
| 3\&4 Ha'apai \& 'Eua | 1.2 | 1.0 | 4.4 | 1.8 |
| Total | $\mathbf{1 0 0 . 0}$ | $\mathbf{1 0 0 . 0}$ | $\mathbf{1 0 0 . 0}$ | $\mathbf{1 0 0 . 0}$ |

Source: Manufacturing survey, Statistics Dept.

Table 4.6: Percentage distribution of manufacturing production by Institutional sector for 2000-2003

|  |  | Percentages |  |  |
| :--- | ---: | ---: | ---: | ---: | ---: |
| Institutional sector | $\mathbf{2 0 0 0}$ | $\mathbf{2 0 0 1}$ | $\mathbf{2 0 0 2}$ | $\mathbf{2 0 0 3}$ |
| 1 Private | 95.1 | 95.3 | 96.6 | 94.3 |
| 2\&3 Government and quasi-government | 4.9 | 4.7 | 3.4 | 5.7 |
| Total | $\mathbf{1 0 0 . 0}$ | $\mathbf{1 0 0 . 0}$ | $\mathbf{1 0 0 . 0}$ | $\mathbf{1 0 0 . 0}$ |

Source: Manufacturing survey, Statistics Dept.

Table 4.7: Average production per establishment by ISIC division for 2000-2003

| T\$('000) |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| ISIC division | 2000 | 2001 | 2002 | 2003 |
| 15 Food products and beverages | 280 | 310 | 287 | 320 |
| 17 Manufacture of textiles | 70 | 90 | 70 | 326 |
| 18 Manufacture of wearing apparel | 20 | 30 | 60 | 25 |
| 19 Manufacture of leather products | 40 | 40 | 0 | 262 |
| 20 Wood and products of wood | 40 | 20 | 10 | 279 |
| 22 Publishing and printing | 420 | 420 | 380 | 309 |
| 24 Chemicals and chemical products | 850 | 740 | 1,150 | 327 |
| 26 Non-metallic mineral products | 320 | 460 | 490 | 457 |
| 28 Fabricated metal products | 210 | 230 | 240 | 502 |
| 35 Other transport equipment | 80 | 70 | 80 | 78 |
| 36 Manufacture of furniture | 60 | 100 | 100 | 72 |
| 37 Other manufacturing industries | 50 | 50 | 30 | 671 |
| Total | 220 | 240 | 252 | 279 |

Source: Manufacturing survey, Statistics Dept. Note: ISIC 37 includes 29,30 and 31

Table4.8: Average production per establishment by Island division for 2000-2003

| Island division | $T \$$ ('000) |  |  |  |
| :--- | ---: | ---: | ---: | ---: |
| 1 Tongatapu | 2000 | 2001 | 2002 | 2003 |
| 2 Vava'u | 280 | 320 | 350 | 315 |
| 3\&4 Ha'apai \& 'Eua | 120 | 60 | 63 | 265 |
| Total | 30 | 20 | 39 | 55 |

Source: Manufacturing survey, Statistics Dept.

Table 4.9: Average production per establishment by Institutional sector for 2000-2003

|  |  |  | T\$('000) |  |
| :---: | :---: | :---: | :---: | :---: |
| Institutional sector | 2000 | 2001 | 2002 | 2003 |
| 1 Private | 230 | 240 | 256 | 275 |
| 2\&3 Government and quasi-government | 180 | 220 | 174 | 412 |
| Total | 220 | 240 | 252 | 279 |

Source: Manufacturing survey, Statistics Dept.

Table 4.10: Average production per production worker by ISIC division for 2000-2003

|  |  |  | T\$('000) |  |
| :---: | :---: | :---: | :---: | :---: |
| ISIC division | 2000 | 2001 | 2002 | 2003 |
| 15 Food products and beverages | 32 | 30 | 28 | 32 |
| 17 Manufacture of textiles | 21 | 19 | 8 | 48 |
| 18 Manufacture of wearing apparel | 10 | 11 | 20 | 10 |
| 19 Manufacture of leather products | 7 | 6 | 0 | 48 |
| 20 Wood and products of wood | 2 | 1 | 1 | 13 |
| 22 Publishing and printing | 12 | 12 | 11 | 12 |
| 24 Chemicals and chemical products | 87 | 113 | 178 | 47 |
| 26 Non-metallic mineral products | 48 | 42 | 57 | 51 |
| 28 Fabricated metal products | 46 | 47 | 49 | 103 |
| 35 Other transport equipment | 17 | 16 | 13 | 17 |
| 36 Manufacture of furniture | 20 | 23 | 20 | 14 |
| 37 Other manufacturing industries | 8 | 8 | 71 | 44 |
| Total | 29 | 27 | 30 | 32 |

Source: Manufacturing survey, Statistics Dept. Note: ISIC 37 includes 29,30 and 31

Table 4.11: Average production per production worker by Island division for 2000-2003

|  | $T \$\left({ }^{\prime} 000\right)$ |  |  |  |
| :--- | ---: | ---: | ---: | ---: |
| I Island division | 2000 | 2001 | 2002 | 2003 |
| 2 Vava'u | 30 | 29 | 33 | 30 |
| 3\&4 Ha'apai \& 'Eua | 30 | 15 | 21 | 47 |
| Total | 8 | 7 | 10 | 17 |

Source: Manufacturing survey, Statistics Dept.

Table 4.12: Average production per production worker by Institutional sector for 2000-2003

|  | $T \$\left({ }^{\prime} 000\right)$ |  |  |  |
| :--- | ---: | ---: | ---: | ---: |
| Institutional sector | 2000 | 2001 | 2002 | 2003 |
| 1 Private | 36 | 31 | 32 | 35 |
| 2\&3 Government and quasi-government | 6 | 8 | 7 | 13 |
| Total | 29 | 27 | 30 | 32 |

[^6]Table 4.13: Manufacturing employment by ISIC division for 2000-2003

|  |  |  | Number |  |
| :---: | :---: | :---: | :---: | :---: |
| ISIC division | 2000 | 2001 | 2002 | 2003 |
| 15 Food products and beverages | 595 | 656 | 704 | 761 |
| 17 Manufacture of textiles | 23 | 23 | 40 | 25 |
| 18 Manufacture of wearing apparel | 49 | 49 | 55 | 60 |
| 19 Manufacture of leather products | 14 | 14 | 14 | 14 |
| 20 Wood and products of wood | 84 | 80 | 77 | 87 |
| 22 Publishing and printing | 114 | 109 | 109 | 108 |
| 24 Chemicals and chemical products | 58 | 31 | 29 | 31 |
| 26 Non-metallic mineral products | 76 | 71 | 70 | 87 |
| 28 Fabricated metal products | 36 | 37 | 37 | 36 |
| 35 Other transport equipment | 19 | 15 | 19 | 12 |
| 36 Manufacture of furniture | 87 | 83 | 90 | 102 |
| 37 Other manufacturing industries | 20 | 20 | 14 | 52 |
| Total | 1,175 | 1,188 | 1258 | 1375 |

Source: Manufacturing survey, Statistics Dept. Note: ISIC 37 includes 29,30 and 31

Table 4.14: Manufacturing employment by Island division for 2000-2003

|  |  | Number |  |  |
| :--- | ---: | ---: | ---: | ---: |
|  | Island division | $\mathbf{2 0 0 0}$ | $\mathbf{2 0 0 1}$ | $\mathbf{2 0 0 2}$ |
| 1 Tongatapu | 957 | 990 | 1,013 | 1104 |
| 2 Vava'u | 135 | 121 | 165 | 219 |
| 3\&4 Ha'apai \& 'Eua | 83 | 77 | 80 | 52 |
| Total | $\mathbf{1 , 1 7 5}$ | $\mathbf{1 , 1 8 8}$ | $\mathbf{1 , 2 5 8}$ | $\mathbf{1 3 7 5}$ |

Source: Manufacturing survey, Statistics Dept.

Table 4.15: Manufacturing employment by Institutional sector for 2000-2003

|  |  |  | Number |  |
| :---: | :---: | :---: | :---: | :---: |
| Institutional sector | 2000 | 2001 | 2002 | 2003 |
| 1 Private | 967 | 1,029 | 1103 | 1215 |
| 2\&3 Government and quasi-government | 208 | 159 | 155 | 160 |
| Total | 1,175 | 1,188 | 1,258 | 1375 |

Source: Manufacturing survey, Statistics Dept.

Table 4.16: Percentage distribution of manufacturing employment by ISIC division for 2000-2003

|  | Percentage |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| ISIC division | 2000 | 2001 | 2002 | 2003 |
| 15 Food products and beverages | 50.6 | 55.2 | 55.9 | 55.3 |
| 17 Manufacture of textiles | 2.0 | 1.9 | 3.3 | 1.8 |
| 18 Manufacture of wearing apparel | 4.2 | 4.1 | 4.5 | 4.3 |
| 19 Manufacture of leather products | 1.2 | 1.2 | 1.1 | 1.0 |
| 20 Wood and products of wood | 7.1 | 6.7 | 6.3 | 6.3 |
| 22 Publishing and printing | 9.7 | 9.2 | 8.9 | 7.9 |
| 24 Chemicals and chemical products | 4.9 | 2.6 | 2.4 | 2.3 |
| 26 Non-metallic mineral products | 6.5 | 6.0 | 5.7 | 6.3 |
| 28 Fabricated metal products | 3.1 | 3.1 | 3.0 | 2.6 |
| 35 Other transport equipment | 1.6 | 1.3 | 1.6 | 1.0 |
| 36 Manufacture of furniture | 7.4 | 7.0 | 7.4 | 7.4 |
| 37 Other manufacturing industries | 1.7 | 1.7 | 1.1 | 3.7 |
| Total | 100.0 | 100.0 | 100.0 | 100.0 |

Source: Manufacturing survey, Statistics Dept. Note: ISIC 37 includes 29,30 and 31

Table 4.17: Percentage distribution of manufacturing employment by Island division for 2000-2003

|  | Percentages |  |  |  |  |
| :--- | ---: | ---: | ---: | ---: | ---: |
|  | Island division | $\mathbf{2 0 0 0}$ | $\mathbf{2 0 0 1}$ | $\mathbf{2 0 0 2}$ | $\mathbf{2 0 0 3}$ |
| 1 Tongatapu | 81.4 | 83.3 | 80.5 | 80.3 |  |
| 2 Vava'u | 11.5 | 10.2 | 13.1 | 15.9 |  |
| 3\&4 Ha'apai \& 'Eua | 7.1 | 6.5 | 6.3 | 3.8 |  |
|  |  | $\mathbf{1 0 0 . 0}$ | $\mathbf{1 0 0 . 0}$ | $\mathbf{1 0 0 . 0}$ | $\mathbf{1 0 0 . 0}$ |

Source: Manufacturing survey, Statistics Dept.

Table 4.18: Percentage distribution of manufacturing employment by Institutional sector for 2000-2003

|  | Percentage |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| Institutional sector | 2000 | 2001 | 2002 | 2003 |
| 1 Private | 82.3 | 86.6 | 87.8 | 88.4 |
| 2\&3 Government and quasi-government | 17.7 | 13.4 | 12.2 | 11.6 |
| Total | 100.0 | 100.0 | 100.0 | 100.0 |

Source: Manufacturing survey, Statistics Dept.

Table 4.19: Number of manufacturing production workers by ISIC division for 2000-2003
Number

| ISIC division | 2000 | 2001 | 2002 | 2003 |
| :--- | ---: | ---: | ---: | ---: |
| 15 Food products and beverages | 441 | 519 | 580 | 621 |
| 17 Manufacture of textiles | 13 | 19 | 35 | 20 |
| $\mathbf{1 8}$ Manufacture of wearing apparel | 25 | 32 | 34 | 37 |
| 19 Manufacture of leather products | 11 | 11 | 11 | 11 |
| 20 Wood and products of wood | 84 | 83 | 60 | 87 |
| 22 Publishing and printing | 105 | 106 | 106 | 103 |
| 24 Chemicals and chemical products | 49 | 26 | 26 | 28 |
| 26 Non-metallic mineral products | 53 | 70 | 61 | 80 |
| 28 Fabricated metal products | 32 | 35 | 34 | 34 |
| 35 Other transport equipment | 14 | 14 | 18 | 11 |
| 36 Manufature of furniture | 47 | 68 | 75 | 80 |
| 37 Other manufacturing industries | 19 | 18 | 10 | 38 |
| $\boldsymbol{y}$ Total | 893 | 1,001 | 1,050 | 1146 |

Source: Manufacturing survey, Statistics Dept. Note: ISIC 37 includes 29,30 and 31

Table 4.20: Number of manufacturing production workers by Island division for 2000-2003 Number

|  | Number |  |  |  |  |
| :--- | ---: | ---: | ---: | ---: | :---: |
| Island division | 2000 | 2001 | 2002 | 2003 |  |
| 1 Tongatapu | 762 | 879 | 922 | 937 |  |
| 2 Vava'u | 93 | 81 | 86 | 170 |  |
| 3\&4 Ha'apai \& 'Eua | 38 | 41 | 42 | 39 |  |
| Total | 893 | 1,001 | 1,050 | 1146 |  |

Table 4.21: Number of manufacturing production workers by Institutional sector for 2000-2003
Number

| Institutional sector | 2000 | 2001 | 2002 | 2003 |
| :--- | ---: | ---: | ---: | ---: |
| 1 Private | 691 | 839 | 895 | 991 |
| $\mathbf{2 \& 3}$ Government and quasi-government | 202 | 162 | 155 | 155 |
| Total | 893 | 1,001 | 1,050 | 1146 |

Table 4.22: Manufacturing wages and salaries by ISIC division for 2000-2003

|  |  |  | T\$('000) |  |
| :---: | :---: | :---: | :---: | :---: |
| ISIC division | 2000 | 2001 | 2002 | 2003 |
| 15 Food products and beverages | 1,682 | 2,238 | 2,511 | 2804 |
| 17 Manufacture of textiles | 51 | 57 | 114 | 101 |
| 18 Manufacture of wearing apparel | 115 | 109 | 142 | 178 |
| 19 Manufacture of leather products | 42 | 44 | 44 | 44 |
| 20 Wood and products of wood | 279 | 230 | 274 | 225 |
| 22 Publishing and printing | 609 | 642 | 648 | 610 |
| 24 Chemicals and chemical products | 163 | 128 | 132 | 154 |
| 26 Non-metallic mineral products | 381 | 342 | 337 | 347 |
| 28 Fabricated metal products | 134 | 172 | 144 | 140 |
| 35 Other transport equipment | 65 | 52 | 54 | 73 |
| 36 Manufacture of furniture | 414 | 490 | 390 | 555 |
| 37 Other manufacturing industries | 96 | 100 | 66 | 123 |
| Total | 4,031 | 4,604 | 4,857 | 5354 |

Source: Manufacturing survey, Statistics Dept. Note: ISIC 37 includes 29,30 and 31

Table 4.23: Manufacturing wages and salaries by Island division for 2000-2003

|  |  |  | T\$(‘000) |  |
| :---: | :---: | :---: | :---: | :---: |
| Island division | 2000 | 2001 | 2002 | 2003 |
| 1 Tongatapu | 3,616 | 4,253 | 4,225 | 4461 |
| 2 Vava'u | 283 | 257 | 295 | 772 |
| 3\&4 Ha'apai \& 'Eua | 133 | 95 | 121 | 121 |
| Total | 4,031 | 4,604 | 4,857 | 5354 |

Source: Manufacturing survey, Statistics Dept.

Table 4.24: Manufacturing wages and salaries by Institutional sector for 2000-2003

| Institutional sector | $T \$\left({ }^{\prime} 000\right)$ |  |  |  |  |  |
| :--- | ---: | ---: | ---: | ---: | :---: | :---: |
| 1 Private | $\mathbf{2 0 0 0}$ | $\mathbf{2 0 0 1}$ | $\mathbf{2 0 0 2}$ | $\mathbf{2 0 0 3}$ |  |  |
| 2\&3 Government and quasi-government | 3,196 | 3,886 | 3,879 | 4689 |  |  |
| Total | 835 | 719 | 763 | 665 |  |  |

Source: Manufacturing survey, Statistics Dept.

Table 4.25: Percentage distribution of manufacturing wages and salaries by ISIC division for 2000-2003
Percentages

| ISIC division | 2000 | 2001 | 2002 | 2003 |
| :---: | :---: | :---: | :---: | :---: |
| 15 Food products and beverages | 41.7 | 48.6 | 52.0 | 52.4 |
| 17 Manufacture of textiles | 1.3 | 1.2 | 2.5 | 1.9 |
| 18 Manufacture of wearing apparel | 2.9 | 2.4 | 3.1 | 3.3 |
| 19 Manufacture of leather products | 1.0 | 1.0 | 0.9 | 0.8 |
| 20 Wood and products of wood | 6.9 | 5.0 | 5.9 | 4.2 |
| 22 Publishing and printing | 15.1 | 14.0 | 14.0 | 11.4 |
| 24 Chemicals and chemical products | 4.0 | 2.8 | 2.8 | 2.9 |
| 26 Non-metallic mineral products | 9.4 | 7.4 | 7.3 | 6.5 |
| 28 Fabricated metal products | 3.3 | 3.7 | 3.1 | 2.6 |
| 35 Other transport equipment | 1.6 | 1.1 | 1.2 | 1.4 |
| 36 Manufacture of furniture | 10.3 | 10.6 | 8.4 | 10.4 |
| 37 Other manufacturing industries | 2.4 | 2.2 | 1.4 | 2.2 |
| Total | 100.0 | 100.0 | 100.0 | 100.0 |

Source: Manufacturing survey, Statistics Dept. Note: ISIC 37 includes 29,30 and 31

Table 4.26: Percentage distribution of manufacturing wages and salaries by Island division for 2000-2003

|  | Percentages |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| Island division | 2000 | 2001 | 2002 | 2003 |
| 1 Tongatapu | 89.7 | 92.4 | 91.0 | 83.3 |
| 2 Vava'u | 7.0 | 5.6 | 6.4 | 14.4 |
| 3\&4 Ha'apai \& 'Eua | 3.3 | 2.1 | 2.6 | 2.3 |
| Total | 100.0 | 100.0 | 100.0 | 100.0 |

Source: Manufacturing survey, Statistics Dept.

Table 4.27: Percentage distribution of manufacturing wages and salaries by Institutional sector for 2000-2003

| Institutional sector | $\mathbf{2 0 0 0}$ | $\mathbf{2 0 0 1}$ | $\mathbf{2 0 0 2}$ | $\mathbf{2 0 0 3}$ |
| :--- | ---: | ---: | ---: | ---: | ---: |
| 1 Private | 79.3 | 84.4 | 83.6 | 87.6 |
| 2\&3 Government and quasi-government | 20.7 | 15.6 | 16.4 | 12.4 |
| Total | $\mathbf{1 0 0 . 0}$ | $\mathbf{1 0 0 . 0}$ | $\mathbf{1 0 0 . 0}$ | $\mathbf{1 0 0 . 0}$ |

[^7]Table 4.28: Wages and salaries of production workers by ISIC division for 2000-2003

|  |  | T\$('000) |  |  |
| :---: | :---: | :---: | :---: | :---: |
| ISIC division | 2000 | 2001 | 2002 | 2003 |
| 15 Food products and beverages | 1,252 | 1,739 | 1,986 | 2,309 |
| 17 Manufacture of textiles | 34 | 57 | 114 | 79 |
| 18 Manufacture of wearing apparel | 65 | 79 | 88 | 113 |
| 19 Manufacture of leather products | 16 | 17 | 17 | 17 |
| 20 Wood and products of wood | 279 | 230 | 274 | 225 |
| 22 Publishing and printing | 541 | 588 | 593 | 548 |
| 24 Chemicals and chemical products | 98 | 68 | 75 | 80 |
| 26 Non-metallic mineral products | 285 | 339 | 277 | 308 |
| 28 Fabricated metal products | 125 | 155 | 134 | 130 |
| 35 Other transport equipment | 53 | 49 | 51 | 58 |
| 36 Manufacture of furniture | 242 | 347 | 288 | 425 |
| 37 Other manufacturing industries | 69 | 74 | 27 | 70 |
| Total | 3,059 | 3,742 | 3,924 | 4,362 |

Source: Manufacturing survey, Statistics Dept. Note: ISIC 37 includes 29,30 and 31

Table 4.29: Wages and salaries of production workers by Island division for 2000-2003

|  | T\$('000) |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| Island division | 2000 | 2001 | 2002 | 2003 |
| 1 Tongatapu | 2,702 | 3,478 | 3,620 | 3,558 |
| 2 Vava'u | 232 | 175 | 188 | 683 |
| 3\&4 Ha'apai \& 'Eua | 124 | 89 | 116 | 121 |
| Total | 3,059 | 3,742 | 3,924 | 4,362 |

Source: Manufacturing survey, Statistics Dept.

Table 4.30: Wages and salaries of production workers by Institutional sector for 2000-2003

| Institutional sector |  | $T \$\left({ }^{\prime} 000\right)$ |  |  |
| :--- | ---: | ---: | ---: | ---: | ---: |
| 1 Private | $\mathbf{2 0 0 0}$ | $\mathbf{2 0 0 1}$ | $\mathbf{2 0 0 2}$ | $\mathbf{2 0 0 3}$ |
| 2\&3 Government and quasi-government | 2,270 | 3,023 | 3,161 | 3,697 |
| Total | 789 | 719 | 763 | 665 |

Source: Manufacturing survey, Statistics Dept.

Table 4.31: Average weekly wage rate for production worker by ISIC division 2000-2003

|  |  |  | T\$ |  |
| :---: | :---: | :---: | :---: | :---: |
| ISIC division | 2000 | 2001 | 2002 | 2003 |
| 15 Food products and beverages | 55 | 64 | 62 | 72 |
| 17 Manufacture of textiles | 51 | 58 | 63 | 76 |
| 18 Manufacture of wearing apparel | 50 | 48 | 50 | 59 |
| 19 Manufacture of leather products | 27 | 29 | 30 | 30 |
| 20 Wood and products of wood | 64 | 53 | 88 | 103 |
| 22 Publishing and printing | 99 | 107 | 108 | 102 |
| 24 Chemicals and chemical products | 38 | 50 | 55 | 55 |
| 26 Non-metallic mineral products | 103 | 93 | 87 | 74 |
| 28 Fabricated metal products | 75 | 85 | 76 | 73 |
| 35 Other transport equipment | 73 | 67 | 54 | 101 |
| 36 Manufacture of furniture | 99 | 98 | 74 | 102 |
| 37 Other manufacturing industries | 70 | 79 | 51 | 30 |
| Total | 66 | 72 | 71 | 73 |

Source: Manufacturing survey, Statistics Dept. Note: ISIC 37 includes 29,30 and 31.

Table 4.32: Average weekly wage rate for production worker by Island division 2000-2003

|  | Tsland division | $\mathbf{2 0 0 0}$ | $\mathbf{2 0 0 1}$ | $\mathbf{2 0 0 2}$ |
| :--- | ---: | ---: | ---: | ---: |
| 1 Tongatapu | 68 | 76 | 75 | 75 |
| 2 Vava'u | 48 | 41 | 60 | 60 |
| 3\&4 Ha'apai \& 'Eua | 63 | 42 | 53 | 53 |
| Total | 66 | 72 | 71 | 73 |

Source: Manufacturing survey, Statistics Dept.

Table 4.33: Average weekly wage rate for production worker by Institutional sector 2000-2003

| Institutional sector | $\mathbf{2 0 0 0}$ | $\mathbf{2 0 0 1}$ | $\mathbf{2 0 0 2}$ | $\mathbf{2 0 0 3}$ |
| :--- | ---: | ---: | ---: | ---: | ---: |
| $\mathbf{1}$ Private | 63 | 69 | 67 | 68 |
| $\mathbf{2 \& 3}$ Government and quasi-government | 75 | 85 | 95 | 95 |
| Total | 66 | 72 | 71 | 73 |

[^8]Table 4.34: Number of manufacturing establishments by ISIC division for 2000-2003

|  |  |  | Number |  |
| :---: | :---: | :---: | :---: | :---: |
| ISIC division | 2000 | 2001 | 2002 | 2003 |
| 15 Food products and beverages | 50 | 51 | 60 | 62 |
| 17 Manufacture of textiles | 4 | 4 | 4 | 3 |
| 18 Manufacture of wearing apparel | 10 | 11 | 12 | 14 |
| 19 Manufacture of leather products | 2 | 2 | 2 | 2 |
| 20 Wood and products of wood | 4 | 4 | 4 | 4 |
| 22 Publishing and printing | 3 | 3 | 3 | 4 |
| 24 Chemicals and chemical products | 5 | 4 | 4 | 4 |
| 26 Non-metallic mineral products | 8 | 7 | 7 | 9 |
| 28 Fabricated metal products | 7 | 7 | 7 | 7 |
| 35 Other transport equipment | 3 | 3 | 3 | 2 |
| 36 Manufacture of furniture | 16 | 16 | 15 | 16 |
| 37 Other manufacturing industries | 3 | 3 | 2 | 3 |
| Total | 115 | 115 | 123 | 130 |

Source: Manufacturing survey, Statistics Dept. Note: ISIC 37 includes 29,30 and 31

Table 4.35: Number of manufacturing establishments by Island division for 2000-2003

|  | Number |  |  |  |  |
| :--- | ---: | ---: | ---: | ---: | :---: |
| I Tongatapu | $\mathbf{2 0 0 0}$ | $\mathbf{2 0 0 1}$ | $\mathbf{2 0 0 2}$ | $\mathbf{2 0 0 3}$ |  |
| 2 Vava'u | 82 | 82 | 82 | 88 |  |
| 3\&4 Ha'apai \& 'Eua | 23 | 22 | 30 | 30 |  |
| Total | 10 | 11 | 11 | 12 |  |

Source: Manufacturing survey, Statistics Dept.

Table 4.36: Number of manufacturing establishments by Institutional sector for 2000-2003

| Institutional sector | 2000 | 2001 | 2002 | 2003 |
| :--- | ---: | ---: | ---: | ---: | ---: |
| 1 Private | 108 | 109 | 117 | 125 |
| 2\&3 Government and quasi-government | 7 | 6 | 6 | 5 |
| Total | 115 | 115 | 123 | 130 |

Source: Manufacturing survey, Statistics Dept.

## Statistics Department

CONFIDENTIAL
QUARTERLY SURVEY OF MANUFACTURING PRODUCTION, EMPLOYMENT AND WAGES/SALARIES "INFORMATION BEING COLLECTED UNDER SECTION 8(3) OF StATIStICS ACT 1978 (ACT No. 31)"

of Establishment $\qquad$
2. PRODUCTION
2.1 Main Products
a.
b.
c.
d.
2.2 Other than main products
2.3 Receipts for work done for others

TOTAL

|  | QUARTER: |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Month: |  | Month: |  | Month: |  |
| (Office <br> Use) | Of <br> Measurement | Quantity | (T\$) Value | Quantity | (T\$) <br> Value | Quantity | (T\$) <br> Value |
|  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |

Comments: $\qquad$
3. EMPLOYMENT AND WAGES/SALARIES
3.1 Category of Employees:
a. Working Proprietors and Active Partners
b. Production Workers

1. Regular/Full-time
2. Part-time/Casual/Daily Paid
c. Unpaid Family Workers
d. All Other Employees

## Total Male

## Total Female

## GRAND TOTAL

3.2 Memorandum item: Wages and Salaries

Paid in kind; estimated value

| QUARTER: January-March |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Month: |  |  | Month: |  |  | Month: |  |  |
| Sex | No. | Wages \& Salaries <br> Paid (T\$) | Sex | No. |  <br> Salaries <br> Paid (T\$) | Sex | No. |  <br> Salaries <br> Paid (T\$) |
| 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 |
| $M$ |  |  | M |  |  | M |  |  |
| F |  |  | $F$ |  |  | $F$ |  |  |
| M |  |  | M |  |  | M |  |  |
| F |  |  | F |  |  | F |  |  |
| M |  |  | M |  |  | M |  |  |
| F |  |  | F |  |  | F |  |  |
| $M$ |  |  | M |  |  | $M$ |  |  |
| $F$ |  |  | $F$ |  |  | $F$ |  |  |
| M |  |  | M |  |  | M |  |  |
| F |  |  | F |  |  | F |  |  |
| $M$ |  |  | M |  |  | M |  |  |
| F |  |  | $F$ |  |  | $F$ |  |  |
| No. |  |  | No. |  |  | No. |  |  |
|  | (T\$) |  |  | (T\$) |  |  | (T\$) |  |

## 4. DECLARATION:

"I declare that the information furnished is complete and correct to the best of my knowledge."

## Name:

## Position:

$\qquad$

## INSTRUCTIONS FOR COMPLETING THE QUESTIONNAIRE ON QUARTERLY SURVEY OF MANUFACTURING PRODUCTION, EMPLOYMENT AND WAGES/SALARIES.

## 1. GENERAL

Please note that the code number on the right hand corner of the questionnaire is your establishment's code number based on the Register of Establishments maintained in the Statistics Department. The information, being requested should relate only to the quarter referred to in the questionnaire.

## 2. PRODUCTION

2.1 Please enter all the products produced by the establishment and for each such product please: -
i) Specify the unit used for measuring each product (e.g. kg, dozen, litre etc.)
ii) Enter the average quantity, in the unit stated in (I) above, of the products produced during each month of the reference quarter.
iii) Enter the average ex-factory value of the quantity referred to in (II) above.
2.2 Enter here the total value of the products other than the main ones mentioned in 2.1 manufactured by the establishment.
2.3 Enter here the total value of work done by your establishment for others.

## 3. EMPLOYMENT AND WAGES/SALARIES

## For each category of employees (at 3.1 a to d) please: -

i) Enter in the column "No" either column 2,5 and 8 the total number of persons engaged in the establishment on the last payday of each month of the reference quarter. The family workers working on the last payday should be entered though they may not be paid.
ii) Enter in column "Wages/Salaries Paid" either column 3, 6 and 9 the total amount of wages and salaries paid to employees by cash/cheque as compensation for the services rendered by them. This should include all payments made on account of bonuses, cost of living allowances and wages paid during vacation and sick leave for the reference period. Payments made to (1) regular/full-time and (2) part-time/casual and daily paid workers should be shown separately.

### 3.1 Category of Employees: -

a) Working proprietors and active partners: are all individual proprietors and partners who are actively engaged in the work of the establishment.
b) Production workers: are those who are directly engaged for pay in the production activities of the establishment. They may be full-time/regular or part-time/casual/daily paid.
c) Unpaid family workers: refers to all such family members working in the establishment without regular pay at least onethird of the normal working time.
d) Other employees: refers to all persons other than those listed above working in the establishment. This shall include administrative, technical and clerical personnel such as salaried Managers, Directors, Clerks, Typist, Bookkeepers, Administrative Supervisors, Salesmen, etc. Proprietors and partners shall be excluded in here but included under 3.1(a) above.
3.2 Memorandum items: (wages and salaries paid in kind) refers to the net cost to the employer, of those goods and services provided to employees free of charge or at a markedly reduced cost which are clearly of benefit to employees. The items included normally are food, beverages, tobacco, clothing etc. Note that an estimated value of these items will be acceptable.

# NGAAHI FAKAHINOHINO 'O E FOOMU FEHU'I FEKAU'AKI MO E SAVEA FAKAKUATA 'O E NGAAHI NGAUE'ANGA NGAOHI KOLOA. 

## 1. FAKALUKUFUA

Kataki 'o fakatokanga'i ange ko e fika mo e fakamatala kotoa pe teke 'omai 'e tauhi fakapulipuli ia 'i he potungaue pea 'e 'ikai ke to e faka'aonga'i ia ki ha 'uhinga kehe. Ko e fika ko ia he ki'i puha he tuliki to'omata'u 'i 'olunga, ko e fika ia ho fale ngaue'anga 'o fakatatau ki he lekooti 'oku mau tauhi he potungaue ni. Ko e ngaahi fakamatala mo e fika kotoa pe 'a ia 'oku fai ki ai e faka'eke'eke ni kuo pau ke fekau'aki ia mo e kuata 'oku fakaha atu he foomu fehu'i.

## 2. KOLOA NA'E NGAOHI

2.1 Kataki 'o lisi mai e ngaahi koloa kehekehe kotoa pe na'e ngaohi 'i ho fale ngaue lolotonga e kuata ko ia 'oku fai ki ai e faka'eke'eke pea kataki 'o: -
I) Fokotu'u mai he kolomu 2 'a e 'iuniti takitaha 'oku ngaue'aki ki hono fua/lau 'o e koloa takitaha na'e ngaohi 'i he ngaue'anga, (hange ko e kilokalami, toseni, lita etc.)
II) Fakafonu mai he kolomu 3, 5 mo e 7 'a e lahi 'o e koloa takitaha fakatatau ki he 'iuniti 'oku ha 'i he I) 'i 'olunga na'e ngaohi 'i he ngaue'anga lolotonga e mahina takitaha 'o e kuata 'oku fai ki ai e faka'eke'eke.
III) Fakafonu 'i he kolomu 4, 6 mo e 8 'a e mahu'inga e koloa takitaha na'e ngaohi 'i he ngaue'anga fakatatau ki he lahi 'oku ha 'i he II) 'i 'olunga lolotonga e mahina takitaha 'o e kuata ko ia.
2.2 Fakafonu mai e mahu'inga fakakatoa e ngaahi koloa na'e ngaohi kehe mei he koloa 'oku ha 'i he 2.1.
2.3 Fakafonu e mahu'inga fakakatoa e pa'anga na'e ma'u mai 'i ha ngaue kehe na'e fai 'i he ngaue' anga (hange ko e ngaue konituleki).

## 3. KAU NGAUE MO E VAHENGA

## 'I hono fakakalakalasi 'o e kau ngaue ('i he 3.1 (a ki he h)) kataki: -

i) Hanga 'o fakafonu ange 'i he kolomu 2, 5 mo e 8 'a e tokolahi fakakatoa e kau ngaue he mahina takitaha 'o e kulupu takitaha 'o e kau ngaue 'o fakatatau ki hono fakakalakalasi 'oku ha atu.
ii) Fakafonu ange he kolomu 3, 6 mo e 9 'a e fakakatoa e pa'anga vahenga ne 'oange ki he kulupu takitaha 'o e kau ngaue lolotonga e mahina takitaha 'o e kuata.

### 3.1 Kulupu '0 e kau ngaue: -

a) Tokotaha 'oku 'o'ona e ngaue'ang: 'oku 'uhinga 'eni ki he tokotaha 'oku 'o'ona e ngaue'anga pea ne toe ngaue foki ki hono ngaohi e koloa.
e) Kau ngaue 'oku nau ngaohi e koloa: 'oku 'uhinga eni ki he kau ngaue 'oku nau tautonu ki hono ngaohi e koloa ko ia 'i he ngaue'anga, hange ko e kau ngaue tu'upau/fakataimi/lau'aho (kau ta'oma, kau ta piliki etc.)
f) Memipa 'o e famili 'oku ngaue 'o 'ikai ha vahenga: 'oku 'uhinga 'eni ki ha memipa 'o e famili 'oku ngaue 'i he ngaue'anga 'o 'ikai ha totongi tu'upau 'o 'ikai toe si'i hifo 'i he vahetolu 'e taha 'o e houa ngaue tu'upau.
h) Toenga 'o e kau ngaue: 'oku 'uhinga 'eni ki he kau ngaue 'oku 'ikai ke nau kau 'i he fa'ahinga 'o e kau ngaue 'oku ha atu 'i 'olunga, ki hono ngaohi 'o e koloa, (hange ko e kalake, tauhitohi, le'o, faka'uli, faitaipe etc.) ka 'oku nau kau he ma'u vahenga he ngaue'anga.
3.2 Ngaahi koloa 'oku foaki 'ikai ha totongi: 'oku 'uhinga 'eni ki hono fakamahu'inga'i ki he tokotaha ‘oku 'a'ana 'a e ngaue'anga 'a e ngaahi koloa pe ko e ngaahi 'aonga 'o e ngaue'anga ki he kau ngaue 'o 'ikai ha totongi pe ko e totongi 'oku ma'ulalo ange 'i he totongi totonu (lau ki ai 'a e me'atokoni, inu, tapaka mo e vala).


[^0]:    Mr. ‘Ata’ata M Finau
    Government Statistician

[^1]:    Source: Manufacturing survey, Statistics Dept.

[^2]:    Source: Manufacturing survey, Statistics Dept.

[^3]:    Source: Manufacturing survey, Statistics Dept.

[^4]:    Source: Manufacturing survey, Statistics Dept.

[^5]:    Source: Manufacturing survey, Statistics Dept.

[^6]:    Source: Manufacturing survey, Statistics Dept.

[^7]:    Source: Manufacturing survey, Statistics Dept.

[^8]:    Source: Manufacturing survey, Statistics Dept.

