

Social and Spiritual Development Strand  
Social Science

Unit 5: Economic Development

## **Module 5.3: Employment and Production**



**Lecturer Support Material**

## Acknowledgements

Materials written and compiled by Sue Lauer (PASTEP adviser)

Layout and diagrams supported by Nick Lauer

Date: 5 July 2002



### *Primary and Secondary Teacher Education Project*

Australian Agency for International Development (AusAID)  
GRM International

*Papua New Guinea-Australia Development Cooperation Program*

## Unit outline

Unit	#	Modules
<b>Unit 5</b>  <b>Economic Development</b>	5.1	Managing the Economy (Core)
	5.2	Trade and Development (Core)
	5.3	Employment and Production (Optional)
	5.4	The Finance Industry (Optional)

## Icons



Read or research



Write or summarise



Activity or discussion



Suggestion for lecturer

## Table of contents

<b>Module 5.3: Employment and Production .....</b>	<b>1</b>
<i>Rationale.....</i>	<i>1</i>
<i>Objectives .....</i>	<i>1</i>
Teaching Module 5.3.....	1
<b>Section 1 – Employment.....</b>	<b>3</b>
Topic 1 - Employment.....	3
<i>Unemployment.....</i>	<i>5</i>
Topic 2 - Income .....	6
<i>Personal income .....</i>	<i>7</i>
<i>Economic growth.....</i>	<i>7</i>
Topic 3 - Business.....	9
<i>Types of businesses .....</i>	<i>9</i>
<i>Regulation of business by government .....</i>	<i>10</i>
<b>Section 2 – Production.....</b>	<b>11</b>
Topic 4 - Production.....	11
<i>The factory system .....</i>	<i>12</i>
Topic 5 – Marketing .....	13
<i>Identifying the market.....</i>	<i>13</i>
<i>Product cycles .....</i>	<i>14</i>
<i>Branding .....</i>	<i>15</i>
<i>Pricing.....</i>	<i>16</i>
<i>Promotion and distribution.....</i>	<i>18</i>
<i>Packaging.....</i>	<i>21</i>
<i>The marketing profession .....</i>	<i>21</i>
Topic 6 - Consumer rights and decisions .....	22
<b>Section 3 - Services .....</b>	<b>23</b>
<b>References .....</b>	<b>24</b>

# Module 5.3: Employment and Production

## Rationale

How people earn an income and what they do with that income, has major implications for the economy and society of a country. PNG's economy is dual in nature with a formal sector comprising workers employed in mineral production, manufacturing, retail, and public service industries. The majority of the population is engaged in the informal sector, although migration to major city centres in the past decade has contributed to urban unemployment and various social problems. The content and activities in this module will provide pre-service teachers with a strong background for teaching topics in primary school subjects such Social Science, Community Living and Making a Living.

## Objectives

At the completion of this module students should have acquired knowledge and understanding about:

- The nature of business and production and their role in society
- Types of business structures
- The operation and organisation of businesses
- The impact of internal and external factors on employment and production
- The role of marketing

## ***Teaching Module 5.3***

The strategies and activities outlined below may be substituted for any included in the module. The main emphasis in the teaching of each topic is to include a range of activities and to develop skills which will be useful for beginning teachers in their own classrooms.

 An important resource for this module is the daily newspapers. (These can often be obtained for free at the end of each week from your local Post Courier or The National office.

Other particularly useful resources include the PNG Year Book, PNG Primary and Secondary School Atlases, census data and the national Population Policy 2000-2010. Details of these books are found in the reference section.

- Collect newspaper files on various topics such trade unions, employment projects, job advertisements.
- Conduct surveys of employment opportunities in the local region
- Describe the jobs done by members of your family

- Survey the industries and factories that exist in the local region
- Interview local government representatives about employment and production plans for the region
- Find out what local politicians are doing about job creation

**i** In this and the other Unit 5 modules, a number of words and phrases are highlighted in bold print. It is essential that students understand the meaning of these terms. Definitions can be found in dictionaries, encyclopedias, commerce or economics textbooks and within the modules. Most of the terms are listed below. It would be a valuable task to have students compile an economics dictionary, and to translate some of the basic terms into the vernacular for use in primary classes.

Balance of payments	borrowings	Monetary policy
Balance of trade	liability	Fiscal policy
Commerce	Revenue	Multinational
Company tax	tariff	Industrialisation
Economics	Monopoly	Credit
Entrepreneur	Trusts	Currency
Gross national product	Multilateral aid	company
Limited liability	Sole trader	Profit margin
Macroeconomics	Cartel	Loan
Mercantalism	Merger	Market forces
Microeconomics	Commodity	Foreign exchange
Mixed economy	Bilateral aid	Cash economy
Privatisation	Tied aid	Currency fluctuation
Value added tax (VAT)	Disposable income	

**i** Your *Additional Resource Material* pack includes extra material that may be copied for student use or classroom displays. Check the pack before commencing each section or topic to see what material might be useful. You can collect similar resources to add to your Unit 5 resource file.

## Section 1 – Employment

**i** This module has many links with modules in Unit 1, particularly topics related to industry and resource use and management. It is recommended that pre-service teachers be given every opportunity, through research and investigation, to acquire detailed knowledge about employment and business prospects in their local communities.

### **Topic 1 - Employment**

PNG's economy is dual in nature, including a **formal sector** and a large **informal sector** where subsistence farming accounts for most of the economic activity. The formal sector consists of workers employed in mineral production, manufacturing, retail, public sector employees and service industries including finance, construction, transportation and utilities. The majority of the population is engaged in the informal sector, although migration to major city centres in the past decade has contributed to urban unemployment and various social problems.



*Market sellers – billums (Ela Beach)*



*Market sellers – vegetables (Kokopo)*

**i** There are many statistics quoted in this section. These provide an opportunity to integrate what has been learned in Mathematics with practical applications in real life situations. Interpreting the statistics also provides opportunities to apply skills in creating and interpreting graphs and tables.

According to the 1990 National Census, citizens involved in wage employment increased from 183,000 to 232,000 between 1980 and 1990 although wage earners, as a percentage of the total population, remained constant at 9.2 percent. Of those formally employed in 1995, approximately 26 percent were public servants, 3 percent were employed in the mineral sector while the remaining 72 percent were employed in the non-mineral private sector. After the recession of the early 1980's, formal private sector employment increased steadily until 1989.

Since then it has fluctuated with the 1997 level of employment little changed from the level recorded in 1989. On average, approximately 2,000 new jobs are created each year.

---

---

### 5.3 Activity 1

*Construct a column graph (or pie graph) using the figures quoted for formal employment in the paragraph above.*

*Use the 2000 census data to find out more about employment statistics.*

*If 2000 jobs are created each year why hasn't the percentage of the population in employment increased?*

---

---

The agriculture sector remains the primary source of employment in Papua New Guinea and by far the most important sector in terms of absorbing new entrants into the labour force. While subsistence food production remains the largest agricultural sub-sector, the period since independence has seen increasing numbers of smallholders involved in producing cash crops. Large plantations remain important for the production of oil palm, rubber and tea while smallholder production predominates in the output of coffee, cocoa and copra. The increased numbers involved in cash cropping together with the introduction of new food crops for the domestic market and the increase in transport, retail and other small businesses in the rural areas indicates growth in the agricultural sector.



*Employment opportunities –  
construction workers*

---

---

 **5.3 Activity 2**

*Select either the plantation or agriculture sector and list what crops are grown. Rank each industry in importance as an employer.*

*What jobs are available in the timber and fishing industries?*

*The mining industry, including gold production, small deposits of other minerals, petroleum and natural gas is a significant employer. Where are the main mines located and what opportunities do they provide for employment and production?*

*Research the establishment and growth of new commercial crops such as vanilla, mushrooms in your local area. Your research should involve interviews with local producers.*

---

---

Manufacturing in Papua New Guinea includes mainly the processing of farm, forest, and fish products for export. Factories also produce consumer goods for the local market. There are over 700 factories employing nearly 25,000 workers. The largest group is concerned with machines and vehicles, particularly maintenance and repair work on them. The second largest group includes industries connected with timber, such as sawmills, plywood mills, and joinery works. Most of their products are exported. The third group is concerned with processing farm products for export as well as making food, drinks, and tobacco goods for local use. There is also a mixed group that involves cement goods, clothing, furniture, paints, printing, and chemicals for local use. The main centres of manufacturing are Port Moresby, Lae, Rabaul, Madang, Goroka, and Bulolo.

## Unemployment

Unemployment, in the sense of a person being willing to work but unable to find a job, is difficult to measure in Papua New Guinea because the communal land tenure arrangements mean that the majority of the population have a viable alternative to formal wage employment. Unemployment however, remains a problem especially for second and third generation urban dwellers that have lost ties with their villages and no longer have access to land for subsistence agriculture.

Shortly after independence, the proportion of urban dwellers regarded as permanent was estimated at 20 to 30 percent of the urban population. The urban population grew at an annual rate of 4.6 percent between 1980 and 1990. Because of the slow rate of formal sector job creation, there has been an increase in reported unemployment from 4.1 percent of the total urban population over ten years old in 1980, to 16.9 percent in 1990.

	Year	% Unemployed				Year	% Unemployed		
		Both sexes	M	F			Both sexes	M	F
Algeria	1992	23.8	24.2	20.3	Egypt	1994	11.0	7.4	22.8
Argentina	1995	18.8	16.5	22.3	El Salvador	1995	7.7	8.7	5.9
Australia	1995	8.5	8.8	8.0	Finland	1995	17.4	17.3	16.7
Austria	1996	4.1	3.9	4.5	France	1995	11.6	9.8	13.9
Barbados	1995	19.7	16.5	22.9	Greece	1995	10.0	6.7	15.4
Belarus	1995	2.7	2.2	3.3	Hungary	1996	9.9	10.7	8.8
Belgium	1995	9.3	7.3	12.2	Iceland	1996	3.7	3.4	4.1
Belize	1994	11.1	9.0	15.1	Israel	1995	6.9	5.6	8.6
Brazil	1993	6.2	5.4	7.4	Italy	1994	11.1	8.5	15.8
Canada	1995	9.5	9.8	9.2	Jamaica	1992	15.9	9.7	22.9
Chile	1995	4.7	4.4	5.3	Japan	1995	3.2	3.1	3.2
China	1994	2.8	0.8	1.1	Mexico	1995	4.7	4.6	5.0
Hong Kong	1996	2.8	3.1	2.3	Morocco	1992	16.0	13.0	25.3
Croatia	1993	16.8	14.0	20.1	Netherlands	1995	7.1	5.9	8.8
Cyprus	1995	2.6	1.9	3.7	New Zealand	1996	6.1	6.2	6.1
Czech Republic	1996	3.9	3.3	4.6	Norway	1995	4.9	5.2	4.6
Denmark	1995	7.0	5.6	8.6	Pakistan	1994	4.8	3.9	10.0
Ecuador	1994	7.1	5.8	9.3	Panama	1996	13.9	11.0	19.4

*Worldwide Unemployment Figures (selected countries)*

### 5.3 Activity 3

*Study the figures in the table above and answer the following questions*

- 1. Identify the two countries with the highest and lowest unemployment rates.*
- 2. Name the countries where female the unemployment rate is lower than the male. Try to explain why this is so.*
- 3. Sort the countries listed into their continents and compare the unemployment rates for Europe, Asia and the Americas. Which area has the highest unemployment? Try to explain why.*

## **Topic 2 - Income**

The value of goods and services is controlled by factors of production such as labour, land, capital, and management. The value takes the form of monetary payments, consisting of wages and salaries, rent, interest, and profit.

- Wages and salaries are paid to workers and managers;
- Rent is paid for the use of land and for certain kinds of physical objects;
- Interest is paid for the use of capital;

- Profit is a reward for risk taking by the owners of business enterprises

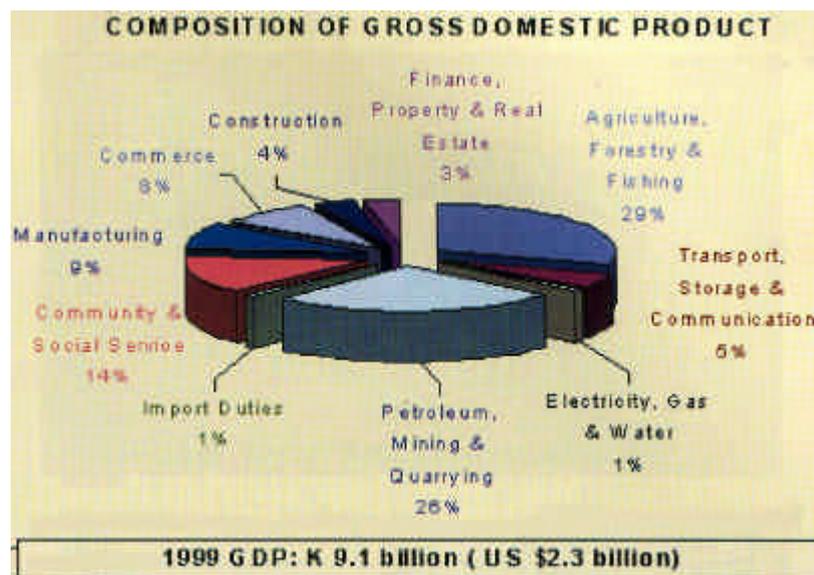
Variations in the relative share of the national income of workers is explained in terms of the operation of the law of **supply and demand**: When labour is plentiful, wage rates tend to fall; when labour is scarce, as in wartime, wages tend to rise.

Differences in income among workers is explained by the relative abundance or scarcity of their skills: skilled workers, less numerous than unskilled workers, receive higher wage rates; and workers with rare skills are paid at a higher rate than workers with skills found in abundance. Taxation is also an important factor affecting income distribution.

## Personal income

Personal income is the amount of money received by individuals for their own use. It is made up of all types of income: wages and salaries, proprietor and rental income, dividends and personal interest, and transfer payments. The latter comprises income from pensions, social insurance, and social-service payments. When total taxes are subtracted from personal income, the remainder is called **disposable income**, which is either spent or saved.

## Economic growth



**Gross National (Domestic) Product (GNP)**, is a term in economics used to describe in monetary value the total annual flow of goods and services in the economy of a nation. The GNP is normally measured by totaling all personal spending, all government spending, and all investment spending by a nation's industry both domestically and all over the world. The GNP measures the value of all goods and services produced within a nation's borders regardless of the nationality of the producer.

Real benefits from economic development will be realised only if growth in GNP leads to full employment, growth in formal employment, and growth in people's real incomes and their quality of life. More job opportunities in both the formal and non-formal sectors will need to be created to meet the demands of a growing labour force.

## 5.3 Activity 4

Study the figures in the table below and answer these questions

1. What three sectors have shown the most growth?
2. What sector shows the biggest drop?
3. What year shows a drop in most sectors?
4. Explain why agriculture/forestry/fishing contributes most to the national economy.

<b>GDP by sector</b>									
(Kina million in current prices)	1989	1990	1991	1992	1993	1994	1995	1996	1997
						1/	1/	1/	1/
Agriculture/forestry/fishing	856.3	891.3	936.5	1033.5	1328.7	1532.1	1692.6	1831.9	1874.2
Mining & Quarrying <sup>2/</sup>	352.7	452.2	612.9	1012.6	1294.8	1276.9	1793.6	1752.5	1288.3
Manufacturing	336.9	275.8	345.1	390.3	411.0	454.4	496.6	602.9	609.0
Electricity, gas & water	49.0	52.3	59.2	65.1	66.3	72.9	80.2	89.9	88.5
Construction	161.3	155.1	224.1	210.6	189.9	236.7	196.0	384.1	367.2
Wholesale & retail trade	328.2	296.8	358.4	387.1	417.3	477.4	520.9	607.3	649.8
Transport, storage & comm.	163.5	190.9	243.0	233.7	261.2	285.0	318.4	350.2	359.0
Finance, insurance, real estate & business services (less bank charges)	172.9	22.6	37.1	44.6	46.1	51.3	57.3	70.3	76.6
Community, social & personal services	421.9	551.3	588.1	649.6	711.4	807.4	859.0	883.5	963.4
Import duties (less subsidies)	203.0	187.9	201.0	195.9	195.5	247.3	293.9	341.2	372.2
<b>Gross Domestic Product</b>	<b>3045.7</b>	<b>3076.1</b>	<b>3605.5</b>	<b>4223.0</b>	<b>4922.2</b>	<b>5441.4</b>	<b>6308.5</b>	<b>6913.9</b>	<b>6648.1</b>

*Source: 1978 - 1993, NSO. 1994-1997, Bank of Papua New Guinea.*

The creation of employment – whether in urban or rural areas – is possibly the greatest economic challenge facing PNG today. The labour market is highly fragmented, largely uneducated and unskilled and the productivity of labour is low. High urban wages relative to rural wages or village income have encouraged excess rural-urban migration and contributed to urban unemployment.

---

---

### 5.3 Activity 5

*Several problems have been mentioned in the paragraph above. List each problem and suggest possible solutions.*

*Find out what the minimum urban and rural wages are.*

*Debate the topic – “Urban workers need higher salaries.”*

---

---

## Topic 3 - Business

### Types of businesses

Business is the production, distribution, and sale of goods and services for the benefit of the buyer and the profit of the seller. The main forms of business organization are:

#### *Sole proprietorship*

A sole proprietor is in sole charge of a business and is responsible for its success or failure. Unless an activity is specifically prohibited by law, no line of business is closed to an owner. The chief advantages of sole proprietorship for the proprietor are that s/he is in total control of the business (subject to the requirements of anyone who has provided finance for it), and is entitled to all the profit. The main disadvantage is that the owner is also personally responsible for all the losses and debts of the business. This is called **unlimited liability**.

#### *Partnership*

A partnership is a business association of two or more people who have formally agreed to work together, each contributing skills, labour, and resources to the venture in return for an agreed share of the profits. The formal partnership agreement usually covers all the partners' rights, responsibilities, and obligations, the circumstances in which their partnership may be dissolved, and a specific length of time during which the partnership is in effect. Unless a limited partnership has been established, all parties share the burden of loss and debts.



*Small business - PMV owner/driver*



*Small business – drinks van*

### *The corporation or company*

A company is a legally defined business entity separate from its owners: it lives on if they die; it can own assets; it can sue and be sued in the courts. The legal requirements and limitations regarding the setting up of a company or corporation are determined by company law.

Companies are dependent on the concept of **limited liability**, whereby, however badly a company performs, its owners can only be held liable up to the amount of their investment (unless they had given additional personal guarantees).

In modern business, there are complex webs of interest and ownership in which companies are connected with other companies through shareholdings or business alliances. These are further complicated by the large stakes held in businesses by banks and institutional investors such as pension funds.

A **multinational** is a company that transacts business and has interests or branches in many countries. These huge concerns generate revenues that can be larger than the gross domestic product of some of the countries in which they operate.

---

## 5.3 Activity 6

*Divide into four groups, with each group presenting a profile of a business from one of the categories described above - sole proprietorship, partnership, company and multinational.*

*Form groups with at least one member who has a connection through his/her family to a business. Identify the benefits and problems associated with owning/running a business.*

*Discuss the impact of the 'wantok' system on PNG businesses.*

---

## Regulation of business by government

In order to ensure that businesses operate fairly with regard to, and in the best interests of, their owners, their customers, their competitors, and the economy as a whole, numerous laws have been passed to regulate business. These cover areas such as takeovers of one company by another and actions that inhibit competition, such as the formation of cartels or business monopolies. This kind of regulation varies from country to country, though some international legislation exists, as within the European Union. In general, the more economically developed the country, the more developed are the rules governing corporate behaviour.

## Section 2 – Production

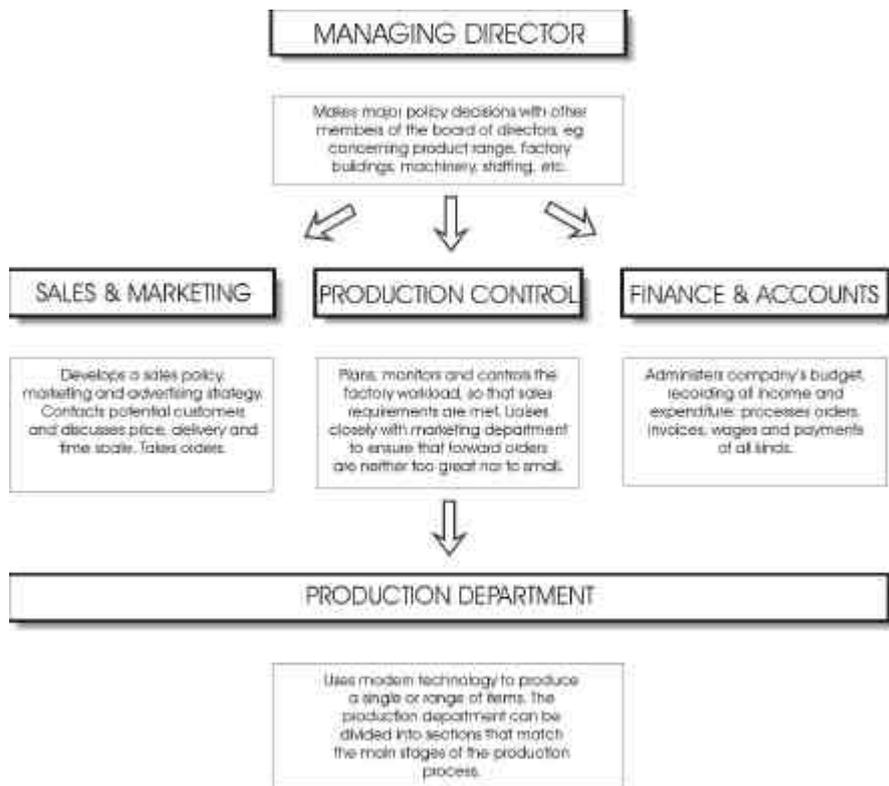
### *Topic 4 - Production*

Production is the manufacture and processing of goods or merchandise, including their design, treatment at various stages, and finance contributed by banks. It is the main way by which wealth is created by human labour, and is regarded as a fundamental economic process.

It is common to imagine trade as consisting of imports and exports of complete products, but in fact much trade of manufactured goods involves transporting parts from several countries and assembling them in another (from which they may be exported). That process represents a globalisation of production itself. It involves corporations planning their production processes so that each specialised subdivision of the whole process is carried out in a country where conditions are particularly favourable for that type of work.

Such “worldwide sourcing” became prominent in the 1970s and has expanded continuously since then, creating a new worldwide system of production as a foundation of the world economy. Its impact and significance can be understood by contrasting a modern car factory, assembling parts made in the company’s factories in other countries, with the integrated plants that until the 1960s made everything from pressed steel to car seats within one country. Another prominent example is the clothing industry which has been restructured in recent decades so that one process is carried out in one country, the next in a second, and the whole garment is finished in a third. Worldwide sourcing has been important for changes in the international division of labour—the concentration of different countries’ labour forces on specialized parts of a production process.

Multinational corporations, owning production facilities abroad, have existed for a long time; in the 19th century (and again in the second half of the 20th century) there was a great wave of direct foreign investment by European and US companies. However, the special feature of multinational corporations since the 1970s has been their worldwide sourcing, so that instead of simply operating plants abroad, multinationals integrate those plants as subdivisions of a globally organized production process. Another noteworthy change is that, although multinational corporations used to be thought of as having their headquarters in the United States or Western Europe, a large number are Japanese or Korean, and a significant number have grown outward from developing countries.



*How a company/business can be organised*

## The factory system

A factory is usually a large establishment employing many people involved in mass production of industrial or consumer goods. Some form of the factory system, however, has existed since ancient times. Pottery works have been uncovered in ancient Greece and Rome and in various parts of the Roman Empire, factories manufactured glassware and bronze ware and other similar articles for export as well as for domestic consumption.

The modern factory system began to develop in the late 18th century, when a series of inventions marked the beginning of the Industrial Revolution. These inventions mechanised many of the hand processes involved in spinning and weaving, making it possible to produce textiles much more quickly and cheaply. One of the major technological breakthroughs early in the Industrial Revolution was the introduction of steam engines. These enabled manufacturers to build factories closer to a labour supply and to markets for the goods produced. The development of the steam locomotive and steamship in the early 19th century made it possible to ship factory-built products to distant markets more rapidly and economically, thus encouraging industrialisation. New machinery and techniques were invented in the 19<sup>th</sup> century that made it possible to extend the factory system to industries other than textiles.

As the world economy has grown, factory operations (especially in the developed world) have sought to increase productivity and efficiency through greater use of **automation** and new technology. Some machines, aided by computers, semiconductors, robots, and other technological innovations, are so nearly self-regulating that an entire factory may be kept running by a few people operating sets of controls. To stay ahead of the competition, great skill, imagination, and rigour must now be applied to everything from decisions on machinery and equipment purchases to quality control.

---

---

### 5.3 Activity 7

*Choose a product that has been manufactured in a factory and draw a flow chart or diagram to show how it was made.*

*Research the invention of one machine, for example the sewing machine, which has allowed easy and rapid production of goods.*

*Find out what automation involves and describe an industry that uses automation extensively.*

*What is downstream processing?*

*Describe and sketch a product that is fully manufactured in Papua New Guinea – from raw materials to the finished product.*

---

---

## Topic 5 – Marketing

 Marketing (including advertising) is a major component of the production process. This topic provides opportunities to study marketing processes employed by producers in PNG and elsewhere. There is also an opportunity to integrate language, design and technology skills in the creation of a sample product and/or advertising campaign.

Marketing involves finding out who wants a product or service and what price they will pay for it, as well as advertising and selling it. A firm's marketing department is concerned with designing and developing the right product in the right quantities at the right price and with promotion to persuade people to buy it. The marketing department also organizes distribution of the product to ensure that it is in the right place at the right time. Marketing consists of a mixture of activities connected with the four Ps - product, price, promotion and place. These different elements of marketing are known as the **marketing mix**.

Early marketing techniques involved little more than making potential consumers aware of a product's existence and benefits, and getting it to the market. Now, however, the marketing process starts even before decisions are taken about what products should be made.

### Identifying the market

Changing attitudes and modes of living directly affect the demand for products. For example, the trend towards informal dress has changed clothing styles dramatically. Merchandise generally similar in appearance, that is, in style or design, but varying in such elements as size, price, and quality is collectively known as a **product line**. Product lines must be planned according to consumer needs and wants.

In order to develop a line effectively, market research is conducted to study consumer behaviour. Market researchers try to find out which groups of people will buy the product, what type of product they want, what price they will pay for it and what the competition is from other similar products. Information is often collected by doing a survey. Surveys can be carried out by post, by telephone, by face-to-face interviews or by setting up consumer panels (e.g. to test a new product).

The most common method is the face-to-face interview. In some cases a random sample of people is interviewed. More often, a quota sample is selected. Certain proportions of people from different groups are chosen according to factors such as their sex, age and social grade.

Depending on the product, the researchers may target a particular group of people who they believe have similar wants, such as teenage girls. A particular group of consumers with similar wants is known as a **market segment**. One of the ways marketing people often define market segments is by socio-economic groups. Market segments can also be divided up according to many other factors, such as marital status, geographical area, ethnic group and whether people are regular or occasional users of the product or service.

Sales projections become the basis for many important marketing decisions, including those relating to the type and extent of advertising, the allocation of salespeople, and the number and location of warehouses

---

---

### 5.3 Activity 8

*What is meant by (a) the marketing mix, (b) market research, (c) market segments?*

*List the advantages and drawbacks of carrying out surveys (a) by post, (b) by telephone, (c) by personal interviews.*

*List some of the market segments for each of the following products: walking sticks, electric mowers, radios, caps, furniture polish, work boots.*

*You have been asked to do some market research by a publisher who is planning to launch a magazine for teenagers and young adults in PNG. Draw up a questionnaire designed to find out what they would like a new magazine to contain.*

---

---

## Product cycles

The life cycles of products require careful study. Virtually all product ideas eventually lose the attraction that made people buy them. Manufacturers may also speed up the **obsolescence** of a product by introducing new, more desirable products or new versions of the existing product. Consumers today expect product innovations and tend to react favourably to new features.

All products have a life-cycle.

- **Development.** The firm invests money to research and develop the new product.
- **Launch.** More expenditure is involved as production is set up and informative advertising is used to promote the product. As yet, the costs of introducing the product have not yet been recovered.
- **Growth.** As the product becomes established, sales grow, income increases and a profit is made. Advertising shifts from being informative to persuasive.
- **Maturity.** The product continues to sell, until the market reaches saturation point. More advertising is needed in order to try to maintain sales.
- **Decline.** There is a dramatic fall in sales. Efforts may be made to extend the product's life, but eventually it becomes obsolete.

The length of a product's life-cycle can vary from a few months to many years. Sometimes, a product's lifecycle can be extended by changing its image -altering its packaging, bringing out new accessories for it or finding a new market for it. Examples of products which were launched a long time ago and continue to have extended lives, because they have been altered or re-packaged include Kellogg's Corn Flakes and Coke Cola. Because the life-cycle of most products is limited, firms are always considering the development of new products and ways of extending the life-cycle of existing products.

Consumers today are more sophisticated than in the past. They attend school for much longer; they are exposed to newspapers, magazines, films, radio, television, and travel; and they have much greater interaction with other people. Their demands are more exacting, and their tastes change frequently. Positioning the product—that is, determining the exact segment of the population that is likely to buy a product, and then developing a marketing campaign to enhance the product's image to fit that particular segment—requires great care and planning.

Competition has also sharply intensified, as the number of firms engaged in producing similar products has increased. Each firm tries to differentiate its products from those of its competitors. **Profit margins**, meaning the percentage of profit made by a business per unit of sales, are constantly being cut. While costs continue to rise, competition tends to keep prices down.

## Branding

A product is given a brand name in order to give it an identity and so that the consumer will recognize it. A successful brand name tells the consumer something about the product and creates an image for it.

Many brand names are chosen because of the associations that the name suggests. For example, SURF was chosen as the name for a washing powder because the word surf conjures up ideas of foamy waves, beating powerfully on the shore, and in order to suggest that the foamy suds in the washing machine will act in the same way on your dirty washing.

### How Kodak cameras got named

*I choose that name because I knew a trade name must be short, vigorous and incapable of being misspelled to an extent that will destroy its identity. The letter K had been a favourite with me - it seemed a strong, incisive sort of letter. Therefore, the word I wanted had to start with K. Then it became a question of trying out a great number of combinations of letters that made words starting and ending with K. The word Kodak is the result.*

George Eastman, inventor of the simple box camera.

## 5.3 Activity 9

*Make lists of brand names of different products – for example, biscuits, chewing gum, and sports clothes. Discuss the ideas that you associate with the words chosen for the brand names.*

*Invent some brand names for new products, such as soap, a watch, canned fruit, a sound system. You may find a thesaurus helpful.*

*Choose five products manufactured in PNG that are also imported. What do you notice about the brand names?*

## Pricing

The price of the product is determined to a certain extent by supply and demand. **Supply** means the number of units (e.g. tables or chairs) that a manufacturer can produce over a certain period of time. **Demand** means the number of units that buyers are willing and able to buy during that time. When supplies are greater than demand, manufacturers may cut back production and lower their prices. When demand increases, manufacturers may increase production and put up prices. The forces of supply and demand, which influence the number of units being produced and the price at which each unit is sold, are known as **market forces**.

Several other factors also influence the price a firm will charge for its product. For example, the firm will take into account the prices being charged by its competitors for similar products, and whether the product is new or being produced for a special occasion. Many firms use the system of pricing known as **cost plus**. This involves working out the cost of producing each unit, then adding on an extra amount, known as the **profit margin**.

There are two types of costs - **direct costs** and **indirect costs**. The direct costs of manufacturing a product are the cost of setting up the machinery, of buying raw materials (e.g. the wood required for a table) and of paying the workers who actually make the product. The indirect costs are all the other costs of running a manufacturing company, such as paying for offices and staff. All these indirect costs are often referred to as **fixed costs** or **overheads**.

If a company is making more than one product - say tables and chairs - the overheads will be calculated for each product as a percentage of the company's total overheads bill. At a given selling price it is possible to determine how many units must be made to recover all the costs

incurred. Alternatively, the lowest acceptable price can be established for a given volume of production. The point at which income matches costs is known as the **break-even** point.

The amount by which the selling price is more than the costs is also known as the **mark-up**. Several factors influence the amount of mark-up which a firm decides to charge. An important factor is the level of price which consumers expect to pay for such a product. This is known as the **price plateau**. If the firm charges much less than the price plateau, then consumers may begin to wonder if the product is of an inferior standard. If the price is much higher than the price plateau, then consumers may be put off. Instead of buying the product they may go and look for another similar product which is on offer at the price they expect to pay.

### *Pricing strategies*

The amount of mark-up is also determined by the pricing strategy which the firm adopts for its product. Here are some possible pricing strategies:

- **Penetration pricing.** When a firm has a new product, it may set a low price at first, and accept a lower profit margin, in order to penetrate the market. Once the product has captured a share of the market, the firm may increase the price.
- **Skimming.** In this case, a high price is set for a new product in order to try to recover the development costs quickly. This strategy is used for innovative products for which no substitutes exist. For example, products such as video recorders, home computers and cordless telephones all cost more when they first became available than they cost now.
- **Competitive pricing.** A price is fixed which matches the price being charged by competitors for similar products.
- **Differential pricing.** Different prices are set for different customers. For example, customers who place large orders get a discounted price, or a reduced rate is charged to pensioners.

---

## 5.3 Activity 10

*What is the difference between direct costs and fixed costs?*

*How are prices fixed by the method of pricing called cost plus?*

*What is the price plateau? How does it affect the way a price is fixed?*

*Imagine that the unit cost of making a box of paper clips is 15 toea. If the overhead costs for each box were 9 toea and the company wanted to make a profit of 25 per cent per box, what price would the firm have to charge its customers for each box?*

*Interview sellers at the closest market to find out how they decide what to charge for their produce.*

*Choose an item produced by a local artisan eg bilum, wood carving and work out a reasonable price for the item, taking into account the cost of the raw materials and the time taken to make the item.*

## Promotion and distribution

Advertising, personal (face-to-face) selling, and sales promotion are the methods for inducing people to buy.



The primary objective of advertising is to pre-sell the product—that is, to convince consumers to purchase an item before they actually see and inspect it. Most companies consider this function so important that they allocate extensive budgets and engage specialist advertising agencies to develop their program of advertising. By repeatedly exposing the consumer to a brand name or trademark, to the appearance or package of a product, and to special features of an item, advertisers hope to influence consumers towards a particular product. Advertising is most frequently done on television, radio, and billboards or other large displays; in newspapers, magazines, and catalogues; and through direct mail to consumers.

There are a number of different types of advertising:

- **Informative advertising.** This is often used when a new product is launched. The aim is to introduce the product, establish its identity and make consumers aware that it exists.
- **Persuasive advertising.** This uses words and images to make the product so appealing that the consumer wants it sufficiently to go out and buy it.
- **Competitive advertising.** This is used to make a product appear superior to its competitors by stressing the product's strengths when compared to other similar products. In addition to advertising products on television and radio and in newspapers and magazines, firms also put up posters, and mail leaflets directly to selected segments of the market.

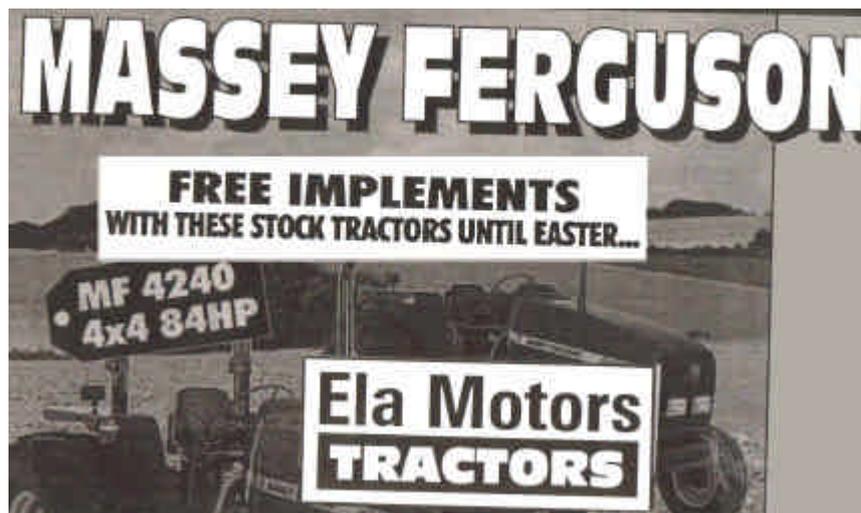
---

## 5.3 Activity 11

*If possible record a number of TV commercials on video. Watch each of them in turn, analyse them and discuss the methods that are being used to influence the audience to buy the product.*

*Pick a fairly well-known product or, if you prefer, invent one of your own. In pairs or small groups, discuss the aspects of the product which you intend to stress in order to persuade people to buy it. Note down your ideas and plan a 30-second television or radio commercial to advertise your product. Present your ideas to the whole class.*

*Draft an informative advertisement for the newspaper advertising your college. Then, think about how you would alter it in order to make it into a persuasive advertisement. Produce a redrafted version of it which would persuade students to enrol at your college.*



### *Sales promotion*

A sales promotion is a way of creating an increase in sales for a short period of time. The aim is to get consumers to try the product; in the hope that once they have tried it they will want to buy it again. Examples of sales promotions are: free samples of new products, coupons, vouchers and percentage reductions (e.g. 10% off), a premium (gift) with the purchase of a product, bargain packs (e.g. buy two get one free) and prize promotions.

Large stores and supermarkets sometimes use a promotion involving **loss leaders**. A loss leader is a product which is priced cheaply, below its usual price. It is usually placed strategically near the entrance to the shop, in the hope that it will attract customers into the shop who will then buy other products at their normal prices.

The purpose of sales promotion is to supplement and coordinate advertising and personal selling; this has become increasingly important in marketing. Often it is necessary to work closely with the dealers who handle a manufacturer's products to make sure that satisfactory

sales levels are achieved. Displays must be supplied and set up, and cooperative advertising programs may be worked out. Shop staff are trained so that they have knowledge of the manufacturer's products. Often the manufacturer provides services such as installation and maintenance for a specified time period.

---

---

## 5.3 Activity 12

*Examine advertisements in the newspaper or on television for one week. Make a list of all the sales promotion offers you see.*

*Find out from your local supermarket which companies control special displays in the store.*

---

---

### *Distribution*

This involves getting the product to the right place at the right time so that it is there when the customer wants it. Using a wholesaler benefits the manufacturer, because the wholesaler buys in large quantities and the manufacturer has only to make one big delivery of goods, instead of several deliveries to different retailers. Buying from a wholesaler benefits retailers because they do not have to keep large stocks of goods in their shops and the wholesaler can usually deliver goods quickly, if necessary.

Some products are marketed most effectively by direct sale from manufacturer to consumer. Among these are durable equipment—for example, computers, office equipment, and industrial machinery and supplies. However, many consumer goods are also sold directly to the public as well, through advertisements and direct mail.

For retailers, the use of catalogues makes it possible to do business considerably beyond their usual trading area and with a minimum of overheads. Also important are credit cards, which have made it relatively easy to purchase by mail or telephone even such high-priced items as appliances, electronic equipment, and cameras.

Television is a powerful tool in direct marketing because it allows people to see the demonstration of products in use. Direct sale of all kinds of goods to the public via home-shopping facilities broadcasting on cable television channels or interactive networks is gaining in popularity. Increasing use is also being made of telephone marketing, or telemarketing, a technique used in selling to businesses as well as to consumers, and in marketing over the Internet.

Most consumer products, however, move from the manufacturer through agents to wholesalers and then to retailers, before ultimately reaching the consumer.

Retailing has undergone even more change. Intensive pre-selling by manufacturers and the development of minimum-service operations—for example, self-service in department stores—have drastically changed the retailer's way of doing business. Supermarkets and discount stores have become commonplace not only for groceries but for products as diversified as medicines and gardening equipment. More recently, warehouse retailing has become a major means of retailing higher-priced consumer goods such as furniture,

appliances, and electronic equipment. The emphasis is on generating shop traffic, speeding up the transaction, and rapidly expanding the sales volume. **Chain stores**—groups of shops owned by the same firm—and cooperative groups have also increased. Special types of retailing, for example, **vending machines** and convenience stores, have also developed to satisfy consumers' needs more easily and cheaply.

## Packaging

Packaging has several important functions. It must provide protection for the product, be easy to use, appeal to the consumer, help to promote the product and be easy to display.

---

---

### 5.3 Activity 13

*Make a list of chain stores and stores that offer warehouse sales in Papua New Guinea.*

*What products are sold from vending machines in the town closest to your college?*

*You work for a company which is developing concentrated instant soup to be sold like instant coffee. Your brief is to design the container in which it is sold. You must choose a material for the container and a size and shape for it. Will it be recyclable? You also have to choose a brand name, think up a slogan and design the label. Remember that as well as promoting the product, the label must contain instructions on how to make the soup and, by law, it must also contain details of its contents, where it was made and by whom.*

*The steps you need to work through are*

- 1. First ideas – brainstorming, recording sketches*
- 2. Market research - study similar products, survey potential customers*
- 3. Designing your product – planning meetings, model construction*
- 4. Testing your product – Give it to a sample of consumers and survey their reactions*

---

---

## The marketing profession

Perhaps nothing is more conducive to the success of a firm than the image that it conveys of itself to the public. The marketing activities of a company, because they act directly on the consumer, do most to shape this image and thus must be developed with great care. As marketing has become increasingly complex, a need has arisen for executives trained in the social sciences that also possess statistical, mathematical, and computer backgrounds. Many colleges and universities now have programs designed to train marketing executives.

Courses are offered at undergraduate and graduate levels in such specialized fields as advertising, administrative practices, financial management, production, human relations, retailing, and personnel administration.

## ***Topic 6 - Consumer rights and decisions***

The consumer movement—that is, the insistence on reliable products and services by consumer groups—is a strong influence on marketing techniques. Both consumer groups and government agencies have intensified their scrutiny of products, challenging such diverse elements as product design, length and legitimacy of **warranty**, and promotional tactics. Warranty and guarantee practices, in particular, have been closely examined. New legislation has generally defined and extended the manufacturer's responsibility for product performance.

Even the way a firm handles itself in public life, that is, how it reacts to social and political issues, has become significant. The public's dissatisfaction with the actions and attitudes of a firm has sometimes led to a reduction in sales; conversely, consumer enthusiasm, generated by a firm's intentional establishment of a good public image or public relations, has led to increased sales.

Many consumers now find it more desirable to rent products than to purchase them outright. For example, a homeowner will often find it preferable to rent an electric floor polisher when needed, rather than purchase the appliance at the list price, use it only infrequently, and then have to provide storage space within the home. Another item that consumers have sometimes found easier and less expensive to rent in certain circumstances (when abroad, for instance) is the car. The renting of equipment also figures in large industry. Corporations are finding it to their economic advantage to rent computers and office and industrial machinery, thereby assuring themselves of product servicing and repair and allowing a changeover, without great expense, to newer equipment models as they become available.

The use of credit has had a great impact on marketing. Customers with credit cards can make purchases without the normal immediate presentation of cash, and sales are thus stimulated.

---

---

### **5.3 Activity 14**

*What is the role of the Price Controller in PNG? List examples of products subject to price controls.*

---

---

## Section 3 - Services

Services are intangible goods, which can be sold despite not being actual objects. Consumers pay for a service as they would for manufactured goods. Already more people are employed in the developed economies in the provision of services than in the manufacture of products, and the service sector shows every indication of expanding even further.

Services familiar to most consumers are in the fields of maintenance and repair, transport, travel, entertainment, education, and medical care. Business-oriented services include computer applications, management consulting, banking, accounting and legal services, stockbrokerage, and advertising.

Services, like products, require marketing. Usually, service marketing parallels product marketing with the exception of physical handling. Services must be planned and developed carefully to meet consumer demand. For example, in the field of temporary personnel, a service that continues to increase in monetary value, studies are made to determine the types of employee skills needed in various geographical locations and fields of business.

Because intangibles are more difficult to sell than physical products, promotional campaigns for services can be even more aggressive than those for manufactured goods. Through extensive promotion, temporary-personnel agencies have convinced many companies that hiring on a temporary basis only in times of need is more economical than hiring permanent, full-time personnel.

---

### 5.3 Activity 15

*List some of the services available in your nearest town.*

*Describe a new service you could develop or promote.*

---

## References

ANZ Bank (2001). *ANZ Bank Customer Forecasts*

Bank of Papua New Guinea (1999). *Money and Banking in Papua New Guinea*

Beddis, R. (1989). *The Third World – development and interdependence*, Oxford: Oxford.

Kleeman, G. et al (1998). *A Geography of Global Environments and Communities*,  
Melbourne: Heinemann.

McInnes, D. (1995). *Dellasta Encyclopedia of Papua New Guinea*, Burwood: Dellasta  
Pacific.

Microsoft Corporation (2000). *Microsoft Encarta Encyclopedia* [CD-ROM]

*Papua New Guinea Year Book 2001* (2002)

*Post-Courier* – various articles

*The National* – various articles