ECONOMICS

LEVEL 1

ACHIEVEMENT STANDARD 90984

5 Credits - Internal

Demonstrate understanding of decisions a producer makes about production
PRODUCERS - 1.2

Objectives:
- Recognise that producers make a range of goods and services.
- Identify individuals and groups who participate in the production of goods and services.

A producer is someone who provides a good or service. They are involved in the production of goods and services.

Production is the bringing into existence of a good or service.

All production involves using inputs of resources which are then transformed or processed, which leads to the output of goods and services.

Producers include a wide range of individuals and organisations involved in the production of goods and services. They range from single individuals to large organisations. Private individuals own producers in the private sector, the government owns producers in the public sector.

Firm An organisation that is involved in the production of a good or service. They are owned and operated by private individuals. e.g. Toyota, Spree, Corner dairy.

Industry All firms involved in the creating of the same type of good or service. e.g. The car industry is made up of firms such as Toyota, Ford etc.

Co-operatives A firm that is owned by its members. e.g. Fonterra

Voluntary Organisations provide goods and services not normally provided by firms and government. e.g. Red Cross
Public sector organisations
Central Government - based in Wellington and includes parliament and many organisations providing health, education etc. The goods and services provided are paid for through taxation.

Local government - based in different regions and provides services such as water, sewerage, roading etc.

E.g. Palmerston North City Council, Manawatu district council.

Over the years there have been changes in the public sector back in the early eighties government departments were large and run entirely by the government through civil servants. Government departments were run as a service to the public and were not required to make a profit. From 1985 onwards some government departments were corporatised. Corporatisation was the making of government departments into State Owned Enterprises (S.O.E.’s) – these were organisations that were owned by the government but were now expected to make a profit. Eventually some S.O.E.’s were sold off to private enterprise – this process is known as privatisation.

Privatisation - the selling of an SOE to private enterprises.

E.g. The Post Office – a government department.

<table>
<thead>
<tr>
<th>Government Department</th>
<th>State Owned Enterprise</th>
<th>Private Company</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>CORPORATISED</strong></td>
<td><strong>POST OFFICE</strong></td>
<td><strong>POST BANK</strong></td>
</tr>
<tr>
<td>Post Office</td>
<td>Telecom NZ</td>
<td>Telecom Ltd.</td>
</tr>
<tr>
<td>Provides services</td>
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<tr>
<td>- Telephone</td>
<td></td>
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<td>- Banking</td>
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<tr>
<td>- Mail</td>
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<tr>
<td><strong>PRIVATISED</strong></td>
<td><strong>POST OFFICE</strong></td>
<td><strong>POST BANK</strong></td>
</tr>
<tr>
<td>ANZ Post Bank</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Some examples of SOE’s today are TVNZ, NZ Post, Solid Energy.
The public sector provides three main types of goods.

Private goods are goods paid for by the consumer and provided through the market place.

Mixed goods includes goods provided privately, but the government also provides them. E.g. Education

Public goods are goods provided by the public sector (government) collectively often because private firms would not provide the good e.g. street lighting.

Public goods and mixed goods are paid for collectively. Collectively means that the good is paid for through the taxation system – everyone pays for the good whether they use it or not.

Some services provided by local government have also been made into profit orientated organisations. These organisations are know as Local Area Trading Enterprises or L.A.T.E’s e.g. Metro water
Goods and services

Goods are **tangible** – things that we can touch.

Goods can be subdivided into two categories.

- **Consumer goods** are for consumption by consumers to provide immediate satisfaction, such as household appliances, food and shelter.

- **Producer goods / Capital goods** are man made goods used in the production process.

**Capital can be divided into two types**

- **Productive Capital** is the machinery or factory, any capital which is not used up in the productive process.

- **Circulating Capital** this is the semi finished goods that go into the productive process for example in making a car we need: glass, rubber and steel. These are all resources that have been processed and are used up in the production process - they can't be used to create any more goods and services.

**Services** are the intangibles, the things that other people do for us – like going to the hairdresser or to the dentist.

QUESTIONS:

1. Explain the difference between a firm and an industry.

   A firm is one producer of a good or service.

   An industry is ALL producers of the same type of good or service.

2. Define the term capital resource.

   man made goods used to make other goods or services (commodity).

3. Explain, with an example, the term “State Owned Enterprise”.

   S.O.E = State Owned Enterprise. An SOE is a government department that has been corporatized and is now expected to make a profit.
GOALS OF PRODUCERS
There are a large range of goals that producers can aspire to.

PROFIT MAXIMISATION – This is the main goal of most businesses. There is a lot of risk involved in starting up and running a business. Business owners expect to be rewarded for the risks they are taking. This is why most businesses have the goal of profit maximisation, they want to make as much revenue as possible.

SALES MAXIMISATION – Some firms may be more interested in increasing the level of sales, and thus their market share. Sales maximisation will often eventually lead to profit maximisation.

MARKET POWER – A firm will often try and dominate a market and eliminate the competition. This will help the firm to eventually gain control of the market and gain more profits.

PRIDE IN PRODUCING QUALITY PRODUCTS. In order to gain prestige, some firms may concentrate on producing quality goods and services. They may want the best type of good on the market, the best clothing, the best luxury car etc. They do this because they know there are people who will pay to have the best.

PRIDE IN OFFERING GOODS AT LOW PRICES. Some firms aim to provide goods or services as cheaply as possible, such as a charity shop. Firms may also market themselves as being a cheap place to shop to help them to gain market share.

PROVIDING A COMMUNITY SERVICE – Some firms, especially voluntary organisations will have the goal of helping the community or providing a service that nobody else is willing to provide. Some firms may also be happy to forego some profits and employ more staff, or take care of the environment.

SATISFICING. The owner of a firm may be happy / satisfied with the profits they are making, they may have reached a target level of profits and so they aim for other goals, such as spending more time with their family, having a better lifestyle, more leisure time etc.
Activity:
**PRODUCER GOALS**: Use the following goals and mission statements to look at producers goals.

**THE BODY SHOP**

Our reasons for being:
To dedicate our business to the pursuit of social and environmental change.

To ensure the business is ecologically sustainable, meeting the needs of the present without harming the future.
To passionately campaign for the protection of the Environment human and civil rights and against Animal testing.

**PepsiCo Mission Statement:**
*PepsiCo’s overall mission is to increase the value of our shareholder's investment. We do this through sales growth, cost controls and wise investment of resources. We believe our commercial success depends upon offering quality and value to our consumers and customers; providing products that are safe, wholesome, economically efficient and environmentally sound; and providing a fair return to our investors while adhering to the highest standards of integrity.*

**McDonald’s** vision is to be the world’s best quick service restaurant experience. Being the best means providing outstanding quality, service, cleanliness and value, so that we make every customer in every restaurant smile. To achieve our vision, we are focused on three worldwide strategies:

1. **Be The Best Employer**
   Be the best employer for our people in each community around the world.

2. **Deliver Operational Excellence**
   Deliver operational excellence to our customers in each of our restaurants.

3. **Achieve Enduring Profitable Growth**
   Achieve enduring profitable growth by expanding the brand and leveraging the strengths of the McDonald’s system through innovation and technology.

**The Warehouse New Zealand**

**Our Core Purpose**
We make a difference to New Zealand by making the desirable affordable.

**Our Values**
The Warehouse New Zealand is a values based business. Our key values are:

- **Where People Come First**
- The culture of The Warehouse is unique and has been one of the key reasons behind the success of the company.
- **Where Everyone Gets A Bargain**
  We are focused on ensuring that we provide great value products for our customers every day.
- **Where The Environment Matters**
  The Warehouse has an extensive programme of environmental and social initiatives, which we feel are improving our community and our environment.
HONDA - "We will crush, squash, and slaughter Yamaha"

Mission Statement

To provide a wide selection of quality sports equipment and team wear at competitive prices and to provide the best possible level of service and efficiency at all times.

Welcome to adidas-Salomon

We strive to be the global leader in the sporting goods industry with sports brands built on a passion for competition and a sporting lifestyle. Our strategy is simple: continuously strengthen our brands and products to improve our competitive position and financial performance.

At Burger King Corporation, we believe that diversity is part of our foundation. We value, honor and respect differences in our employees, customers, franchisees and suppliers. By sharing a common vision, we will create a premier company with a harmonious working environment that achieves its business and diversity objectives.

"'Exceptional People On A Mission To Be The Best Pizza Delivery Company In The World'. This is part of Domino's 'Vision and Guiding Principles'"

Our vision, our mission, our values

<table>
<thead>
<tr>
<th>Our Vision:</th>
<th>to become the world's leading company for automotive products and services.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Our Mission:</td>
<td>we are a global, diverse family with a proud heritage, passionately committed to providing outstanding products and services.</td>
</tr>
<tr>
<td>Our Values:</td>
<td>We do the right thing for our people, our environment and our society, but above all for our customers.</td>
</tr>
</tbody>
</table>

1. For each of the above producers what is their main goal as stated in their mission statement?

Body shop Social responsibility.

Pepsi Market share, profit maximisation.

McDonalds Prestige, profit.

The Warehouse Pride in offering goods at low prices.

Honda Market power, eliminate the competition.
2. Explain why profit maximisation is the main goal of producers.________

Enables the business to survive ______ and provide a return on the investment of the investors / owners.

3. Define satisficing. Where a firm feels it is making enough profit and so focuses on other things such as quality of life, time with family etc.

4. What kind of goal would a voluntary organization have? Provide a community service and to provide goods at a low price.

BUSINESS SUCCESS OR FAILURE

Any production involves taking risks. Firms need to try and decide what to sell, who to sell it to, where to sell and produce it and for how much. Before they try and sell their product to consumers, producers can never be sure whether their product will succeed or fail. Market research can help to reduce this risk.

A typical life cycle of a product has various stages as show below.
QUESTIONS:

a) Match the statements below with the following goals

- Profit maximisation.________
- Sales maximisation._______
- Market share___________
- Satisficing_______________
- Community service________
- Pride in producing a quality product._____  

a. Dean is just starting to sell Floops, and he wants to quickly increase the number of people buying them  

b. After years in business Sean just wants to relax and enjoy his family more

c. Amy just wants to be the best  

d. Grace is concerned about people who find it hard to get jobs and so she often employs unskilled workers

e. Zac is worried about the competition and he would just like to eliminate them.  

f. Scott doesn’t want to sell snuffy’s for long – he just wants to make as much money as possible and then move on.

B) Many New Zealand firms have social and environmental goals.

State the most likely valid social, environmental and financial goals a firm could have.

Social Goal:__________________________________________
__________________________________________
__________________________________________

Environmental Goal:____________________________________
__________________________________________
__________________________________________

Financial Goal:________________________________________
__________________________________________
__________________________________________
Resources Used In Production

Objectives:
- Classify human, capital and natural resources.
- Distinguish between renewable and non-renewable resources.
- Identify resource use for a particular production process.
- Explain labour and capital intensive methods of production.

All production uses a variety of inputs to make the good or service that they provide. These inputs are known as the factors of production and they are combined to produce a good or service.

We already know that production is the creating of a good or service (commodity).

Resources (the factors of production) can be classified into three main categories.

The factors of production can be classified as
- Land
- Labour
- Capital
- Entrepreneurship

All Economic resources are scarce in relation to wants, therefore decisions need to be made about their use. With every decision made there will be an opportunity cost.
NATURAL RESOURCES (LAND)
Natural resources are those that are provided by nature. In Economics these are known as land.

RENEWABLE RESOURCES
Renewable resources can naturally regenerate, or grow again within our lifetime, if they are used in a sustainable way. If overexploited renewable resources will deplete and may run out.

Sustainability: This means that the natural resources are used in a way that does not deplete them for future generations. If a firm chooses to produces in an environmentally sustainable way this may actually increase their cost of production, but could also increase their customer base.

The Resource Management Act (RMA) in New Zealand is a law put in place to help protect the environment. Firms must go through a process if they want to use or develop a resource.

Examples of renewable resources are fish, wind, sun livestock, fruit etc. There have been numerous cases of over fishing causing fish stocks to be depleted and so the resource has disappeared. If used carefully and conserved then renewable resources can be used for generations.

Renewable doesn’t necessarily mean environmentally friendly. Hydro electric electricity is renewable but can cause a lot of environmental damage. Dams are formed, forests, farmland and in some cases villages are destroyed.

Example Three Gorges Dam
China has undertaken the greatest project since the erection of the Great Wall and the Grand Canal -- the Three Gorges Dam project. The Three Gorges Dam will be the largest hydropower station and dam in the world, with a 2.3 km stretch of concrete a 600 km-long reservoir and 185 meters high. The project will also cause devastating environmental damage, increasing the risk of earthquakes and landslides. It will also threaten the riverbeds and wildlife. In addition to fish species, it will also affect endangered species, including the Yangtze dolphin, the Chinese Sturgeon, the Chinese Tiger, the Chinese Alligator, the Siberian Crane, and the Giant Panda. Moreover, silt trapped behind the dam will not only deprive downstream regions, but also will impede power generation from the back-up. Construction of the dam would require extensive logging in the area. Chinese officials estimate that the reservoir will partially or completely inundate 2 cities, 11 counties, 140 towns, 326 townships, and 1351 villages. About 23800 hectares, more than 1.1 million people will have to be resettled.
NON RENEWABLE RESOURCES
Non-renewable resources cannot be replenished / replaced within a human lifetime. Once they have been used there are no more available. Coal, oil, gold, are non-renewable resources. Currently there are concerns about oil becoming scarce and there have been price rises as oil becomes scarce.

CAPITAL RESOURCES
These are man-made resources used to produce other goods and services. There are two main types of capital goods.

- **Productive Capital** the fixed assets such as machinery or factory, any capital which is not used up in the productive process which go into the making of a good or service.

- **Circulating Capital / intermediate goods** this is the semi finished goods that go into the productive process for example in making a car we need: glass, rubber and steel. These are all resources that have been processed and are used up in the production process - they can't be used to create any more goods and services.

Firms invest in capital goods to help in the production process. Investment is when a firm adds to its stock of capital goods.

**Investment in Economics is the buying of capital resources.**

Capital goods depreciate in value over time. This means that they wear out and lose value. A business will have to invest just too replace or repair the capital that is depreciating.

To expand production a firm will have to add to its capital stock, buy additional machines or equipment to increase the amount of capital resources it has.

HUMAN RESOURCES
Human resources include all input by people into the production of commodities. 

- **Labour** – is the human resource that is hired by employers to produce goods and services. They may be paid a wage, salary or commission. People who perform services for others are paid fees.

- **Entrepreneur** – this is a person who is an organiser of resources. Entrepreneurs take risks in organizing resources to make commodities and in return they receive a profit.

COMBINATION OF RESOURCES USED IN PRODUCTION
Resources are combined to produce a good or service. When a baker makes bread he is using a combination of resources. The bakery, mixer, bowls etc are all productive capital. The flour, yeast and milk etc are all intermediate goods. They have been processed and now are used in the production of bread. The baker and workers at the bakery are all human resources.

A firm can choose to use mostly capital goods to produce a good, this often happens when labour costs are high and so it is more efficient to produce the good using machinery.
A firm may choose to produce the good using mostly human resources. This is often the case where the cost of labour is low. A firm will aim to find a combination of resources that gives it the lowest possible production cost.

We can classify resource combinations as

**Labour intensive** - relatively more human than capital resources are used in the production process. The service industry often uses more human resources than capital resources. Countries like Thailand that have low wages will also tend to use labour intensive production methods. Brands such as Nike will often choose to produce their products in countries such as these.

**Capital intensive** – relatively more capital than labour is used in the production process.

The manufacturing industry will often use more machinery to produce their products. They are able to work 24 hours a day, are often more accurate and they work faster. Countries with higher wages will often use capital intensive methods of production.

**RESOURCE COMBINATIONS:**

**INPUTS** (human, capital or natural resources).

**PROCESS** (the resources are combined and processed).

**OUTPUT** (the finished good or service).

**CULTURAL ASPECTS OF RESOURCE USE**

Indigenous people around the world often have a strong link to the land. In New Zealand Maori have traditional right to land use. Many of New Zealand’s natural resources have a cultural and spiritual significance to Maori. The Resource Management Act has special obligations in relation with the Treaty of Waitangi.
ACTIVITIES

WWF report supports NZ proposal

The creation of a vast network of protected marine reserves to shelter fragile stocks of fish around the world would cost less than is currently being spent on subsidies to fishing industries, the conservation group WWF said in a report issued on Tuesday. New Zealand introduced a proposal for a broadly-based ban on fisheries subsidies at the World Trade Organisation in Geneva in April. According to WWF the cost of managing marine reserves - which would need to cover 30% of the world's oceans to ensure the regeneration of stocks - would be between $NZ19 and $NZ22 billion.

"This is less than the $NZ24 - $NZ40 billion already spent each year on economically and environmentally damaging subsidies to commercial fisheries," the report said.

WWF said that although the idea of creating special marine reserves was first mooted at the UN-organised World Summit on Sustainable Development in Johannesburg in 2002, this is the first time the scheme has been costed. The study showed that its proposed marine parks, which currently represent just 0.5% of the world's oceans, would increase the value of the catch to $NZ128 billion each year.

The group argues that the system of subsidising fishing fleets around the world contributes to the over-exploitation of marine resources and to over-capacity in the sector.

QUESTIONS
1. Fish are often considered to be a renewable resource. Why are they considered to be a renewable resource?

2. What does “over exploitation of marine resources” mean?

3. The government currently uses quotas to try and sustainable manage the fishing resource. What is a quota?

   How would a quota help to sustainable manage the resource?

4. How would the creation of marine reserves help to sustainably manage the resource?

5. Using fish as an example, define renewable resource.
6. Classify the following as renewable or non-renewable resources.

<table>
<thead>
<tr>
<th>Renewable Resources</th>
<th>Non-Renewable Resources</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hydro electricity</td>
<td>Oil</td>
</tr>
<tr>
<td>Nuclear electricity</td>
<td>Iron</td>
</tr>
<tr>
<td>Gas electricity</td>
<td>Thermal electricity</td>
</tr>
<tr>
<td>Gold</td>
<td>Wind</td>
</tr>
<tr>
<td>Kauri Tree</td>
<td>Sand</td>
</tr>
</tbody>
</table>

7. Why is hydro electricity considered to be a renewable resource?

8. Why is oil fired electricity considered to be non-renewable?

9. Which of the following pictures show capital intensive production methods and which show labour intensive production methods?

10. Why is the production of a car more likely to be capital intensive?
11. Is apple picking labour or capital intensive? Why? 
More labour than capital is used in the production process.

12. Define capital. A man made good used to produce other goods.

13. Define investment the buying of capital goods.

14. What will happen to the size of the labour force and the availability of human resources as a result of the following?
Increase in school leaving age
Immigration
Increase in the age of retirement

15. Which of the following are productive capital which are circulating capital?

<table>
<thead>
<tr>
<th>Computer</th>
<th>Flour</th>
<th>Butter</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hammer</td>
<td>Sewing machine</td>
<td>Cotton</td>
</tr>
<tr>
<td>Mixer</td>
<td>Milk</td>
<td>Oven</td>
</tr>
<tr>
<td>Sugar</td>
<td>Dried fruit</td>
<td>Spoon</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>PRODUCTIVE</th>
<th>CIRCULATING</th>
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</table>

16. Most people would classify a sheep as a natural renewable resource, but recently some people have stated that a sheep is a capital resource.
a) Explain how a sheep is a natural resource.
b) Explain how a sheep could be classified as a capital resource.

17. From the following list, identify which resources would be used in a corner dairy. Classify these resources as natural, human or capital.

<table>
<thead>
<tr>
<th>tractor</th>
<th>shop counter</th>
<th>premises</th>
<th>fridges</th>
</tr>
</thead>
<tbody>
<tr>
<td>baby</td>
<td>shelves</td>
<td>shop owner</td>
<td>shop assistant</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>NATURAL</th>
<th>HUMAN</th>
<th>CAPITAL</th>
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</tbody>
</table>

18. Apple picking is a labour intensive activity, while car manufacturing is capital intensive. Explain both of these terms using apple picking and car manufacturing as examples.

19. Explain the term depletable in terms of renewable and non-renewable resources.

20. An important feature of capital goods is that they depreciate. What does this mean?
Many _________________ are used the making of goods and services. These are called the _________________ and are used in a variety of combinations to produce a product.

Natural resources come from the ________ and can be divided into renewable and non-renewable resources. _________________ resources are resources that can be replaced within our life time. _________________ resources are _________________ and cannot be regenerated within our life time.

Electricity can be made using both renewable and non-renewable resources. The wind turbines in the Taurarua ranges are examples of a _________________ way to generate electricity. However the gas generators in Taranaki are an example of a _________________ way to produce electricity.

Human resources are made up of both labour and entrepreneurs. ________ becomes part of the work force and they are compensated for their work by being paid _________________ and salaries. Entrepreneurs are a special type of human resource and they are compensated for the _________________ they take by making profits.

__________________ is a man made resource used to produce goods and services. Firms ________________ in capital resources to produce goods and services. Often firms will invest in new capital because production will become _________________ and cheaper and so the costs of production will _________________.

There are two main types of capital resources, ________________ – this is capital that is not used up in the production process and ________________ – this is capital that is used up in the production process. An example of circulating capital is ________________ used at pizza hut and the productive capital would be the ________________ to make the pizza.

Firms decide what combination of resources to use. Some firms may decide to be more ________________ – this is where the firm uses a lot more human resources than capital resources. If a firm uses more capital resources then it is ________________.
22. Name the resources used in the picture below and classify them as land, human or capital.

![Image of a person using a wheelbarrow]

<table>
<thead>
<tr>
<th>LAND</th>
<th>HUMAN</th>
<th>CAPITAL</th>
</tr>
</thead>
<tbody>
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</tbody>
</table>

23. Write a definition of each of the Economic terms in the space provided in the table below.

<table>
<thead>
<tr>
<th>Economic term</th>
<th>Definition</th>
<th>Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>Capital</td>
<td>Man made resource used to make other goods and services.</td>
<td></td>
</tr>
<tr>
<td>Interest</td>
<td>The price of capital goods. Firms borrow money for investment and the interest is paid to banks.</td>
<td></td>
</tr>
<tr>
<td>Entrepreneur</td>
<td>An organizer of resources – the person who takes a risk to start an organization.</td>
<td></td>
</tr>
<tr>
<td>Rent</td>
<td>The cost of land.</td>
<td></td>
</tr>
<tr>
<td>Profit</td>
<td>Total revenue minus the costs of production.</td>
<td></td>
</tr>
<tr>
<td>Natural resource</td>
<td>Comes from the land. Naturally occurring.</td>
<td></td>
</tr>
<tr>
<td>Renewable resource.</td>
<td>A resource that can be regenerated / replaced within our lifetime, if used sustainably.</td>
<td></td>
</tr>
<tr>
<td>Non-renewable resource.</td>
<td>A resource that is depletable. It cannot be regenerated within our lifetime.</td>
<td></td>
</tr>
</tbody>
</table>
24. Use the following diagram structure to identify 10 resources and the outputs for each of the following production processes.
PRODUCTIVITY: Increasing the efficiency of the firm.

Objectives:
- Understand the concept of productivity, and how to calculate productivity.
- How productivity can be affected by technology, specialization, division of labour, investment, and economies and diseconomies of scale.
- The reasons for, and consequences of, diversification and horizontal and vertical integration.

PRODUCTIVITY:
We know that production is the amount produced.
But what is productivity?
Productivity is the amount that can be produced per unit of input.

Productivity is measured by comparing what is produced (outputs) to the amount of resource used (inputs) over a period of time.

Productivity is calculated by

\[
\text{Productivity} = \frac{\text{OUTPUT}}{\text{INPUT}}
\]

Productivity of labour is output per worker.
Productivity of capital is output per machine.

Example:
If a fast food business employing two workers produces 150 hamburgers a day, the productivity is 75 hamburgers per worker per day.

\[
\text{Productivity} = \frac{150}{2} = 75 \text{ hamburgers per worker.}
\]

A firm is interested in increasing productivity as this lowers the cost of production.

Some of the benefits of increased productivity are

- For the firm: increased efficiency and competitiveness, and increased profits.
- For the worker: income and leisure time can be increased.
- For the economy: economic growth and a higher standard of living.
ACHIEVING INCREASED PRODUCTIVITY
Productivity can be improved by getting people / firms to work more efficiently or smarter.

There are many different ways to improve productivity – it can be improved if any of the inputs are used more efficiently or in a better combination. The replacing of people with machinery will often help to improve productivity. To improve productivity a firm needs to find ways in which labour can be used more efficiently in combination with other resources.

TECHNOLOGY
Investing in new capital or ways in which to produce a good will help a firm to improve output per unit of input. Investing in better equipment, new plant and machinery will help labour to improve labour productivity as less workers may now be required to do the same task or they may become quicker and more efficient at their job.

RESEARCH AND DEVELOPMENT.
Developing new technology (equipment or processes) may involve research and development. Introducing new technology will require investment spending by firms.

Firms can fully automate their factories so that they run 24 hours a day seven days a week, throughout the year. This would mean that they require less human resources – perhaps only management and maintenance staff and would also help the firm to make better use of their inputs, thereby increasing productivity.
PRODUCER DECISIONS ABOUT PRODUCTION

SPECIALISATION
By concentrating on the production of one type of good or service the firm is able to become more efficient at making / providing the commodity. Workers become specialised and more highly skilled in the production of that good increasing productivity. Specialisation leads to interdependence.

DIVISION OF LABOUR
This is the further breaking up of the production process into specialised tasks.

Advantages and disadvantages of division of labour

<table>
<thead>
<tr>
<th>ADVANTAGES</th>
<th>DISADVANTAGES</th>
</tr>
</thead>
<tbody>
<tr>
<td>☑ Workers become more efficient.</td>
<td>☑ May be little job satisfaction in repetitive tasks.</td>
</tr>
<tr>
<td>☑ Reduces the cost of production for each good.</td>
<td>☑ Boring doing the same task over and over.</td>
</tr>
<tr>
<td>☑ Training time is reduced.</td>
<td>☑ Loss of craftsmanship as you are doing only one small part of the production process.</td>
</tr>
<tr>
<td>☑ Workers can concentrate on areas they are good at.</td>
<td>☑ Higher turn over of staff.</td>
</tr>
<tr>
<td>☑ Repetition allows workers to become better and quicker at their jobs.</td>
<td></td>
</tr>
<tr>
<td>☑ Possible automation of boring, dangerous or heavy jobs.</td>
<td></td>
</tr>
</tbody>
</table>

SPECIALISATION IN MANAGEMENT
Like division of labour, jobs in management can be further specialised into a number of separate management positions.

This allows the general manager to delegate responsibility for certain functions in middle management who have specialised in that area and are able to gain the expertise required. This can increase the level of skills and efficiency.

ECONOMIES AND DISECONOMIES OF SCALE
The diagram below shows an average cost curve for a firm. Average cost is calculated by dividing total cost by output.

**Economies of Scale** - these occur when *any increase in output results in a decrease in the average costs of production*. So if a firm decided to increase production and as a result it had to employ more people, if the output per person increased then the average cost of production would decrease.

Economies of scale can occur because of:

1. Specialisation and division of labour
2. Economies of scale - any increase in the firm's size results in savings to the firm through increased efficiencies.
3. Longer production runs, bulk buying of inputs.

**Internal Economies of Scale**

These are economies made within a firm as a result of *mass production*. As the firm produces more and more goods, so average cost begin to fall because of:

- **Technical economies** *Technical economies* made in the actual production of the good. For example, large firms can use expensive machinery, intensively. E.g robots and conveyers.

- **Managerial economies** made in the administration of a large firm by splitting up management jobs and employing specialist accountants, salesmen, etc.

- **Financial economies** made by borrowing money at lower rates of interest than smaller firms.

- **Marketing economies** *Marketing economies* made by spreading the high cost of advertising on television and in national newspapers, across a large level of output.
• **Commercial economies** made when buying supplies in bulk and therefore gaining a larger discount.

• **Research and development economies** made when developing new and better products.

**External Economies of Scale**

These are economies made outside the firm as a result of its location and occur when:

• A local skilled labour force is available.

• Specialist local back-up forms can supply parts or services.

• An area has a good transport network.

• An area has an excellent reputation for producing a particular good. For example, Sheffield is associated with steel.

**Diseconomies of Scale** occur when the cost of producing each item rises as the amount of output increases.

If a firm decided to increase production, as the output increased it would employ more workers. As it continued to employ more workers all that would happen is there would be overcrowding, output per worker would drop and therefore average costs of production would rise.

Diseconomies of scale can occur because of:

1. **Size** - the larger the firm gets the more inefficient it becomes because of such things as overcrowding, loss of communication between management and employees and managerial inefficiencies.

**Internal Diseconomies of Scale**

These occur when the firm has become too large and inefficient. As the firm increases production, eventually average costs begin to rise because:

• The disadvantages of the division of labour take effect.

• Congestion of workers and equipment.

• Management becomes out of touch with the shop floor and some machinery becomes over-manned.

• Decisions are not taken quickly and there is too much form filling.

• Lack of communication in a large firm means that management tasks sometimes get done twice.

• Poor labour relations may develop in large companies.

**External Diseconomies of Scale**

These occur when too many firms have located in one area. Unit costs begin to rise because:
• Local labour becomes scarce and firms now have to offer higher wages to attract new workers.
• Land and factories become scarce and rents begin to rise.
• Local roads become congested and so transport costs begin to rise.

THE GROWTH OF FIRMS.
Firms can expand by.
  o Using retained profits, by putting profits back into the firm.
  o Sell more shares or borrow more finance and invest it into further expansion.
  o The firm can speed up expansion by franchising the business. This is where a proven business package is sold onto others. E.g. Pak’n’Save and McDonalds.
  o Takeover or merge with other firms through integration and diversification.

We have already looked at some ways in which a firm can reduce its costs of production. These included
  ☝ Increased productivity.
  ☝ Increased capital.
  ☝ Economies of scale.
  ☝ New technology.

Another way in which a firm can reduce its costs of production is by expanding the business through **merger or integration**.

**INTEGRATION**

Firms combine their operations to expand.
VERTICAL INTEGRATION:

This is where a firm merges with or combines with a firm in the same kind of industry but at in a different stage of production. A firm may do this to secure a source of supply or to ensure a market for their product.

E.g. An oil company such as B.P.

- Oil wells (Primary sector)
- Oil refinery (secondary sector)
- Transport Fleet (Tertiary sector)
- Petrol station

Types of integration

- **Backward vertical integration** – occurs when a firm buys into a firm in an earlier stage of production. This can secure the source of supply for the firm.
- **Forward vertical integration** – occurs when a firm buys into another firm at a later stage of production. This secures market for their output.

The advantages of vertical integration include.

- Increases the control of the supply chain.
- Increases efficiency of the supply chain.
- Secures source of supply.
- Secures market for their output.

HORIZONTAL INTEGRATION.

This occurs when firms that operate at the same stage of production (the same sector of the economy) merge e.g. two car manufacturers merge. A firm will often merge horizontally to reduce competition and gain market power or to grow larger.
and take advantage of internal economies of scale which will allow it to increase output while cutting costs and reducing personal. This will help the firm to maximize its profits.

Advantages:
- Reduce costs.
- Able to buy in bulk.
- Eliminate competition.
- Reduce personal.
- Increase profits.
- Prices may decrease as firm can reduce costs.

Disadvantages:
- Consumer has less choice as there are now less firms.
- Prices may increase as there is now less competition.
- Less range of choice as there are less firms in the market.

Diversification
This occurs when a producer decides to increase its range or variety of products, such as a market gardening business (growing vegetables) decides to put some of its resources into sheep production.
Diversification could involve a firm taking over or starting up another firm in an unrelated business industry; for example a café owner buying a bookshop. Firms diversify to gain a new source of income and to spread risk. When sales in one industry are depressed, other industries may provide better profits. A disadvantage of this kind of expansion is that the firm may know very little about the new industry.

ACTIVITIES:

1. Define productivity. OUTPUT OVER INPUT

2. Amy owned many businesses but did not manage them all. She could not understand what was happening at Tiny Tots, one of her companies that made children’s clothing. According to Amy’s accountant, the productivity of the workers had increased but total output had decreased. Amy wondered how this could happen. Explain. THE NUMBER OF WORKERS HAD DECREASED AND SO OUTPUT PER WORKER HAD INCREASED AS EACH WORKER WAS PRODUCING MORE SO PRODUCTIVITY HAD INCREASED.

3. Explain why improving productivity is a common goal of businesses. IT LEADS TO GREATER PROFITS AS LESS INPUTS ARE NEEDED TO PRODUCE THE SAME AMOUNT OF OUTPUTS.

4. The productivity of land, labour and capital can be measured.

   Name the type of productivity for each of the following resources.

   Land ______ OUTPUT PER HECTARE
   Human ______ OUTPUT PER PERSON
   Natural ______ OUTPUT PER UNIT OF INPUT

5. Name and write a definition for the two types of natural resource.

   RENEWABLE – CAN BE REGENERATED WITHIN OUR LIFETIME IF USED SUSTAINABLY.
   NON-RENEWABLE, CANNOT BE REGENERATED WITHIN OUR LIFETIME. IT IS DEPLETABLE.

6. Copy and complete the following table by making the necessary calculations.
### Selected Statistics from the Real Rubber Boot Company

<table>
<thead>
<tr>
<th>Year</th>
<th>Employees</th>
<th>Total Boot Production</th>
<th>Boots Produced Per Employee</th>
</tr>
</thead>
<tbody>
<tr>
<td>2000</td>
<td>100</td>
<td>200,000</td>
<td>2000</td>
</tr>
<tr>
<td>2001</td>
<td>80</td>
<td>240,000</td>
<td>3000</td>
</tr>
<tr>
<td>2002</td>
<td>80</td>
<td>280,000</td>
<td>3500</td>
</tr>
<tr>
<td>2003</td>
<td>90</td>
<td>315,000</td>
<td>3500</td>
</tr>
<tr>
<td>2004</td>
<td>110</td>
<td>440,000</td>
<td>4000</td>
</tr>
</tbody>
</table>

i) Which column heading in the table is a measure of productivity?

**BOOTS PRODUCED PER EMPLOYEE**

ii) Does the table focus on the productivity of land, labour or capital?

**LABOUR**

iii) Calculate the percentage change in productivity from 2000 to 2004. **100%**

7. Explain the difference between specialisation and division of labour by process.

**SPECIALISATION IS THE CONCENTRATING ON PRODUCING ONE TYPE OF GOOD OR SERVICE.**

**DIVISION OF LABOUR IS THE BREAKING UP OF THE PRODUCTION PROCESS INTO SEPARATE TASKS. IT IS FURTHER SPECIALISATION OF THE PRODUCTION PROCESS.**

8. Explain three major advantages AND disadvantages of division of labour.

**Advantages**

MORE EFFICIENT, PEOPLE BECOME MORE PROFICIENT AT DOING ONE TASK, QUICKER, TRAINING TIME REDUCED.

**Disadvantages**

BORING DOING THE SAME TASK ALL THE TIME, HIGHER TURNOVER IN STAFF, LOSS OF CRAFTSMANSHIP.
9. Use the different concepts and definitions to fill in the table below.

<table>
<thead>
<tr>
<th>CONCEPT</th>
<th>DEFINITION</th>
</tr>
</thead>
<tbody>
<tr>
<td>Division Of labour</td>
<td>When individual workers within a business concentrate on one main task in the productive process</td>
</tr>
<tr>
<td>Economies of Scale</td>
<td>When businesses increase their use of resources and as a result output increases and per unit cost falls.</td>
</tr>
<tr>
<td>Technology</td>
<td>The use of capital resources and methods of production</td>
</tr>
<tr>
<td>Investment</td>
<td>Buying or purchasing of capital resources.</td>
</tr>
<tr>
<td>Specialisation</td>
<td>When a business concentrates on producing one type of product.</td>
</tr>
<tr>
<td>Diseconomies of Scale</td>
<td>When businesses increase their use of resources and as a result output increases and per unit cost increases.</td>
</tr>
</tbody>
</table>

Division Of labour – When a business concentrates on producing one type of product. Economies of Scale - Buying or purchasing of capital resources. Technology – When businesses increase their use of resources and as a result output increases and per unit costs increases. Investment – When individual workers within a business concentrate on one main task in the productive process. Specialisation – The use of capital resources and methods of production. Diseconomies of Scale – When businesses increase their use of resources and as a result output increases and per unit cost falls.

10. Below each business list examples of the division of labour related to that business.

<table>
<thead>
<tr>
<th>CITY DOCTORS</th>
<th>MCDONALDS</th>
<th>THE WAREHOUSE</th>
</tr>
</thead>
<tbody>
<tr>
<td>NURSES</td>
<td>FRY COOK</td>
<td>MANAGER</td>
</tr>
<tr>
<td>RECEPTIONIST</td>
<td>SERVER</td>
<td>STACKER</td>
</tr>
<tr>
<td>RADIOPHYSICIAN</td>
<td>DRIVE THROUGH</td>
<td>CHECKOUT</td>
</tr>
</tbody>
</table>

11. Complete the following to make statements about productivity.
   i) When resources are used more efficiently productivity **INCREASES**
   ii) When resource use becomes less efficient productivity **DECREASES**
   iii) Inefficient resource use results in **DECREASE IN PRODUCTIVITY**
   iv) Efficient resource use results in **INCREASE IN PRODUCTIVITY**
12. Complete the following table.
RESOURCE USE AND OUTPUT FOR FLOWERNZ Ltd – PRODUCERS OF CUT FLOWERS

<table>
<thead>
<tr>
<th>Year</th>
<th>Natural - hectares</th>
<th>Capital - machines</th>
<th>Human- Workers</th>
<th>Total Output</th>
<th>Output per worker</th>
<th>Total Cost</th>
<th>Average Cost</th>
</tr>
</thead>
<tbody>
<tr>
<td>1995</td>
<td>60</td>
<td>8</td>
<td>4</td>
<td>1200</td>
<td>300</td>
<td>$720,000</td>
<td>600</td>
</tr>
<tr>
<td>1996</td>
<td>90</td>
<td>12</td>
<td>6</td>
<td>2100</td>
<td>350</td>
<td>$1,080,000</td>
<td>514</td>
</tr>
<tr>
<td>1997</td>
<td>120</td>
<td>16</td>
<td>8</td>
<td>3200</td>
<td>400</td>
<td>$1,480,000</td>
<td>463</td>
</tr>
<tr>
<td>1998</td>
<td>150</td>
<td>20</td>
<td>10</td>
<td>5000</td>
<td>500</td>
<td>$1,800,000</td>
<td>360</td>
</tr>
<tr>
<td>1999</td>
<td>180</td>
<td>24</td>
<td>12</td>
<td>5400</td>
<td>450</td>
<td>$2,160,000</td>
<td>400</td>
</tr>
<tr>
<td>2001</td>
<td>210</td>
<td>28</td>
<td>14</td>
<td>5600</td>
<td>400</td>
<td>$2,520,000</td>
<td>450</td>
</tr>
<tr>
<td>2002</td>
<td>240</td>
<td>32</td>
<td>16</td>
<td>5664</td>
<td>354</td>
<td>$2,880,000</td>
<td>509</td>
</tr>
</tbody>
</table>

i) Which column in the table measures production? **TOTAL OUTPUT**

ii) Which column measures productivity? **OUTPUT PER WORKER**

iii) Explain what is meant by Economies of scale. **AS OUTPUT INCREASES AVERAGE COST DECREASES**

iv) Over which years did FlowerNZ Ltd benefit from economies of scale? Justify your answer. **1995 TO 1998 – AVERAGE COST IS FALLING AS OUTPUT IS INCREASING**

v) In which year was the combination of resources the most efficient? Justify your answer. **1998 – AVERAGE COST IS THE LOWEST. AND OUTPUT PER WORKER IS THE HIGHEST.**

vi) Explain what is meant by diseconomies of scale. **AS OUTPUT INCREASES AVERAGE COST INCREASES**

13. Explain two causes of Economies of scale. **BULK BUYING, INCREASED DIVISION OF LABOUR, TECHNICAL ECONOMIES, MANAGERIAL ECONOMIES.**

Diseconomies of Scale. **DISADVANTAGES OF DIVISION OF LABOUR SET IN, CONGESTION, COMMUNICATION PROBLEMS.**

14. Explain how the productivity of labour can be improved. **USING MORE CAPITAL, GREATER DIVISION OF LABOUR, EDUCATION, TRAINING, R AND D INTO BETTER PRODUCTION METHODS. WILL HELP TO INCREASE OUTPUT PER WORKER INCREASING WORKER PRODUCTIVITY.**
15. What do we mean by investment in economics? Give an example. **THE BUYING OF CAPITAL – MACHINERY, NEW TECHNOLOGY.**

16. Explain how the productivity of labour could be improved by new technology. **BETTER PRODUCTION METHODS, INCREASED EFFICIENCY, LESS WORKERS NEEDED AND PRODUCTION INCREASES SO OUTPUT PER PERSON INCREASES LEADING TO INCREASED PRODUCTIVITY.**

17. Explain the difference between production and productivity. **PRODUCTION IS TOTAL OUTPUT.**

**PRODUCTIVITY IS OUTPUT PER UNIT OF INPUT – IT IS A MEASURE OF EFFICIENCY.**

18. Define productivity. **OUTPUT / INPUT**

19. Explain, using examples the difference between fixed and variable costs. **A FIXED COST IS A COST THAT DOESN’T CHANGE NO MATTER HOW MUCH IS PRODUCED E.G. A FACTORY.**

**A VARIABLE COST CHANGES WITH OUTPUT AS OUTPUT INCREASES THE VARIABLE COST WILL ALSO INCREASE. E.G. LABOUR**
Sean is the owner of ‘Styli Carpets’ a factory which produces top quality carpets. Sean is looking to expand and asks a consultant for advice on what he should do. The consultant suggests that Sean buys “Just Carpets”, a national retail chain that sells carpets.

20. a) If Sean decides to buy “Just Carpets”, what type of integration would this be and why would he choose to do this?:

VERTICAL INTEGRATION – SECURE MARKET FOR OUTPUT.

b) State two consequences of Sean buying ‘Just Carpets’ for Consumers

CHEAPER PRICES, LESS CHOICE

Producers

SECURES MARKET, INCREASES EFFICIENCY OF SUPPLY CHAIN

c) Sean has decided to diversify. Using styli carpets as an example, define diversification.

WHEN A FIRM BUYS ANOTHER FIRM IN AN UNRELATED INDUSTRY, E.G. SEAN BUYS A BAKERY.

21. Use the article to answer the questions which follow.

FASHION STORE SOLD

It was announced today that the owners of Graces Fashions have sold their business to Amy’s Boutique. A spokesperson for Amy’s Boutique assured customers of Graces Fashions that the Fashions range of products will continue to be produced and that the resulting economies of scale will be of benefit to customers. The only changes for employees will be some reorganisation because of further division of labour.
a) The management of Amy’s Fashions want to increase their firm’s productivity. What is meant by the term “productivity”? 

______________________________

—

OUTPUT / INPUT________________

b) Explain why the production of Amy’s Boutique could be affected after the takeover by:
   i) increased division of labour.
   WITH A LARGER FIRM THEY WILL BE ABLE TO FURTHER SPLIT UP THE PRODUCTION PROCESS AND USE MORE DIVISION OF LABOUR. ______
   ii) economies of scale.
   ______ AS THE FIRM BECOMES LARGER IT WILL BE ABLE TO TAKE ADVANTAGE OF ITS SIZE THROUGH BULK BUYING, INCREASED DIVISION OF LABOUR AND SO AS OUTPUT INCREASES AVERAGE COSTS WILL FALL

c) In three or four sentences explain two likely results of the takeover for Amy’s Boutique and two likely results of the takeover for Graces Fashions.

INCREASED PROFITS DUE TO GREATER EFFICIENCY, JOB LOSSES, ECONOMIES OF SCALE, INCREASE IN PRICES FOR CONSUMERS.

d) What kind of integration is the takeover likely to be?
   HORIZONTAL INTEGRATION______________________________

Name two consequences of this kind of integration

For the producer
1. INCREASED EFFICIENCY, HIGHER PROFITS________________
2. CAN RAISE PRICES, LOWER COSTS OF PRODUCTION. ______

For the consumer
1. LESS CHOICE AS RANGE OF PRODUCTS DECREASE__________
2. HIGHER PRICES ____________________________

22. Explain the link between the economic concepts of specialisation, interdependence and exchange.
   BECAUSE OF SPECIALISATION PEOPLE RELY ON OTHER PEOPLE FOR THE COMMODITIES THEY NO LONGER PRODUCE, THEY HAVE TO EXCHANGE THE GOODS AND SERVICES THEY PRODUCE WITH OTHER PEOPLE TO OBTAIN THE COMMODITIES THEY NEED. THEY RELY ON OTHER PEOPLE
FOR COMMODITIES THEY DON’T PRODUCE AND OTHER PEOPLE RELY ON THEM FOR THE COMMODITIES THEY PRODUCE, THEY ARE INTERDEPENDENT.

23. Amy’s Boutique has a decentralised management structure.
   Name two advantages of this kind of management structure.
   __________ SIMPLER LINES OF COMMUNICATION, GREATER DELEGATION, INCREASED DIVISION OF LABOUR, INCREASED EFFICIENCY. __________

24. There are two types of vertical integration. Using an example for each, explain what the two kinds of integration are.
   FOREWARD VERTICAL – MERGING WITH A FIRM AT A LATER STAGE OF PRODUCTION E.G. A WATTIES BUYING A SUPERMARKET.
   __________
   BACKWARD VERTICAL – MERGING WITH A FIRM AT AN EARLIER STAGE OF PRODUCTION E.G. WATTIES BUYING ORCHARDS.
   __________

25. Define the following terms
   a) Integration __ JOINING WITH ANOTHER FIRM __________
   b) Merger __ A FRIENDLY JOINING OF FIRMS __________
c) Takeover  
A HOSTILE MERGER OR JOINING OF FIRMS

d) Diversification  
MERGING WITH A FIRM IN AN UNRELATED INDUSTRY

e) Vertical Integration  
MERGING WITH ANOTHER FIRM AT A DIFFERENT STAGE OF PRODUCTION

f) Horizontal integration  
MERGING WITH ANOTHER FIRM AT THE SAME STAGE OF PRODUCTION.

26. Businesses diversify and integrate for a number of reasons and there are a number of consequences for doing so. Below reasons and consequences are mixed up.

a) Complete the table below to identify the reasons for each type of business expansion and the associated consequences.

<table>
<thead>
<tr>
<th>Improved or more efficient resource use as production, distribution and selling are rationalized. To reduce dependence on a limited range of goods for which the price fluctuates. Reduced employment as the business rationalizes the production process and workers are made redundant. To reduce costs of production, distribution and selling. To ensure an outlet for the product (guaranteed market) or a supply of raw materials or components. An increased range of goods and services for consumers. There may be lower prices for consumers if the benefits of economies of scale are passed on. Lower price for consumers if the lower costs of production, distribution and selling are passed on. The current range of products is no longer in demand but other products are. To lower average costs of production through economies of scale. More efficient resource use as the business now produces products that consumers want. Less competition amongst businesses and maybe higher prices for consumers. To increase market share. Improved or more efficient resource use through economies of scale.</th>
</tr>
</thead>
<tbody>
<tr>
<td>i) Businesses diversify for the following reasons:</td>
</tr>
<tr>
<td>o To reduce dependence on a limited range of goods for which the price fluctuates.</td>
</tr>
<tr>
<td>o The current range of products is no longer in demand but other products are.</td>
</tr>
<tr>
<td>ii) Consequences of diversification include:</td>
</tr>
<tr>
<td>o An increased range of goods and services for consumers.</td>
</tr>
<tr>
<td>o More efficient resource use as the business now produces products that consumers want.</td>
</tr>
<tr>
<td>iii) Businesses integrate vertically for the following reasons:</td>
</tr>
<tr>
<td>o To ensure an outlet for the product (guaranteed market) or a supply of raw materials or components.</td>
</tr>
</tbody>
</table>
iv) Consequences of vertical may include:
- Improved or more efficient resource use as production, distribution and selling are rationalized.
- Lower price for consumers if the lower costs of production, distribution and selling are passed on.
- Reduced employment as the business rationalizes the production process and workers are made redundant.

v) Businesses integrate horizontally for the following reasons:
- To lower average costs of production through economies of scale
  - To increase market share.

vi) Consequences of horizontal integration include:
- Improved or more efficient resource use through economies of scale.
- There may be lower prices for consumers if the benefits of economies of scale are passed on.
  - Less competition amongst businesses and maybe higher prices for consumers.
27. Complete the following diagram.

```
Business Expansion

<table>
<thead>
<tr>
<th>Vertical Integration</th>
</tr>
</thead>
<tbody>
<tr>
<td>Reduce Competition</td>
</tr>
<tr>
<td>Backward vertical.</td>
</tr>
</tbody>
</table>

| Merging with a firm in an unrelated industry |
```
PRICE AND NON-PRICE COMPETITION.

Objectives:
- Identify the ways firms compete through price and non-price competition.
- Understand the advantages and disadvantages to both consumers and producers of non-price competition.

PRICE COMPETITION
Producers use this strategy to try and undercut the competition and increase sales. By reducing their price producers are trying to increase the quantity demanded for their product and decrease the demand for their competitor’s product.

![Demand graph for Shell and Mobil petrol](image)

Shell is able to increase its market share by reducing its price.

Price competition involves the firm in some way reducing its price, and may include:
- Two for the price of one.
- Discounts.
- Loss leaders – an item deliberately sold at loss to get customers into the store.

Price competition may lead to price wars were two or more firms try to undercut each other. This may lead to a loss in profits and eventually one of the firms closing down. Recent price wars can be seen in the airline industry. Larger firms such as the Warehouse, are able to take advantage of economies of scale such as bulk buying, marketing economies etc. and undercut smaller firms eliminating them. There are often a lot of arguments about ‘big box’ stores that often eliminate smaller firms when they come to a town.
NON-PRICE COMPETITION.

PRODUCT DIFFERENTIATION

PRODUCT VARIATION

PRODUCT MODIFICATION

VERTICAL PRODUCT VARIATION

PRODUCT DIFFERENTIATION.
This involves encouraging consumers to buy a good by making it appear different or better to the other products.

Product differentiation includes:

- **Advertising** – e.g. T.V, radio, magazines etc. A new trend has been product placement in shows, where the actors use the advertising company’s products.
- **Branding** – creating an image or brand so that customers can easily identify their product e.g. Nike, McDonalds.
- **Packaging** - making their packaging look more attractive. Hubbard’s differentiates its cereals in this way.
- **Location** – a good location can help a firm to increase sales. Shop rents / building prices are often determined by foot traffic – the number of people going past that point.
- **Sponsorship** - firms sponsor local clubs, schools or national teams to raise awareness for their product. They get exposure from T.V. and support from supporters of that team.
- **Service** - some firm concentrate on offering a better service than anyone else to encourage people to use their shop / product.
- **Loyalty schemes** - such as Fly Buys encourage people to use their product as they get rewards for spending money there.

PRODUCT VARIATION

Product variation is where firms give their product *real* variations to try and get consumers to buy their product.

PRODUCT MODIFICATION

Producers give their products real differences such as airbags in cars, better body designs, raspberry coke etc. The modifications may draw customers away from their competitors.

VERTICAL PRODUCT VARIATION

To make their product appeal to a wider range of income levels, some producers may introduce a number of different models of the same product.

e.g. Car manufactures may have the economy model, GTI model, station wagon model, sports model with different engine sizes or extra features for the more expensive models, but the body design general aspects are still the same.
ADVANTAGES AND DISADVANTAGES OF NON-PRICE COMPETITION.

Advantages to Suppliers
- Increases demand for their product.
- Greater market share.
- Greater market power.
- Increased profits.

Disadvantages to Suppliers
- Higher selling costs due to advertising costs.
- Cost of production increases.
- Higher Average Costs.

- Vertical product variation leads to increased costs of production for each model of products as less able to take advantage of economies of scale.

ADVANTAGES TO CONSUMERS
- Consumers may believe they have more choice.
- With product variation they do get a wider choice.
- Better quality of goods and services.
- Better informed of choices.
- Better standards / quality as producers are forced to continually update and improve their products.

DISADVANTAGES TO CONSUMERS
- Higher prices as producers pass on increased costs.
- May not be able to distinguish between products.
- ‘Wider” choice may be just packaging or branding – product may not be any better.
**Questions:**
1. For the following state whether it is an example of price or non-price competition.

<table>
<thead>
<tr>
<th>Location</th>
<th>End of season sale.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Service</td>
<td>Interest free.</td>
</tr>
<tr>
<td>2 for the price of one.</td>
<td>Sponsorship.</td>
</tr>
<tr>
<td>Discounts.</td>
<td>Extra Features</td>
</tr>
<tr>
<td>Giveaway</td>
<td>10% off.</td>
</tr>
<tr>
<td>Competitions</td>
<td>Buy one get one free.</td>
</tr>
</tbody>
</table>

2. Give two examples of non-price competition petrol companies use.

3. Give one advantage and one disadvantage to consumers of the non-price competition petrol company’s use.

4. Complete the following with a ✓ in the appropriate column.

<table>
<thead>
<tr>
<th>Advantage.</th>
<th>To the consumer.</th>
<th>To the producer.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Allows individuals to find out about the product.</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>Gets the product known.</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Cheaper to purchase.</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Undercuts competitor.</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Allows people to buy now pay later.</td>
<td></td>
<td>✓</td>
</tr>
</tbody>
</table>

5. Define product differentiation

6. Define, with an example, product variation.
7. Complete the table below.

<table>
<thead>
<tr>
<th></th>
<th>Advantage to firms</th>
<th>Disadvantage to firms</th>
<th>Advantage to consumers</th>
<th>Disadvantage to consumers</th>
</tr>
</thead>
<tbody>
<tr>
<td>Price Competition</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Non-price competition.</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

8. Explain why aggressive price cutting is unlikely to be a strategy of the petrol companies in the long run.

9. What are the consequences to producers and consumers of increased product variation?

   Producers
   
   Consumers
10. Complete the following diagram.