COMMERCE PRESENTATIONS AND PUBLICATIONS



VCE ECONOMICS

Unit 1 Examination 2017

SUGGESTED RESPONSES

CPAP © 2017 VCE Economics Unit 1 Examination (Answers and marking scheme)

SECTION A MULTIPLE CHOICE ANSWERS

1	А	В	С	D
2	Α	В	С	D
3	Α	В	С	D
4	Α	В	С	D
5	Α	В	С	D
6	Α	В	С	D
7	Α	В	С	D
8	Α	В	С	D
9	Α	В	С	D
10	Α	В	С	D
11	Α	В	С	D
12	А	В	С	D
13	Α	В	С	D
14	А	В	C	D
15	A	В	С	D

SECTION A: Multiple Choice QUESTIONS (30 MARKS)

Question 1

Which of the following is most likely to be considered the opportunity cost associated with spending \$550 million to construct a gas-fired electricity plant with battery storage, to address energy security?

- a) The benefit that would be enjoyed if the \$550 million was spent on schools and a new hospital
- b) The reduction in environmental damage gained from a less carbon-intensive energy system
- c) The total construction cost of the plant and battery system
- *d)* The net benefit that would be enjoyed if the \$550 million was spent on the next best alternative

Question 2

According to the traditional economic view of consumers, which of the following is incorrect?

- a) Consumers are inherently self-interested and focused on maximising their own utility
- b) Consumers are likely to choose an option that minimises their utility
- c) Consumers consistently make rational choices that attempt to maximise their wellbeing
- d) Consumers generally have access to all of the information required to make rational, informed decisions

Question 3

Average material living standards in Australia are likely to decline if

- a) there is increased traffic congestion and pollution as a result of a larger population
- b) there is a decrease in access to health and education services
- c) there is a decrease in Australia's output and more people become unemployed
- d) real Gross Domestic Product rises faster than the increase in population

Question 4

The data in the table below represent the utility gained by a student in their consumption of chocolate frogs.

Chocolate frog	Total utility (utils*)
1 st frog	15
2 nd frog	27
3 rd frog	35
4 th frog	39
5 th frog	40
6 th frog	38

 \ast 'utils' are a theoretical measure of utility

According to the data in the table, which of the following statements is correct?

- a) The student experiences a decrease in total utility with every frog they eat
- b) The student experiences an increase in their total satisfaction with every frog they eat
- c) The student experiences the most satisfaction from the first frog they eat
- d) The student should eat six frogs, because their total utility is still positive

If a product became more popular, while at the same time the producers experienced increased costs of production, it can be concluded that

- a) equilibrium quantity and price will both rise.
- b) equilibrium price may rise or fall.
- c) equilibrium quantity will fall.
- d) equilibrium quantity may rise or fall, but equilibrium price will rise.

Question 6

A large barrier associated with entering the Australian domestic airline industry would be:

- a) The need to employ many workers
- b) The existence of many competitors, including Australian and overseas carriers
- c) The high costs of operating planes, including the need for very expensive aviation fuel
- d) The large expenditure on planes, terminals and other investment to establish the airline

Question 7

A study published in the British Medical Journal in 2016 found that, following the introduction by Mexico of a 10% tax on sugary drinks, there had been a 12% reduction in the sale of such drinks and a 4% increase in the sale of non-taxed bottled drinks, like diet soft drinks. In relation to this case, which of the following statements is not true?

- a) There will have been an increase in the allocation of resources to non-taxed drinks
- b) Sugary drinks and non-taxed bottled drinks are perfect substitutes
- c) The price of non-taxed bottled drinks is likely to rise
- d) The relative price of non-taxed bottled drinks has fallen

Question 8

Which of the following would lead to an expansion in the supply of spinach?

- a) A successful marketing campaign promoting the health benefits of spinach
- b) The release of research showing spinach consumption can be detrimental to health
- c) Government announces a subsidy to vegetable growers to help cover the cost of production
- d) An investigation reveals that many farm workers, including those picking spinach, are being underpaid

Question 9

Bounce-A-Lot Trampoline Centre offers four levels of ticket pricing: Adults, Pensioners, T(w)eens and Under 10s, whereas its neighbour, Inflatable World inflatable play centre, offers one flat entry price for all customers. Bounce-a-lot is undertaking

- a) multibranding.
- b) price discrimination.
- c) predatory pricing.
- d) anti-competitive conduct.

Examine the diagram below. In the market for new cars, which of the following is most likely to cause the change shown in the diagram?





- a) The price of second hand cars decreases
- b) The price of new cars decreases
- c) The price of inputs for new cars decreases
- d) The price of petrol decreases

Question 11

Which of the following is unlikely to be the result of decreased competition in Australia's supermarket sector?

- a) Businesses will no longer be able to earn 'super normal' profits
- b) Productive (technical) efficiency within the industry is likely to worsen
- c) It will be more difficult for new businesses to enter the market
- d) It is likely that prices will increase across the sector

Question 12

Which of the following scenarios is most likely to cause the new equilibrium in the market for apples in Victoria as depicted in the diagram below?



- a) A hailstorm damages apple orchards across the state and a study links apple consumption to reduced cancer risk
- b) A successful marketing campaign for apples and an increase in the productivity of apple orchard workers
- c) A favourable growing season leads to a record harvest of apples and the price of bananas (a substitute for apples) fall
- d) SPC opens a new factory making apple pies and the government removes subsidies to agricultural producers (including apple growers)

Which of the following conditions is not likely to occur in a perfectly competitive market?

- a) There are many buyers and sellers
- b) An individual buyer can influence the level of output in the market
- c) There are low set up costs, and it's easy for new sellers to enter the market
- d) Sellers offer identical products in the market

Question 14

Which of the following is most likely to result in a higher relative price of smart phones?

- a) A lower price of smart phones with all other prices in the economy decreasing by the same amount
- b) A higher price of smart phones with all other prices in the economy increasing by the same amount
- c) A lower price of smart phones with all other prices in the economy decreasing by a larger amount
- d) A higher price of smart phones with all other prices in the economy increasing by a larger amount

Question 15

The Austrian government operates an opt-out organ donor scheme. All citizens over 18 are considered to have consented to be organ donors unless they choose to withdraw from the scheme. Austria has much higher rates of organ donation than Australia, which has an opt-in scheme. This is an example of which influence on how humans make decisions?

- a) Status quo bias
- b) Herd behaviour
- c) Vividness
- d) Framing bias

SECTION B: STRUCTURED QUESTIONS (30 MARKS)

Name

Question 1 (2 marks)

Describe the basic economic problem of relative scarcity and explain whether all economies, even rich countries like Australia, face this problem.

- 1st mark for demonstrating an understanding of relative scarcity
- 2nd mark for demonstrating that all economies face this problem, regardless of whether they have a large or small endowment of resources.

Sample answer: The basic economic problem is the problem of 'relative scarcity' which all economies and individuals experience. Relative scarcity is the fact that the wants and needs of societies are always greater than the resources available to create goods and services required to satisfy those wants and needs. This is because wants and needs are infinite (unlimited) whereas resources are finite (limited). Ultimately, even rich countries like Australia with its very large resource endowment, face relative scarcity. This is because, even in rich countries, not all wants can be satisfied because there is a finite amount of

resources available. Also, once one need or want is satisfied, many other arise in its place, meaning that wants are ultimately infinite (or unlimited).

Question 2 (4 marks) Examine the list of statements below.

Choose <u>one</u> 'normative' economic statement and <u>one</u> 'positive' economic statement.

For each statement you have chosen, justify your classification of that statement as either normative or positive.

Cutting company tax will increase economic activity and lead to lower unemployment. (N)

Australia is one of the wealthiest countries in the world. (P)

Minimum wages in Australia are too high. (N)

The level of final output in Australia, measured by GDP, rose by 2.4% between December 2015 and December 2016. (*P*)

Improving productivity will lead to an improvement in technical efficiency. (P)

Improving productivity always leads to an improvement in allocative efficiency. (N)

An increase in personal tax rates will tend to reduce expenditure by households. (P)

The decision to reduce penalty rates paid on Sundays will be good for the economy. (N)

- 1 mark for accurately identifying one normative economic statement and one positive economic statement from the list
- 3 marks for accurate justification of the classification of the statement as normative or positive with reference to the meaning of 'normative economics' and 'positive economics'

Sample answer:

Normative statement and justification:

The statement 'Minimum wages in Australia are too high' is a normative economic statement. Normative economic statements are based on opinion or value judgements. They cannot be verified or tested to be either true or false. The conclusion that 'minimum wages in Australia are too high' will be based on an individual's opinion or value judgement, and others who have a different perspective (such as those workers on minimum wages) may conclude that minimum wages are actually too low.

Positive statement and justification:

The statement 'An increase in personal tax rates will tend to reduce expenditure by households' is a positive economic statement. Positive economic statements are factbased statements that can be verified or tested to be either true or false, using evidence. When personal income tax rates are increased this reduces the income available to households for spending, and therefore will tend to reduce expenditure by households. **Note 1:** Students are <u>not</u> required to classify <u>all</u> the statements as normative or positive, but these classifications have been suggested in the table above for the benefit of the assessor.

Note 2: Students should be rewarded for classifications that do not comply with the suggested classification above, but which are justified with accurate reference to the difference between normative and positive economic statements.

Question 3 (9 marks)

The table below shows the production possibilities of the small fictional economy of Schooltopia. Use the data to complete the questions that follow.

Combination	Consumer	Capital goods
	goods (\$000)	(\$000)
Α	140	0
В	115	30
С	110	40
D	80	70
E	50	80
F	0	95

a) Use the data provided to plot a 'production possibility frontier' (PPF/PPC) for Schooltopia. 2 marks

- 1st mark for a somewhat accurate PPF/PPC diagram but lacks some axis labels
- 2nd mark for a PPF/PPC diagram that is accurately drawn and fully labelled



b) Calculate the opportunity cost of each of the following economic decisions. 0.5 + 0.5 = 1 mark

i) Production of the first \$70,000 worth of capital goods

Answer: \$60,000 worth of consumer goods

ii) Moving from producing combination D to producing combination B

Answer: \$40,000 worth of capital goods

Note: Students should not be rewarded for simply quoting a dollar amount. Students must accurately identify the value of the items foregone in making the change in production.

- c) Explain why all output combinations from A to F would be considered technically efficient (productively efficient), but not all combinations would be considered allocatively efficient. 3 marks
 - 1st mark for explaining that all combinations of output on a PPF/PPC represent the combinations of maximum possible production achievable when all available resources are fully and efficiently used.
 - 2nd mark for making the link between the points on the PPF/PPC and the definition of productive efficiency.
 - 3rd mark for defining allocative efficiency and explaining that only one combination on the PPF/PPC will be considered allocatively efficient.

Sample answer: The PPF/PPC represents the maximum production possibilities available when all resources are fully and efficiently employed. Therefore, by definition, all points on the PPF/PPC are productively efficient – meaning they represent a situation where the resources of Schooltopia are producing the maximum amount possible at the lowest cost. However, only one point on the PPF/PPC will be considered allocatively efficient. Allocative efficiency refers to the situation where resources are allocated in the economy in combinations that provide the maximum possible benefits for consumers and the nation. Only one point on the PPF/PPC will be in the nation's best interest. What is or isn't considered the most efficient allocation of resources will depend on the values it places on various goods and services.

d) On the PPF drawn in part a, illustrate the impact of each of following economic events. Clearly label each event on the diagram. 3 marks

- i) Schooltopia suffers a large reduction in population and a drought in the same year.
- 1 mark for drawing and labelling a new PPF that has shifted inwards from the original PPF

ii) Schooltopia experiences high unemployment.

- 1 mark for drawing and labelling a single point inside the original PPF (to represent that some resources are unemployed)
- iii) Schooltopian scientists develop new technology that improves productivity in the country.
- 1 mark for drawing and labelling a new PPF that has shifted outwards from the original PPF



Question 4 (7 marks)

The Case for Investing in Last Resort Housing

A report released in March this year has, for the first time, calculated the cost of homelessness in Victoria. The economists from the University of Melbourne Sustainable Society Institute found that homelessness cost \$25,615 per homeless person, per year. Their calculations included the cost of extra healthcare, crime and other factors.

The economists calculated that it would cost \$60,000 to create each emergency accommodation bed (last-resort housing) required to provide housing for Victoria's homeless population of 7,600, but that the investment would result in savings of \$10,800 per person per year, calculated over 20 years. The benefit-cost ratio of spending on last-resort housing was calculated at 2.7 over 20 years.

Lead author of the report, Ellen Witte, stated 'We hope that this will make clear to the Government that if you provide people with a roof over their heads there will be a lesser demand and impact on emergency services, on healthcare, on the police force because there will be a reduction of crime and, last but not least, it will greatly improve the quality of life of the people involved.'

Adapted from reports at: <u>http://sustainable.unimelb.edu.au/case-investing-last-resort-housing</u> and <u>http://www.abc.net.au/news/2017-03-16/cheaper-to-provide-homes-for-homeless-rather-sleep-rough/8354284</u>

a) Explain the meaning of 'cost-benefit analysis' and explain <u>why</u> a cost-benefit analysis is conducted when governments are making major decisions. 3 marks

- 1 mark for defining 'cost-benefit analysis' (CBA)
- 1 mark for a brief explanation of how a CBA is conducted
- 1 mark for an explanation of why it is important for governments to conduct CBAs when making major decisions

Sample answer: [All economic decisions involve trade-offs – in order to gain something of value we give up the chance to use those resources for a range of other purposes.] A costbenefit analysis is a comparison of the expected costs and the expected benefits of a particular course of action or project. When governments are deciding whether or not to proceed with a major project (such as investing in the development of last-resort housing for the homeless), all of the benefits and costs of the project will be listed in a common unit of measurement (typically a monetary value). The total benefits will be compared to the total costs, to determine whether the benefits of the project will outweigh its costs. This will help the government to minimise the opportunity cost of major economic decisions and ensure that the most efficient allocation of resources is achieved.

Note: Square bracketed section not required for full marks.

b) Explain what the benefit-cost ratio calculated indicates about the proposal to provide last-resort housing to the homeless? 2 marks

- 1st mark for explaining what the value of BCR indicates about the viability of a project
- 2nd mark for explaining that, at 2.7, the BCR benefit-cost ratio indicates that the project should proceed.

Sample answer: [A benefit-cost ratio (BCR) is the value of the (estimated) benefits of undertaking the project divided by the (estimated) costs of the project.] If the BCR is greater than 1, this indicates that a project's benefits outweigh the costs, and therefore it could be argued that the project should proceed. In the case of the last-resort housing project proposal, a BCR of 2.7 indicates that, once all the benefits and all the costs of the project will outweigh the costs of the project by a ratio of 2.7 to 1. [Supporters of the project would use this as evidence that the project should proceed.]

Note: Square bracketed sections not required for full marks.

c) Assume that the Victorian government chose to proceed with the proposal made in the report. Explain the potential impact on the material living standards <u>or</u> the non-material living standards of Victorians. 2 marks

- 1st mark for defining material living standards <u>or</u> non-material living standards
- 2nd mark for explaining at least one impact of the decision on either the material or non-material living standards of Victorians.

Sample answer: Non-material living standards refer to the quality of life factors that impact our overall standard of living. These are factors that influence our well-being beyond our ability to purchase goods and services. If the Victorian government chooses to proceed with the proposal to build more last-resort housing to provide accommodation for Victoria's homeless population this will add to the non-material living standards of homeless Victorians through reduced stress, increased access to safe housing and improved health outcomes. The decision is also likely to improve the non-material living standards of those Victorians not directly affected by homelessness, as reducing the level of homelessness in the community will mean Victoria will become a community with lower levels of income and wealth inequality and higher general happiness levels because we live in a fairer, safer community.

Question 5 (8 marks)

Ngaire and Tran are friends. They are studying economics at secondary school but they have many friends who are not lucky enough to study such an interesting subject. Over lunch one day, they explain to their friends that the traditional economic viewpoint sees consumers as Homo economicus, also known as 'rational economic humans'.

a) Explain what Ngaire and Tran mean by *Homo economicus* and describe one characteristic of *Homo economicus*. 3 marks

- 1st mark for a brief explanation of homo economicus as a 'rational, self-interested being'.
- 2nd mark for a more detailed explanation of homo economicus that refers to the idea of making judgements and maximising utility or benefit.
- 3rd mark for a description of one feature of homo economicus including rationality, the ability to order preferences, motivated almost exclusively by self-interest, and able to undertake fully-informed decision-making.

Sample answer: The concept of 'Homo economicus' is used in economic theories to describe what economists traditionally assumed would be the behaviour of a typical consumer – a 'rational economic man'. Homo economicus sees humans as rational and self-interested beings, who are capable of continually making judgements and choices to optimise (maximise) the benefit they enjoy as a result of those choices. [When faced with a choice, homo economicus will consider all options, weigh up the costs and benefits of each choice, and maximise the benefit by always choosing the best option. The best option is assumed to be when the consumer chooses the thing they most need, at the cheapest price, which maximises their utility and minimises their opportunity cost.]

One characteristic of Homo economicus is that 'he' will always act rationally. When faced with a choice, he will be able to rank (or order) his preferences, weigh up the expected costs and benefits of each option and act to optimise the benefit to himself by always choosing the best option.

Note: Square bracketed section not required for full marks.

When their friends express scepticism about humans acting in the way assumed by economists, Ngaire and Tran concede that a group called 'Behavioural Economists' have critiqued some of the assumptions of the 'rational economicman' model of humans as consumers.

b) Explain <u>one</u> insight from behavioural economics that critiques the model of *Homo economicus,* illustrating your answer with an example. 2 marks

- 1st mark for identifying and explaining one insight from behavioural economics (such as bounded rationality, bounded self-interest or bounded willpower)
- 2nd mark for providing an example illustrating the insight

Sample answer: [Behavioural economics is a field of economics that seeks to incorporate the insights of psychology into economics, by observing how consumers actually make decisions, rather than assuming a theoretical model of human economic decision making.] One insight of behavioural economics is that in reality humans do not always make rational decisions, and in fact may experience 'bounded rationality'. One common decision-making error humans make that limits their ability to act rationally is 'vividness'. Vividness refers to the idea that consumers often place too much weight on a small number of vivid observations – observations that are very recent or close at hand. For example, when

someone is considering buying a new washing machine, they make undertake extensive research into all of the brands, reading reports on the quality of each brand in consumer magazines, searching the internet for testimonies, investigating relative prices and warranties. They may make a rational decision to buy a certain brand of machine, only to hear from just one friend that she had a terrible experience with that brand of machine. Often humans are tempted to place a large amount of weight on the small piece of negative feedback from the friend compared to the vast amount of positive feedback on the brand found in various locations. This is because the friend's feedback is more 'vivid' – more immediate or obvious. This may direct the consumer away from making a rational decision to purchase the superior machine that would maximise their utility.

Note 1: Square bracketed section not required for full marks.

Note 2: Students should also be rewarded for identifying other specific decision-making 'errors' committed by consumers that limit rational decision-making – overconfidence bias, vividness, anchoring effect, herd behaviour, status quo bias and framing bias or demonstrate bounded self-interest or bounded willpower. For example, humans often act with 'bounded self-interest', whereas traditional economics assumes that people's primary motive is self-interest. Bounded self-interest is the idea that consumers care about fairness and aren't always driven by narrow self-interest in order to maximise their personal benefit. An example of this is that a large percentage of Australian households regularly give money to charity – not because it is in their own economic self-interest, but because they consider it to be fair.

Later that evening, Ngaire is talking about her recent economics studies with her mother. Ngaire's mother is a senior manager in a large Australian corporation. Her mother explains that, while 'profit maximisation' has traditionally been the main focus of all businesses, in recent years many businesses have evolved beyond this primary focus. As a result, their goals have expanded to include:

- Concern about sustainability
- A commitment to community involvement
- Interest in gender equality
- A focus on innovation
- A focus on research and development
- c) Choose <u>one</u> of the changing goals of business from the list above, and discuss how and why it has influenced businesses to expand their goals beyond the narrow pursuit of profit maximisation. 3 marks
 - 1st mark for demonstrating an understanding of profit maximisation
 - 2nd mark for explaining how business goals have been broadened by one of the issues from the list
 - 3rd mark for an explanation of why the issue has influenced businesses to broaden their goals

Sample answer: Profit maximisation refers to the idea that the main motivating force of all business owners is to ensure that their business makes the largest return possible, by maximising their profit – the value of the revenue earned by the business, minus expenses or costs of production. Historically, this has been the main goal of businesses.

However, in recent years, businesses have become more concerned about the 'triple bottom line' – the performance of the business in terms of the impact of its decisions on the planet (environment), people (the community or society), as well as the business' profit. It has become increasingly important for businesses to be 'good corporate citizens' because society's expectations about the behaviour of business has also changed. Consumers have become increasingly concerned about the impact of environmental damage or the exploitation of workers. If businesses are exposed as being involved in these damaging practices (in their pursuit of profit), it is increasingly common for consumers to undertake product boycotts or mount social media campaigns to try and shame the business into improving its performance as a corporate citizen.

SECTION C: STRUCTURED QUESTIONS (30 MARKS)

Question 1 (7 marks)

In recent months, there has been a vigorous public debate about Australia's energy generation. Rising electricity and gas prices, combined with electricity blackouts in South Australia, have created concern among electricity consumers and the government about the future of Australia's energy system.

In addition, in late March 2017, one of Victoria's largest electricity generating plants, Hazelwood power station located in the Latrobe Valley, ceased operation after a decision by its French owner, Engie, to close down the plant. Hazelwood generated power by burning highly-polluting brown coal, and was the source of around 25% of Victoria's electricity.

a) Use the demand and supply diagram to illustrate the impact on the market for electricity of the decision by Engie to close down the Hazelwood generation plant. Ensure the diagram is fully annotated. 3 marks



- 1 mark for correct movement of supply curve
- 1 mark for correct identification of the price movement
- 1 mark for correct identification of the quantity movement

In response to widespread discussions of energy insecurity and rising prices of electricity, many households have decided to purchase solar panel and battery systems to generate their own electricity.

b) Outline how resources might be reallocated following the closure of Hazelwood and changing consumer behaviour around energy prices. In your answer, refer to the role of relative prices. 4 marks

- 1 mark for a superficial outline (e.g. does not demonstrate idea of resources being moved from one use to another via price signals)
- 2nd mark for a more detailed outline that refers to the effect of reduced supply causing a higher price of electricity, and increasing consumer demand for renewable energy systems.
- 3rd mark for a comprehensive outline but with **no reference to relative prices**
- 4th mark for a comprehensive outline but **with a discussion** of relative prices

Sample answer: The closing of Hazelwood power station will lead to a lower supply of coal-fired electricity. This will result in rising prices of electricity provided through the energy grid and generated from burning coal, and lower production volumes. The producers will allocate fewer resources to the production of electricity from coal-fired generation. In response to the higher relative price of coal-fired electricity from the grid (compared to the cost of generating electricity from renewable sources), consumers have redirected their demand towards the relatively cheaper solar panels and battery systems that can be used to generate and store their own electricity. As demand for solar panels and battery systems increases, this will exert upward pressure on the price of these systems, raising the relative price of these systems, compared to coal-fired power. This will provide producers with increased incentive to reallocate resources such as labour, intellectual property and capital into the production of solar panel and battery systems. Resources will be reallocated away from coal-fired power generation and towards household solar panel systems.

Question 2 (9 marks)

In February this year, the Fair Work Commission announced a decision that Sunday and public holiday penalty rates will be reduced for full-time and parttime workers in the hospitality, retail and fast-food industries. In hospitality, Sunday pay rates for workers would be cut from 175 per cent of their standard wage to 150 per cent. In retail, Sunday pay rates would be cut from 200 per cent to 150 per cent. Casual workers would also lose some of their Sunday and public holiday loading. Some estimates suggested that nearly half a million workers would be affected. The Commission said the cuts would lead to increased services and trading hours on public holidays and Sundays. The Commission recommended the changes should come into effect within a year of its decision.

- a) Identify one group in the economy that might be affected by the Commission's decision, and predict their likely reaction to the Commission's ruling. 2 marks
 - 0.5 mark for identification of one group affected by the ruling
 - 0.5 mark for superficial prediction of their likely reaction to the ruling
 - 2nd mark for a more detailed explanation of the predicted reaction

Sample answer: One group in the economy affected by the Commission's decision would be those who currently work part-time or full-time in the hospitality, retail or fast-food industries. They are likely to oppose the ruling, as they may find their incomes reduced. This reduction in income may prompt the workers to leave those industries and seek employment elsewhere [since the relative price of their labour has fallen compared to what they could earn in other sectors that are not affected by the ruling].

Note: Other acceptable responses include predicting that employers in those sectors will be facing reduced costs of production and would therefore be pleased with the decision, and may employ more staff. As the Commission said in its ruling 'the cuts would lead to increased services and trading hours on public holidays and Sundays'. Another group that may also be affected is those who are currently seeking employment in any of the affected industries, but have been unable to find employment due to lack of demand for their labour. As the relative price of labour in those industries has now fallen, this may encourage employers to demand more labour, allowing job seekers to find jobs.

The diagram below depicts the impact of the Commission's decision on the market for hospitality labour on weekends. Carefully examine the diagram and answer the following questions



Market for hospitality labour on Sundays

b) Referring to the diagram, outline the impact on both the demand for and supply of labour following the decision to reduce penalty rates of pay for working on Sundays in the hospitality industry.

- 1 mark for an appropriate outline of the impact on demand
- 1 mark for an accurate reference to the diagram
- 1 mark for an appropriate outline of the impact on supply
- 1 mark for an accurate reference to the diagram

Sample answer: Lower penalty rates effectively means that the price of labour on Sundays [and public holidays] has fallen, which encourages employers to demand more labour on those days as it is cheaper for them to open and/or operate their hospitality business (e.g. a cafe). This is highlighted in the diagram by the expansion of demand from point A to point B. The lower rates of pay also discourages some workers from continuing to offer their labour services given that the financial rewards from working are now lower. This is highlighted in the contraction of labour supply from C to D.

- c) Referring to the previous diagram, describe why the market was not in equilibrium before the decision to reduce penalty rates. Explain how the subsequent reduction in penalty rates helps to return the market towards equilibrium.
 - 1 mark for an accurate description of why the market is in disequilibrium
 - 2 marks for a comprehensive explanation of why lower penalty rates helps to reduce the surplus of labour and return the market towards equilibrium

Sample answer: The (arguably) high penalty rates for Sunday workers in the hospitality industry necessarily implies that the legal rate of pay is above the equilibrium rate of pay that would ordinarily apply in the absence of government intervention. This creates an excess supply of labour reflected in the diagram by the distance between point A (or QA) - which is the demand for labour/employment - and point C (or QC) - which is the supply of labour. The reduction in penalty rates (P1 to P2) actually helps to reduce the surplus (i.e. unemployment on Sundays) because (as explained in part b) employers demand more workers and fewer workers will be willing to supply their labour. Accordingly, unemployment falls from C - A to D - B.

Note: Students are not required to refer to unemployment to achieve full marks. Nor are students required to explain why the market does not reach its new equilibrium point (E).

Question 3 (14 marks)

In a report released in March 2017, the Australian Competition and Consumer Commission (ACCC) identified that the profit margins earned by Australia's capital city airports were amongst the highest in corporate Australia. Sydney Airport's profit margin was 46.7% in the 2015-16 financial year and Melbourne Airport's was 38.2%. The ACCC found airports have been able to steadily increase their charges to passengers and airlines, in part because incentives to keep costs down are insufficient.

In addition, the ACCC's chairman, Rod Sims, described the airports' parking profit margins as 'quite amazing' – more than 73% at Sydney Airport, and more than 59% at Melbourne Airport. He said they get away with such high charges because they also force taxis, hire cars and shuttle buses to pay large fees to drop-off and pick-up at the airport. He stated that 'Their access charges have gone up quite a lot, so airports don't face much competition. ... It's a great position to be in where you can have this near monopoly car parking and also make it more difficult for your competitors.'

a) Distinguish between a 'monopoly' market and a 'perfectly competitive' market structure. 3 marks

- 1 mark for demonstrating an understanding of a monopoly (at least one characteristic required)
- 1 mark for demonstrating an understanding of perfect competition (at least one characteristic required)
- 1 mark for identifying a key point of difference between the two market structures

Sample answer: A monopoly is a market structure characterised by one seller dominating a market, where there is no (effective) competition for its product(s) [and the barriers to entry into the market are high]. In contrast, perfect competition is a market structure with a large number of competing firms and the barriers to entry into the market are quite low. A key distinguishing feature is that monopoly firms are price makers, and are therefore able to influence the market price for their products, while firms in perfectly competitive markets are price takers. They are unable to manipulate the market price because of the threat posed by rival firms.

- b) Explain why prices in a monopoly market are likely to be higher than in a market characterised by high levels of competition. In your response, refer to material provided in the case study.
 3 marks
 - 1 mark for explaining why monopolists are able to charge higher prices
 - 1 mark for explaining how perfect competition forces sellers to compete on price and therefore leads to lower prices
 - 1 mark for accurate use of material from the case study

Sample answer: In a monopoly market, the single producer faces no (effective) competition. This means that, should the producer decide to restrict supply in order to raise their prices, there are no other producers who will be able to offer the same product, and it will also be difficult for new producers to enter the market to offer the product. As a result, monopolists are often able to charge higher prices, and earn supernormal profits. This contrasts with a more perfectly competitive market where there are a large number of sellers offering mostly similar products. Therefore, no single producer is able to charge a price higher than their competitors without eventually going out of business. This is because if they did charge higher prices, consumers would simply buy the cheaper product available from a competitor. This means that there is constant pressure for producers in perfectly competitive markets to keep prices low enough to be competitive. In the case study, the ACCC Chairman Rod Sims notes that one of the reasons why airport parking operators are able to get away with such 'high charges' is because they have effectively eliminated their competition.

c) Explain why a perfectly competitive market is likely to lead to a more efficient allocation of resources compared to a monopoly market structure.

3 marks

- 1 mark for defining 'efficient allocation of resources'
- 1 mark for explaining why monopolies lead to a less efficient allocation of resources
- 1 mark for explaining how perfect competition leads to a more efficient allocation of resources.

Sample answer: An efficient allocation of resources refers to that situation where resources are allocated in combinations that provide the maximum possible benefits for consumers. This then means that any change in the way resources are allocated that moves the allocation from this point will make someone worse off. In a monopoly market structure, the producer is able to restrict the supply of the product. Since there are no viable substitutes, consumers pay higher prices than they would if the monopolist were facing competition from another producer. If the monopolist chooses to restrict supply of the product, there will be an under allocation of resources to the production of the product relative to what would have been if the market was more competitive. This reduces society's wellbeing overall, and means there is a less efficient allocation of resources.

In contrast, in a perfectly competitive market, the desire to increase profit will mean that firms will produce those goods and services that are most preferred by consumers, and at the lowest possible price. Failure to do so will lead these firms to suffer diminished profits and they may go out of business.

Note: Students can be rewarded for explaining how perfectly competitive markets will lead to higher levels of productive efficiency compared to monopolistic markets.

Melbourne Airport practices a form of price discrimination in its pricing of car parking. It charges less per hour of parking for those customers who prepurchase parking online, compared to those who simply drive up, enter the carpark and pay at the conclusion of their stay. Drive-up customers can pay up to twice as much as those who book online.

d) Define 'price discrimination' and discuss how it can operate as a profit maximising strategy. 3 marks

- 1 mark for demonstrating an understanding price discrimination
- 2nd mark for a superficial explanation of how price discrimination can increase profit
- 3rd mark for a more sophisticated explanation of how price discrimination can operate as a profit maximising strategy

Sample answer: Price discrimination involves businesses charging consumers different prices for the same product. Price discrimination enables businesses to maximise revenue by imposing a higher price for 'high value' customers who are willing and able to pay more for the product, while imposing a lower price for 'low value' customers who are unwilling or unable to pay the higher price. One example is that many cinemas offer different price tickets to customers based on their ability and willingness to pay. They charge full price for adults, and reduced prices for seniors, students and children. The cinema therefore sells as many full price tickets as possible to those willing and able to pay for the tickets at that price. They can then boost their revenue by selling the reduced price tickets to those who could not afford the full price tickets, and would not have bought a ticket at all if the discount price was not available. As a result, total sales revenue from cinema ticket will be greater than if all tickets had been sold at the discount price, or the discount price was not offered and only full price tickets were sold. This is an especially effective strategy for companies that face the same cost of product delivery, regardless of the number of products sold – such as services.

e) Identify and briefly explain one example of illegal, anti-competitive behaviour, as defined by the ACCC. 2 marks

- 1 mark for demonstrating an understanding of illegal anti-competitive behaviour
- 1 mark for explaining one example of illegal, anti-competitive behaviour

Sample answer: Illegal anti-competitive behaviour involves businesses conducting themselves in ways that are in breach of Australia's competition laws as policed by the ACCC. [Examples of illegal anti-competitive behaviour include cartel conduct, collusion and predatory pricing.] Predatory pricing involves a business setting its prices sufficiently low in order to damage a competitor. This can ultimately result in driving the competitor out of the market. Once the competitor has left the market, the business that engaged in predatory pricing can then increase its prices without risk of losing market share.

Note: Square bracketed text not required for full marks

COMMERCE PRESENTATIONS AND PUBLICATIONS



VCE ECONOMICS UNIT 1 2017 Practice Examination

SECTION D

ADDITIONAL 30 MARKS WORTH OF MULTIPLE CHOICE QUESTIONS

15 MULTIPLE CHOICE

Answer the questions on the multiple choice answer sheet marked Part D

CPAP © 2017 VCE Economics Unit 1 Examination (Answers and marking scheme)

SECTION D

MULTIPLE CHOICE QUESTIONS [16-30]

16	Α	В	С	D
17	Α	В	С	D
18	Α	В	С	D
19	Α	В	С	D
20	Α	В	С	D
21	Α	В	С	D
22	Α	В	С	D
23	Α	В	С	D
24	Α	В	С	D
25	Α	В	С	D
26	Α	В	С	D
27	Α	В	С	D
28	Α	В	C	D
29	Α	В	С	D
30	Α	В	C	D

Question 16

Regarding the two sector circular flow model of the economy, which statement is incorrect?

- a) An increase in production should lead to an increase in demand for resources from the household sector
- b) Profits, wages, rents, interest and royalties are all examples of income paid by the business sector
- c) An increase in production should lead to a decrease in incomes received by households
- d) An increase in expenditure by households should lead to an increase in production of goods and services

Question 17

When production is occurring such that it is not possible to increase output without increasing inputs, it suggests that the economy

- a) is achieving allocative efficiency
- b) *is achieving technical (productive) efficiency*
- c) is producing inside the production possibility frontier
- d) has experienced an increase in productivity

Question 18

Which of the following is not regarded as a factor affecting the willingness and ability to supply potatoes?

- a) Business confidence
- b) The cost of fertiliser
- c) Government subsidies to farmers
- d) Productivity of farm workers

Economists conducted an experiment. Person A was given \$20. Person A could keep some of the money, if they offered any amount of the money to Person B and Person B accepted the amount offered. If Person B refused the amount offered, both participants received \$0. Person A offered Person B \$1 and Person B rejected the offer. They both ended up with no money. Which of the following combinations best describes how economists would characterise this interaction?

- i) Person A was acting rationally and in their own self-interest
- ii) Person B was acting rationally and in their own self-interest
- iii) Person A was demonstrating bounded self-interest
- iv) Person B was demonstrating bounded rationality
- a) i and ii
- b) i and iii
- c) *i and iv*
- d) ii and iii

Question 20 Which of the following is an example of a positive incentive offered to some businesses?

- a) A tariff on imported inputs
- b) A subsidy on production
- c) A tax on carbon emissions
- d) Productivity growth

Question 21

Which of the following is most likely to improve non-material living standards?

- a) Increased levels of production
- b) Increased spending by households
- c) Increased access to education
- d) Increased work hours

Question 22

Which of the following is not an example of businesses responding to changing values and attitudes of society?

- a) The introduction of driver-less trucks in mines
- b) The increased use of recyclable packaging in products
- c) The introduction of 'blind recruitment' to reduce discrimination in employing new staff
- d) The use of Fair Trade cocoa in chocolate production

Question 23 An increase in the availability of qualified dentists would result in

- a) reduced prices of dentistry treatments and lower quantities sold.
- b) reduced prices of dentistry treatments and higher quantities sold.
- c) higher prices of dentistry treatments and lower quantities sold.
- d) higher prices of dentistry treatments and higher quantities sold.

Question 24 Decreased demand for motorbikes would lead to

- a) a decrease in the price of motorbikes and an increase in the price of motorbike helmets.
- b) a decrease in the price of motorbikes and a decrease in the price of motorbike helmets.
- c) an increase in the price of motorbikes and an increase in the price of motorbike helmets.
- d) an increase in the price of motorbikes and a decrease in the price of motorbike helmets.

Question 25

The problem of relative scarcity forces every economy to

- a) specialise in the production process.
- b) choose between alternatives.
- c) accept a minimum standard of living.
- d) produce capital resources.

Question 26 A shift to the left in the position of a demand curve will most likely be due to

- a) a fall in quantity supplied
- b) increased production costs
- c) a fall in the price of a complementary product
- d) *a fall in the price of a substitute product*

Question 27 Which of the following will result in a contraction in supply of Toyota Yaris cars?

- a) A rise in the price of Honda Civics
- b) A successful advertising campaign by Honda
- c) A rise in the average level of disposable incomes
- d) A rise in the labour costs at Toyota assembly plants

Question 28

Which one of the following is not a characteristic of monopolistic competition?

- a) Large numbers of buyers
- b) Large numbers of sellers
- c) Identical products
- d) Low barriers to entry and exit

A large German hardware chain opens 100 new stores in Victoria. It sets its prices to be at least 15% lower than all other local hardware companies. Within 2 years, two of the four local hardware chains have closed down, and the German hardware chain takes advantage of the reduced competition by increasing its prices. This behaviour is called

- a) Price discrimination
- b) Economies of scale
- c) Cartel behaviour
- d) Predatory pricing

Question 30 Which of the following would be considered as a capital resource (factor of production)?

- a) A computer used by a Year 12 student to complete their homework
- b) The ability to write computer code
- c) A car park at a shopping centre
- d) A uranium deposit in South Australia