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# AS ECONOMICS

Paper 1 The Operation of Markets and Market Failure

Monday 11 May 2020

Morning

Time allowed: 1 hour 30 minutes

#### **Materials**

For this paper you must have:

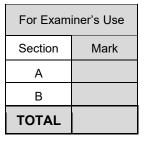
- the insert
- a calculator.

#### Instructions

- Use black ink or black ball-point pen. Pencil should only be used for drawing.
- Fill in the boxes at the top of this page.
- Answer all questions in Section A.
- Answer either Context 1 or Context 2 in Section B.
- You will need to refer to the insert provided to answer Section B.
- You must answer the questions in the spaces provided. Do not write outside the box around each page or on blank pages.
- If you need extra space for your answer(s), use the lined pages at the end of this book. Write the question number against your answer(s).
- Do all rough work in this book. Cross through any work you do not want to be marked.

#### Information

- The maximum mark for this paper is 70.
- The marks for questions are shown in brackets.
- No deductions will be made for wrong answers.





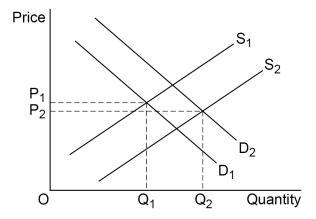
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Se	CTI	n	· A
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Answer <b>all</b> questions in this section.				
Only <b>one</b> answer per question is allowed.				
For each question completely fill in the circle alongside the appropriate answe	r.			
CORRECT METHOD WRONG METHODS © © 🕸 🕏				
If you want to change your answer you must cross out your original answer as shown.				
If you wish to return to an answer previously crossed out, ring the answer you now wish to select as shown.				
0 1 A resource must be scarce if				
A it has an opportunity cost.	0			
<b>B</b> it is non-renewable.	0			
C there is a high demand for it.	0			
<b>D</b> there is a small quantity supplied.	0			
	[1 mark]			



**O** 2 Figure 1 shows demand (D) and supply (S) in the market for electric cars. Demand is initially at D<sub>1</sub> and supply at S<sub>1</sub>.

Figure 1



Other things remaining the same, which one of the following combination of events could have caused demand to shift from  $D_1$  to  $D_2$  and supply from  $S_1$  to  $S_2$ ?

- A Greater availability of roadside chargers for electric cars and a rise in workers' wages
- **B** Higher petrol prices and an increase in workers' productivity
- C Introduction of a road pricing scheme for all vehicles and higher diesel fuel prices
- **D** Lower rail and bus fares and the use of new technology for electric car production

[1 mark]

- 0 3 Government failure must have occurred when government intervention
  - A causes income inequality to increase.
  - **B** has unintended consequences.
  - **C** is based on imperfect information.
  - **D** reduces total welfare in the economy.

[1 mark]



0 4
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0 5

**Table 1** shows the prices and quantities of rice and pasta sold in a supermarket in one month.

Table 1

Price of rice	Quantity of rice (000s packets)	Price of pasta	Quantity of pasta (000s packets)
£2.00	100	£1.50	40
£2.25	80	£1.50	50

When the price of rice rises from £2.00 to £2.25, the cross elasticity of demand for pasta with respect to the price of rice is

A	<b>-2.0</b>	0
В	-0.5	0
С	+0.5	0
D	+2.0	0
		[1 mark]
C	he number of film production companies in a city increases. As a restorkers skilled in making films grows. Companies experience a reductorsts.	
T	he fall in average costs results from	
A	a reduction in diseconomies of scale.	0
В	an increase in managerial economies of scale.	0
С	the existence of external economies of scale.	0
D	the presence of technical economies of scale.	0

[1 mark]



0 6

Table 2 shows total costs and profit for different levels of output produced by a firm.

Table 2

Output	Total cost (£)	Profit (£)
50	1000	1000
100	1800	1700
150	2400	2400

When the firm increases its output from

A 50 to 100, the price falls by £2

**B** 50 to 100, the price falls by £3

C 100 to 150, the price falls by £2

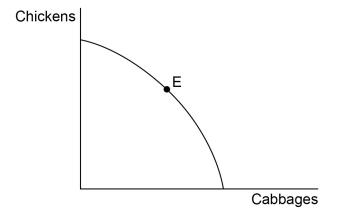
**D** 100 to 150, the price falls by £3

[1 mark]

0 7

**Figure 2** shows the production possibility frontier for an economy producing only two goods: chickens and cabbages.

Figure 2



Which one of the following statements is true?

- A From the information given, it is impossible to determine whether point E is allocatively efficient
- 0
- **B** From the information given, it is impossible to determine whether point E is productively efficient
- 0

**C** Point E is productively and allocatively efficient

- 0
- **D** Point E is productively efficient but allocatively inefficient
- 0

[1 mark]



0 8	In the market for apples, at the current market price of £3 per kilo, consumers buy 5000 kilos and farmers produce 6000 kilos each week.	
	It can be concluded that	
	A consumers are unaware of the positive externalities from eating apples.	
	<b>B</b> the government must have set a maximum price for apples.	
	<b>C</b> the prices of substitute fruit such as oranges and pears have risen.	
	<b>D</b> there is disequilibrium in the apple market and the price is likely to fall.	
		[1 mark]
0 9	An online streaming firm increased its paying subscribers by 300% over a 4-year part of the total time people spent watching television doubled and progrew rapidly.	
	Which one of the following is the most likely explanation for the firm's success?	
	A A low concentration ratio in the industry meant that the firm faced little competition	
	<b>B</b> A low income elasticity of demand enabled the firm to raise the price of its subscription and increase its profits	
	C The firm was able to cut average costs by producing and selling a homogeneous product	
	<b>D</b> The firm was innovative and this increased barriers to entry for firms wishing to join the industry	
		[1 mark]
1 0	Which one of the following statements about price elasticity of supply is correct?	
	Price elasticity of supply	
	A increases when a firm's labour costs increase.	
	<b>B</b> is affected by the amount of spare capacity.	
	<b>C</b> measures the responsiveness of price to a change in supply.	
	<b>D</b> tends to be lower in the long run than in the short run.	
		[1 mark]



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1 1	Antonio sells ice creams in the local park. In a typical week, he sells 500 ice creams at £2
	each and his total costs are £700. One week he does not work, so he sells no ice creams but his total costs are £200.

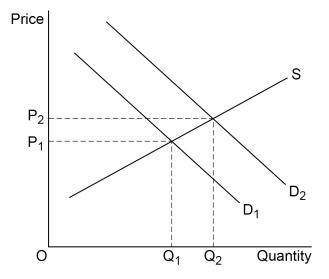
What are his variable costs in a typical week?

- A £200
- **B** £300
- **C** £500
- D £700

[1 mark]

**1 2 Figure 3** shows the market demand (D<sub>1</sub>) and supply (S) of loft insulation material. If consumers have full information about the benefits of insulating their lofts, demand will be D<sub>2</sub>.

Figure 3



There is underproduction,  $Q_2 - Q_1$ , of loft insulation material because

- A at the social optimum, Q<sub>2</sub>, the price would be too high.
- **B** firms have no incentive to increase output beyond Q<sub>1</sub>.
- **C** firms lack information about the external benefits of loft insulation.
- **D** the government has failed to set a minimum price for loft insulation.

[1 mark]



1 3 A firm producing frozen foods has collected statistics on recent trends in sales of oven chips, as shown in **Table 3**.

# Table 3

,	Year	Average number of bags of oven chips sold per week	Average real income of customers (2018 prices)
1	2018	7800	£23 000
	2019	7600	£22 000

These statistics suggest that oven chips

	A are a normal good.	0
	<b>B</b> are an inferior good.	0
	C have an income elasticity of demand greater than 1.	0
	<b>D</b> have an income elasticity of demand less than 0.	0
		[1 mark]
1 4	Which one of the following helps to explain why profits are likely to be competitive market than in a monopoly market?	lower in a perfectly
	A A firm with monopoly power doesn't need to spend money on research and development to improve its products	0
	<b>B</b> Firms in a perfectly competitive market are more likely to experience diseconomies of scale	0
	C In a monopoly, a firm can increase the price of the product by limiting its output	0
	<b>D</b> In a perfectly competitive market, firms differentiate their products to compete with rivals and achieve brand loyalty	0
		[1 mark]



			Do not write
1 5	Land is in composite demand and can be used to build houses or to p When the demand for playing fields increases, there will be	rovide playing fields.	outside the box
	A a decrease in the price of new houses.	0	
	<b>B</b> a decrease in the supply of new houses.	0	
	C an increase in demand for new houses.	0	
	<b>D</b> an increase in output of new houses.	0	
		[1 mark]	
1 6	A government decides to set a minimum price for plastic bottles of wa market price. The most likely impact of the scheme will be	ter above the current	
	A a rise in consumption of plastic bottles of water.	0	
	<b>B</b> a shortage of plastic bottles of water if the price elasticity of supply is zero.	0	
	C excess stocks of plastic bottles of water.	0	
	<b>D</b> no excess supply of plastic bottles of water if the price elasticity of demand is zero.	0	
		[1 mark]	
1 7	The production of a good generates positive externalities. This means market equilibrium	s that at the free	
	A the good will be under-produced.	0	
	<b>B</b> the price of the good will be too low.	0	
	C there will be excess demand for the good.	0	
	<b>D</b> the supply of the good will be inelastic.	0	
		[1 mark]	
			I

A higher labour productivity.  B less capital equipment per worker.  C lower labour turnover.  D lower wage rates.		.•		
A in this economy, the distribution of income became more equitable.  B the incomes of some households moved closer to the average income of the economy.  C the incomes of the middle 20% of households in the income distribution did not change.  D the gap between the income of the richest household and the poorest household became smaller.  [1 mark  1 9 A firm makes more use of division of labour when organising its workforce. The most likely result will be  A higher labour productivity.  B less capital equipment per worker.  C lower labour turnover.  D lower wage rates.  [1 mark  2 0 In a free market, the consumption of a good leads to negative externalities. If left to the free market, how would price and output compare to the social optimum?  A The price and output would be higher  B The price and output would be lower  C The price would be higher and the output lower	1 8	economy rose over one year. Over the same period, the share rec	eived by the r	ichest
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C The price would be higher and the output lower		A The price and output would be higher	0	
		<b>B</b> The price and output would be lower	0	
<b>D</b> The price would be lower and the output higher		C The price would be higher and the output lower	0	
		<b>D</b> The price would be lower and the output higher	0	
[1 mark				[1 mark]

END OF SECTION A



# **Section B**

Look at the insert and choose to answer **EITHER** Context 1 **OR** Context 2.

Answer **EITHER** Questions 21 to 26 in the spaces below

### OR

Questions 27 to 32 on pages 21 to 30 of this answer booklet.

There is a total of 50 marks for either context.

Context 0 1 Context 0 2  WRONG METHODS © © © CORRECT  EITHER  Context 1  BUS TRAVEL  Use the insert provided to study Questions 21 to 26 and Extraction questions in the spaces which follow.  2 1 Define 'fixed costs' in Extract B (line 13).	Total for this context: 50 marks
EITHER  Context 1  BUS TRAVEL  Use the insert provided to study Questions 21 to 26 and Extrapolations in the spaces which follow.	Total for this context: 50 marks acts A, B and C, and then answer the
Context 1  BUS TRAVEL  Use the insert provided to study Questions 21 to 26 and Extrapolations in the spaces which follow.	acts A, B and C, and then answer the
BUS TRAVEL  Use the insert provided to study Questions 21 to 26 and Extrapolations in the spaces which follow.	acts A, B and C, and then answer the
Use the insert provided to study <b>Questions 21</b> to <b>26</b> and <b>Extr</b> questions in the spaces which follow.	
questions in the spaces which follow.	
2 1 Define 'fixed costs' in Extract B (line 13).	[3 marks]
	[3 Illaiks





2 2	Use <b>Extract A</b> to calculate the <b>difference</b> in the median male and female take-up rates of concessionary travel schemes for the elderly in England for the years shown.
	[4 marks]
2 3	Use <b>Extract A</b> to identify <b>two</b> significant points of comparison between the take-up of concessionary travel schemes by males and females in England over the period shown.  [4 marks]
	Comparison 1
	Extra space
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	Extra space

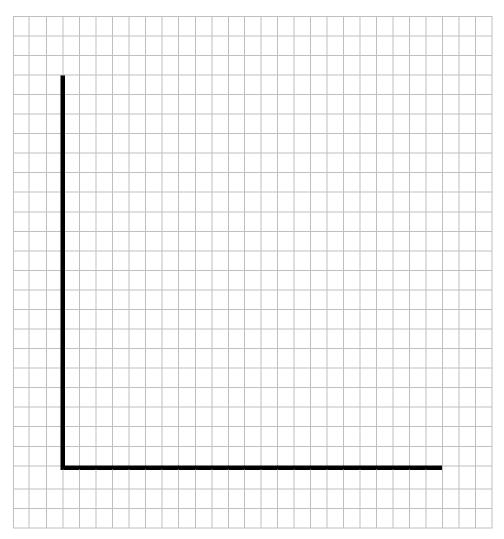


2 4

**Extract C** (line 7) states: 'Bus companies also receive subsidies to operate routes in rural areas.'

Draw a supply and demand diagram to show the effects on the market for bus travel of the government providing a subsidy. The total amount of government spending on the subsidy should be labelled clearly.

[4 marks]



Turn over for the next question



Extract C (line 13) states: 'Both have been falling in recent year	h the take-up rate and number of journeys per bus pass rs.'
Explain <b>two</b> factors which could future.	d lead to an increase in the demand for bus travel in the
	[10 marks]
Extra space	







		Do not write
2 6	<b>Extract C</b> (lines 16–17) states: 'Perhaps the time has come to stop free bus travel for the elderly or to limit it to certain groups?'	outside the box
	Use the extracts and your knowledge of economics to evaluate whether the UK government should continue to provide free bus travel for all, some or no elderly people.  [25 marks]	



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	Do <b>not</b> answer Context 2 if you have answered Context 1.
OR	
Context	2 Total for this context: 50 marks
E-CIGAI	RETTES
	insert provided to study <b>Questions 27</b> to <b>32</b> and <b>Extracts D</b> , <b>E</b> and <b>F</b> , and then answer the s in the spaces which follow.
2 7	Define 'social cost' in <b>Extract E</b> (line 7).
	[3 marks]
2 8	Use <b>Extract D</b> to calculate, to <b>one</b> decimal place, the <b>difference</b> between the mean male and female rates of cigarette smoking in Great Britain for the years shown.  [4 marks]



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(	Use <b>Extract D</b> to identify <b>two</b> significant points of comparison between the rates of comparison between the rates of cigarette smoking of males and females in Great Britain over the period shown.	of [ <b>4 m</b>
(	Comparison 1	_
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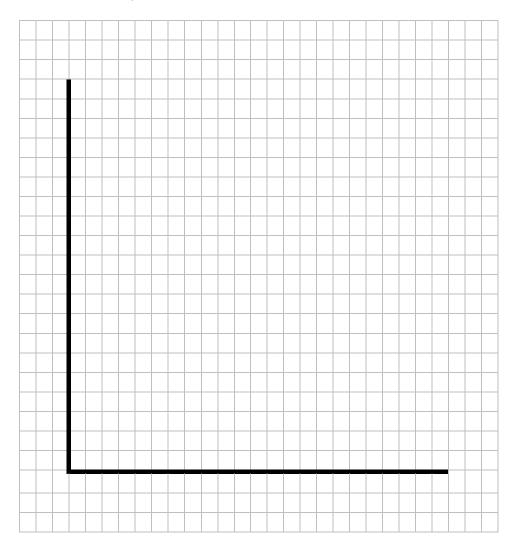


3 0

**Extract E** (lines 10–12) states: 'between 2006 and 2016, the price of tobacco rose by 43% more than general retail prices with the tax now being about 80% of the price.'

Draw a supply and demand diagram to show the effects on the market for cigarettes of the government imposing an indirect tax. The total amount of government tax revenue should be labelled clearly.

[4 marks]



Turn over for the next question



Explain <b>two</b> factors	which could lead to	an increase in th	e demand for conve	ntional
cigarettes.				[10 n
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3 2

26	
xtract F (lines 17–19) states: 'Should the UK government promote a particular brand-cigarettes as a 'healthy alternative' to conventional cigarettes? Should the use of	
-cigarettes be discouraged or has government intervention already gone far enough?	,
se the extracts and your knowledge of economics to evaluate whether the UK overnment should encourage, discourage or do nothing more to affect the use of	
-cigarettes. [25 ma	arks]
	-



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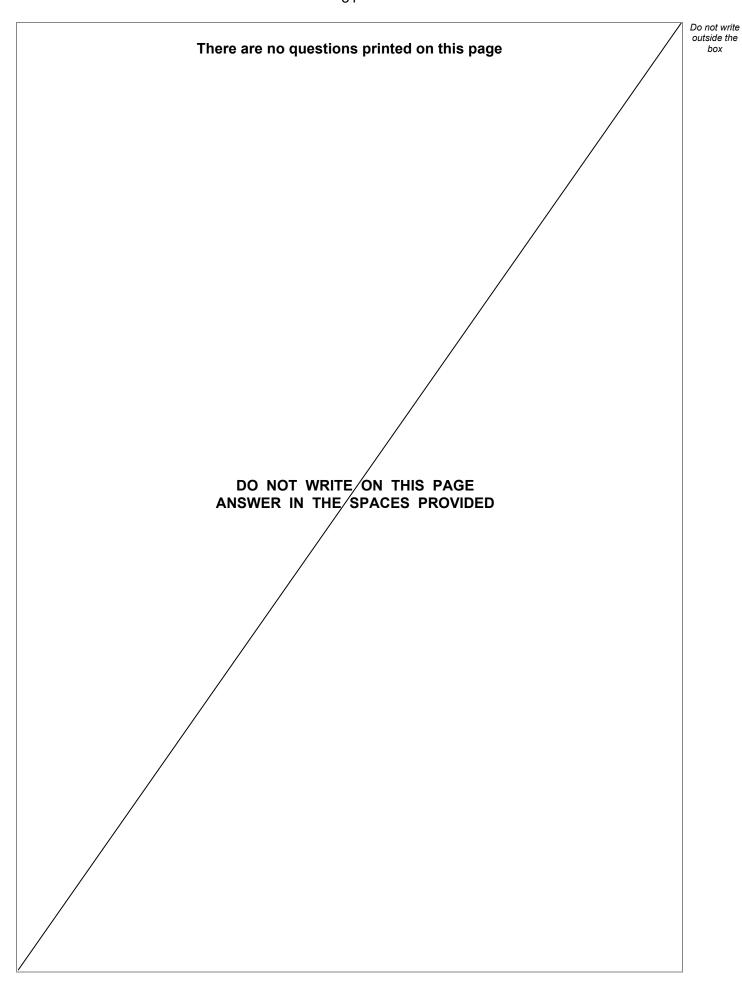






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END OF QUESTIONS	







Question number	Additional page, if required. Write the question numbers in the left-hand margin.



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