

### Suggested Answers for JC2 H1 CSQ 1

(a)	Compare the change in food prices between 2017 and 2022 with the change in petroleum prices over the same period. [2]
	Similarity: Prices of both food and petroleum have increased. [1]
	Difference: Prices of petroleum has increased more rapidly than that of food. [1]
(b)	Russia's invasion is placing pressure on global physical supply chains. Additionally, panic buying from consumers as the global economy recovers from the COVID-19 pandemic have further contributed to significant price changes of food.
(i)	Using a supply and demand diagram, explain the impact of these effects on the changes in the price of food and comment on the significance of price elasticity of supply in this case. [6]
	<p>Due to the disruption on global physical supply chains, producers will find it more difficult to obtain key resources from abroad so they may have to source elsewhere or incur higher transport costs in order to maintain the steady flow of factor inputs they could get. Due to the increase in input prices, unit cost of production increases, thus producers will be less willing and able to produce food at each price level since it is less profitable to do so, resulting in a fall in the supply of food from <math>S_0</math> to <math>S_1</math>.</p> <p>On the other hand, the panic buying has affected the taste and preferences in favour of food of as consumers started to buy necessities like food supplies in bulk in view of hoarding them in case of future food depletion or price increases. This results in increase in demand for food from <math>D_0</math> to <math>D_1</math>.</p> <p>With the simultaneous increase in the demand for and decrease in supply of food, there is a reinforcing effect on equilibrium price. At <math>P_0</math>, there is a severe shortage <math>Q_dQ_s</math> as quantity demanded exceeds quantity supplied. This will cause an upward pressure on the prices of food as the competing buyers bid up the prices of food. Consumers will be less willing and able to buy the food, causing a fall in quantity demanded for food, while producers will be more incentivized to produce more food, causing a rise in quantity supplied of food. This process continues until the shortage is eliminated. This results in a significant increase in the prices of food from <math>P_0</math> to <math>P_1</math> in Figure 1.</p>

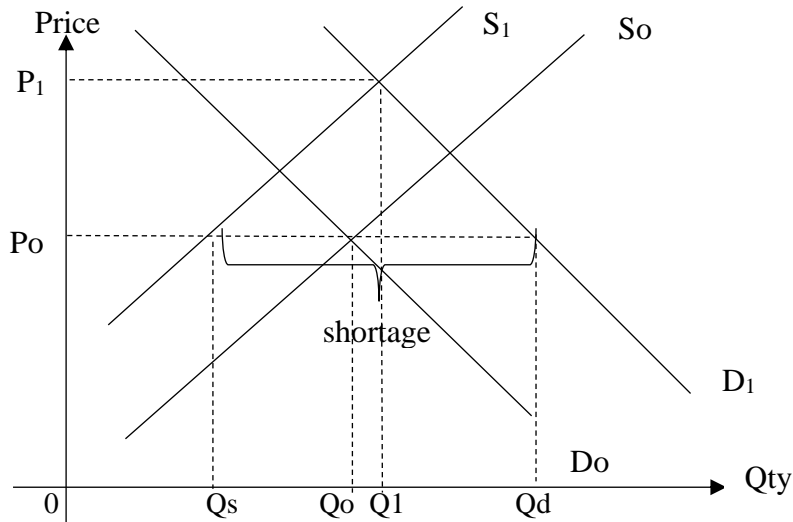


Figure 1: Market for Food

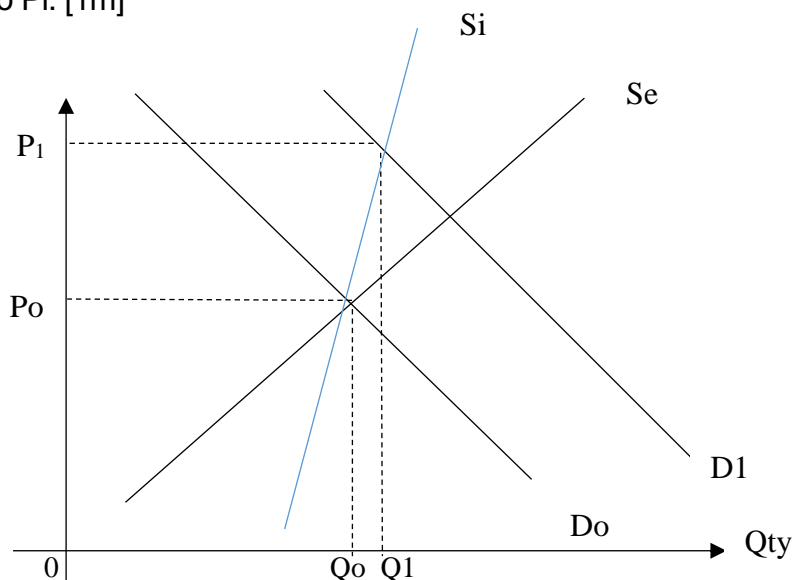
**Significance of PES:**

PES is significant in accounting for the huge rise in the price of food. The PES of food is likely to be less than 1 since the **gestation period** for agricultural products especially is long given the time it requires to harvest. [Justify PES value with a PES determinant: 1m]

<OR>

Disruptions in global supply chains have impeded the **mobility of resources**, thereby prolonging the time required for producers to mobilize them. [Justify PES value with a PES determinant: 1m]

With reference to the diagram, this causes the larger change in prices of food from  $P_0$  to  $P_1$ . [1m]



(ii)	With reference to Extract 1, explain the likely effects on the food retailers' total revenue in view of the change in food prices in bi. [5]
	<p>As food prices increase in bi, the cost of production for food retailers will increase. This will result in a fall in profitability for the food retailers as they will be able to produce less with the same amount of financial resources as before. This results in less willingness and ability of the food retailers to produce, causing a fall in supply of food.</p> <p>The fall in supply will result in an increase in the price of food. From Extract 1, the retailers selling non-essentials are expected to incur losses. This is because the demand for non-essential foods is price elastic due to the availability of substitutes and nature of the product. Quantity demanded for the non-essential foods will decrease more than proportionately, causing a decrease in total revenue.</p> <p>However, for the retailers selling essentials, demand for their goods will be price inelastic due to the nature of the product, the rise in the price of food will cause a less than proportionate decrease in quantity demanded for food, resulting in a rise in total revenue for these retailers.</p>
(c)	Using the information in Extract 2, discuss the view that price cap is the best policy to address the soaring food prices. [8]
	<p><b>Intro:</b> The Russian Ukraine war has disrupted food supplies of “wheat, barley and other cereals” from the two world’s major exporters. The conflict also resulted in a supply crunch in other essential food items such as bread, eggs and milk, and hence the hiking of prices of these items. This gives rise to inequity among the poor population in the UK as high prices reduce their access to essential food items.</p> <p><b>Thesis: Price cap can address soaring food prices.</b></p> <p>The price cap on essential items was introduced by the UK government to keep the prices of essential food items within an affordable range such that every citizen, even those belonging to the lower income strata, have access to them. Thus, promoting equity. The price cap determines the maximum permissible price that sellers can legally charge for their products.</p>

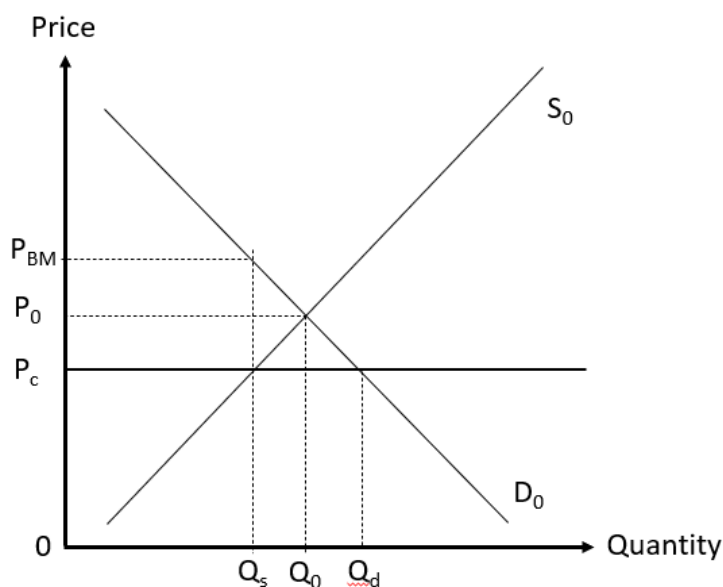


Figure 2

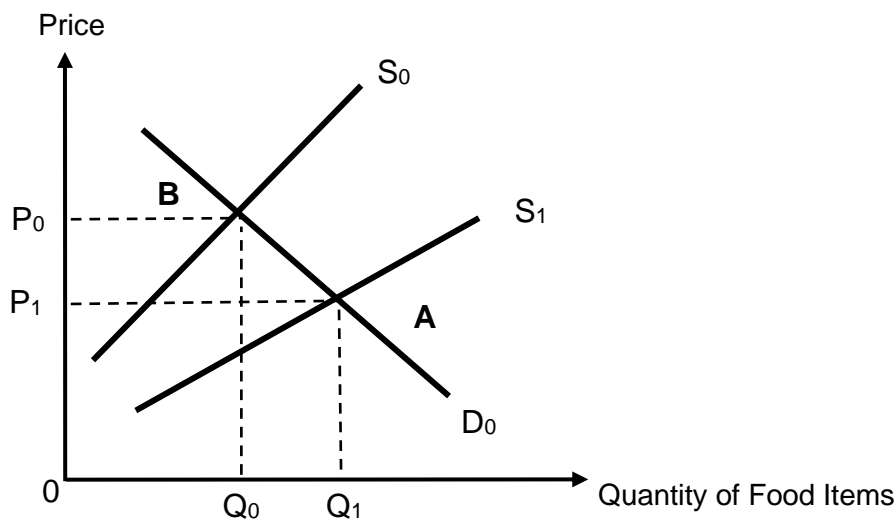
With reference to Figure 2,  $P_c$  represents the price cap imposed on essential food items by the UK government.  $P_c$  should be below the initial equilibrium price  $P_0$  to be legally binding. As a result, the price cap causes a fall in quantity supplied of essential food items from  $Q_0$  to  $Q_s$ , and an increase in quantity demanded from  $Q_0$  to  $Q_d$ .

However, the introduction of price caps results in a shortage in the market of essential food items. At  $P_c$ , the quantity demanded exceeds the quantity supplied. This results in a shortage in the market for essential food items. This means that despite the lower prices, fewer consumers consume the good. The shortage may perversely result in a black market where those who cannot get their hand on essential food items turn to an illegal market where prices are charged higher than the initial equilibrium price. In a black market, illegal vendors may charge as high as  $P_{BM}$ , which is the maximum price consumers are willing and able to pay at  $Q_s$  which is the amount of essential food items available in the market. As such, a price ceiling may not be effective in bringing about a fall in price.

### **Anti-thesis: Sales tax can address soaring prices**

Another solution proposed in extract 2 was to “cut sales tax on food”. The sales tax on food is imposed on food producers for the quantity sold. Therefore, the tax is perceived to add onto a firm’s cost of production. With the reduction of the sales tax, it reduces their cost of production, making their food products more profitable to produce at each price level. As a result, there is an increase in supply. With reference to figure 3, the increase in supply is represented by a pivotal rightwards shift in the supply from  $S_0$  to  $S_1$  since it is a percentage of the value of the food items. Consequently, the resulting equilibrium price decreases from  $P_0$  to  $P_1$ , while the quantity of food increases from  $Q_0$  to  $Q_1$ . The reduction

in food prices increases the low-income households' accessibility to food products.



**Figure 3**

However, the reduction in sales tax may not result in a significant enough decrease in prices for poorer households to afford essential food products. This could be attributed to incomplete or inaccurate information. The government may lack perfect information regarding the extent to which sales tax reductions are needed to sufficiently lower prices and make them affordable for the lowest-income households.

OR

The reduction in sales tax reduces the total government tax revenue. As a result, the government is less able to redistribute income to low-income households, which limits their access to essential food items.

Evaluation:

To evaluate which is a more effective policy, we can consider a few factors.

A price ceiling is the best policy in the short run to prevent further price increases, but it should only be viewed as a temporary measure due to its unintended consequences as explained above. Prolonged implementation of price ceilings could lead producers to redirect resources towards other commodities with higher returns or choose to shut down since they are making less revenue as evident in Extract 2 “small grocery stores... no hope of recouping lost revenue”, resulting in decreased food supply and potentially sharper price increases in the future.

Therefore, in the long run, a reduction in sales tax may be a more suitable approach, as it may not result in further price hikes as seen in price ceiling.

OR

A price ceiling does not in any way tackle this issue and merely brings prices down in the interim period to prevent prices from rising too high. While this is effective in dealing with higher prices, it can be problematic as it is difficult to remove it once in place as the citizens will want to keep it in place. Even if the political will is present to remove it, one also must consider the destabilising effect on prices once a price ceiling is removed. If the upwards pressure on price to reduce the shortage is too fast, it will lead to a sudden surge in price of essential food items, which might result in even higher prices than before.

OR

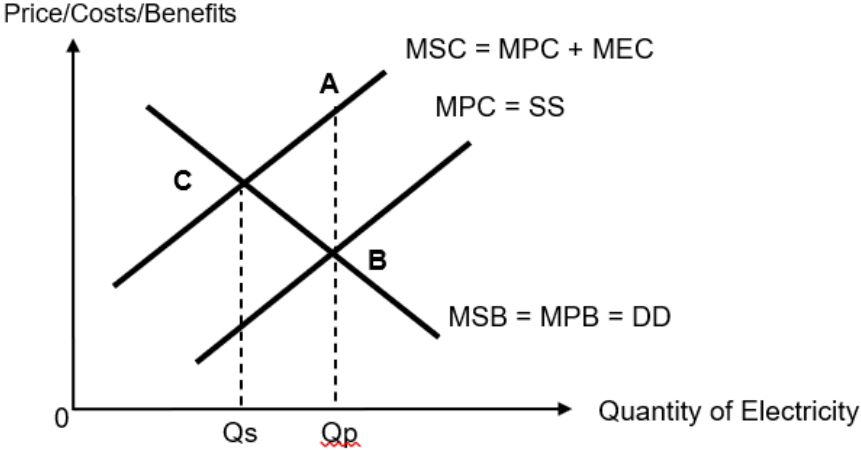
The price cap may be more effective in ensuring equity as it is a hard legislation which ensures that producers do not sell above the stipulated price. This increases accessibility to essential food items among lower income families. However, with regards to the reduction in sales tax, producers may not pass down the tax benefits in terms of lower prices to consumers considering that the state of economy is below optimal. Therefore, this measure does not ensure that prices are lowered such that lower income individuals have access to essential food items.

OR

Considering that the price hike is due to a supply crunch possibly due to trade sanctions or destruction of crops coupled with surge in demand in post-COVID period, both price cap and reduction in sales tax do not effectively tackle the root causes of the price hike. Policies that may be more effective include giving subsidies to local producers to step up production of these essential food items or governmental support in diversifying import partners for essential food items or public education to reduce the incidence of panic buying, which reduces the surge in demand.

Level	Knowledge, Application, Understanding & Analysis	Marks
L2	Well-developed assessment of how a price ceiling and reduction in sales tax helps to tackle rising prices of essential food items, supported with diagram(s).  Reference made to evidences from extracts that support the arguments made.	4-6
L1	Well-developed assessment of how a price ceiling OR reduction in sales tax helps to tackle rising prices of essential food items, supported with diagram(s). Some reference made to evidences from extracts that support the arguments made.	1-3

		OR		
		Under-developed assessment of how a price ceiling and reduction in sales tax helps to tackle rising prices of essential food items, supported with diagram(s). Some reference made to evidences from extracts that support the arguments made.		
		<b>Evaluation</b>		
	E2	Well-reasoned judgement on whether a price ceiling or reduction in sales tax is the more effective policy to tackle the rising prices of essential food items.	2	
	E1	Unsupported judgement on whether a price ceiling or reduction in sales tax is the more effective policy to tackle the rising prices of essential food items.	1	
(d)	Assess whether or not the statement in Extract 2 “The government is working constructively with supermarkets as to how we address the very real concerns around food inflation and the cost of living” is a normative one. [3]			
	<p>The statement could be normative as it seems like a judgement about the way the government is working with the supermarkets and no indicators was given about what constitute a constructive way of cooperation. [1]</p> <p>On the other hand, the statement may not be normative, but a positive one as the indicators of food inflation and cost of living are mentioned and these can be verified to measure the effectiveness of the government actions with supermarkets to alleviate the financial burden on the people. [1] Moreover, the statement doesn't explicitly convey any subjective belief about whether the government's action is good or bad. It merely describes the collaborative efforts between the government and supermarkets to address concerns about food inflation and the cost of living. Therefore, it is more accurately classified as a positive statement. [1]</p>			
(e)	With reference to Extract 3, explain the opportunity cost of “embracing clean energy as the pathway to a net-zero future”. [2]			
	Opportunity cost is defined as the value of the next best alternative foregone. When the world is placing their resources and efforts on developing and utilizing clean energy, the foregone economic benefits would be the revenue and jobs that would have been generated with the growth of the refining and petrochemical industries.			

<b>f(i)</b>	With reference to Extract 3 and using a diagram, explain how burning of fossil fuel to generate electricity could lead to market failure. [4]
	<p>Negative externalities are the harmful side effects of production or consumption on persons other than the consumers and the producers themselves. Third parties are not compensated for the external cost.</p> <p>In this situation, the marginal private cost (MPC) is the operation cost burning fossil fuel to produce electricity. [0.5] The marginal external cost (MEC) in this case is the additional costs incurred by third parties such as residents near the powerplants [identify third parties = 0.5] who suffer from respiratory conditions due to long exposure to harmful gas particles released. [0.5]</p> <p>Since negative externalities are present, <math>MEC &gt; 0</math>. This means that <math>MSC = MPC + MEC</math> + MEC will be greater than MPC. [0.5]</p> <p>Assuming that there are no positive externalities (<math>MEB=0</math>), <math>MSB=MPB</math>. The market for electricity can be represented in the diagram below.</p>  <p>Figure 4: Negative Externalities</p>
	<p>With reference to Figure 4, when left to the free market, the consumption/production of electricity occurs at <math>Q_m</math> where <math>MPB = MPC</math> [0.5] since individuals only consider their private costs and benefits in decision making. However, the socially optimum level of output occurs at <math>Q_s</math> where <math>MSB = MSC</math> [0.5], which is also a point where society's welfare is maximized.</p> <p>Since <math>Q_m &gt; Q_s</math>, there is an over-consumption/production of electricity [0.5]. Since there is an over allocation of resources, allocative inefficiency results. There is a welfare loss [0.5] to the society which is represented by area ABC as there is a</p>





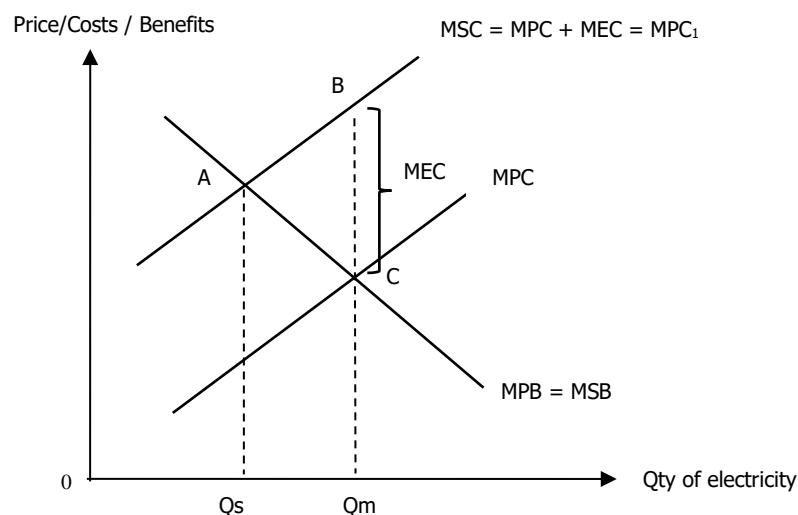
However, this may not be adequate to address the market failure due to constraints in terms of the land available for solar panels to be deployed sufficiently to meet Singapore's energy needs. Therefore, it is inevitable that the government has to 'import low-carbon electricity from neighbouring countries' to fulfil its energy requirements. Consequently, carbon emissions will still occur. As a result, instead of MSC coinciding with MPC, MSC shifts to  $MSC^2$  due to the lower negative externalities generated compared to burning fossil fuels. The new socially optimal level of output is at  $Q_s'$  where  $MSC^2$  equals MSB. Instead of resolving the market failure completely, difference between  $Q_s'$  and  $Q_m$  is smaller, the problem of over-consumption/production of electricity is reduced.

Additionally, government funding for investment in clean energy technology may strain the government's budget. Furthermore, the opportunity cost incurred from allocating the S\$5 billion to clean energy technology includes the foregone benefits of investing it in other critical sectors of the economy, such as healthcare services for Singapore's ageing population.

### **Anti-thesis: Explain how the carbon tax would work to tackle the market failure**

To deal with the above market failure, the government could implement carbon pricing. According to Extract 4, "the carbon tax is slated to incrementally rise from the current S\$5 per tonne of emissions, eventually reaching between \$50 and \$80 per tonne by 2030." This is a market-based measure, which creates financial incentives designed to elicit a specific behaviour from polluters.

When the carbon tax is imposed on power plants, cost of production increases, reducing the profitability of generating electricity. This reduces the supply of electricity. The MPC of producing electricity would increase, illustrated by a leftward shift of the MPC curve from MPC to  $MPC_1$ .



If the amount of tax = MEC at socially optimal output, the production/consumption of energy will be reduced to socially optimal level at  $Q_s$ , as producers are forced to internalise the external costs, hence reducing carbon emissions to the socially optimal level, achieving an efficient allocation of resources, thus resolving the market failure.

A carbon tax provides financial incentives for polluters to change behaviour. But for the policy to be effective, the government must accurately determine the external cost to derive the socially optimal level of pollution. Due to imperfect information, the government may miscalculate the external costs as it may be difficult to accurately put a monetary value on the MEC, such as measuring the potential healthcare costs that may be incurred by third parties. Under-valuation of MEC leads to a reduction in output that is not sufficient to bring output to the socially optimal level. An over-valuation of MEC leads to output falling below socially optimal level. In both cases, society's welfare is reduced but not maximised.

OR

However, it might not be due to imperfect information. Rather, the Singapore government's key consideration to raise the carbon tax rate could be the trade-off that may arise. Imposing a carbon tax would increase the price of energy, making the unit cost of production higher for firms. As such, the short run aggregate supply decreases, hence real GDP decreases. Therefore, a higher carbon tax may impose a drag on the economy.

**Summative Conclusion:**

Which is the better measure depends on the constraints unique to each country or government. For instance, in Singapore, limited available land poses challenges for deploying solar panels efficiently to fulfil the nation's energy requirements (as referenced in Extract 4). Therefore, **in the short term**, carbon pricing could be more effective in addressing the market failure until Singapore develops solutions for deploying alternative renewables that require less land space, such as hydrogen technology. However, it's worth noting that widespread deployment of hydrogen technology would require extensive research before it becomes feasible. In the **long run**, government funding for investment in renewable energy is the better policy in addressing the market failure as it directly targets the root cause by reducing negative externalities such as air pollution.

One recommendation is that the Singapore government might consider employing a more relevant benchmark for determining the carbon tax rate and potentially increasing it further to address market failures more effectively. One option could involve basing the rate on the average cost of carbon capture and sequestration activities. However, in raising the carbon tax rate further, the Singapore government will need to acknowledge the trade-off regarding competitiveness.

	Level	Knowledge, Application, Understanding & Analysis	Marks
	L2	Well-developed explanation on how the investment in renewable energy can tackle the market failure and its limitation AND how carbon tax can tackle the market failure and its limitation.	5-7
	L1	<p>Under-developed explanation on how the investment in renewable energy can tackle market failure and its limitation AND how carbon tax can tackle the market failure and its limitation.</p> <p>OR</p> <p>Well-developed explanation on how the investment in renewable energy can tackle market failure and its limitation OR how carbon tax can tackle the market failure and its limitation.</p>	1-4
	<b>Evaluation</b>		
	E3	Well-reasoned judgement on whether investment in renewable energy better than carbon tax in tackling the market failure.	3
	E2	Under-developed judgement on whether investment in renewable energy better than carbon tax in tackling the market failure.	2
	E1	Unsupported judgement on whether the adoption of EVs is the best policy to improve efficiency of resource allocation in the market for private transport.	1

### **Suggested Answers for CSQ 2**

**a) Explain whether the information in Table 1 is sufficient to conclude that Singapore has a higher standard of living than Japan. [5]**

**Explain how the information is sufficient**

GDP per capita is a significant indicator of economic performance and average income levels. Higher GDP per capita in Singapore suggests that, on average, individuals have higher income [1], which means that a typical average Singaporean can consume more goods and services than an average Japanese, accounting for higher material standard of living for the Singaporean. [1]

Singapore have a lower infant mortality rate per 1000 live births than Japan. This shows that Singaporeans have access to better quality healthcare, better sanitation and hygiene, implying that Singapore have higher non-material standard of living [1].

**Explain how the information is insufficient**

However, as the cost of living [1] could be different between Japan and Singapore, it is important to consider the real GDP per capita at purchasing power parity rates [1] of the two countries. Although Singapore might have recorded a higher real GDP per capita, price levels in Singapore could be higher. Therefore, it will be more accurate to compare the material well-being of the 2 countries by equalising the cost of living differences. Hence this explains the inadequacies of the data as PPP information is not furnished.

Note: Other limitations are also acceptable

**b) Explain one possible reason why retrenchment numbers in Singapore more than doubled in 2023 but unemployment rate fell in the same year. [2]**

Unemployment rate is measured by total number of unemployed workers over the size of the labour force which includes the employed and unemployed. [1]

Although the number of people being retrenched might have increased, the total size of labour force might have increased faster than the number of unemployed as more people might have entered the workforce. [1]

**c) With reference to Extract 1, explain two reasons for the rise in retrenchments numbers in Singapore in 2023 and comment on the severity of the problem. [6]**

There was economic uncertainty around the global economy, and this will cause demand for SG exports to decrease as trading partners of SG turn cautious and pessimistic about the future. The fall in demand for exports will mean the AD of SG will fall and this will in turn cause decrease in demand for workers as producers will be aiming to reduce production during this period. This is cyclical unemployment. [2]

It was also mentioned that there was restructuring and business reorganization as firms seek to adapt to the changing market. As firms restructure their operations to accommodate more machines and automation in a bid to increase productivity, workers with a lack of relevant IT skills will be deemed obsolete and forced to leave but they will not be able to find jobs elsewhere as most firms in SG are revamping. This mismatch of skills of the unemployed to the jobs available is structural unemployment. [2]

The severity is not high as it was reported that most retrenched workers are able to find jobs within 6 months on the average. This is because of a high level of transferability of basic skills amongst the workers and government also actively recommend workers to go for courses, so they remain employable. [2]

**d) With reference to Extract 2 and using a Production Possibilities Curve, explain how an ageing population will increase economic growth both in the short run and long run. [6]**

Economic growth in the short run

An ageing population will bring about a longer working-life expectancy where workers will remain active in the workforce for extended periods. This implies that the older workers can continue earning wages for a longer period and accumulate more wealth in the form of savings, particularly if policies are implemented to extend or eliminate the retirement age. The more wealth which the older workers accumulate, the more they will spend and the less they will save out of their current income. This is because they now feel more financially secure and hence are likely to lower their rate of savings as they feel less need to add to their large stock of wealth. Thus, consumption expenditure will rise [1] and this will increase real output in the short run assuming there are unemployed resources, thereby achieving actual growth. This is shown as a movement of production point from a point within the  $PPC_0$  (Point A) to a point nearer to  $PPC_0$  (Point B) in Figure 1.

Economic growth in the long run

Extract 2 mentioned that there will be an increasing use of automation and robots to make existing jobs physically easier for older workers to perform. Additionally, there will be innovative ways for older workers to develop new skills and stay updated with industry trends through online courses, virtual simulations, and other educational tools. This will increase labour productivity, as each worker can produce more output. In other words, the quality of labour improves [1], which in turn increases the productive capacity of the economy and achieve potential growth in the long run. [1] This is shown as an outward shift of the PPC from  $PPC_0$  to  $PPC_1$ .

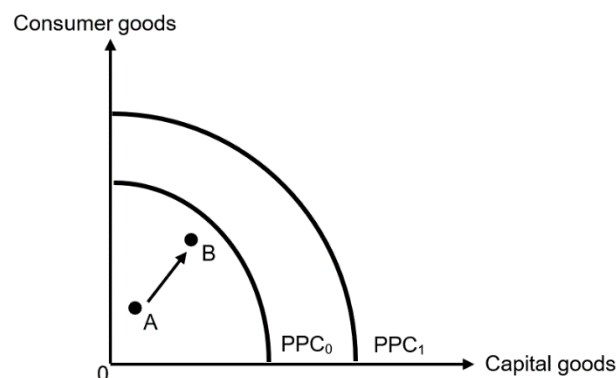


Figure 1

2m for a fully labelled and well-explained diagram

**e) Explain why MAS tightened monetary policy in Singapore while BoJ loosened monetary policy in Japan. [3]**

Singapore is facing imported inflation which stems from geopolitical shocks on global supply chains while Japan is facing deflation. [1]

Singapore is a small country which lacks natural resources, and this makes us particularly vulnerable to imported inflation. Hence, a strong SGD stance will be able to keep out and mitigate imported inflation. [1]

Japan is facing weak demand conditions as evident in Extract 4. Hence a low interest rate will be able to stimulate AD so as to try to revive the stagnant economy. [1]

**f) Discuss the possible consequences on the economy when ‘inflation is rising with no let-up in sight’. [8]**

Introduction:

- Many economists and policymakers consider that price stability is achieved when inflation is in the range of 2% to 3%.
- With a projected inflation rate anticipated to average around 6% (Extract 3), Singapore’s economy would be experiencing high inflation.

Body:

Negative effects of high anticipated inflation on:

Households: Fixed nominal income receivers (↓ material and non-material standard of living)

- Households or individuals on fixed income such as pensioners, savers and salaried workers would be adversely affected as they are unable to negotiate for wage increase. From Extract 3, with a projected inflation rate of 6% rising faster than economic growth rate of between 3% to 5%, the real income of fixed income receivers would fall, as their nominal income would not have increased as much as prices.–This leads to a fall in material standard of living as the average individual now consume fewer units of goods and services given a fall in purchasing power.
- Additionally, a fall in real income could force fixed income receivers to work longer hours or take on a second job to continue paying their bills and put food on the table. This increases stress levels which could take a toll on physical and mental well-being. Non-material standard of living falls.

Economy: ↓real GDP, ↑unemployment

① Relatively higher inflation → ↓AD → ↓real GDP, ↑unemployment

- If the rate of inflation in Singapore is higher than rival countries, a relatively higher rate of inflation increases the price of Singapore exports in foreign currencies. This leads to a fall in export revenue (X) since  $PED_x > 1$  given the availability of substitutes such as semi-conductors and consumer electronics produced in Taiwan and South Korea.
- Assuming no change in import expenditure, the consequent fall in net exports (X-M) leads to a fall in AD where  $AD = C + I + G + (X - M)$  and that real NY falls by a multiple via the reverse multiplier effect. This has a negative impact on economic growth. Unemployment increases since the demand for labour is derived from the demand of output.

Positive effects of high anticipated inflation on:

Households: Prevents a fall in SOL

- If fixed income earners can better negotiate for a rise in their nominal wage to exceed the expected rate of inflation of 6%, thereby protecting the purchasing power of their income. This is supported in Extract 3 where a poll on wage expectations showed more firms expressing an intention to raise the wages of their employees.

- Furthermore, households or individuals can take steps to mitigate the negative effects of inflation through the purchase of index linked bonds.

Level	Description	Marks
L2	A <b>developed</b> and <b>balanced</b> discussion with clear economic analysis on the effects of high inflation  At least TWO well-developed points – 1 positive & 1 negative effects  OR THREE fairly-developed points (both positive & negative effects)	4-6
L1	A <b>developed one-sided</b> discussion with clear economic analysis on the effects of high inflation  OR  An <b>undeveloped</b> discussion with <b>some</b> economic analysis on the effects of high inflation	1-3

In addition, **up to a further 2 marks** for valid evaluative comment which may include the conclusion on possible consequences on the economy when ‘inflation is rising with no let-up in sight’.

**g) Extract 5 suggests that the removal of seniority-based wage system will incentivise employees to undergo skill acquisition or pursue further education. Discuss the extent to which inclusive growth can be achieved through supply-side policy. [10]**

Inclusive growth is the rate of economic growth that is sustained over a period of time, is broad based across economic sectors, & creates productive employment opportunities for majority of the country's population. As such, in order to achieve inclusive growth, the policy must be able to achieve sustained growth through increase in AD and LRAS as well as increasing the income of the lower income households.

The removal of seniority-based wage system is an example of labour market reform where it seeks to reduce labour market rigidities. Extract 5 mentioned that the removal of the seniority-based wage system will improve productivity and hence enable individual workers to earn more competitive wages. In other words, since workers are paid based on their merits and performance, this will encourage them to undergo skills upgrading and retraining. As workers with updated and advanced skills can perform their tasks more efficiently, this means that labour productivity has increased. As the quality of labour rises, this will increase the productive capacity of the economy, thereby causing LRAS to shift rightwards from AS1 to AS2 as shown in Figure 2.

Also, the Japanese government announced a policy package of investments worth 400 billion yen (US \$3.2 billion) over three years until fiscal 2024 to support skills development for workers. This increase in government expenditure will increase AD from AD0 to AD1 as shown in Figure 2.

With the increase in both AD and AS, Japan is able to enjoy increase in real output (actual growth) from Y1 to Y2 at GPL at P2 instead of P3. That is, Japan is able to enjoy sustained growth i.e. actual growth at lower GPL or stable prices.



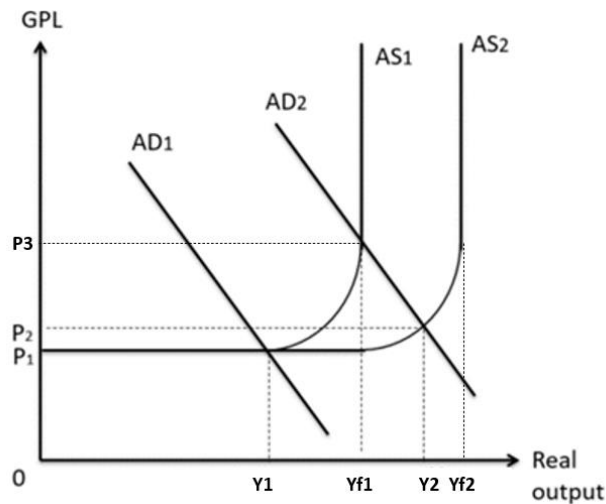


Figure 2

The rise in real national income will generate higher tax revenue for the government as households are earning higher income and therefore, they pay more personal income tax. Also, they will be paying more consumption tax since purchasing power are higher and they are buying more goods and services. Firms are paying more corporate tax due to higher profits earned. Hence, the Japanese government can then use these tax monies collected to provide transfer payment to the lower-income households to increase their disposable income, thereby ensuring that the rise in real national income is more inclusive.

#### Limitation

The success of labour market reforms hinges largely on the attitude and the aptitude of the workers. The basis for removing seniority-based wage system to achieve inclusive growth stems from the assumption that workers will be motivated to undergo skills upgrading and retraining. However, not all workers may be willing or able to participate in retraining programs due to lack of motivation, awareness, or perceived relevance to their careers. Besides, Japan has an aging population, this may mean that these older workers may not have the aptitude and attitude to undergo the training programmes. Older workers or those established in their careers might be less inclined to undergo retraining.

L2	<p>For a developed discussion on how supply-side policies can achieve inclusive growth in Japan</p> <p>Answer must include the following points:</p> <ul style="list-style-type: none"> <li>• How SSP work to achieve inclusive growth</li> <li>• Limitation of SSP to achieve inclusive growth</li> </ul>	5-7
L1	<p>For an undeveloped discussion on how supply-side policies can achieve inclusive growth in Japan</p> <p>For a developed explanation on how supply-side policies can achieve inclusive growth in Japan</p>	1-4

In addition, **up to a further 3 marks** for valid evaluative comment which may include the conclusion on the extent of how supply-side policies can achieve inclusive growth in Japan.