Assessment Schedule – 2021

Economics: Analyse inflation using economic concepts and models (91222)

Assessment Criteria

Achievement	Achievement with Merit	Achievement with Excellence
Analyse inflation involves: • **explaining** the causes of changes in inflation using economic models • **explaining** the impacts of changes in inflation on various groups in New Zealand society • **identifying, defining,** or **describing** inflation concepts.	Analyse inflation **in depth** involves: • **detailed explanation** of the causes of changes in inflation, using economic models • **detailed explanation** of the impacts of changes in inflation on various groups in New Zealand society.	Analyse inflation **comprehensively** involves: • **analysing** causes of changes in inflation by **comparing** and / or **contrasting** their impact on inflation • **analysing** the impacts of changes in inflation by **comparing** and / or **contrasting** the impact on various groups in New Zealand society • **integrating** changes shown on economic models into **detailed** explanations.

Evidence

Q1	Evidence	Achievement	Achievement with Merit	Achievement with Excellence
(a)(i) (ii)	Aggregate supply curve shifts to the left, increase in price level labelled appropriately (see Appendix). The increase in the cost of raw materials will increase the costs of production as it is more expensive to produce the goods and services, and the AS will decrease (or cost-push inflation). The decrease in AS will result in the price level increasing. Producers will increase their prices on their output, and to maintain their profit margins AS decreases from AS to AS_1. The decrease in AS will result in the price level increasing from PL to PL_1, which is inflation.	• Graph One completed correctly. • Explains that the AS curve decreases due to increased costs of production and relates this to inflation.	• Uses Graph One to provide a detailed explanation of how the AS curve decreases due to increased costs of production and producers will increase prices to maintain profit margins and refers to the correct labels.	
(b)(i) (ii)	Aggregate demand curve shifts to the right, increase in price level labelled appropriately. An increase in people taking local holidays will result in more spending at campgrounds and other tourist attractions, increasing consumption. An increase in C will result in AD increasing from AD to AD_2. This is because C is a component of AD. The rise in AD (from C) will result in the price level rising from PL to PL_2, which is inflation.	• Graph Two completed correctly. • Explains that the AD curve will increase due to an increase in consumer spending and relates this to inflation.	• Uses Graph Two to provide a detailed explanation as to why inflation will increase due to an increase in the consumption component of the AD curve and refers to the correct labels.	

(c)	The increase in AD will have a relatively smaller impact on price level than the decrease in AS. Only a relatively small number of people will be able to afford to go on holiday and spending is likely to be on low-value tourism, such as staying at campgrounds. Additionally, the tourism sector, which targets overseas visitors, may not be targeting the same people, e.g., far fewer NZ customers will be able to afford luxury lodge stays. Increased raw material costs will impact a wide range of businesses, and price increases in (for example) transport costs will have a flow-on effect on the prices of other goods and services. The increase in inflation on Graph One from PL to PL_1 is greater than the increase on Graph Two from PL to PL_2.	• Explains how widespread the effects of either change will be.	• Provides a detailed explanation that only a relatively small number of people will be able to afford to go on a domestic holiday so the increase in AD may not be significant / tourism sector may have different target market. • Provides a detailed explanation that delays and increased raw material costs will impact a wide range of businesses, and price increases in (for example) transport costs will have a flow-on effect on the prices of other goods and services.	• A judgement is made (with valid reasoning) as to which change will have the greatest impact on the price level, with reference to Graphs One and Two.

N1	N2	A3	A4	M5	M6	E7	E8
Very little Achievement evidence.	Some Achievement evidence.	Most Achievement evidence.	Nearly all Achievement evidence.	Some Merit evidence.	Most Merit evidence.	Some Excellence evidence.	Most Excellence evidence.

N0 = No response; no relevant evidence.

Q2	Evidence	Achievement	Achievement with Merit	Achievement with Excellence
(a)(i)	Not all consumers spend the same percentage of their income on fruit and vegetables. For example, some consumers may grow their own fruit and vegetables. Some consumers are vegetarians and may spend a higher proportion of their income on fruit and vegetables.	• Explains that households spend differing proportions of income on fruit and vegetables.	• Provides a detailed explanation of how households spend differing proportions of income on fruit and vegetables, using an example to explain why.	
(ii)	Fruit and vegetables are part of the food category, which is only one part of the CPI. Other categories such as housing may have increased less or decreased, leading to an overall change of 1.4%.	• Explains that fruit and vegetables make up a small proportion of the Consumer Price Index.	• Provides a detailed explanation of how fruit and vegetables make up a small proportion of the basket of goods and services that make up the Consumer Price Index, or uses another category to explain how the 8.9% increase could be balanced out to make an overall change of 1.4%.	
(b)(i)	For example, 1% and –1%. Disinflation answer must be between greater than zero and less than 1.4%. Deflation must be negative.	• Correct examples.		
(ii)	Deflation can lead to an increase in the real value of savings / increased purchasing power. If nominal interest rates on term deposit were 1% and there was deflation of –1%, then the saver would have a real interest rate of +2% and therefore have 2% more purchasing power at the end of the term. The purchasing power of the total amount saved will also increase.	• Explains that deflation will lead to an increase in the purchasing power of savings because more goods and services are able to be purchased by savers.	• Provides a detailed explanation of why the purchasing power of savers will increase by comparing real and nominal interest rates or the increase in the real value of savings.	

(c)	Inflationary expectations refer to what consumers and producers think the rate of inflation will be in the future. A low and stable rate of inflation will maintain the incentive for consumers to purchase goods and services as they expect prices to be higher in the future. If businesses expect a low and stable rate of inflation, they will be more confident about investing in expanding output as they can more accurately estimate future profitability. Deflation can be damaging to a business / business confidence as consumers will expect prices to fall and therefore may delay consumption until prices fall. Businesses will sell less good and services, and be less profitable.	• Explains how inflationary expectations can impact on consumer or producer decisions.	• Provides a detailed explanation as to how a low and stable inflation rate will encourage consumers to purchase goods and services before prices increase OR give businesses confidence to invest in expanding output due to more accurate estimation of profitability. • Provides a detailed explanation why deflation will delay consumption and therefore lead to lower sales and profits, OR lower investment / employment by businesses.	• Provides a detailed explanation as to how a low and stable inflation rate will encourage consumers to purchase goods and services before prices increase AND give businesses confidence to invest in expanding output due to more accurate estimation of profitability. • Provides a detailed explanation why deflation will delay consumption and therefore lead to lower sales and profits. Therefore, businesses lose confidence and cut back on investment and employment.

N1	N2	A3	A4	M5	M6	E7	E8
Very little Achievement evidence.	Some Achievement evidence.	Most Achievement evidence.	Nearly all Achievement evidence.	Some Merit evidence.	Most Merit evidence.	Some Excellence evidence.	Most Excellence evidence.

N0 = No response; no relevant evidence.

Q3	Evidence	Achievement	Achievement with Merit	Achievement with Excellence
(a)	The quantity theory of money (QTOM) is MV = PQ. An increase in the money supply will lead to a proportional increase in the price level, if velocity of circulation and output stay constant.	• Refers to the quantity theory of money equation. • Explains how inflation will occur if other variables stay constant.	• Uses the equation and explains that the price level increases proportionately, for example, if the money supply (M) increases by 5%, while V and Q are constant, the price level (P) will increase by 5%.	
(b)	The velocity of circulation refers to how many times money changes hands in a year. It is likely to decrease in a recession due to lower consumer confidence / consumers being more careful with their spending.	• Explains that the velocity of circulation refers to how many times money changes hands in a year.	• Provides a detailed explanation of how the velocity of circulation refers to how many times money changes hands in a year and is likely to decrease in a recession due to lower consumer confidence / consumers being more careful with their spending.	

(c)	A decrease in the velocity of circulation means that there is less spending of existing income. The QTOM of MV = PQ means that a decrease in velocity of circulation will decrease the inflationary impact of the increase in the money supply on the price level as the overall level of spending in the economy will be less than proportionate to the increase in the money supply. A decrease in the level of output means that fewer goods and services are produced. This will increase the inflationary impact of the increase in the money supply on the price level as more money is chasing fewer goods. The overall impact on inflation depends on the proportionate change in velocity of circulation and real output. This is because according to the QTOM of mv = pq, the effect of change will work in the opposite direction in terms of the effect on inflation. If the proportionate decrease in velocity of circulation is larger, the result will be a lower inflation rate than the proportionate change in money supply. If the proportionate decrease in real output is larger, the result will be higher inflation rate than the increase in money supply.	• Uses the QTOM to explain why a lower velocity of circulation leads to lower inflation. • Uses the QTOM to explain why a lower level of output leads to higher inflation.	• Uses the QTOM to provide a detailed explanation of how a decrease in the velocity of circulation will decrease the inflationary impact as there will be less spending of existing income. *OR* • Provides a detailed explanation of how a decrease in the level of output will increase the inflationary impact as extra money but fewer goods will increase the prices of those goods, according to the QTOM.	• Uses the QTOM to provide a detailed explanation of how a decrease in the velocity of circulation will decrease the inflationary impact as there will be less spending of existing income. • Provides a detailed explanation of how a decrease in the level of output will increase the inflationary impact as extra money, but fewer goods will increase the prices of those goods, according to the QTOM. • Provides a detailed explanation of how these two changes work opposite to each other, meaning that the overall impact of an increase in money supply during a recession on inflation depends on the proportionate change in each component.

N1	N2	A3	A4	M5	M6	E7	E8
Very little Achievement evidence.	Some Achievement evidence.	Most Achievement evidence.	Nearly all Achievement evidence.	Some Merit evidence.	Most Merit evidence.	Some Excellence evidence.	Most Excellence evidence.

N0 = No response; no relevant evidence.

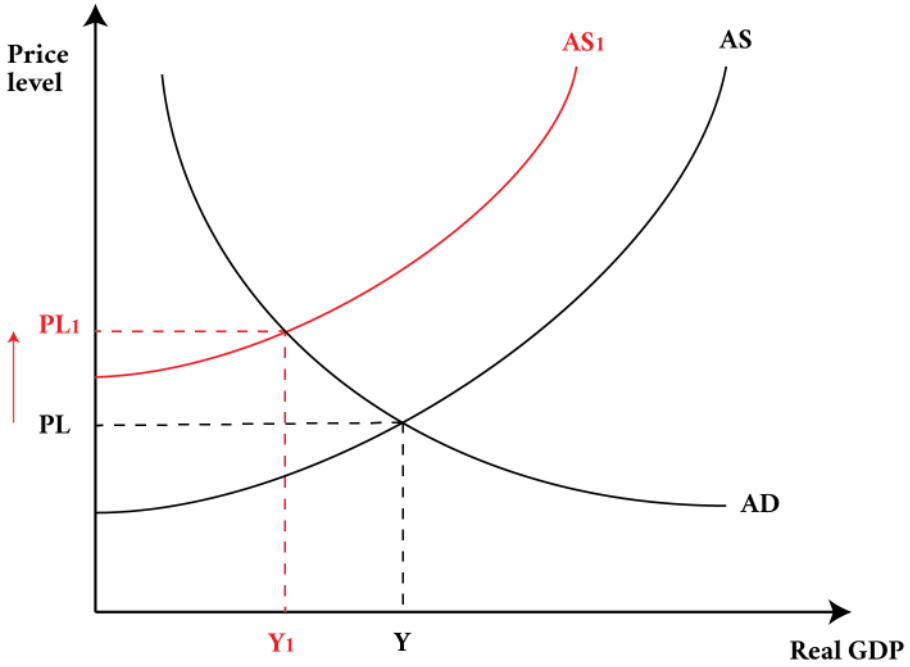
Cut Scores

Not Achieved	Achievement	Achievement with Merit	Achievement with Excellence
0 – 6	7 – 12	13 – 18	19 – 24

Appendix

Question 1(a)(i) and (b)(i)

Graph One: The New Zealand economy



Graph Two: The New Zealand economy