



# The Tale of Sophia and Inflation

## Economics lesson 2

Learning aim: To be able to understand price stability and inflation and how it is measured; and analyse the causes and consequences of inflation.



Problem solving step 5 - I explore problems by thinking about the pros and cons of possible solutions.



Staying positive step 7 - I look for opportunities in difficult situations.

Task

What is inflation?

Extension task:

Write your definition for inflation.

## Economics

Inflation – a sustained rise in the price level over a period of time.

Causes of inflation:

Cost – push inflation

A rise in the price level due to increase in the costs of production.

Demand – pull inflation

A rise in the price level due to excessive increases in aggregate demand.

# Inflation

## How is inflation measured?

Inflation is measured by Consumer Price Index (CPI)

- The government undertakes a survey to determine the goods and services average UK families spend their money on. This is known as 'the basket of goods and services'.
- Prices of all goods and services in this basket are recorded every month.
- These figures are recorded in the CPI.
- CPI is given the number 100 at the start of the period and if prices rise in the next month. This will be reflected in the index.
- To make the CPI accurate, the government uses a system called weighting.
- Each item in the 'basket of goods and services' is given a weight, which represents its importance in the total spending of the average family.
- The importance is measured dependent on the proportion of income that is being spent on the goods.

Loss of consumer confidence

Income inequality rises

Wage costs rise

Consider the consequences of inflation

Clue: Take into consideration the UK's cost of living crisis.

Real incomes fall

Menu costs – shops/restaurants have reprint labels/menus have inflation rises

Consumers that have debt gain

Shoe leather costs – consumers have to spend more time shopping around

Government spends more money on salaries – remember they are a major employer e.g. NHS

Unemployment

Producers lack business confidence

Government spends more money on benefits such as pensions

## Scenario

The UK economy has been experiencing a cost of living crisis since late 2021. This has contributed to significantly high rates of inflation in the UK. In October 2022, the UK's inflation rate was at 11.1%. Sophia is a sole trader on a popular ecommerce website. She sells cards and gifts. The cost of living crisis has contributed to a significant rise in costs of production. Additionally, Sophia's business has been affected by the limited supply chains. These issues have predicted price changes for the future. Sophia has to make a huge decision on whether she buys her raw materials in bulk now or wait, taking into consideration whether inflation would continue to rise or fall.

## Activity: Q1

Using the table, calculate the annual inflation rate at December 2022 to one decimal place. Show your working.

Clue – Use the percentage change formula to help you complete this question –  $(\text{new}-\text{old}/\text{old}) \times 100$ .

Date	CPI
December 2021	114.7
December 2022	127.2

Activity: Q1 answer

10.9%



Activity: Q2

Explain two costs of inflation on Sophia's business.



## Activity: Q2 answer

Menu costs: Firms have to adjust their price lists more often when there is inflation. Sophia has experienced limited supply chains. This increased the price of her raw materials. A rise in costs of production means she would have to pass on higher prices to consumers.

Reduced business confidence: High rates of inflation can reduce business confidence.

Businesses are much less likely to invest if they have great uncertainty about the future.



## Activity: Q3

Using the data given, explain whether Sophia should buy all of her raw materials in bulk now or wait and purchase them at a later date.

Write down your ideas in bullet form.

Year	Inflation Rate
2021	2.6%
2022	9.1%
2023	6.1%
2024	4.5%
2025	3.0%
2026	2.5%
2027	1.6%



## Activity: Q3 answer

- The data shows that the level of inflation will fall as we go into the end of 2023 and enter 2024. This suggests that Sophia should wait to buy her materials at a later date, as they will be cheaper.
- However, there are benefits of buying in bulk, as her unit costs will fall, reducing Sophia's costs of production. A fall in the costs of production may lead to lower prices for Sophia's customers, reducing cost-push inflation.



## Reflection part 1

1 - At the beginning of class, rate how well you were able to think through the pros and cons of different solutions to challenges?

*1 (I focus on either just the pros or just the cons of a situation or solution) - 5 (I listen carefully to my classmates and make a note of important information they share, whilst building up a list of pros and cons for a situation or solution)*

2 - Score yourself again, based on how well you scoped the pros and cons of a solution during class.

## Reflection part 2

3 - See if there is a difference in your scores. How can you improve on and continue these problem-solving skills in the future?