



MIAMI HERBERT
BUSINESS SCHOOL



ECO212 Principles of Macroeconomics

Chapter 5

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Overview



1. Macroeconomic questions
2. National income accounts

Aggregated economy



History of macroeconomics:

- ▶ Before World War I: No country had a system of measuring aggregate economic activity.
Economists had to analogy the whole with an observation of a small piece.
- ▶ Today: We have a sophisticated system that measures aggregate activity level.

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Macroeconomic questions



Macroeconomics questions

What macroeconomics analysis?

Macroeconomic analysis explains past patterns in aggregate economic activity and tries to predict future changes.

Macroeconomists are interested in the enormous differences in income across countries and the creation of policies that would enable the countries with lower income to catch up.



Macroeconomics questions

Income per capita - income per person

A global view of GDP per capita change.

Examples of per capita mindset:

- ▶ China has been catching up to the United States very quickly. China's economy has been growing 4 times as fast as the U.S. economy for over 30 years
 1. Will China eventually match the level of U.S. income per capita?
 2. Will China surpass the U.S.?
- ▶ Japan experienced a long-run slowdown in economic growth starting around 1990 when its income per capita was about to overtake that of the U.S.
Growth rate slow down as income per capita rises.



Macroeconomics questions

Income per capita - income per person

$$\text{Income per capita} = \text{GDP per capita} = \frac{\text{GDP}}{\text{Total population}}$$

Measuring differences in income per capita

Example 1: the United States in 2019

GDP = \$21,428 billion

Population = 327 million

GDP per capita = \$65,529 per person



Macroeconomics questions

Measuring differences in income per capita

Example 2: China in 2019

GDP = 127, 116 RMB billion

Population = 1.41billion

GDP per capita = 90, 153 RMB per person = \$12, 445.54 per person

Example 2: Saudi Arabia in 2019

GDP = 4, 928 riyal billion

Population = 32.9 million

GDP per capita = 149, 787 riyal per person = \$39, 844.33 per person

Macroeconomics questions - economy development



Economy development:

- ▶ **Japan experienced a long-run slowdown in economic growth starting around 1990**
- ▶ **Middle income trap:**
a country that attains a certain income (with gross national product per capita that has remained between \$1,000 to \$12,000 at constant (2011) prices)(due to given advantages) gets stuck at that level.

Macroeconomics questions - economy development



long-run and short-run in macroeconomics:

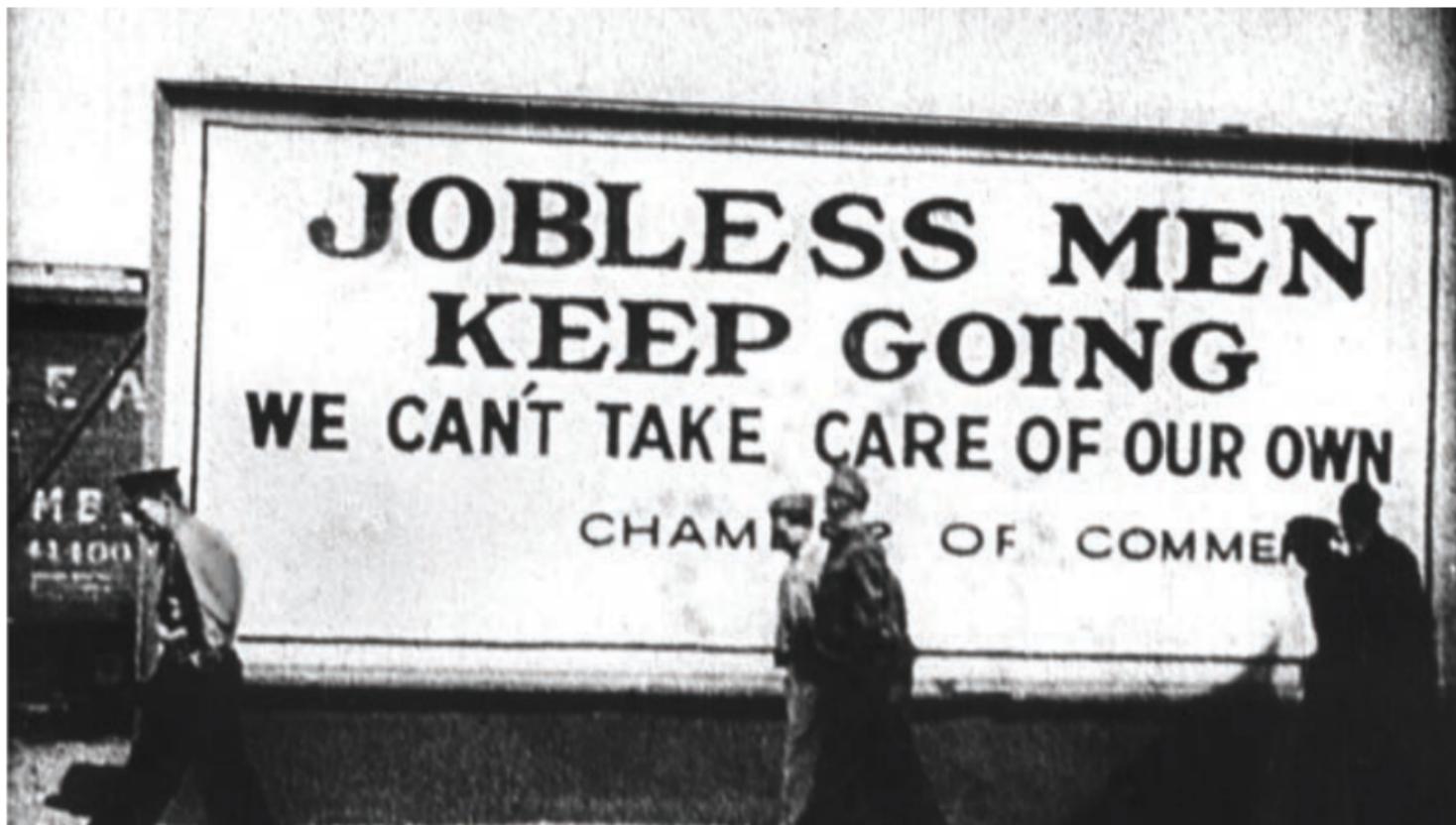
- ▶ “short-run”: the year-to-year study of the economy.
- ▶ “long-run”: the ultimate equilibrium after any shocks.

Saltwater vs Freshwater economics.

Important topics in macroeconomics:

- ▶ How to make low-income countries grow faster?
- ▶ achieve long-run economic prosperity.

Macroeconomics questions - employment





Macroeconomics questions - employment

Definition for labor:

- ▶ **Employed:** Persons who hold a paid full-time or part-time job.
- ▶ **Unemployed:** A worker is officially unemployed if he or she does not have a job, has actively looked for work in the prior four weeks, and is currently available for work.
- ▶ **Not in labor force:** persons who are without a paid job and not actively searching for one.

$$\text{Labor force} = \text{Employed} + \text{Unemployed}$$

$$\text{Unemployment rate} = 100\% + \frac{\text{Unemployed}}{\text{Labor force}}$$

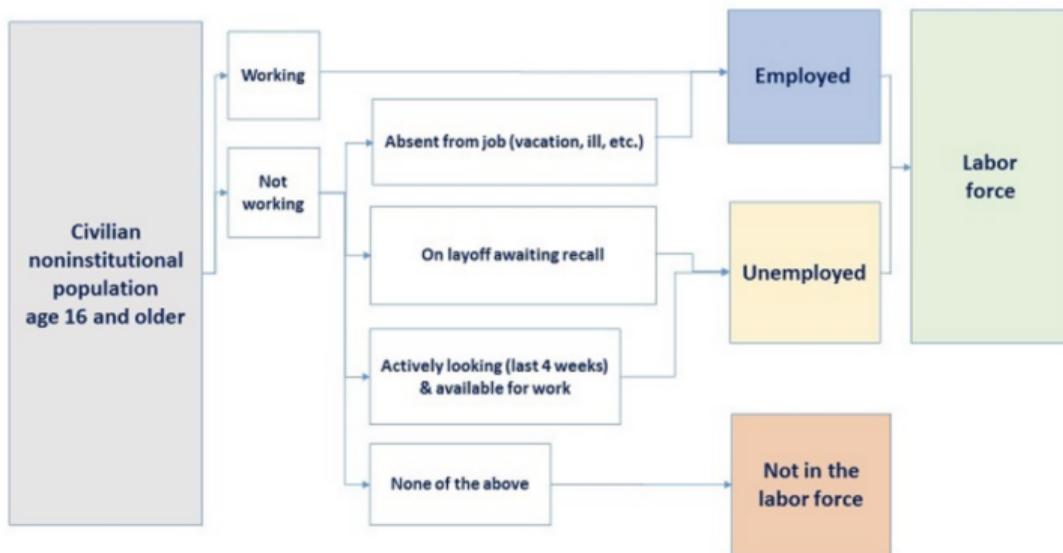
$$\text{Labor force participation rate} = 100\% + \frac{\text{Labor force}}{\text{Potential workers}}$$



Macroeconomics questions - employment

Unemployed rate:

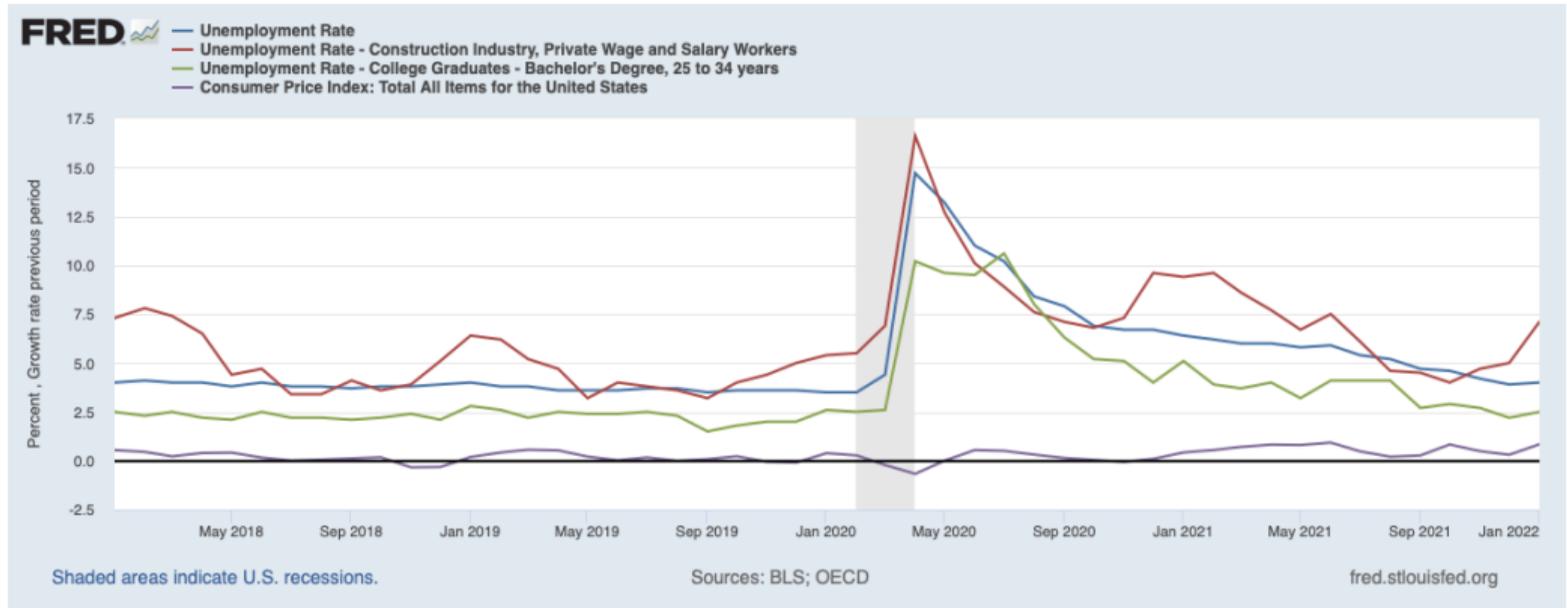
Unemployment rate is the fraction of the labor force that is unemployed.



Macroeconomics questions



Discuss the unemployment rate:





Macroeconomics questions- employment

Unemployment rate vs. inflation

Think of the current situation - tolerant of a high inflation rate for what?

Philips curve

The Federal Reserve has a dual mandate

- ▶ promote maximum sustainable employment
- ▶ price stability

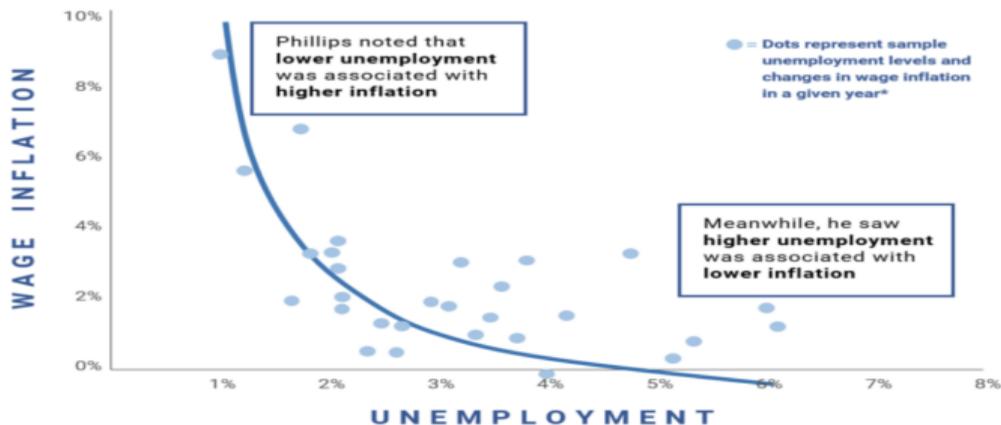


Macroeconomics questions- employment



UNDERSTANDING THE PHILLIPS CURVE

In the 1950s, A.W. Phillips plotted decades' worth of data on wage inflation and unemployment. He noticed an inverse relationship between these two indicators.



BUT WHY?

The idea may seem intuitive: A lower unemployment rate means more people are working, which signals increased demand for labor. That can put upward pressure on wages, so companies may raise prices for their products. But the inverse relationship Phillips described has "flattened" in recent years, prompting debate among economists and policymakers.

*This illustration is intended for conceptual purposes only. It's partly modeled on the Figure 1 scatterplot on Page 285 of Phillips' 1958 paper, which contained 1861-1913 data. Each dot represents a year. The vertical axis shows the average rate of change of money wage rates; the horizontal axis shows average unemployment.

Macroeconomics questions- employment



Discuss why we have low unemployment rate in some sectors

Leisure and hospitality industry experienced great losses and continues to experience the worst shortfall

Employment change by industry (thousands), seasonally adjusted, February 2020–February 2021

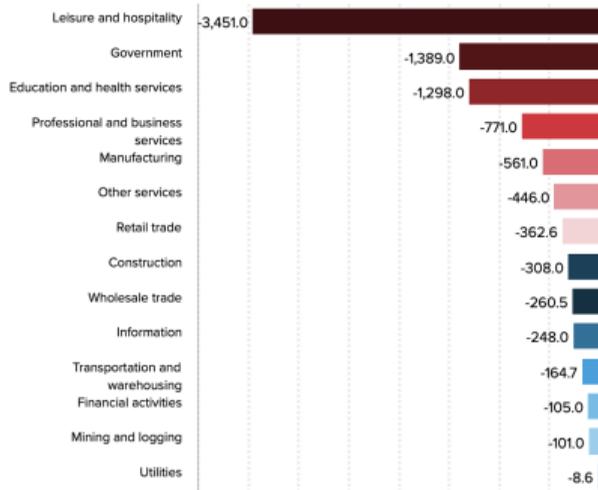


Chart Data

Source: Bureau of Labor Statistics (BLS) Current Employment Statistics, Establishment Survey (CES) public data series.

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National income accounts

National income account



National income accounts: measure the level of aggregate economic activity in country.

The National Income and Product Accounts (NIPA): is the system of national income accounts that is used by the U.S. government.