

INTRODUCTION TO ECONOMICS  
BUSINESS ADMINISTRATION DEGREE - YEAR 2016

PRACTICE SHEET 6

1. Consider an imaginary economy with the following data in 2015. Suppose that the raw materials sold have been added to the production of this year.

Type of good	Production (Units)	Sales (Units)	Price (m.u.)
Consumer Goods	400	360	12
Capital Goods	300	275	25
Raw materials	160	180	10

- Consumption of fixed capital (*depreciation*) during 2015: 800.
- Stock level at the beginning of 2015: 1000.
- Public transfers to households: 30.
- Taxes: 80.

Get for this economy:

- (a) Stock level at the end of 2015.
  - (b) Net fixed capital formation in 2015.
  - (c) Nominal GDP in 2015 (through output and expenditure approaches).
  - (d) Disposable income in 2015.
2. Suppose now that: (i) the base period is year 2014, (ii) nominal GDP in 2010 was 10000 and, (iii) 2010 prices were: consumer goods 9 m.u.; capital goods 22; raw materials 10.
- (a) Real GDP in 2015.
  - (b) Real and nominal GDP growth rate in 2015.
  - (c) Inflation rate in 2015, measured with: (i) real and nominal GDP growth rates, and (ii) 2014 and 2015 GDP deflators.
  - (d) In the previous question: did you get the same outcomes? Why? Please explain.
3. Imagine an economy that produced 300000 PCs in 2016. Each of them was worth 800. Suppose that the use of those PCs was:
- (a) 135000 were sold to households.
  - (b) 65000 were sold to the public sector.
  - (c) 50000 were bought by firms.
  - (d) 25000 were exported.
  - (e) The rest was kept in stock by the producers.

(f) Real and nominal GDP growth rate in 2015.

What was nominal GDP of this economy in 2016? Calculate this figure from (i) the output and (ii) the expenditure approach

4. Imagine an economy where only two consumer goods are produced, movies and popcorn, and a capital good, cameras. The table below shows the amount of those goods produced and sold in units and their prices in monetary units.

Year	Movies	Price M.	PopCorn	Price P.	Cameras	Price C.
2015	50	7	300	1.5	20	1000
2016	60	8	370	2	30	1200

Consider that the base period is year 2015. Get for this economy:

- (a) Nominal and real GDP in 2015.
- (b) Nominal and real GDP in 2016.
- (c) Nominal and real GDP growth rate in 2016.
- (d) DGP deflator in 2016.
- (e) Inflation in 2016, measured with GDP deflator.
- (f) Deflator of the consumption in 2015 and 2016.
- (g) Inflation in 2016, measured with consumption deflator.