

## “Answer on question #59586 -Economics - Macroeconomics”

Calculating CPI, real, and per capita terms.

Year	2000	2001	2002
Data (CPI)	847	902	911
GDP real (\$B)	562	607	619
Pop per capita (m)	183	201	232

Calculate nominal GDP growth for 2002

### Solution

Nominal GDP growth for 2002 will be calculated the following formula:

$$\text{Nominal GDP growth rate} = \frac{(\text{Nominal GDP}_{2002} - \text{Nominal GDP}_{2001})}{\text{Nominal GDP}_{2001}} * 100\%$$

Where

$$\text{Nominal GDP}_{2002} = \frac{\text{CPI}_{2002}}{\text{CPI}_{2000}} * \text{Real GDP}_{2002}$$

$$\text{Nominal GDP}_{2001} = \frac{\text{CPI}_{2001}}{\text{CPI}_{2000}} * \text{Real GDP}_{2001}$$

$$\text{Nominal GDP}_{2001} = \frac{902}{847} * 607 = 650 (\$B)$$

$$\text{Nominal GDP}_{2002} = \frac{911}{847} * 619 = 665,77 (\$B)$$

$$\text{Nominal GDP growth rate} = \frac{(665,77 - 605)}{605} * 100\% = 2,43\%$$

The nominal GDP growth rate for 2002 is 2.43%.

### Answer

The nominal GDP growth rate for 2002 equals 2.43%.