

Real GDP per capita in developed countries

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Growth rate of real GDP per capita is represented as a sum of two components – a monotonically decreasing economic trend and fluctuations related to a specific age population change. The economic trend is modeled by an inverse function of real GDP per capita with a numerator potentially constant for the largest developed economies. Statistical analysis of 19 selected OECD countries for the period between 1950 and 2004 shows a very weak linear trend in the annual GDP per capita increment for the largest economies: the USA, Japan, France, Italy, and Spain. The UK, Australia, and Canada show a larger positive linear trend. The fluctuations around the trend values are characterized by a quasi-normal distribution with potentially Levy distribution for far tails. Developing countries demonstrate the increment values far below the mean increment for the most developed economies. This indicates an underperformance in spite of large relative growth rates.

Key words: economic development, economic trend, business cycle, GDP per capita
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