**The Impact of Population on the Gross Domestic Product (GDP) in United States of America from 1950-1999 Using the Annual Ciphering.**

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-1973-1975, what happen in America?

-25 years before and after the rapid increase of GDP was the time period that was chosen to study the data.

- Growth rate= (current year – previous year) / (previous year)

-Change in data= current year – previous year

 

 

 



GDP growth rate

POP growth rate 





* Comparing population growth rate with population
* Comparing GDP growth rate with population growth rate.
* The decrease in population growth rate compare to the growth in population.

-While Population growth rate and population do not have any outliers. GDP growth rate has 2 outliers.

-0.01115122 and 0.15526047



The regression equation is

Pop growth rate = 0.0291 - 0.000000 Population



The regression equation is

GDP growth rate = 0.112 - 3.37 Pop growth rate

Residual graph for GDP growth rate to the residual



Using R program and finding the Resistant line from three groups

Popgr.hat = 0.02113261 - 1.014636e-10 pop

Gdpgr.hat = 0.1789693 - 7.666954 pop.growth.rate



Looking similar to the graph in minitab.

> summary(resid)

Min. 1st Qu. Median Mean 3rd Qu. Max. NA's

-0.06950 0.02502 0.04670 0.04299 0.07366 0.10720 1

> summary(popgr)

Min. 1st Qu. Median Mean 3rd Qu. Max. NA's

0.008695 0.009547 0.010720 0.011970 0.014500 0.018240 1

> summary(pop)

Min. 1st Qu. Median Mean 3rd Qu. Max.

152300000 187200000 214900000 214100000 241700000 272700000

> summary(gdpgr)

Min. 1st Qu. Median Mean 3rd Qu. Max. NA's

-0.01115 0.05474 0.07300 0.07207 0.09017 0.15530 1

<http://en.wikipedia.org/wiki/List_of_countries_by_nominal_GDP_growth_rate>

<http://en.wikipedia.org/wiki/Lists_of_countries_by_GDP>

<http://www.jstor.org/stable/2280393?seq=3>