## The economic impact of the one-child policy



The One-Child Policy helped China to raise its economic growth in the past decades. China was able to control the rate of the population growth lower than the rate of the GDP growth, and thus the GDP per capita increases dramatically in the past decades. In regression model 1, over 53% of the economic growth can be explained by the policy; in regression model 2, over 74% of the economic growth can be explained by the policy. Hence this paper has shown the change in the economic growth of China could be explained by the effects of the One-Child Policy. Although the crude birth rate is not shown to have long term or short term effect on the GDP per capita, the gross fixed capital formation has a significant positive impact on the GDP per capita. The gross fixed capital formation could not have increased that much without the presence of the One-Child Policy. While the population growth decreases, more resources are used to improve the living standard.

The long term effect of the One-Child policy was also considered in the research. The results obtained in regression model 2 have indicated the graduate economic growth in China can be well explained by the effect of the One-Child Policy.

The coefficients of the crude birth rate were negative in both regression models; it suggested that part of the Malthusian theory and the neo-Malthusian theory were support. The main criticism of the theories was the theories did not account the advance in the technology, and thereby the food supply has increased faster than arithmetic progress. The science and technology in China has evolved tremendously in the past thirty years since the One-Child Policy has implemented. Therefore, the Malthusian theory and the neo-Malthusian may not be applicable in the modern world today. This view has been support in the work of Galor and Weil (1999, pp. 150-154). Moreover, part of the Revisionism theory was supported. The theory suggested that the population growth does not hinder the population growth in dense area and China is a densely populated country.

In regression model 2, lagged crude birth rate was used. Since the population will enter the workforce at the aged of 16, the crude birth rate was tested for the impact on the GDP per capita. The variable was found insignificant to explain the changes in the GDP per capita. The results suggested that China was not facing the diminishing return of labour.

Since the crude birth rate is not correlated with the growth of GDP per capita, there is no population theory which is totally supported in the analysis of China. Although China was not facing a Malthusian dynamic of overpopulation and diminishing return of labour dynamics, it is essential for the implementation of the One-Child Policy. If the population was not controlled and continued to increase, China would soon have to face the problems associated with overpopulation and diminishing return to labour.

In conclusion, the decision of the implementation of the One-Child Policy in 1979 was supported in this research. Although the One-Child Policy has shown to have benefitted the economic growth of China in the short term and 16 years long term, it may have an adverse effect in the very long term. The " one child" now has to support his/her two parents and four grandparents. Therefore, the implementation of the One-Child Policy was supported in 1979 but the decision of the continuation of the One-Child Policy is to be remained uncertain.

## 6. 2 Limitations of the Study

The results obtained in the research only give a suggestion of the implementation of the One-Child Policy. There are certain limitations in the research. A number of measurement issues need to be addressed are stated below.

As a proxy of the education level, it is better to use the average number of schooling as it gives a clearer picture of the education level of the population. Unfortunately, the National Bureau of Statistics of China has not recorded this variable for the period, 1979 – 2007.

As a proxy of the living standard, it is better to use the gross fixed capital formation per capita as it accounts the fact that the living standard increases faster than the population growth. Unfortunately, the size labour force was also not recorded. (Gross fixed capital formation per capita = Gross fixed capital formation/ Workforce)

There are several missing figures in the data. The missing figures usually occur in 1980 to 1985. Although interpolation has used to calculate the missing data in between, the lack of data may lead to inaccuracies in the results.

There may be inaccuracies in the figures of the crude birth rate. Many illegal birth of baby girls occurred due to the traditional son preference in China.

The actual crude birth rate should be higher as the illegal births were not recorded.

The lack of the sample sizes may also lead to inaccuracies in the results which determine the long term effect of the One-Child Policy. There are only 13 observations after the adjustments, which may lead to no significant variable being detected even if there is a one present. Furthermore, only the labour market was accounted to determine the long term effect of the One-Child Policy in this study. The " 4-2-1" problem can not accounted in the study, as the policy has only implemented for 31 years and it is not long enough for the analysis of this effect.

Although the implementation of the One-Child Policy was generally supported in the results, it may not be supported in different areas of China. The average crude birth rate was used in the research, and thus the decision of the One-Child Policy may not be supported in individual cities. E. g. Urban areas

The official numbers from the National Bureau of Statistics of China may have exaggerated the growth of GDP [The Economist: China's dismal statistics (Anon., 2009)], which will lead to the overestimation of the effect of the One-Child Policy.

## 6.3 Potential Areas of Study

The research provides general study on the implementation of the One Child Policy in China. It can be further studied to achieve a deeper level of understanding of the policy. As mentioned in the previous section, the analysis of the implementation of the One-Child Policy may differ from cities. https://assignbuster.com/the-economic-impact-of-the-one-child-policy/ The number of births has been largely reduced, and the population started to age. Urban areas may have started to face the shortage of labour and problems related to demographic aging. This suggestion has been supported as the citizens in Shanghai were encouraged to have two children per family since 2009 (Xie Linli, 2009). Furthermore, the action taken in Shanghai has supported my conclusion in the research which China was not facing the diminishing return of labour. The relationship between the GDP per capita and the crude birth rate in different cities can be revised by cities. The population theories will possibly be supported by the analyses in different cities. Same methods and tests can be used and the data required can also be found in the official website of the National Bureau of Statistics of China. Since the One-Child Policy was criticised to have violated the human rights, the results obtained from this further research will aid the find suggestions to other family planning in China. If the crude birth rate was found positively correlated with the economic growth in different cities, some policy suggestions can be made. For example, more births can be allowed or only the spacing between births is controlled. Alteration of the policy will possibly bring advantages to China. The criticisms of the family planning may reduce; the number of female infanticides may also be reduced, and may lead to the further increase in the economic growth in China.

The One-Child Policy has always been a source of controversy since its execution; there are many more potential studying areas. In the analysis chapter, the growth in the number of tertiary enrolment in China was found insignificant to explain the economic growth. Another independent variable such as the percentage of people that have finished secondary schools can be used as a proxy of the education level. More research can be done on the relationships between the One-Child Policy, education and crude birth rate. The relationship between the variables can also be found using the time series OLS regression. Although the education level of the people was increased by the One-Child Policy, there are other factors that affect the education level. As the education level of the people increased, the desire of improving the qualities of life may increase and the desire having children may decrease. As a result, the crude birth rate may not only be affected by the One-Child Policy, but also the increased level of education. The results obtained can help to notice if the effect of the One-Child Policy was overestimated in the present study, and at the same time help to gain a better understanding of the economic growth in China.

Further study could include analysing the sex ratios in China. It has always been an active debating topic. The One-Child Policy has affected to the sex ratio due to the traditional son preference in China. The sex selective abortion has led to the excess births of males and the unbalance sex ratio in China. A research has been done on the unbalanced sex ratios, and the researcher, Hesketh states that, " males under the age of 20 exceeded females by more than 32 million in China, and more than 1. 1 million excess births of boys occurred." Since there are 32 million more males than females, some of the men will be unable to get married and have a family. Fewer births will be occurred as there are less married couples, and therefore the unbalanced sex ratios may also decrease the crude birth rate of the population. Moreover, the children may have to take care even more elderly rather than only their own 2 parents and 4 parents, but their relatives

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as well. The GDP per capita may be negatively affected by the sex ratios. Same as the suggested research in the previous paragraph, the results obtained can help to notice if the effect of the One-Child Policy was overestimated in the present study.

The last suggestion of the potentials area of study is based on the past of the One-Child Policy effects on the economic growth, and to estimate the future effect on the economy. The changes in the variables which are affected by the One-Child Policy can be predicted. The least squares regression can be used to estimate the lines of best fit. Based on the predicted changes of the variables, the growth of GDP in the future can then be estimated. Further analysis on the implementation of the One-Child Policy can be done along with the results obtained.

The People's Republic of China seems to have faith in the influences on the One-Child Policy. As to how deep the influence of the One-Child Policy, only time can tell.