## TITLE: EFFECT ON THE DEVELOPMENT OF NATIONS THROUGH THE CHANNEL OF MORTALITIES AND POVERTY.

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# INTRODUCTION

This paper will discuss about the mortalities and poverty rate increases due to pandemic COVID: 19. COVID: 19 started in Wuhan China in December 2019 and very swiftly it took entire world under its grasp. It is a highly contagious and deadly virus and had left its impact on many big nations. In this paper we will try and look into the mortalities that certain big nations have to suffer and what is the impact of such casualties on the development of these nations. Not only we are addressing and analyzing development from the mortality rates of a nation but we are also interested in looking at the issue of poverty which surely had expanded due to extensive lockdowns people have to go through. Lockdowns and quarantines had impacted individual’s earning capacity by either losing their jobs (as their employer could not no longer afford them as employee) or by facing direct impact on revenue generation and thus affecting their profits.

To see the changes in development patterns of the nation’s we will simple just look at the GDP per capita of the nations. Majorly the countries that we are interested in are United States of America, England, India, and Spain. Among the countries that I will be analyzing in this paper are developed nations (United States of America and England) and the developing nations (Spain and India). This selection of countries is completely random and unbiased. The purpose behind learning the effects of pandemic on both developed and developing countries is to make our analysis more genuine and efficient.

# METHODOLY

To come at results of this paper we will compare the mortality rates before pandemic of both developed and developing nations with the mortality rates of these nations after COVID: 19. And later we will also see what effects does it holds on the per capita GDP of these nations. We will be using graphical representation of these data to make the analysis more feasible.

As our paper is discussing the effect on development by both mortalities and poverty after COVID: 19, we will use this same analysis of comparing poverty rates both before and after pandemic and will thus look into per capita GDP to reach our result.

# HEAD

Everyone in this world has gone through some tough times in the past. The years 2020 till even today 2022 have left an impact on the mind of people which is never going away anytime soon. This is the time when a deadly pandemic arose in the world named COVID: 19 or CORONAVIRUS. It originated from some part in Wuhan, China due to some toxic present in the body of bats but is so contagious that merely in a time span of a month it took over majority of people in Wuhan and some other people in China under its effect. This virus has brutal mortality rates with itself and thus almost every nation in this world went under Lockdown to prevent any unacceptable range of casualties but anyhow this virus has seen to take many lives with it.

DEVELOPED NATIONS

### UNITED STATES OF AMERICA

We will start analyzing our first nation United States of America. Mortality rate of United States of America in the year 2019 is around 8.7 percent and the growth rate of the same year is 1.12 percent with per capita GDP for these years to be $65,280 whereas year after 2019 when COVID hit USA the per capita GDP gradually fell to $63,533 which for a developed nation is quite a big downfall whereas the mortality rates for this year becomes 8.88 percent and the growth remains constant at 1.12 percent. Data at the hand shows us how United States of America from the past one and a half decade has gradually paced up its growth rate but has seen a down fall due to pandemic. For years 2021 and 2022 the mortality rates have increased to 9.075 percent whereas growth has fallen to 1.09 percent (macro trends).

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| --- | --- | --- |
| UNITED STATES OF AMERICA | | |
| **Years** | **Mortality rate** | **Growth rate** |
|  |  |  |
| 2021 | 8.97 | 5.59 |
| 2020 | 8.88 | -3.41 |
| 2019 | 8.78 | 2.29 |

Total casualties during pandemic that USA had to face are 946686. Fallen in the growth rate of United States of America is clearly the reason of lack of man power and fallen productivity if we look through the point of view of mortalities.

Poverty in USA had clearly increased due to obvious reasons and consequences of pandemic. A majority of people who are a daily wage labor or even some monthly salaried employees had lost their jobs and earning due to extensive and long lockdowns that country had to go through in order to protect their population. Loss of income due to these lockdowns pushed many below poverty line (world economic forum). Poverty in the U.S. increased in 2020 as the coronavirus pandemic hammered the economy and unemployment soared. Those at the bottom of the economic ladder were hit hardest, new figures confirm, suggesting that the recession may have widened the gap between the rich and the poor. Not just poverty has risen due this pandemic driven recession but even inequality has also increased. Paper by François Bourguignon has shown us how poverty and inequality both have their significant roles while achieving growth and how a relation between poverty and inequality is vital. Around 11.4 percent that is around 37.2 million people were below poverty line in 2020 which rate was 10.5 percent in 2019.

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| --- | --- | --- |
| UNITED STATES OF AMERICA | | |
| **Years** | **Poverty rate** | **Growth rate** |
| 2021 | 11.5 | 5.59 |
| 2020 | 11.4 | -3.41 |
| 2019 | 10.5 | 2.29 |

### ENGLAND

Next in our list is England. We will use the same approach as before which we used while analyzing usa and will try to derive results. The growth rate of GDP in England was 1.25 in 2018 which rose to 1.37 in 2019 but gradually fell in 2020 to -9.79 percent for obvious effects of COVID: 19. Mortality rate in year 2019 for UK was 9.1 percent which rose to 10.3 percent. This greater increase in the magnitude of death rates is one of the effects after pandemic and this is the result why GDP fell so vastly. If we now look at the GDP per capita of uk for the years 2018-20 the country had $42,996 GDP per capita in 2018 and $42,354 in 2019 but GDP per capital fell by 4.89 percent in 2020 from 2019 and made it to $40,285. There were 607,992 deaths in 2020 in England but were 530,841 in 2019. A big proportion of deaths were witnessed due to pandemic in 2020 in England. Deaths due to COVID in England were 140,392.

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| --- | --- | --- |
| ENGLAND | | |
| **Years** | **Mortality rates** | **Growth rates** |
| 2020 | 10.3 | -98 |
| 2019 | 9.1 | 14 |
| 2018 | 9.3 | 17 |

Growth rate is multiplied by 10 for better understanding.

Another approach of our paper focuses on poverty as a key which effects development through various channels. Poverty in England for the year 2019 had recorded to be 18 percent of the population whereas this number has seen to increase in the coming years due to pandemic. England is the nation which had affected by CORONAVURUS’s many new variants as well. UK had to go through under lockdown many times due the emergence of such new variants. Year 2020 had poverty rate of 23 percent which rose to a decade maximum for England to 47 percent.

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| --- | --- | --- |
| ENGLAND | | |
| **Years** | **Poverty rate** | **Growth rates** |
| 2020 | 23 | -98.5 |
| 2019 | 19 | 14 |
| 2018 | 18 | 17 |

Growth rate is multiplied by 10 for better understanding.

The above two countries that we mentioned are considered as developed nations. It is startling to see how these nations fell in their growth rates due to pandemic.

Later coming we are going to address two developing nations and will perform the same actions as we did with our previous developed nations to analyze better.

DEVELOPING NATIONS

### SPAIN

Analyzing the effect of COVID: 19 on SPAIN’s development we will first look through mortality rate point of view. Mortality or death rates in Spain for the year 2018 was 9.1 for 2019 was 8.83 and for 2020 the year of pandemic strike for the world is 10.3 per 1000 people. The annual growth rate for these three years had been 7.88, -2.71 and -8.48 respectively for 2018, 19 and 20. Our statistics of GDP per capita is $30,389, $29,565 and $27,057 for those years 2018-2020. Given this data we are able to comprehend how after effects of pandemic has resulted in fall in growth rate (also GDP per capita). Deaths due to COVID: 19 in Spain are 99,410.

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| --- | --- | --- |
| **SPAIN** | | |
| **Years** | **Mortality rates** | **Growth rates** |
| 2018 | 9.1 | 7.88 |
| 2019 | 8.83 | -2.71 |
| 2020 | 10.3 | -8.48 |

Poverty rate experienced by Spain in the 2020 is equal to 21 percent whereas in 2019 this rate has been equal to 20.7 percent. There are significant results of fall in growth rate but the impact of mortalities and poverty increase is very less. We can say for this case that fall in growth rate for Spain has not much affected by those factors which are directly influenced by COVID. Clearly other factors (inequality, population growth etc.) had their impact on the results we are witnessing here of Spain.

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| --- | --- | --- |
| SPAIN | | |
| **YEARS** | **POVERTY RATE** | **GROWTH RATE** |
| 2018 | 21 | 7.22 |
| 2019 | 20.7 | -2.71 |
| 2020 | 21.5 | -8.48 |

### INDIA

The GDP per capita for India in the year 2019 had been $2101 and the same in 2020 was expected to be $1929. Growth rates for this developing nation was 6.5 percent in 2018 to 4 percent in 2019 but witnessed a fall in 2020 by 8 percent. Although we didn’t see any gradual fall in mortality rates with respect to the nation. Mortality rates of India for these past years are mentioned on table below. India has although suffered from 513,481 deaths due to COVID: 19 but the mortality rate seem approximately same. This may mean that India’s mortality rate even before pandemic was quite high.

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| --- | --- | --- |
| INDIA | | |
| **YEAR** | **MORTALITY RATE** | **GROWTH RATE** |
| 2018 | 7.3 | 6.5 |
| 2019 | 7.27 | 4 |
| 2020 | 7.23 | -8 |

Poverty rate of India has affected the most by COVID: 19. India is a country of income inequality from the very starting this rise in poverty has even increased this gap for Indians and will thus impact the development of the nation which is seen in the chart and the table below.

|  |  |  |
| --- | --- | --- |
| INDIA | | |
| **YEAR** | **POVERTY RATE** | **GROWTH RATE** |
| 2018 | 6.9 | 6.5 |
| 2019 | 6.7 | 4 |
| 2020 | 20.8 | -8 |

Negative impact of inequality and poverty work side by side in effecting economic growth. Any one of them working distinctively does not have significant impact on economic growth. We have seen in our analysis that countries while suffering through pandemic has gone through some major poverty effects as well as inequality effects. It has been seen in many publications before that economist tend to focus on inequality more than they do on poverty while addressing the question of growth. It had been argues that due to income inequality in a nation people under the weaker section of inequality tend to provide under investment in sectors like education, healthcare and physical capital thus under investment in both human and physical capital tend to lower growth. But it had been counter argued that under investment is an outcome of lack of resources and not of inequality. Mortality increase on the other hand as a result of pandemic showers the same impact on growth. Increase in mortalities takes away people which were human capital indeed. Inequality impacts human capital as well due to lack of investment on essential areas (Cingano (2014)) Thus lack of human capital has its negative impacts of economic growth as well. Solow in his model has shown the significance of human capital by bringing it in production functions. He has also shown efficiency a tool to achieve increasing growth but when inequality, poverty and mortality strikes and lead to under investment in some vital sectors it can be seen how that consequence has an impact on economic growth. Robert and Omer in their writings (Inequality, poverty and economic growth) had mentioned about how negative impact of inequality on economic growth is related to the incidence of poverty. When poverty of the nation is below 25 percent it has seen to be showing statistically insignificant negative impact of inequality on economic growth. Whereas as poverty rise the impact of inequality also tend to increase.

In our example above of developing countries it is clearly visible and is feasible to say that mortality rates of these countries were not very much got affected by COVID: 19. But on the other hand growth rates had affected adversely for both the nations. So we move ahead and see if poverty increase has something to do with these changes. Poverty in India has increased by a greater magnitude which makes inequality in the country along with poverty to drop India’s growth to fall. Although other developing country in this paper is Spain who had not shown much increase in mortalities (more from India) but again still have witnessed drop in growth. We thought of looking at our poverty aspect to come at any conclusion but there we see how in 2018 in Spain even at 21 percent of poverty growth was around at 7 percent but in 2020 due to pandemic though the poverty rate remained at 21.5 percent only growth rate faced a significant drop of negative 8.48 percent. It became difficult to come at a conclusion here in respect of this country. All we can argue is many other factors may be responsible for such fall in growth rate. It may be due to increase in inequality due to some political aristocrat’s influence. Also pandemic had also affected education sector due to changing the mode to online so lack of efficiency and productivity can also be the reason. Also Spain is country whose travelling revenue holds a bigger proportion in GDP it can be said that extensive lockdowns and lack of tourists also affected Spain’s growth rate.

To talk about developed nations now let us start with England. England has shown slight increases in mortalities but has still shown a greater downfall in growth rates. But on the other hand poverty rate of the nation had increased from the years 2018 to 2020 reaching the threshold where inequality would show significant negative impact on economic growth. Clearly it would be unwise to say that only this is the main reason for the nation’s fall in growth. Many other aspects off course like traveling revenue or lost efficiency in personnel has it’s impacts too but here in our analysis we can say increased poverty made inequality’s impact on growth highly significant.

Neither mortality rates nor poverty rates has shown much rise in respect of United States of America. The analysis we did for USA was from 2019-2021. Here the growth of United States of America showed negative results of growth only in 2020. But this paper’s analysis cannot say that this downfall for the year 2020 is because of those two factors that we have studied in our analysis. Clearly that one year downfall is due to many other aspects in which we are not looking into in this paper. It is impeccable to see how within a year United States of America was able to increase its growth rate into a positive number, which was astonishing. This result can be presumed to be the effect of USA being an industrialization driven nation.

Now we are going to present the simultaneous tabular presentation and graphical representation for better understanding of our audience.

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| --- | --- | --- | --- |
| YEAR 2020 | | | |
| **Countries** | **growth rate for the year 2020** | **poverty rate** | **mortality rate** |
| **USA** | 3.47 | 11.4 | 8.88 |
| **UK** | 9.8 | 23 | 10.3 |
| **India** | 8 | 20.8 | 7.23 |
| **Spain** | 8.48 | 21.5 | 10.3 |

### CONCLUSION

Our analysis was centered towards finding an impact that COVID: 19 had imposed on nation’s development but clearly there is no single answer to that analysis. Even after differentiating our choice of countries into two sections Developing and Developed to find any significant relation we are unable to provide any solid conclusion. Some countries got affected by inequality and poverty thus affecting their growth. And some may have affected due to several other reasons and factors which can be responsible for this which we have not taken in our paper under observation. We can although see by this analysis that industry driven nations were able to come out of the impact posed on them by pandemic.

Also mortality which was the area of concern while going through this pandemic has not shown significant increases over the years our analysis. A way which we can say about coming out of this phase of setback in development due to pandemic can be learnt from United States of America. Nations should focus on the industry side if their GSP to Come out of the injuries left by this pandemic.

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