Title: COVID-19: Lockdown- Perception of Faculty and Students towards Life, Society, Teaching, and Learning.

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#### Abstract:

The purpose of this study is to examine the perception of faculties and students in Bangalore city about teaching, learning, and quality of life during this COVID 19 pandemic. The study is deductive in nature. In the study quantitative research technique is used by collecting responses from faculty and students of different demographical base. The finding of the study focuses on changing pattern of personal behavior of people during the lockdown, availability of essential commodities during the lockdown, opinion on punishment for people whose risky behavior leads to the spread of the coronavirus, and steps taken by the government of India during this lockdown period. This study helps practitioners and educationalists to plan the tactics and strategies for future disasters.

Keywords: COVID-19, Lockdown, Perception, Faculty, Students, Life, Society, Teaching, and Learning.

#### INTRODUCTION

An epidemic is a new disease that usually spreads within national boundaries. A Pandemic is an epidemic that spreads worldwide, crossing international boundaries affecting a very large number of people(WHO 2011b). The outbreak of such a disease is caused by a virus that is new to mankind for which the human body is not immune. Viruses that are found in animals sometimes when transmitted to the human body mutate and become harmful causing deaths. A pandemic has certain distinct features such as wide geographic extension, disease movement, novelty, high explosion rates (W.Qiu 2017). Based on these, the health authorities discover a potential pandemic. The world has seen deadly pandemics washing out the majority of the population meanwhile posing a great challenge for medical science such as 'The Black Death' (1346-1353), 'Great Plague of Marseille' (1720-1723),' Asiatic Cholera' (1817-1824), 'Spanish Flu' (1918-1920), 'Asian Flu' (1957-1958), 'H1N1 Swine Flu' (2009-10), COVID-19 (Present).

#### PANDEMICS AND SOCIETY:

Pandemics are not the mere realm of public health but a social issue and global security issue (Castillo-Chavez2015). It impacts on economic, social, and political conditions of the countries where it spreads(W.Qiu 2017). The movement of people from one region to another is highly restricted on account of the transmission of the virus and therefore the social life of citizens gets badly affected. When economic activities are shut down country faces a deficit in funds for meeting the needs of people. The Lockdown of a city or entire state curtails development and so builds up the pressure on the ruling party. A country needs to be well equipped with medical infrastructure to sail through a pandemic situation.

# THE MAJOR PANDEMICS AND THEIR IMPACTS:

1. The Great Plague of Marseille (1720-1723):

Plague is an infectious disease caused by a bacteria called *Yersinia* pestis found in small mammals which get transmitted to humans through their fleas (*WHO*). The remarkable epidemic 'Black Death' in the 14<sup>th</sup> century ravaged Europe, Asia, the Middle East, and North Africa(*Ole Jorgen Benedictow 2004*). The plague of Marseille popularly called the plague of Provence (French region) was a successive wave of the 'Black Death',

which is said to have killed 50,000 people in the region which amounts to more than half of the total population of 90,000(*Nasir Puyan 2017*). The royal government in Paris took effective measures such as suspending all commerce & travel, implementing strict quarantines, and death penalties to the check pandemic(*Cindy Ermus 2015*).

- 2. The first cholera pandemic (1817–1824): Cholera is a diarrhoeal infection caused by a bacterium Vibrio cholera which is present in contaminated water or food (WHO). The first cholera pandemic is said to have its origin in South East Asia. Most of the cases were observed in India (Bengal) in 1826 and has spread Meditterrainregionsthroughsea routes which were considered as the second pandemic and are also called 'Asiatic Cholera' (Chan C H 2013). More than 13% of the world's population lack safe drinking water facility and therefore cholera can be controlled but it cannot be completely eradicated (Edward T. Ryan 2011). Cholera is still an epidemic in many countries. Effective measures to control cholera include restricting foreign trade, programs of the government to improve sanitation, water supply, and food (WHO Geneva 1993).
- 3. Spanish Flu (1918-1920): An *influenza virus* resulted in death of 40 million people worldwide causing respiratory illness (*WHO Global Alert and Response*). The flu was first discovered in 'Spain' and therefore it is named as 'Spanish Flu'. The normal life of people was disturbed, schools & universities were shut and public gatherings were strictly prohibited(*Antoni Trilla 2008*). Influenza virus has occurred three times in the 20<sup>th</sup> century caused by H1N1-1918 (Spanish flu), H2N2 1957 (Asian flu), H3N2 1968 (Hong Kong Flu) (*Burton H. Singer 2007*).
- 4. Swine flu (2009-10): *H1N1 Influenza virus type A* found in pigs is responsible for causing Swine flu in human beings causing respiratory illness (*Girard MP 2009*). On 11 June 2009, 74 countries officially reported 28,774 cases of influenza A (H1N1) infection, including 144 deaths (*WHO*). During this pandemic, the government in many cities implemented strict lockdown. Public health agencies, public and private schools in the US were closed to avoid the spread of the virus(*Navarro 2016*). Centers for Disease Control and Prevention (CDC) recommended that people who had symptoms of Influenza-like-illness to work from home for 7 to 10days and additional 24 hours after symptoms subsided(*Kumar 2012*).

### **COVID 19 PANDEMIC (PRESENT):**

A new strain of virus causes the disease COVID-19 which is similar to Severe Acute Respiratory Syndrome (SARS). Symptoms of the disease include fever, cough, and shortness of breath. In more severe cases, the infection can cause pneumonia or breathing difficulties. (WHO). The outbreak of the disease was first reported in Wuhan, Hubei province, China in December 2019(Zi Yue Zu2020). WHO declared on 30<sup>th</sup> January 2020, the outbreak of PHEC (Public Health Emergency Concern), and on 12th February 2020, the disease was named COVID 19 (Coronavirus Disease 2019). In a span of 30 days, COVID 19 spread rapidly to the entire country with an increase in a number of confirmed cases where the first few were from Huanan Seafood Wholesale Market in Jianghan District, Wuhan, Hubei, China which is also said to be the possible point of origin of COVID 19 and later cases were through transmission from one person to another (Zunyou Wu 2020). As per the WHO's situation report on 13th March 2020, the disease has spread in more than 100 countries of the world and among them, the most affected are the USA, Italy, Spain, Germany, China, France, Iran, UK, Switzerland, and Turkey. To check the spread of pandemics many countries including India took certain measures such as lockdown of cities, screening mechanisms at airports to detect symptomatic people, and keeping them in isolation for 14 days to test them for the virus(TanuSinghal 2020).

### COVID-19 IN INDIA:

On 30th January 2020, India had its first case of COVID 19 positive patient which set an alarming tone throughout the country to be alert. The airport screening process did not turn to be that effective since many people were asymptomatic. People returning from outside countries were quarantined and tested for the virus. By March 24<sup>th</sup> 2020 India had 563 patients who tested positive (*Priyanka pulla 2020*). On the same day, PM Narendra Modi announced the Lockdown of the country for 21 days (14<sup>th</sup> April 2020). Lockdown is an emergency protocol where people will not be allowed to move from the region where they are residing. It is a scenario where only essentials are supplied(Groceries, pharmacies, and banks). It was again extended till the 3<sup>rd</sup> of May because as of April 22, India has reported 18 985 confirmed cases and 603 deaths(*Lancent 2020*), and the final stage of lockdown till 19<sup>th</sup> of May 2020.

### Summary of sections of the paper

This paper comprises of six sections. Following the Introduction is a brief on literature about pandemics in the past. The next section comprises of the objectives, hypothesis and the research design of this paper. The section after that is about analyzing the data and interpreting the results. Following the above sections is the Implications and the last section comprises of conclusion.

### **Literature Review:**

A pandemic is the worst kind of catastrophe that will impact the entire world. It will affect the world economy, halts the wealth creation process, impacts the education and health sectors, and creates panic among the public. W.Qiu (2017) has attempted to research various pandemics and their impact on mankind. According to the authors, a pandemic has certain important features such as wide geographical extension, novelty, severity, etc. It affects the social, economic, and political life of citizens of a country. Global security is also one of the threats that a world has to face during a pandemic situation. The economic impact of a pandemic would be heavy direct and indirect costs, the social impact would be population mobility, school closures, canceling public sports and gatherings, markets, etc. and the political impact would be relating to the security of individuals. The impact of pandemics is not limited to the current generation but it could also impact future generations. Tommy Bengtsson (2015) has researched the impact of the influenza virus on fetal health and socio-economic status of an individual. The pregnant ladies who were found positive for the 1918 influenza pandemic who lived in Sweden had severe health issues during their old age. The human being is a social animal and being isolated to homes is going to create a lot of mental health issues. Yingfei Zhan-g (31 March 2020) has studied the impact of COVID 19 on the mental health and quality of life of people in Liaoning Province, China. The findings of the study reveal that people in that province were mildly stressed during the pandemic. The majority of them received support from families and friends which has helped them to cope with the negative impact on mental health. Sarah Alonzi (11th June 2020) has done primary research on the impact of the COVID 19 pandemic on mental health. The respondents were those with pre-existing medical conditions. The findings of the research show that women and non-binary individuals had higher levels of depression or anxiety compared to men. The availability of technology platforms has however

helped people to bring some routine into their lives. GeetaVerma (May 2020) in her editorial has brought out some of the changes in the society that has taken place during the COVID 19 pandemic situation. The focus of their study is on a) global impact of pandemic and schools and life b) response of government leaders c) ways in which COVID 19 has helped the changes in educational and societal inequalities. Rod J. Rohrich (2020) has analyzed the life changes due to the pandemic. The societal changes (Social distancing, fear, panic, and focus on others over us) and their implications (being more self-reliant, selfless, caring for family, friends, parents, and grandparents) mentioned in the paper gives an insight into the future challenges of social life. Peter H. Katjavivi (2003) has highlighted the important role played by a university in creating awareness among students and society regarding HIV / AIDS pandemic. In some of the Southern African countries, HIV is still an epidemic. Therefore, through this research, the authors have suggested the higher education institutions in Africa to run a program that leads to the prevention of the disease. Nancy Dumais (2009) undertook a research project to test the conceptual understanding of influenza viruses among adolescents in Canada. An analogical model was used to describe the results of the study. It was proved that the intervention has a positive impact on creating awareness among students about influenza viruses and their vaccination. **Debbie Van (14 March 2010)** researched in Australia during the outbreak of the H1N1 2009 pandemic. The respondents were both academic (teachers and students) and non-academic (staffs) of the University of New South Wales, Sydney, Australia. The results show that young respondents were not very anxious about the pandemic assuming that they were susceptible to pandemics. As far as the behavioral changes are concerned there was no significant change. Only 1/5<sup>th</sup> of the sample had adopted the simplest health behavior such as wearing masks and hand washing. The most important findings of the study were students were willing to continue learning through online strategies to promote self-isolation and control the infection. Ellen B. Fragaszv (9thoct 2017) has measured the health-related quality of life, school, and work absenteeism in England during an influenza pandemic. The participants were classified into 3 groups such as working, nonworking, and students.. It was proved that the absenteeism in school and workplace were lower than the previous pandemic situation but still, it did contribute to substantial loss of quality of life. **Thomas Franchi** (June 2020) has mentioned in his letter to the editor the impact of COVID 19 on anatomy students. The author is a student himself who had addressed a few ongoing

issues students being taught without practical-based learning, expensive online software programs making it unaffordable for students, loss of access to dissection rooms, etc. He has also listed down certain opportunities that can be explored during this pandemic situation like the use of pre-recorded lectures, tailor-made online software programs, peer teaching groups through video conferencing, and the like. Mel L Anderson (April 9th, 2020) has expressed concern about the cancellation of classroom sessions for the health care professional students during the COVID pandemic. Some of the key issues discussed in the paper include patient and hospital welfare, learner welfare, educational experience, etc. Four broad principles were framed under which multiple suggestions were included such as deploying technology for non-face-to-face learning, maintaining flexibility in the educational needs of trainees, discussing learning opportunities for ethics in health care. Russell M Viner (April 2020) has researched the effectiveness of closing down schools in controlling coronavirus spread. The study is based on secondary research where different articles relating to school closure published during previous pandemics (SARS, MERS) were collected through Pub Med. Hongkong, China, Taiwan, Singapore were some of the countries to introduce school closures in early January due to COVID 19. The results show that school closure would reduce the death rate by 2-4%.

The main focus of our study in this paper is on the perception of faculties and students in Bangalore city about teaching, learning, and quality of life during this COVID 19 pandemic.

## **Objectives**

The study was conducted to understand-

- The personal behavior concerning demographics during the lockdown
- The availability of essentials and other commodities during the lockdown
- The opinion on punishment for people whose risky behavior lead to the spread of the Coronavirus
- The opinion about steps taken by the Government of India during this lockdown period

### **Hypotheses:**

- There is a significant difference in personal behavior during lockdown among different demographic groups
- There is a significant difference in opinion amongst various demographic groups about steps taken by the Government during the lockdown

## **Research Design:**

The present study aims at understanding the behavior of faculty and students of higher education during the lockdown period. The sample size for the study was 194 comprising of 53 faculty and 141 students. Various demographic variables were considered for the study to get a better understanding of behavior and opinions. Hence the study is descriptive in nature.

The researchers used a self-constructed questionnaire to collect data online from the samples. The various demographic details were collected for the study. The other variables in the study were used to understand personal behavior, availability of essential commodities, opinion of participants about punishment to be given to people with risky behavior leading to spread of coronavirus, and opinion about the steps taken by the Government during the lockdown period.

Data is collected from the sample related to the lockdown period in India which was first announced for 21 days from 24<sup>th</sup> March 2020 and then was extended till 19th May 2020.

# **Analysis and Findings**

Demographic data summary

The primary data was collected from 194 participants. The sample comprised of 27% faculty and 73% students. 50% of the sample belonged to the age group 18-23 years and the rest 50% were above 23 years. The sample comprised of 40% male and 60% female. 25% of the participants were undergraduates, 65% were postgraduates and 10% were doctorates. The family annual income of 26% of respondents was below 5 lakhs, 19% had an annual income between 5 -7.5 lakhs, 20% had an annual income between 7.5 – 10 lakhs, 12% had an annual income between 10-12.5 lakhs, and rest 24% had an annual family income above 12.5 lakhs.

The data collected is slightly skewed for age and type of respondent. The rest of the demographic variables have skewness between -1 and +1. Kurtosis is below 3 for all demographic variables.

Data were collected to understand the personal behavior of faculty and students during the lockdown period. The hypothesis was set to understand the same.

# Hypothesis:

H1: There is a significant difference in personal behavior during lockdown among different demographic groups.

The hypothesis test comprises Likert scale data with categorical data taken from various demographics and hence non-parametric tests are used to analyze the same. The variables under Personal Behaviour are analyzed with each of the demographic variables.

1. Type of respondent (Faculty/ student)

H1a: There is a significant difference in personal behavior during lockdown across categories of type of respondents

-Table 1: Type of respondent (Faculty/ student)

Hypothesis Test Summary

|   | Null Hypothesis  | Test  | Sig. | Decision                          |
|---|--|---|------|-----------------------------------|
| 1 | The distribution of PB- Stayed at home is the same across categories of Type of respondent.      | Independent-<br>Samples<br>Mann-<br>Whitney U<br>Test | .050 | Retain the<br>null<br>hypothesis. |
| 2 | The distribution of PB- no social gathering is the same across categories of Type of respondent. | Independent-<br>Samples<br>Mann-<br>Whitney U<br>Test | .047 | Reject the<br>null<br>hypothesis. |
| 3 | The distribution of PB-Kept<br>Distance is the same across<br>categories of Type of respondent.  | Independent-<br>Samples<br>Mann-<br>Whitney U<br>Test | .623 | Retain the<br>null<br>hypothesis. |
| 4 | The distribution of PB-Inform if sides is the same across categories of Type of respondent.      | Independent-<br>Bamples<br>Mann-<br>Whitney U<br>Test | .407 | Retain the<br>null<br>hypothesis. |
| 5 | The distribution of WPB-washed hands is the same across categories of Type of respondent.        | Independent-<br>Samples<br>Mann-<br>Whitney U<br>Test | .921 | Retain the<br>null<br>hypothesis. |

Asymptotic significances are displayed. The significance level is .05.

Table 1 shows the result of non-parametric tests conducted to check if there is a significant difference in personal behavior across categories of types of respondents. Mann-Whitney U test was used for the hypothesis testing as there are only 2 categories. It was found that results were not significant and hence across categories respondents stayed at home (p-value .050), maintained social distance(p-value .623), informed if they were sick(p-value .407), and washed

hands regularly(p-value .921) except for no social gatherings(p-value .047), test results were found to be statistically significant and hence there is a difference across categories of respondents regarding no social gatherings.

### 2.Age

H1b: There is a significant difference in personal behavior during lockdown across categories of age groups

Table 2: Age

Hypothesis Test Summary

| _ |  |   |      |                                   |  |  |
|---|--|---|------|-----------------------------------|--|--|
| L | Null Hypothesis  | Test  | Sig. | Decision                          |  |  |
| - | The distribution of PB- Stayed at home is the same across categories of 2. Age.            | Independent-<br>Samples<br>Kruskal-<br>Wallis Test  | .214 | Retain the<br>null<br>hypothesis. |  |  |
| 2 | The distribution of PB- no social<br>gathering is the same across<br>categories of 2. Age. | Independent-<br>Samples<br>Kruskal-<br>Wallis Test  | .515 | Retain the<br>null<br>hypothesis. |  |  |
| 3 | The distribution of PB-Kept<br>Distance is the same across<br>categories of 2. Age.        | Independent-<br>Samples<br>Kruskal-<br>Wallis Test  | .344 | Retain the<br>null<br>hypothesis. |  |  |
| _ | The distribution of PB-Inform if sid<br>is the same across categories of 2<br>Age.         | Independent-<br>KSamples<br>Kruskal-<br>Wallis Test | .755 | Retain the<br>null<br>hypothesis. |  |  |
| ٤ | The distribution of WPB-washed hands is the same across categories of 2. Age.              | Independent-<br>Samples<br>Kruskal-<br>Wallis Test  | .244 | Retain the<br>null<br>hypothesis. |  |  |

Asymptotic significances are displayed. The significance level is .05.

Table 2 shows the result of non-parametric tests conducted to check if there is a significant difference in personal behavior across categories of age. Kruskal-Wallis test was used for the hypothesis testing as there are more than 2 categories. It was found that results were not significant (p-value .214) and hence across categories of age respondents stayed at home, no social gatherings (p-value .515), maintained social distance (p-value .344), informed if they were sick (p-value .755), and washed hands regularly (p-value .244).

### 3. Gender

H1c: There is a significant difference in personal behavior during lockdown across categories of gender

Table 3: Gender

|   | Null Hypothesis   | Test  | Sig. | Decision                          |
|---|---|---|------|-----------------------------------|
| 1 | The distribution of PB- Stayed at home is the same across categories of 3. Gender.      | Independent-<br>Samples<br>Mann-<br>Whitney U<br>Test | .001 | Reject the null hypothesis.       |
| 2 | The distribution of PB- no social gathering is the same across categories of 3. Gender. | Independent-<br>Samples<br>Mann-<br>Whitney U<br>Test | .862 | Retain the<br>null<br>hypothesis. |
| 3 | The distribution of PB-Kept<br>Distance is the same across<br>categories of 3. Gender.  | Independent-<br>Samples<br>Mann-<br>Whitney U<br>Test | .016 | Reject the null hypothesis.       |
| 4 | The distribution of PB-Inform if sides is the same across categories of 3 Gender.       |   | .045 | Reject the null hypothesis.       |
| 5 | The distribution of WPB-washed hands is the same across categories of 3. Gender.        | Independent-<br>Samples<br>Mann-<br>Whitney U<br>Test | .081 | Retain the<br>null<br>hypothesis. |

Asymptotic significances are displayed. The significance level is .05.

Table 3 shows the result of non-parametric tests conducted to check if there is a significant difference in personal behavior across categories of gender. Mann-Whitney U test was used for the hypothesis testing as there are only 2 categories. It was found that results were not significant across categories of gender for no social gatherings(p-value .862) and washed hands regularly(p-value .081) and for the other personal behavior results were significant and across categories of gender respondents stayed at home (p-value .001), maintained social distance(p-value .016) and informed if they were sick(p-value .045).

# 4. Educational Qualification

H1d: There is a significant difference in personal behavior during lockdown across categories of educational qualification

Table 4: Education qualification

| _ |  |  |      |                                   |
|---|--|--|------|-----------------------------------|
| L | Null Hypothesis  | Test   | Sig. | Decision                          |
| 1 | The distribution of PB- Stayed at home is the same across categories of 4. Educational Qualification.        | Independent-<br>Samples<br>Kruskal-<br>Wallis Test | .132 | Retain the<br>null<br>hypothesis. |
| 2 | The distribution of PB- no social gathering is the same across categories of 4. Educational Qualification.   | Independent-<br>Samples<br>Kruskal-<br>Wallis Test | .020 | Reject the<br>null<br>hypothesis. |
| 3 | The distribution of PB-Kept<br>Distance is the same across<br>categories of 4. Educational<br>Qualification. | Independent-<br>Samples<br>Kruskal-<br>Wallis Test | .414 | Retain the<br>null<br>hypothesis. |
| 4 | The distribution of PB-Inform if sides is the same across categories of 4. Educational Qualification.        | Independent-<br>Samples<br>Kruskal-<br>Wallis Test | .114 | Retain the<br>null<br>hypothesis. |
| 5 | The distribution of WPB-washed hands is the same across categories of 4. Educational Qualification.          | Independent-<br>Samples<br>Kruskal-<br>Wallis Test | .452 | Retain the<br>null<br>hypothesis. |

Asymptotic significances are displayed. The significance level is .05.

Table 4 shows the result of non-parametric tests conducted to check if there is a significant difference in personal behavior across categories of educational qualification. Kruskal-Wallis test was used for the hypothesis testing as there are more than 2 categories. It was found that results were not significant and hence across categories of education respondents stayed at home (p-value .132), maintained social distance(p-value .414), informed if they were sick(p-value .114), and washed hands regularly(p-value .452) except for no social gatherings(p-value .020), test results were found to be statistically significant and hence there is a difference across categories of educational qualification regarding no social gatherings.

## 5. Family Income (in Rupees)

H1e: There is a significant difference in personal behavior during lockdown across categories of family income

Table 5 : Family income (in rupees) :

|   | Null Hypothesis   | Test   | Sig. | Decision                          |
|---|---|--|------|-----------------------------------|
| 1 | The distribution of PB- Stayed at home is the same across categories of 5. Annual Family income( in Rupees).        | Independent-<br>Samples<br>Kruskal-<br>Wallis Test | .170 | Retain the<br>null<br>hypothesis. |
| 2 | The distribution of PB- no social gathering is the same across categories of 5. Annual Family income( in Rupees).   | Independent-<br>Samples<br>Kruskal-<br>Wallis Test | .592 | Retain the<br>null<br>hypothesis. |
| 3 | The distribution of PB-Kept<br>Distance is the same across<br>categories of 5. Annual Family<br>income( in Rupees). | Independent-<br>Samples<br>Kruskal-<br>Wallis Test | .432 | Retain the<br>null<br>hypothesis. |
| 4 | The distribution of PB-Inform if sides is the same across categories of 5 Annual Family income( in Rupees           |  | .612 | Retain the<br>null<br>hypothesis. |
| 5 | The distribution of WPB-washed<br>hands is the same across<br>categories of 5. Annual Family<br>income( in Rupees). | Independent-<br>Samples<br>Kruskal-<br>Wallis Test | .906 | Retain the<br>null<br>hypothesis. |

Asymptotic significances are displayed. The significance level is .05.

Table 5 shows the result of non-parametric tests conducted to check if there is a significant difference in personal behavior across categories of annual family income. Kruskal-Wallis test was used for the hypothesis testing as there are more than 2 categories. It was found that results were not significant and hence across categories of annual family income respondents stayed at home (p-value .170), no social gatherings (p-value .592), maintained social distance p-value .432), informed if they were sick (p-value .612), and washed hands regularly (p-value .906).

# The availability of essentials and other commodities during the lockdown

It was found that 64% of the respondents had to leave home to buy essential commodities whereas the rest 36% did not leave home to buy essential commodities. 86% of the respondents found all shops in India closed during lockdown except for supermarkets selling essential commodities, gas stations, and pharmacies. It was also found that 100% of the respondents felt lockdown as a necessary step.

The study found respondents' opinions regarding other people following the restrictions to be maintained during the period of lockdown. It was found that 68% of the respondents felt that 81-90% of other residents in India had the opinion that social gatherings should be canceled during the lockdown period, 82% of the respondents felt that 81-90% of Indian residents do not want to shake hands with other people's hands due to the coronavirus. 71% of the

respondents felt that 81-90% of Indians did not want any shops other than essential

commodities to be open for a certain period.

64% of the respondents thought that people whose risky behavior leads to the further spread of

the coronavirus should be financially punished. They also suggested fines ranging from Rs

1000 to 10000 along with jail for a few months if people behaved in a risky manner and led to

further spread of the coronavirus.

Opinion on steps taken by Government during the lockdown period

Respondents are of different opinions regarding the reaction of the Government of India about

the coronavirus outbreak. 21% of them felt that moderately extreme steps were taken to reduce

the spread of coronavirus, 36% felt that moderately sufficient steps are taken, 39% thought that

extremely sufficient steps had been taken to slow down the spread of coronavirus, and rest 4%

felt little extreme steps had been taken.

Hypothesis:

H1: There is a significant difference in trusting India's Government to take care of its citizens

during this coronavirus outbreak among different demographic groups.

The hypothesis test comprises Likert scale data with categorical data taken from various

demographics and hence non-parametric tests are used to analyze the same. The variables under

Personal Behaviour are analyzed with each of the demographic variables.

1. Type of respondent (Faculty/ student)

H1a: There is a significant difference in trusting India's Government to take care of its citizens

during lockdown across categories of type of respondents

Table 6: Test results based on type of respondent (Faculty/ student):

|   | Null Hypothesis   | Test  | Sig. | Decision                          |
|---|---|---|------|-----------------------------------|
| 1 | The distribution of 15. How much do you trust India's Government to take care of its citizens? is the same across categories of 1. I am a.  | Independent-<br>Samples<br>Mann-<br>Whitney U<br>Test | .894 | Retain the<br>null<br>hypothesis. |
| 2 | The distribution of 16. How factually truthful do you think Indian Government has been about the corona virus outbreak? is the same across categories of 1. I am a.                         | Independent-<br>Samples<br>Mann-<br>Whitney U<br>Test | .155 | Retain the<br>null<br>hypothesis. |
| 3 | The distribution of 17. What do you think – How effective are social distancing measures(eg. Lockdown) to slow down the spread of corona virus? is the same across categories of 1. I am a. | Independent-<br>Samples<br>Mann-<br>Whitney U<br>Test | .012 | Reject the null hypothesis.       |

Asymptotic significances are displayed. The significance level is .05.

Table 6 shows the result of non-parametric tests conducted to check if there is a significant difference in trusting India's Government to take care of its citizens during lockdown across categories of type of respondents. Mann-Whitney U test was used for the hypothesis testing as there are 2 categories.

H1b: There is a significant difference in trusting India's Government to take care of its citizens during lockdown across categories of age group

Table 7: Test results based on Age

### **Hypothesis Test Summary**

|   | Null Hypothesis   | Test                    | Sig. | Decision                          |
|---|---|-------------------------|------|-----------------------------------|
| 1 | The distribution of 15. How much of you trust India's Government to take care of its citizens? is the same across categories of 2. Age.   | Samples<br>Kruskal-     | .388 | Retain the<br>null<br>hypothesis. |
| 2 | The distribution of 16. How factual truthful do you think Indian Government has been about the corona virus outbreak? is the same across categories of 2. Age.                          | Samples                 | .059 | Retain the<br>null<br>hypothesis. |
| 3 | The distribution of 17. What do you think - How effective are social distancing measures(eg. Lockdown to slow down the spread of corona virus? is the same across categories of 2. Age. | Independent-<br>Bamples | .109 | Retain the<br>null<br>hypothesis. |

Asymptotic significances are displayed. The significance level is .05.

Table 7 shows the result of non-parametric tests conducted to check if there is a significant difference in trusting India's Government to take care of its citizens during lockdown across categories of age. Kruskal-Wallis test was used for the hypothesis testing as there are more than 2 categories. It was found that results were not significant and hence across categories of age, there was no difference in respondents trust in the Indian Government to take care of its citizens (p-value .388), opinion on the Indian Government being factually truthful about the coronavirus outbreak (p-value .059) and the effectiveness of social distancing (p-value .109).

H1c: There is a significant difference in trusting India's Government to take care of its citizens during lockdown across categories of gender

Table 8: Test results based on Gender

**Hypothesis Test Summary** 

|   | Null Hypothesis  | Test   | Sig. | Decision                          |
|---|--|--|------|-----------------------------------|
| 1 | take care of its citizens? is the same across categories of 3.   | londependent-<br>Samples<br>Mann-<br>Whitney U<br>Test | .623 | Retain the<br>null<br>hypothesis. |
| 2 | Government has been about the corona virus outbreak? is the same | Śamples<br>Mann-                                       | .411 | Retain the<br>null<br>hypothesis. |
| 3 | to slow down the spread of corona .                              | Independent-<br>Samples<br>Mann-<br>Whitney U<br>Test  | .225 | Retain the<br>null<br>hypothesis. |

Asymptotic significances are displayed. The significance level is .05.

Table 8 shows the result of non-parametric tests conducted to check if there is a significant difference in trusting India's Government to take care of its citizens during lockdown across categories of gender. Mann-Whitney U test was used for the hypothesis testing as there are 2 categories. It was found that results were not significant and hence across categories of gender, there was no difference in respondents trust in the Indian Government to take care of its citizens (p-value .623), opinion on the Indian Government being factually truthful about the coronavirus outbreak (p-value .411) and the effectiveness of social distancing (p-value .225).

H1d: There is a significant difference in trusting India's Government to take care of its citizens during lockdown across categories of educational qualification

Table 9: Test results based on Education Qualification

|   | Null Hypothesis   | Test   | Sig. | Decision                          |
|---|---|--|------|-----------------------------------|
| 1 | The distribution of 15. How much you trust India's Government to take care of its citizens? is the same across categories of 4. Educational Qualification.  | d<br>Mdependent-<br>Samples<br>Kruskal-<br>Wallis Test | .946 | Retain the<br>null<br>hypothesis. |
| 2 | The distribution of 16. How factual truthful do you think Indian Government has been about the corona virus outbreak? is the samacross categories of 4. Education Qualification.                            | Índependent-<br>Samples<br>eKruskal-                   | .303 | Retain the<br>null<br>hypothesis. |
| 3 | The distribution of 17. What do yo think - How effective are social distancing measures(eg. Lockdow to slow down the spread of corona virus? is the same across categories of 4. Educational Qualification. | n Independent  | .013 | Reject the<br>null<br>hypothesis. |

Asymptotic significances are displayed. The significance level is .05.

Table 9 shows the result of non-parametric tests conducted to check if there is a significant difference in trusting India's Government to take care of its citizens during lockdown across categories of educational qualification. Kruskal - Wallis test was used for the hypothesis testing as there are more than 2 categories. It was found that results were not significant and hence across categories of educational qualification, there was no difference in the trust on India's Government to take care of its citizens (p-value .946) and their view on how factually truthful the Indian Government has been about the coronavirus outbreak (p-value .303) except for effectiveness of social distancing measures to slow down the spread of coronavirus (p-value .013) test results was found to be statistically significant and hence there is a difference across types of respondents about the social distancing

H1e: There is a significant difference in trusting India's Government to take care of its citizens during lockdown across categories of annual family income

Table 10: Test results based on Family income (IN rupees)

Hypothesis Test Summary

|   | Null Hypothesis  | Test                    | Sig. | Decision                          |
|---|--|-------------------------|------|-----------------------------------|
| 1 | The distribution of 15. How much you trust India's Government to take care of its citizens? is the same across categories of 5. Annual Family income( in Rupees  | Samples<br>Kruskal-     | .076 | Retain the<br>null<br>hypothesis. |
| 2 | The distribution of 16. How factual truthful do you think Indian Government has been about the corona virus outbreak? is the same across categories of 5. Annual Family income( in Rupees).                          | Índependent-<br>Samples | .718 | Retain the<br>null<br>hypothesis. |
| 3 | The distribution of 17. What do you think - How effective are social distancing measures(eg. Lockdowr to slow down the spread of corona virus? is the same across categories of 5. Annual Family income( in Rupees). |                         | .806 | Retain the<br>null<br>hypothesis. |

Asymptotic significances are displayed. The significance level is .05.

Table 10 shows the result of non-parametric tests conducted to check if there is a significant difference in trusting India's Government to take care of its citizens during lockdown across categories of annual family income. Kruskal-Wallis test was used for the hypothesis testing as there are more than 2 categories. It was found that results were not significant and hence across categories of annual family income, there was no difference in respondents trust on Indian Government to take care of its citizens (p-value .076), opinion on Indian Government being factually truthful about the coronavirus outbreak (p-value .718) and the effectiveness of social distancing (p-value .806).

# **Implications:**

Understanding the behavior of different demographics during lockdown helps to implement strategies during a disaster and understand the categories and their responses towards the pandemic. This study helped to understand demographical categories and their behavior patterns during Lockdown. Based on the responses demographical wise projection can be made for the future. This demographical base helps practitioners in their forecasting strategies.

During the pandemic, availability of the essential commodities for the public was in pain and many ventures have redesigned their business model. This study also gave broad pictures of the risky behavior of people and its impact on the spread of the coronavirus. Social distancing poses a lot of emotional stress on the community. Changes in lifestyle, anxiety or fear towards the spread of the pandemic, being more conscious about health and sanitization, working from home, attending online classes, pursuing hobbies, etc., are some of the common behavioral changes observed in people of the country. At this point, it is important to understand the reactions of people towards lockdown (*Vijayaraghavan 2020*). This article has focused on the perceptions of both faculties and students towards teaching and learning and life in general. This study also projected the opinions about the steps taken by the government of India during lockdown and how this influenced the public at large.

### **Conclusion**

The Pandemic has created physical/mental/financial dissonance in the mind of people. During the lockdown, people had different perceptions and their pattern of behavior towards life has changed. The classroom of faculty has changed from offline to online. And students had different perceptions of online teaching and their engagement level have changed accordingly. People had opted for different sources during lockdown for the availability of various

commodities. And their trusting government for various safety aspects has changed during lockdown. This study has considered the perception of faculty and students considering the pattern of behavior during the lockdown, availability of commodities during the lockdown, risky behavior of people, and social distancing and trusting government for safety aspects. Future researchers can consider this as a limitation and focus on various other factors influencing faculty and students during lockdown.

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