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## RESEARCH ARTICLE

# A PROPOSED MODEL TO FIGHT AGAINST SPREAD OF NOVEL CORONA VIRUS IN INDIA FROM STAGE2 TO STAGE3

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#### **ABSTRACT**

The paper deals with a proposed model to fight against spread of NOVEL CORONA VIRUS in India and restricting it as much as possible so that the virus does not make us enter from Stage 2 to Stage 3. The virus now is a greatest threat towards human civilization and existence. We all know now is that the virus spreads very fast and destroys human lives in a raid fashion. So, we are to be fast and robust to deal with it and to restrict the spread of the virus in the human community. Once we can break the chain of spread of this virus we are safe and we can establish that by following the proposed model human existence can take a breath and we can defeat the threat of the virus. We need to overcome the danger of spread of this virus in the community as soon as possible by means of scientific efforts and exiting tools, equipment and machineries that we are having with us currently.

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## INTRODUCTION

Right now it can be told undoubtedly that the threat of NOVEL CORONA VIRUS is the greatest danger to mankind and human existence. So, to fight against the spread of NOVEL CORONA VIRUS in the community we have some established models so that we can defeat this evil and can restrict minimal damage to the mankind. India is now in Stage 2 in spreading the NOVEL CORONA VIRUS. We need to try whole heartedly to defeat this threat so that we do not enter from Stage 2 to Stage 3. We are now in complete lockdown phase throughout India until midnight of 14<sup>th</sup> April 2020 started from 24<sup>th</sup> March2020. This is high time to restrict the virus so that we do not enter from Stage 2 to Stage 3. We are facing issues like people are not disciplined enough and they are gathering still in huge numbers in different places. Well, in this scenario here is a small effort to come out with an algorithm so that we can fight against this evil in this problematic scenario also. This algorithm is not new - it is existing model but we have tried to implement it taking into consideration about the nature of our country.

**Scopes:** The scopes of this research are to come out with an algorithm so that we do not enter from Stage2 to Stage3 in the fight against NOVEL CORONA VIRUS.

Time is short so implementation of this algorithm requires rapid work and takes challenge together so that the evil does not spread in a rapid fashion in the community as a whole.

#### Covid – 19: Anoverview

Corona Viruses(COVID -19) havebizarrely large RNA genome with unique replication process are positive sense RNAViruses containing the spike (S), the membrane (M) and the envelope (E) proteins [1]. It causes a variety of diseases in animalslike enteritis and upper respiratory disease including lethal infectionsof human [2]. The genetic drift (change in frequency of an existing gene variant in a population caused byrandom sampling of organisms) of the "S" gene responsible for club shaped spike (S), participates in asignificantmanner in genotype persistence of human populations which will bestowus deep understandings intothe adaptive evolution mechanisms of Human Corona Virus—OC43in near future [3].

## Algorithm

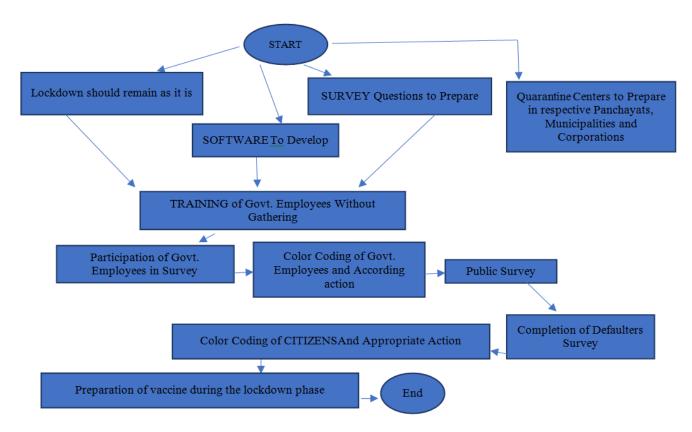
Step 1:- Lockdown should remain as it is right now.

Step 2:- A group of well qualified doctors, medical practitioners, qualified professional and experts on

- corona Disease need to come out with a set of questionnaires for the survey among the people for identification of initial symptoms of CORONA or the questions need to be framed in such a way so that it can be found out that the chances of CORONA infection to that person in percentage figure. Say the timeline for framing the questionnaire is one day.
- Step 3:- A software system needs to be developed within 2 3 days which will be intelligent enough to take the surveys from the people of our country and can calculate the risk percentage of CORONA infection.
- Step 4:- We perform general election with the help of Government employees. All the employees who take part in general election are to answer the questions between the timeframe of framing the questions and development of software systems.
- Step 5:- In between this timeframe all such employees need to be trained about the questions and the calculation of percentage figure for the risk percentage of CORONA infection. This needs to be done avoiding any gathering and need to do as much as possible through office orders and online communication. If all the employees are not having computers I believe everybody is using smart phone so they can be trained though Smartphone with the help of power point presentations.
- Step6:- After development of software every employee who got trained need to login to the system and need to feed the data accordingly.
- Step7:-System will calculate the risk percentage of corona infection amongst the government employees depending upon the fed data.
- Step8:-According to calculated percentage of risk on corona infection employees need to divide into three color coded groups Green, Yellow and Red.
- Step9:- Green color coded employees can be kindly requested to help this model to fight against the spread of NOVEL CORONA VIRUS.
  - Yellow color coded employees need to be in home quarantine mode and they cannot come out from home till further instructions.
  - Red color coded employees need to take to ISOLATION and requires treatment.
- Step10:-Now the team is ready not for helping in general Election but to help fighting against spread of NOVEL CORONA virus.
- Step11:-General public notification needs to be issued to login to the software system and to respond to the survey questions. The survey is mandatory for all the citizens of India and the timeline is just half a day. All can take the survey through their mobile phones.
- Step12:-After the timeline is over for taking the survey it is the responsibility of all the Panchayat, Municipalities and Corporation administration to find out the defaulters of taking this survey throughout the country taking the voter list into consideration. Timeline for this operation is one day.
- Step13:-Now one day needs to be taken to complete the survey of the defaulters with the help of Green color coded government employees. They need to provide proper sanitized cars and equipment to go door to door. Their safety needs to be given proper priority. Again in a car there will be two persons only one driver and one employee and the responsibility of making them

- understand about their responsibilities lie on the respective Panchayat, municipality or corporation administration.
- Step14:-So within next 7 days we will be in a position to color code our citizens as Green, Yellow or Red.
- Step 15:- Within this 7 days in all the Panchayats,
  Municipalities and Corporations' proper infrastructure
  to built for quarantine centres. Trained professionals
  need to prepare also to take care of the patients over
- Step 16:- After color coding of citizens the following measures need to take
  - Red color coded people to be taken to nearest quarantine centres.
  - Yellow color coded people must have to go for home quarantine. They can never ever come out from their home.
  - Green color coded people need to follow the general lockdown norms and they are allowed to go to the following places –
    - Grocery Shop (Local administration need to ensure that the person in the Grocery Shop delivering goods must be green color coded and no gathering in the grocery shop).
    - Medicine Shop (Local administration need to ensure that the persons in the Medicine Shop delivering medicines must be green color coded and no gathering in the medicine shop)
    - ATM (Local Administration need to ensure that proper distances are getting maintained in all the ATMs)
    - Local Market (Local Administration need to prepare roaster of the vegetable, fruits, fish and meat shops of the market and the roaster should be round robin for all the shopkeepers. Gathering needs to be maintained in the markets in a systematic way).
    - Supermarket(Local Administration need to take proper measure to avoid gathering in the supermarkets and maintain queues in the market)
- Step 17:- Green color coded people having standard transportation like Toto; Auto- rickshaw etc. can operate so that life does not become total standstill.
- Step 18:- Only Green coded people can use private transportation to commute but a person cannot travel more than 20 km from their home. For long distance travel only green coded people are allowed with proper permission from the local administration.
- Step 19:- Surprise NAKA checking is required to ensure people are following proper rules and regulations on the road.
- Step 20:- No bus, trains, and aeroplanes will be operative during lockdown phase.
- Step 21:-Online delivery chain and supply of all other essential commodities will remain as it is but only through Green Coded executives.
- Step 22:- Proper measures need to take for the newly infected persons after implementation of this algorithm which is going to be explained later.
- Step 23:- Preparation of vaccine in this lockdown period which will be effective to any mutant species of COVID-19 virus.
- Step 24:- End of Algorithm.

#### **Flowcharts**



#### RISKS

- a. Government employees are suppressing facts or somehow green coded employee got CORONA infected
  - Mobile or ISP should ensure always internet connectivity in the mobile of employee.
  - His / Her mobile location histories to check to find out where he had visited for the previous 7 days.
  - All the places should be sanitized where he / she had visited and all the persons concerned to be placed in quarantine.
  - Proper treatment of the infected employee.
- b. Any citizen is suppressing facts or somehow green coded citizen got CORONA infected
  - Mobile or ISP should ensure always internet connectivity in the mobile of green coded citizen.
  - His / Her mobile location histories to check to find out where he had visited for the previous 7 days.
  - All the places should be sanitized where he / she had visited and all the persons concerned to be placed in quarantine.
  - Proper treatment of the infected citizen.
- c. Proper health checking measures to yellow coded citizens or employees.
- d. If any yellow coded citizen got infected all the family members need to take in quarantine.
- e. Local administration will ensure that yellow coded people should not go out from home if fails to do so then the same steps to be taken as green coded people if any yellow coded people got infected.

#### **Conclusions**

Let us hope for the best to avoid spreading corona virus from Stage 2 to Stage 3 in our country. Proper teamwork and proper unity amongst us is very essential for the success of this model. All hands need to be bind together tightly to fight against this evil. Any responsibility gap of anybody will be having severe impact and will lead to failure of this model in this crisis scenario.

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