ANALYSIS AND PREDICTION OF COVID-19

A project report Submitted to the Department of Computer Applications, Bharathiar University, in the partial fulfilment of the requirements for the Award of degree of

Master of Science in Data Analytics

Submitted by

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(18CSEG027)

Under the guidance of

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COIMBATORE-641 046

APRIL-2020

DECLARATION

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I hereby declare that this project work titled, "**ANALYSIS AND PREDICTION OF COVID-19**" submitted to Department of Computer Applications, Bharathiar University, in partial fulfilment of the requirements for the award of the degree of **Master of Science in Data Analytics,** is a record of original work done by me, under the supervision and guidance of **Mr.K.MOORTHY, M.C.A.,** Department of Computer Applications, Bharathiar University, and that this project work has not formed the basis for the award of any Degree /Diploma /Associateship /Fellowship or similar title to any candidate of any University.

Place : Coimbatore
Date :

Signature of the Candidate
(M. VENU GOPAL REDDY)

Countersigned by
Project Guide

CERTIFICATE

CERTIFICATE

This is to certify that, this project work entitled, "**ANALYSIS AND PREDICTION OF COVID-19**" submitted to Bharathiar University, in partial fulfilment of the requirements for the award of the degree of **Master of Science in Data Analytics,** is a record of original work done by **M. VENU GOPAL REDDY (18CSEG027)**, during his period of study in the Department of Computer Applications, Bharathiar University, Coimbatore, under my supervision and guidance and that this project work has not formed the basis for the award of any Degree /Diploma /Associateship /Fellowship or similar title to any candidate of any University.

Place : Coimbatore

Date :

Project Guide

Head of the Department

Submitted for the Project VIVA-VOCE Examination held on _____

Internal Examiner

External Examiner

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ABSTRACT

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The project is entitled "**Analysis and prediction of COVID-19**". This data is taken from Kaggle, This dataset has daily level information on the number of affected cases, deaths and recovery from 2019 novel coronavirus. Please note that this is a time series data and so the number of cases on any given day is the cumulative number. The data is available from 22 Jan, 2020. Focus on the areas most affected and taking the required precautions to control the spreading of the virus. Polynomial regression, support vector machine and Arima model which helps to predict the future. Based on the prediction values we can see that the cases are increasing or decreasing. Based on the prediction we can control the spread of the coronavirus.

Coronavirus disease 2019 (COVID-19), a highly infectious disease, was first detected in Wuhan, China, in December 2019. The disease has spread to 212 countries and territories around the world and infected (confirmed) more than 4.8 million people. In India, the disease was first detected on 30 January 2020 in Kerala in a student who returned from Wuhan. The total (cumulative) number of confirmed infected people is more than one lakh till now across India (19 May 2020). In this project, we will focus the infected people worldwide, country wise and states and build models to predict infected people for the next 10 days.

Keyword: Machine Learning, Python, Time series, Predictive Modelling

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