*Abstract*—During the pandemic COVID-19, Indonesia have a significant number of positive cases among countries in Asia. In early December 2020, the death rate in Indonesia had been reached more than 3%. Meanwhile, the daily number of positive is also continued to increase, it happens due to lack of anticipation rule made by local authorities and central government. Thus, the preventive step such forecasting become a major issue in area of science and technology, to make all stakeholders well-prepared against this pandemic. The previous research revealed the dependency between several certain query search related to dengue fever on Google Trends with the number of cases of dengue fever in Surabaya, Indonesia. This paper provides the performance of The Autoregressive Integrated Moving Average (ARIMA) to forecast a number of COVID-19, and also examines Auto Regressive Integrated Moving Average with exogenous variables (ARIMAX) model by considering Google Trends as an external variable. We consider a daily dataset from the official website of the Jakarta's COVID-19 and the Google Trends data based certain queries as external variables on March 1 - November 25, 2020. According to ARIMA dan ARIMAX models, we have ARIMAX model with Google Trends improving ARIMA's performance by reducing the MAPE until 0.8 %.

Keywords—Forecasting, COVID-19, ARIMA, ARIMAX, Google Trends.