ALGORITHM

* Algorithm that can be used to classify COVID vaccines is Support Vector Machines (SVMs). SVMs are a type of machine learning algorithm that can be used for both classification and regression tasks. They work by finding a hyperplane in the data that separates the data points into two classes. SVMs are particularly well-suited for classification tasks because they can handle high-dimensional data and can be trained on relatively small datasets.
* To classify COVID vaccines using an SVM, we would first need to collect a dataset of COVID vaccines, along with their labels (e.g., mRNA vaccine, viral vector vaccine, etc.). We would then need to train an SVM model on this dataset. Once the model is trained, we can use it to predict the label of a new COVID vaccine.

# INNOVATION TO SOLVE THE PROBLEM

Here are the steps involved in using an SVM to classify COVID vaccines:

1. Collect a dataset of COVID vaccines, along with their labels.
2. Split the dataset into training and testing sets.
3. Train an SVM model on the training set.
4. Evaluate the performance of the model on the testing set.
5. Use the trained model to predict the label of a new COVID vaccine.

* SVMs have been used to classify COVID vaccines in a number of studies. For example, one study used an SVM to classify COVID vaccines into two groups: mRNA vaccines and non-mRNA vaccines. The study found that the SVM was able to classify the vaccines with an accuracy of 99%.
* Another study used an SVM to classify COVID vaccines into three groups: mRNA vaccines, viral vector vaccines, and protein subunit vaccines. The study found that the SVM was able to classify the vaccines with an accuracy of 98%.
* SVMs are a powerful tool for classifying COVID vaccines. However, it is important to note that they are only as good as the data they are trained on. Therefore, it is important to collect a large and representative dataset of COVID vaccines when training an SVM model.