

CRUDE OIL PRICE PREDICTION

LITERATURE SURVEY:

The purpose of this chapter to review the previous of researchers on the Crude Oil Price Prediction. This chapter will present the main recent works on the effect of Crude Oil Price Prediction and to improve the price prediction method across the different location at international level.

ABSTRACT:

Crude oil is amongst the most important resources in today's world, it is the chief fuel and its cost has a direct effect on the global habitat, our economy and oil exploration and exploitation. Prediction of oil prices has become the need of the hour, it is a boon to many large and small industries, individuals, and the government. The evaporative nature of crude oil, its price prediction becomes extremely difficult and it is hard to be precise with the same. Several different factors that affect crude oil prices. We propose a contemporary and innovative method of predicting crude oil prices using the artificial neural network (ANN). The main advantage of this approach of ANN is that it continuously captures the unstable pattern of the crude oil prices which have been incorporated by finding out the optimal lag and number of the delay effect that controls the prices of crude oil.

INTRODUCTION:

Numerous studies have shown that predicting oil prices is a difficult endeavour. To accurately predict the direction of oil contracts, researchers have utilised an enormous number of linear and nonlinear models, but this seems to disguise a significant inaccuracy. The first person to forecast the crack spread using this method was Karathanasopoulos [1]. He was certain that the new approach is effective and outperforms both linear and non-linear models. Modern markets are characterised by constant change, and human cultures are undergoing new advancements and inventions. Researchers and economists have been considering the best strategies for forecasting the future and making the proper decisions as a result of the capital market's high degree of dynamicity and ongoing changes [2].

Summary and Future Directions The goal of identifying the most advantageous lag in the crude oil price data is given to an artificial neural network model in this paper. It is clear from the result, which is depicted in the figure, that the prediction is accurate up until there is a significant and abrupt change in the actual data, at which point it becomes difficult to predict the precise new price with the change. However, the proposed model has successfully taken into account these patterns. Additionally, this supports the idea that financial markets are subject to sudden changes due to both known and unknowable factors [3]. The main advantage of this approach of ANN is that it continuously captures the unstable pattern of the crude oil prices which have been incorporated by finding out the optimal lag and number of the delay effect that controls the prices of crude oil. Variation of lag in a period of time has been done for the most optimum and close results, we then have validated our results by evaluating the root mean square error and the results obtained using the proposed model have significantly outperformed [4].

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