

ABSTRACT

Since the company started importing products into Thailand in 2011, at the initial stage, the order estimate was based mainly on the historical data and the past experience of the team. Therefore, the order per batch might not be accurate. The Economic Order Quantity (EOQ) model might be the solution to help improve the ordering process and calculation leading to more efficient order making in terms of quantity.

The purpose of this research is to reduce the carrying cost of inventory by applying EOQ. The EOQ model is one of the methods that would help the company to find the appropriate inventory level, the point to restock, and how much buffer stock to keep. The inventory costs consist of the ordering and carrying costs. Carrying costs are the major expenses of the inventory, which means that by reducing the carrying cost, the company would spend less on the annual inventory cost.

The primary data of ABC Company was collected from June 2015 to May 2016, to compute the economic order quantity, re-order point and safety stock using the EOQ model, and then compare with the current total annual inventory cost. After using the EOQ method, the result indicated that the proposed solution can help sustain the total annual inventory cost reduction of ABC Company. Thus, the EOQ model is the model that can improve inventory management and reduce carrying cost.