

ABSTRACT

The purpose of this thesis is to investigate and model the process of container control in a typical liner shipping company. A two stage model is developed that can be used to obtain optimal (cost minimizing) decisions for both the size of a company's container complement and the allocation of containers within the company's shipping service. The model lends itself to practical application in the sense that it is capable of handling container leasing, purchasing, stocking, and allocating patterns, the data requirements are compatible with the information liner companies routinely gather, and all the solutions are obtainable quickly using a PC-286 computer.

By being of this nature, the development and specification of the model will hopefully contribute to the current small body of literature on container control, while its user friendly operation may make it potentially of practical use to actual container shipping companies.