ABSTRACT

With the globalization deepening and the acknowledgement that it would prove difficult to remain outside it, therefore, SME sector in Sri Lanka will have to be prepared adequately if they were to become active players in the global market. The role that SME sector can play in stimulating competitive environment and technologically based innovation is becoming a crucial factor in the knowledge-base economy.

However, the success of SME sector depends on the effective management science techniques (MST) that are used by the managers. These techniques are generally acceptable process improvement approaches for achieving exceptional results in many areas in the organization. Implementation of MST will maximize profit, minimize losses and restrict risks. Therefore, the usage of appropriate MST in the quantitative decision making process is increasingly in the focus of attention for entrepreneurs.

This paper reports on the results of a study that examined barriers to adopt MST among a sample of 70 managers of SMEs in Sri Lanka. Further, the study examined the importance of MST in firm’s operational improvement and obstacles to implement MST, which can limit a firm's ability to remain competitive and profitable. Findings of the study show that barriers have a differential impact on the various types operations. The most significant barriers are associated with organizational factors of organizational culture, top management support and motivation to use MST. The results may also be insightful for managers who are attempting to encourage adoption of MST.

Key words: Management Science Techniques, SME, Barriers