



Contingencies for Low Implementation Levels of New Manufacturing Practices

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ABSTRACT

New manufacturing practices, common in many industries, have been underrepresented in the apparel industry. For this industry, the researcher explored what barriers and organizational characteristics exist for firms that have low implementation levels of these new manufacturing practices. Findings show that management's approach or strategy choice for quality management and return on investment had significant relationships to implementation levels of new manufacturing practices. Resources were perceived as a barrier to implementation, and firm size had significant relationships to new manufacturing practices implementation.

Key words: Operation strategy, empirical study, implementation, technology management

1. Introduction

Manufacturers in the apparel industry, as many industries, have operated within a highly competitive business environment. For these firms, profitability has been eroded by rising labor costs, increasing numbers of rivals, and constantly changing customer demands. In addition, apparel manufacturers, in industrialized countries, have aging factories and limited capital. In such countries, the apparel industry has been considered near extinction (Ormerod, 1999). Failure to maintain or rejuvenate the industry has caused extreme economic hardship in some U.S. regions (Crafted with Pride, 2000). Many managers have perceived only two options for the future of their firms: go offshore or go out-of-business. This study examined a third option - manufacturing transformation through implementation of new manufacturing practices. Transforming a business by implementing new practices has been promoted as beneficial for firms in

competitive environments (Bordogna, 1996).

The apparel industry has been well documented as existing in a highly competitive market driven by an increasingly demanding customer (e.g., Abernathy et al., 1995; Goldhar et al., 1991). Such a crisis has been stated as an alert mechanism to trigger change (Moosbrucker & Loftin, 1998). For these reasons, this industry has fit the image of an industry with potential for transformation through new technology implementation. Although other industries have made major transformations in manufacturing practices, many apparel manufacturers have maintained a traditional stance with a continuation of mass production techniques (Singletary & Winchester, 1998). The crisis-situation in the apparel industry was full-blown by the late 1990s, with competitive stress continuing its pressure. Barriers that may have impeded implementation of new manufacturing practices were suggested and