1.0 INTRODUCTION

1.1 The Metal Packaging Industry

The metal packaging industry encompasses a wide spectrum of businesses, from suppliers of lacquers, can-making to food packers. The beginning of the industry can be traced back to 1809 in France. Back then, Nicholas Appert demonstrated that food packed in sealed bottles and subsequently heated in boiling water (sterilised) could be preserved for a long time. In England, Peter Durand obtained a patent to cover the application of this process to metal containers. In 1812, Hall and Dankin started to produce commercially "tinned" preserved foods (now generally referred to as cans/canned foods). Early cans were made laboriously by hand cutting and assembling followed by joining the two ends and can body by hand soldering. Development of fast automatic can-making and cannyry equipment has resulted in rapid growth to the current very high rate of production (Morgan, 1985).

In Malaysia, the first can-making factory was established in 1935 in Penang. To date, there are about 34 can-making factories throughout the whole of Malaysia. Out of these, 3 are major producer of aluminium cans for beer and beverages. The rest, produces tin cans for packaging of dry food, processed food, edible oil, paints, aerosol and motor oil. The latest survey for total number of cans, can ends and caps manufactured in Malaysia during 1999 is 1902 million units.

The application of coatings to metal cans for protective and decorative purposes was practiced since the late 19th century. As a general guide, coating applied on the internal of cans, is for protective purpose. It acts as a barrier against the attack on the metal can by the pack content. On the contrary, coatings are applied on the external side of the cans for both protective and decorative purposes. Growth in the range of food products packed in metal cans and the need for longer storage periods in more difficult environmental conditions led to a demand for more effective internal protective coatings. These demands have been reinforced by introduction of more severe regulations covering health and safety, and air pollution. The Food and Drugs
Authority (FDA) in the United States, the European Economic Community Directives and similar safety regulations in most countries impose strict rules on coatings which will come into direct contact with the food.

Metal can printing in Malaysia, did not get started until early 1960s. Before that, can-making activities were mainly production of plain tin cans and cans for biscuits, cooking oil and kerosene. However, in 1963 Kian Joo Can Factory was the first to bring in printing equipment to produce lithographed cans, caps and boxes. By the mid 1970s, under the Malaysian Industrial Policy 1975, the packaging industry was very active. The increasing demand in the food processing industry, motivated the can-making industry to expand. This in turn encouraged the involvement of local coating suppliers in the industry.

1.2 Objectives of The Study

The main objective of this research is to study the development and market situation of the can coating industry in Malaysia. The scope of the research is restricted to the analysis of the external environment threats, on the industry, in particularly threats related to technological demand and advances. A strategic analysis on the can coating industry, was first conducted. For completeness of the study, the corporate strategies of one of the can coatings manufacturer, ICI Packaging Malaysia was examined. The study ends with recommendations to enhance the competitiveness of the organisation in the face of external threats.
1.3 **Methodology**

This study encompasses a study on the metal packaging industry in Malaysia to give an overview of the operation and stake-holders in this industry. This is then followed by an in-depth study and analysis of various segments in the can coatings industry. Case study method is used to assess the business environment of a can coating manufacturer, namely ICI Packaging Malaysia.

The primary data furnished in this study was obtained from a customer survey conducted in the end of 1999 through interviews with several managers and executives from can manufacturers. Format of the survey questionnaire is exhibited in Appendix A1 and A2. Informal interview was also carried out with personnel from manufacturer of can coatings and suppliers of raw materials, to gather information on the background, history, growth profile and current market situation of the can industry in Malaysia, as well as their views on the future potential of this industry.

Secondary data pertaining to global production data and company financial performance was gathered from trade journals and the company annual financial reports.

The external environment of the industry was assessed using the Porter’s Five Forces whereas competitiveness of the can coating company was assessed using the HAX methodology.