CHAPTER 3 : LITERATURE REVIEW

Basically, this chapter briefs few researches done in the past, covering two main areas, i.e. on the effectiveness of bond market; and on the impact of bond ratings on companies' share prices.

3.1 The Effectiveness of Bond Market

Studies on Efficient Market Hypothesis (EMH) became prominent since 1960's after Fame (1965) argued that in markets, which are information-efficient, information is rapidly disseminated and quickly witnessed in the assets' price. Thus, Fama (1965) identified market as efficient when a large number of market players who intend to maximize profits, compete among each other in anticipating future values of their shares. His study was based on few assumptions: all recent and pertinent information is almost freely available to all market players and a high competition is anticipated among them, which will ensure that they respond concurrently upon receiving the new information. Hence, this will invalidate any possibility of price arbitrage among the market players. In addition, it will also ensure that the market potential is reflected by the prices of individual shares based on all accessible common information.

Subsequent to Fame's (1965) study, Higgins (1992), defined market efficiency more accurately. He stated that market efficiency is a description of how prices in competitive markets respond towards new information is similar to the reaction of flesh eating piranha engulfing a piece of meat. Once the meat is dropped into the water, piranha devours the meat creating turmoil leaving behind the valueless bone and then the water returns to normal. It is similar in the case of bond market. Once new information is being released, commotion transpires in competitive markets, as investors buy and sell securities, responding to the news, causing changes in the prices. Soon after the prices are being adjusted, the market returns to its normal condition, as the received information will not be able to generate profits anymore.

Although a lot of studies had been carried out throughout the world on this subject, the main objective is to determine the level of market's efficiency. There are three forms of

EMH, i.e. weak, semi-strong and strong. The weak form also called as predictability efficiency which asserts that previous knowledge on market's performance will not provide much benefit, on the other hand, the semi-strong form also known as information efficiency, states that researches on openly available information will not yield any potential benefits. Finally, the strong form or the private information efficiency, which indicates that internal information, will not be useful, as the market will ultimately disregard even the internal information. As this paper deals with rating announcements by rating agencies, literature review will be limited to the semi-strong form.

Keane (1983) categorised EMH into another three potential degree, namely, perfect efficiency; near efficiency; and inefficiency. Subsequently, Dawson's (1984) research indicates that there is a permanent and strong possibility for markets to increase its efficiency over time rather than weaken, as it will learn from history.

Previous researches also had been done to compare markets efficiency between the advanced and emerging countries. Findings by Anwar (1993), evident that the advanced markets comply with the requirements of EMH as they actively traded in securities, have large revenues as well as a large number of utility maximising investors, lack of entry barriers and information are distributed efficiently among all the market players. Conversely, markets in emerging economies, which are less effective, lack of transparency and disclosure as well as low liquidity may affect its efficiency, resilience and competitiveness.

According to Neoh (1986), the EMH in emerging countries witnessed a mixed picture and the results varied among these countries. Market efficiency in these countries is dependent on liquidity, number and volume of active trading, strength of market reputation, institutional demand as well as the availability of consultancy services. For example, Kuala Lumpur Stock Exchange (KLSE) as a small and thinner market did not show a clear result, whereby, studies on Indian capital markets stated that weak form efficiency occurred in the bourse. Nevertheless, a study by Samir, Ragunathan and Varma (1994) proved a semi-strong form of EMH, contradicting to the previous study.

Their findings showed that market responded efficiently towards announcements related to issues on politic, bonus and rights but not to uncertain and intricate events. In Singapore, based on analysis on bonus declaration, Tang (1976), Wane and Lee (1987) found that the SES market was inefficient in the semi-strong form but further studies by Ariff and Finn (1989), using monthly price data and an improved methodology identified a semi-strong efficiency for the Singapore market

Among countries in transition, a study on most liquid stocks in Russian market, witnessed inefficiency whereby, it is forecast that the market takes a longer period of more than two years to become more efficient. However, recent studies based on more stocks showed that there is a possibility for the market to become more efficient in shorter terms (Hall and Urga, 2002).

The purpose of the tests on semi-strong form of EMH is to determine the impact of the 'new' information on markets during the period before and after the announcement. The market is identified as not in the semi-strong form if the announcement returns exist even after the announcement took place.

A study was done on KLSE in regard with earnings announcements on commonly traded stocks, which showed near efficiency and semi-strong form of market efficiency. However, related to concerns on bonus, Neoh (1986) found semi-strong form of inefficiencies. Earlier study by Fama, Fisher, Jensen and Roll (1969) was on the pace and preciseness with which the market reacts to the announcement of stock splits and an expected increase in the dividend. When the market is efficient in expecting the stock split and a subsequent rise in dividend, there will not be any abnormal returns after the even month. Further researches on this subject done in United States, United Kingdom and Australia related to the same case, supports these findings. However, in 1984, a study by Grinblatt, Masulis and Titman (1984), using daily data, observed a contrary result to the previous study. The findings were that abnormal returns were ascertained around the ex-date of stock dividends and stock splits.

Further to that, Warner, Watts & Wruck,(1988) stated that market do not respond towards any changes of announcement made by the top management and for merger announcement the market was able to anticipate at least three months before the announcement. However, according to Frank, Broyles & Hecht (1977) after the merger announcement, the stock price movements was parallel with market efficiency.

3.2 The impact of bond ratings on companies' share prices

Several studies had been conducted to analyse the impact of bond ratings on equity or stock and had produced various findings. The earlier studies were done by Katz (1974), Grier and Katz (1976) and Hettenhouse and Sartoris (1976) on the statement, that bond downgrades provides new information to the market, therefore has an impact on market, on the other hand, any upgrades of initial ratings does not have any impact on the market. They concluded that both rating decreases were anticipated; bond rating increases were not anticipated; anticipation of bond rating changes occurred around or within a few months before the month of change; and the stock market appears more efficient than the bond market.

Subsequently, Pinches and Singleton (1978) carried out an analysis on the adjustment of stock prices as the bond rating changes, using 207 bond rating changes and 79 months of price data. The results showed that both bond rating decreases as well as increases were completely anticipated at around 15 to 18 months, however, for both rating decreases relating to firm certain reasons, the forecast period did not exceed 6 months. As a result the stock market seems to be highly efficient in absorbing the rating news.

Griffin and Sancivente (1982) conducted further studies in this field by using three different methodologies, namely the one-factor market model, two-factor cross sectional model and two-factor model but explicitly controlling for non-event of extraneous factors. Analysis was based on 732 bond rating change announcements from 1960 until 1975. They found that the bond downgrading do transfer new information to the equity market in terms of security returns and it was observed that there was a significant hefty in the month of announcement and in 11 months prior to the announcement. Nonetheless,

as the bonds were upgraded, abnormal returns were found in the month of announcement. Consequently, the results of this study contradicted to the previous research done by Pinches and Singleton (1978).

After conducting a study on 41 firms with bond issuance covering the period from January 1981 to June 1981, using weekly share prices, Zaima and McCarthy (1988), concluded that bond upgrading did not provide significant abnormal returns, conversely, bond downgrading has an significant impact on abnormal returns. This means that bond downgrading provides 'new' information to the market and these findings were consistent with those of Griffin (1982) and Holthausen (1986).

Further to that, Hand, Holthausen et al (1992) undertook another similar study by using daily price data and 1350 ratings, including rating changes and additions to the credit watch list, which covers from 1977 until 1982 for announcement day and one day after announcement. Additional abnormal returns were found in credit watch for ratings on negative outlook but not for positive. However, in the case of unanticipated bond downgrades significant abnormal returns were detected but not for upgrades and these findings concur the research of Holthausen et al (1986) and Griffin (1982).

Motolcsy and Lianto (1995) after carrying out a research on the increasing information content of bond relations by using Australia's data, noted that abnormal returns were observed for downgrades but not for bond upgrades, affirms the findings of Holthausen et al (1986), Hand et al (1992); and Ariff et al (1988). This study indicates, rating agencies have further impact on the already available information set on downgrades.

Elayan, Hsu and Meyer (2000) looking into the emerging market, which is small and has thinner trading volumes, did a study on three types of announcements, namely, rating assignments, placements of credit watch and rating change. In this study, New Zealand was the sample market as it is smaller and thinner relative to the markets in United States and United Kingdom. Investors in this emerging market may be looking forward to obtain information from rating agencies on financial and the level of performance of the

companies. The research was based on 149 credit rating announcement from July 1991 until June 2000 and found that abnormal return existed for downgrades indicating that rating information is new information to the market. However, previous analysis showed that they did not provide new information to the market. Further, credit watch placements with a negative outlook created significant abnormal return and this is consistent with the observation done by Holthausen et al (1986), Hand et al (1992) and Motolscy (1995).

Basically, the above findings reveal that every bond upgrades and credit watch placements with a positive look do provide significant reaction. As a result, in a small market, bad as well as good news both are important and have significant impact on the market.

This paper analyses the impact of bond rating by Rating Agency of Malaysia (RAM) on KLSE's market efficiency and stock returns as to date there have not been any studies done in this field.