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INTERNATIONAL ISLAMIC UNIVERSITY MALAYSIA
بَوَيْتِ رَبِّنَا إِنَّا نَسْتَعِينُكَ بِرَبِّكَ يَا رَبَّنَا

**STOCK MARKET REACTIONS
TO THE BOND RATING ANNOUNCEMENTS:
THE MALAYSIAN EVIDENCE**

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RAJALAKSHMI S.KESAVAN

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MBA PROJECT PAPER

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Approval Page

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**STOCK MARKET REACTIONS TO THE BOND RATING
ANNOUNCEMENTS: THE MALAYSIAN EVIDENCE**

CANDIDATE NAME: RAJALAKSHMI S.KESAVAN

MATRIC NO.: G9610081/MBA

The undersigned certifies that the above candidate has fulfilled the conditions of the
project paper in partial fulfillment of the requirement for the
Master of Business Administration (MBA)
Supervisor,

A handwritten signature in black ink, appearing to read 'Azmi', is written over a horizontal dotted line. Below the dotted line is a solid horizontal line.

DR. MOHD. AZMI OMAR

KULLIYAH OF ECONOMICS AND MANAGEMENT SCIENCES

INTERNATIONAL ISLAMIC UNIVERSITY MALAYSIA

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Abstract

This study examines the daily excess returns (prediction error) of the common stock of main-board listed companies associated with the change in the rating announcement. The empirical evidence in this study suggests that the effect of downgrades and upgrades of long-term debt credit issues and short-term debt credit issues are not consistent with most studies conducted whereby a downgrade is often associated with a negative stock response.

The study concludes that rating agencies does provide information to the capital market and the market is efficient so that the stock price changes occur simultaneously with the rating changes.

CHAPTER 1 INTRODUCTION

Private debt securities (PDS) are fast gaining ground as the preferred attractive option for raising funds in the Malaysian capital market. More and more corporates are turning to PDS because of the potential cost savings as a result of financial disintermediation.

Effective from 2nd May 1992, Bank Negara Malaysia has made it compulsory for all issues of PDS to be rated. Furthermore, under current guidelines the issues must secure investment grade ratings.

Investors around the world have long used ratings not just as a guide to the risk of default, but as a way to compare the riskiness of one bond with the riskiness of another. Indeed, much of the demand for ratings come from investors who want to know whether this or that debt issue is attractively priced.¹

Bond ratings are a form of research. The aim is to provide an objective form of risk analysis and evaluation on the quality of the bond and its issuer.² In the international scene, the rating agencies include Standard & Poor's Rating Services, and Moody's Investors Service Inc., who perform comprehensive research and provide ratings through their global office network.

1.1 Objective of this Study

The objective of this study is to examine the impact of bond rating changes on Malaysian common stock returns. This would try to ascertain if the rating agency has superior knowledge over the capital market or indeed provide information to the capital market.

The initial intended study was to examine the stock price response to false signals—positive and negative placement on RatingWatch that are not followed by a rating change of the indicated direction. However, the historical data pertaining to RatingWatch dates and the corresponding outlook of such issues were not available. This coupled with the fact that in the history of RAM since its establishment in 1991, there were hardly any rating change in the opposite direction upon placement on RatingWatch, the study of false signals deemed not possible in the Malaysian context.

The study therefore, examines the stock market reactions to RAM's announcement of the rating change of a bond issued by a particular listed company.

This is about the first study of its kind in the Malaysian context and is based on revised methodology and approach by previous studies conducted on the UK, Australian and the US bond and stock market.

¹ The Economist, (December, 13, 1997), vol. 345, Issue 8047, pp 68

1.2 Outline of the paper

To date, a number of studies have addressed the impact of bond rating on stock market returns. Evidently, capital market theory is the only established theoretical framework within which the value added by rating agencies can be tested. In this framework, market efficiency is assumed and the information content of rating revision announcements can be tested.

The remainder of this paper is organised as follows. In Chapter 2 of this study some institutional background on the Rating Agency Malaysia Bhd (RAM), the Malaysian Rating Corporation (MARC), the rating process and the implications of bond rating is provided.

Chapter 3 details the data collection procedures to obtain the final list of stocks corresponding to the issuers of the bonds that experienced a rating change. Chapter 4 identifies the methodology and the conceptual framework employed in this study.

The empirical results and analysis are reported in Chapter 5 whilst Chapter 6 summarises and concludes this study.

² NST (August,2,1998), pp. 2 (Business)

CHAPTER 2 BACKGROUND

2.1 The rating agency

The introduction of credit rating occurred at the point of time when the Malaysian economy was poised for a quantum leap in economic development. On the back of an impressive phase in performance in 1989 and 1990 where the economy grew by 8.7% and 9.8%³ respectively, a bold and ambitious economic strategy and vision designed to transform the Malaysian economy into a developed and industrialised economy by the year 2020 was formulated.

In pursuit of this long term economic objective, the Sixth Malaysia Plan (1991-95) outlined the pivotal role of the private sector as the major impetus in the development process. It was then that Government launched a concerted and long term effort to further develop the PDS market to complement the existing component of the financial system. The demand for alternate and more cost-efficient sources of funding is to be met by corporate bonds and various derivative instruments.⁴

Such innovative financial instruments is to meet the demand for alternative investment instruments beyond the current mix of low-yield deposit facilities and

³ Bank Negara Reports, 1988-1996

⁴ RAM Annual Report 1991

the volatile equity papers. The demand for wider range of investment opportunities is expected to grow significantly with the increasing sophistication of investors and the need by pension funds like Employees Provident Fund (EPF), Social Security Organisation (SOCSO), and Civil Service Pension Fund to seek relatively high fixed yield investments as a substitute for the steadily shrinking Malaysian Government securities. In view of this, the Rating Agency of Malaysia (RAM) being the first credit rating agency has therefore a very important role to play in the development of the capital market.

Whilst RAM gears itself to take on this task, the circumstances prevailing in Malaysia as far as the corporate disclosure standard is concerned is rather low and certainly not enough to enable any comprehensive analysis into a company's fundamentals and financial help. Therefore, RAM will necessarily require the cooperation of the company to share unpublished and confidential information in the course of a rating exercise.

However, it is of concern to the potential issuers on the need to divulge sensitive and strategic information. Nevertheless it must be understood that confidential information is crucial for any rating agency to arrive at an informed judgement on credit quality thus necessitating confidential discussions which can provide the issuer with an opportunity to explain their plans and to tell the story behind the facts and figures. The potential issuers also give RAM's analysts a chance to have their

question answered directly by the people responsible for the issuers financial future. It is a policy of a rating agency on all confidential information received will not be made known to the public. They are used solely to make better rating decisions. As a standard practice, RAM will furnish the issuer a copy of the rating rationale before disseminating it to the public. This step is taken to allow the issuer to correct any factual errors or to suggest rephrasing certain parts of the rationale which is deemed to be sensitive. Though RAM will be firm with its opinion and its rating assigned, the views of the issuer to improve the write-up of the rationale will surely be taken into consideration.

Besides RAM, a rating institute known as Malaysian Rating Corporation Berhad (MARC) which was officially launched in September 1996 aims to bring all relevant risk factors and indepth market analysis to every rating exercise it undertakes.

MARC distinguishes itself from RAM in being the first rating agency to introduce a specific set of Rating Symbols and Definitions for the ratings of Islamic capital market instruments⁵.

Having entered into a Technical Cooperation Agreement with Thomson BankWatch, the world's largest financial institution rating agency based in New York, United States of America, MARC provides dual ratings, i.e., a local rating by

MARC and an international rating by Thomson BankWatch, through a single due diligence process, thereby saving time and cost.

2.2 *The Corporate Bond Market*

The Malaysian corporate bond market is relatively young and small compared to the equity market. Corporate bonds grew from merely 2% of GDP in 1988 to 12% of GDP in 1994.⁶ Although the bulk of the issues are privately placed bonds, many of which are locked to maturity by institutional investors, there appears to be growing over-the-counter market for these bonds.

As the corporate bond market grows into an important alternative source for financing economic growth in Malaysia, price efficiency in bond trading has become a pertinent issue to investors and policy maker in the country. Theoretically, a deep and liquid capital market is a crucial link between the mobilisation of savings and financing of productive investments required to sustain economic growth.

A study undertaken by RAM suggests that the most popular of long term instruments is the issuance of bonds with warrants (or Transferable Subscriptions

⁵ Source: <http://www.marc.com.my>

⁶ Wong, Chee Seng and Lee, Tin Hui, "Price Efficiency of Corporate Bonds Traded in the KLSE", RAMFocus, Issue No.3 (December 1995), pp.1

Rights “TSR”) which accounted for 118 issues of 82.5% of the total number of long term bonds issued as of end October 1997.⁷

The predominance of this instrument was explained by the following factors in the study:

- (a) the bought deal arrangement offers issuers quick and easy access to the bond proceeds;
- (b) the bonds have low annual coupon payments (2%-4%) and thus, low yearly fixed cash outflows, due to the implicit subsidy by warrant holders;
- (c) all market risks of raising the required funds are borne by the primary subscribers; and
- (d) proceeds from warrant conversion provide the corporate issuer with additional financial flexibility either to pay for the bond redemption or to enable capital funding in the future. The warrants act as a form of deferred rights issue spanning over the life of the bonds.

As in an efficient corporate bond market, prices are determined by investors who correctly evaluate all available information. Among the determinants of the expected returns on a bond are investor’s expectations of changes in interest rates,

⁷ Thean, Denise Y.F., “The Slump in the Stockmarket: How will it affect the credit strength of bonds issued with warrants?” ,RAMFocus, Issue No.8 (January 1998), pp.1

the time to maturity, perceived credit quality, and the value of embedded options such as callability and convertibility.

Though illiquid, the secondary bond market is emerging. Casual observations suggest though that when investors are not conversant with bond valuation, trends in the prices of equities and the KLSE composite index (KLCI) strongly influence bond prices (or yields which are inversely correlated to prices).

2.3 The rating process

Credit rating is an objective and impartial third-party opinion on the ability and willingness of an issuer of a debt instrument to make full and timely payments of principal and interest over the life of that instrument. In addition to quantitative and statistical data and accounting information, in every rating process, the focus is on qualitative and non-statistical elements such as legal and regulatory environment, industry outlook and international competitiveness.

Since ratings are intended to measure term risk, factors that will influence long-term ability to meet debt payments, such as changes in financial and management strategy, regulatory trends and future outlook, while evaluating past business results are scrutinised. Risk diversification and business potential are also significant factors taken into consideration. Ascertaining the current position and future outlook are critical facets of assigning a rating.

A rating is also designed to rank, within a consistent framework, the degree of future default risk of a particular debt relative to other rated debts in the market. Conversely, in an unrated market, there is relatively little pricing differentiation between strong and weak credits. Ratings are thus of particular benefit to very creditworthy issuers, as they can distinguish themselves from less creditworthy ones.

Effective from 2nd May 1992, Bank Negara Malaysia has made it compulsory for all issues of PDS to be rated. Furthermore, under current guidelines the issues must secure investment grade ratings. Aside from lowering the cost of funds to issuers, ratings are becoming a requirement of issuing in the markets, and are being used more widely as a tool by investors. In fact, in the other developed countries investors often want different views of a particular credit and thus may seek a second or third opinion from another rating agency.

To help widen the investor base for small and medium-sized companies accessing the capital markets for the first time, a rating exercise can provide the necessary credibility to compensate for the fact that the companies may not be well known to investors. However, as it pertains to the future, credit rating is necessarily subjective. The goal of rating process in RAM or MARC is to arrive at a reasoned judgement on credit risk not through a set formula but rather through a careful

analysis of the critical issues surrounding a specific debt and the issuer as described earlier.

A rating agency's objective is to provide the issuers, investors and financial intermediaries with a common standard of credit quality. In this regard, each rating symbol will carry the same meaning and interpretation as to credit risk across all types of debt instruments, companies and industrial sectors within its institute.

Having said that, a rating agency's rating of corporate borrowings pertains to a specific instrument being rated as opposed to a general credit evaluation of the corporation that issues the instrument. Accordingly, a debt issued by a particular issuer may differ in rating from other issues by the same issuer. This is possible because the quality of each debt may be enhanced by the inclusion of some internal and/or external features such as a sinking fund, asset-backing and assignment of a specific cash flow.

Since RAM is the veteran of the two rating agencies available in Malaysia, this research from herein onwards will confine its references to RAM only.

In an effort to promote a more discerning rating scale such that market players using RAM's ratings are better able to differentiate the risk profile of rated securities, RAM has applied the suffixes (bg) and (s) to ratings which have been enhanced by a

bank guarantee or other external supports respectively.⁸ For example, a AAA(bg) is differentiated from a stand-alone AAA which is accorded based on the intrinsic strength of a rated debt and issuer. Please refer to **Appendix B** for details of the rating scale and definition of corporate debt instruments provided by RAM.

However, it must be stressed RAM's rating is not a recommendation to purchase, sell or hold a security, in as much as it does not comment on the security's market price or suitability for a particular investor, nor does it involve an audit by RAM.

Therefore, its rating represent a useful and reliable investment tool to assist in decision making. But the ultimate choice of investment will depend on individual risk preferences and purchase acceptance criteria of the investors themselves.

An alternative view is that rating agencies are information specialists who obtain information that is not in the public domain, i.e., information acquisition is costly and rating agencies are the lowest cost providers of some information. Consequently, rating changes affect security prices and assigned rating affect the yield on new issues.⁹

⁸ A Practice on RAM's Rating and Debt Securities

⁹ Unexpected rating change announcements could affect security prices if markets were segmented, even if the rating agencies have access to only publicly available information

Rating agencies usually claim that they have access to information that is probably not publicly available. They indicate that the rating review process usually includes discussions with management, visits to company premises, and forecasts of income statement and balance sheet data provided by management:

‘Over 90% of industrial companies with debt ratings in investment grade categories regularly supply S&P with financial forecasts, as do a majority of companies with lower-rated debt. The typical package consists of three-to five-year projections of income statements, balance sheets, and source and use of fund statements. As appropriate, consolidated reports are supplemented with consolidating statements or with detailed data by business segment.’
(Standard and Poor’s Credit Week, August 22, 1983, (p. 1099)¹⁰

2.4 *Malaysian market efficiency*

An efficient capital market is one which security prices adjust rapidly to the arrival of new information and, therefore the current prices of securities reflect all information about the security. Despite the fact that the Malaysian market is considered very young, there are studies that conclude that the Malaysian market does tend to exhibit some degree of efficiency. A study conducted by Wong Chee

¹⁰ Source: As reported in page 61 of the Journal of Financial Economics, 17 (1986). Holthausen, Robert W. and Richard W. Leftwich, “The Effect of Bond Rating Changes on Common Stock Prices”

Seng and Lee Tin Hui (1995) supported by econometric evidence suggests that the local bond market is still inefficient given the major influence of underlying share prices in two sample periods tested, i.e., 14 September 1993 to 31 May 1994 and 1 June 1994 to 14 May 1995. According to the study, investors' lack of understanding of bond valuation was most glaring during January 1994 peak of the bull market where prices of non-convertible bonds surged in tandem with the run-up in share prices.

The objective of the study conducted was to ascertain if the bond prices are influenced by movement of underlying stock prices. To address the questions relating to the efficiency of the secondary market, the author first determined how bond yields are influenced by three variables: (1) movements in the prices of underlying corporate shares, (2) changes in market sentiments as reflected by the KLSE sectoral share indices and (3) changes in interest rates before establishing the extent to which credit rating has been factored into the determination of bond yields. Being dominant by retail investors, he expected it to be less efficient than the institution-based over-the counter (OTC) market.

The econometric evidence presented in that study was consistent with the hypothesis established, i.e., the local bond market is still inefficient given the major influence of underlying share prices even when the bull run effect was excluded.