Analysis of Rating Methodology of Credit Rating Agencies in India

DR.PAVAN MISHRA
Professor
Department of Commerce
Barkatullah University Bhopal

DIKSHA DUBEY
Research Scholar
faculty of management
Barkatullah University Bhopal

Abstract:-The credit rating is a process of assigning a symbol with specific reference to the instrument being rated, that acts as an indicator of the Current opinion on relative capability on the borrower to meet its debt obligation in a timely manner is known as credit rating. Credit rating is a metric used by borrowers to assess how much they can trust a borrower, whether the borrower is an individual, a company, or a country. The research focuses primarily on the firmness of the rating criteria of the rating agencies by evaluating some of the variables of the NSE-listed firms. The paper's main purpose is to determine the Consistency of rating agency procedures by Verification of some of the important determining factors Ratings on the equity and bond. Consistency in assessment methodology each rating agency is evaluated by taking the companies of same ranking group which includes AAA, AA/A and BBB as study sample. Corporate credit rating methodology is used for the study including some variables. It has been concluded that all credit rating agencies use identical methodologies when determining individual rating ratings, since there is no substantial variation in the valuation of all ratios that apply to separate sets of related classified firms.

Key words:-Credit rating, credit rating agencies, financial ratios, corporate credit rating methodology.

“To get profit without risk, experience without danger, and reward without hard work, is as impossible as it is to live without being born”

A.P.Gouthey
Introduction: - Credit rating agencies are an organisation with a specialist calculation of the probabilities of auspicious increments by issuers of a budgetary commitment. A free outlook on the credit rating score is the willingness and the money-related eagerness of the institution to meet its obligations; that is, its loans, its financial strength, or its lending capability. Credit rating agencies assess the Corporate Financial Position and Liability regularly and update their ranking on shares. CRA were giving opinions on credit Quality of securities issuers, among others financial institutions.

An evaluated security is put higher in the estimation of speculators than an unrated security independent of better monetary standing or then again notoriety of the Issuer or Sponsor Company. Credit rating gives characteristic direction to the planned financial specialists on the level of risk engaged with the opportune reimbursement of head and intrigue. Subsequently 'FICO assessment' is basically the undertaking of deciding the quality and possibilities of a security/instrument offered in the market by separating it from different protections/instruments with the assistance of foreordained norms called 'grades' (ordinarily these evaluations are emblematically spoken to, viz. A, AA, AAA and so forth). FICO assessment is a wellspring of solid data for some clients as appraised instruments talk themselves about the adequacy of the organization and the quality of the instrument evaluated by the Credit Rating agency. Rating assists financial specialists with looking at the issues by giving them a short and clear guide. Credit Rating agency gives prevalent data about the evaluated item and that too easily, which the speculator in any case would not have the option to get so without any problem. The reason of rating administration is to reestablish trust in the psyches of financial specialists.

In India rating activities are began with the incorporating of Credit Rating Information Services of India Ltd. (CRISIL) in 1987 which initiated its activities of rating organization in 1987-1988 and was promoted by ICICI bank and UTI. The second rating agency Investment information and credit rating agency of India ltd. (ICRA) was incorporated in 1991 and was mutually supported by Industrial Finance Enterprise of India IFCI and other Financial institution and banks. The other rating agency, Credit Rating and Analysis and Research Ltd. (CARE) which was established in April 1993, is a credit rating information and advisory service company promoted by IDBI together with Canara Bank, UTI, private sector bank and financial services company. One more Rating agency ONICRA Credit Rating Agency of India Ltd. which was incorporated in 1993, is perceived as the pioneer of the concept of individual rating in India? Further Duff and Phelps credit rating (India) private ltd. (DCR) was built up in 1996, which is presently known as Fitch Ratings India pvt.Ltd.

One more rating agency SME Rating Agency of India Ltd. (SMERA), which was a joint endeavor of SIDBI, Dun and Bradstreet Information Service(D&B), Credit Information Bureau of India Limited (CIBIL) and 11 other leading bank in the country was established in 2005. Another rating agency Brickworks Rating (BWR) which is situated in Bangalore was incorporated in 2007. Other than CRISIL (Standard and Poor), ICRA (Moody’s), CARE and Fitch, Brickwork Ratings is the fifth Credit Rating Agency to be perceived by SEBI.
Credit Rating Agencies in India

- Credit rating information service ltd. (CRISIL)
- Investment Information and credit rating Agency of India (ICRA)
- Credit Analysis and Research (CARE)
- Indian Rating and Research pvt.ltd.
- Small and Medium enterprise Rating agency of India (SMERA)
- Brickwork Ratings(BWR)

Review of Literature

Patric Bolton Xavier Freixas and Joel Shapira(2012) examined, Competition between credit rating agencies which was expected to reduce the efficiency of market with the help of model. They also clarified the features of credit rating agencies in short. Author arranges the analysis in the form of Parts describing how credit rating agencies are compared and extended. They have also made other conclusions about the details on Savings-Investment. They explained the analysis by taking a monopoly look at the game Credit rating companies. They demonstrated credit rating rivalry agencies, and their methodological effects.

Timothy E.Lynch(2009) examined ,The credit rating fundamentals Agencies and the important role credit rating agencies have in the Flow of information to the investment. Author assessed credit rating position Capital market companies, and investment strategy. He explained the Private contracting parties use the credit rating information. He also does. Specified concerning the problematic concerns posed by credit rating Organizations. He complained about credit rating agencies' protections on honesty’. The current regulatory climate includes many issues that are analyzed in research. The author has finally highlighted the value of credit rating industry. The stock market and the credit rating industry's challenges under the Present system of regulations. He also reported issues with the issuer- pay conflicts of interest.

Omaima G.Hassan and Ray Barrell (2013) examine the issue of the degree to which bank ratings represent banks and the Features clarify the accounting details to help assess the issue. The author clarified the thesis by taking the samples from descriptive analysis USA and United Kingdom. Statistical instruments such as matrix correlation and effects of regression are used to determine research. The results showed model efficiency that helped 74 to 78 percent of banks give proper credit ratings. It's there was a disparity in the scores awarded to banks, as the top ranking banks and Banks ranked as lowest.

Raghunathan and Verma (1997) examined that CRISIL, not only fell short of ratings International but also suffering standards Inconsistency International. And Raghunathan and the same was true of Varma (1997) Methods which they followed originally (1992) the analysis revealed the financial ratios correspond to the Currencies. The difference with global norms is near. Stricter criteria exist and investment grade scores have developed into rarer. The study indicated ratings represent the rising experience CRISIL has had.
Importance of Credit Rating Agencies

Credit Rating sets up a connection among risk and return. They therefore give a measuring stick against which to quantify the risk inalienable in any instrument. A speculator utilizes the rating to evaluate the risk level and compared the offered rate to return with his expected rate of return (for specific degree of risk) to optimize risk return trade off. The risk perception of a common investor, in the absence of a Credit rating framework, to a great extent relies upon his familiarity with the names of organization and what they may think about the organization. It isn't practical for the corporate guarantor of debt instrument to offer every prospective investor the opportunity to undertake a detailed risk assessment. For typical investor, it would difficult to assess the entirety of the money related data accessible to relegate their own risk appraisals. Along these lines the requirement for Credit rating in the present scenario cannot be over emphasized.

Objective of study

The research focuses primarily on the firmness of the rating criteria of the rating agencies by evaluating some of the variables of the NSE-listed firms. The paper's main purpose is to determine the Consistency of rating agency procedures by Verification of some of the important determining factors Ratings on the equity and bond. Consistency in assessment methodology each rating agency is evaluated by taking the companies of same ranking group which includes AAA, AA/A and BBB as study sample.

Research Methodology

The study is based on secondary data. It is a study of SEBI perceived rating agencies including CRISIL, ICRA, CARE. The data utilized for this rating consistency study is from April 16 to March 20. Corporate credit rating methodology is used for the study including some variables i.e. profitability and solvency ratio of a companies. Long term ratio includes debt equity ratio and for short term Current and quick ratio are being analyzed. Return on capital, Return on net income, Profit before interest and taxes (PBITA) and Profit after taxes are also studied under profitability ratio analysis. These data is considered in study because credit rating agencies use this ratio of various companies while providing them ratings.
Source of data

The data regarding different ratings has been collected from company’s websites, books, Report of credit rating agencies (CRISIL, ICRA, CARE, SMERA, and BWR) is used for the study. The related to various Financial ratio is collected from www.moneycontrol.com, fincialexpess.com, www.trendlyne.com, www.screener.com.

In the present study basic symbol are used because different agencies use some prefixes or suffixes for AAA to D rated companies. In this study F-test using ANOVA (analysis of variance) is calculated for all the selected financial ratios. NSE listed manufacturing, IT, Financial service and trading companies whose shares, bonds and debentures are rated by different rating agencies from April 2016 to March 2020 are used as sample. Further AAA, AA/A, BBB rated companies are consider in the study because maximum listed companies are fall in these categories. The key thrust of the study is that the variation in the mean values of the ratios should be minimal in the case of a group sample organization.

Results and Interpretation

The analysis shows the following results

<table>
<thead>
<tr>
<th>S.No.</th>
<th>Ratio</th>
<th>CRISIL</th>
<th>ICRA</th>
<th>CARE</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>F Values</td>
<td>P value</td>
<td>F Values</td>
<td>P value</td>
</tr>
<tr>
<td>1</td>
<td>Current Ratio</td>
<td>0.78</td>
<td>0.53</td>
<td>0.17</td>
</tr>
<tr>
<td>2</td>
<td>Quick Ratio</td>
<td>0.65</td>
<td>0.55</td>
<td>0.9</td>
</tr>
<tr>
<td>3</td>
<td>Debt Equity Ratio</td>
<td>1.29</td>
<td>0.34</td>
<td>0.65</td>
</tr>
<tr>
<td>4</td>
<td>Return on Capital Employed</td>
<td>0.17</td>
<td>0.94</td>
<td>3.25</td>
</tr>
<tr>
<td>5</td>
<td>Return on Net Worth</td>
<td>0.09</td>
<td>0.98</td>
<td>0.07</td>
</tr>
<tr>
<td>6</td>
<td>Total Income</td>
<td>3.25</td>
<td>0.09</td>
<td>1.37</td>
</tr>
</tbody>
</table>

Table: 1 AAA rated companies Ratio comparison of CRISIL, ICRA, CARE
This ranking is applied to an investment-grade debt with a high degree of creditworthiness. Debt issuers with the highest scores have the best potential to repay investors. Their solid financial status gives them the lowest risk of default.

First table (table 1) of the analysis shows the F-test of financial ratio of various companies which were rated AAA ratings by selected credit rating agencies CRISIL, ICRA, CARE respectively. This results of analysis of variance through a light on fact that not any financial ratio have significant F-test. Although the method used by CRISIL while assigning ratings was consistent and consequent for selected duration for the studies. This reflect same financial ratio were used to provide ratings.

Further when we see the results of ICRA for AAA rated companies we find that values are not significant which reflects that same financial ratios are used for rating grades and no significant difference between the ratios of AAA rated companies by ICRA.

Table further shows results of CARE for AAA rated companies also reflects no significant difference among the selected ratio used for the analysis. Thus there was consistent method is used while providing ratings.

<table>
<thead>
<tr>
<th>S.No.</th>
<th>Ratio</th>
<th>CRISIL</th>
<th>ICRA</th>
<th>CARE</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>F Values</td>
<td>P values</td>
<td>F Values</td>
</tr>
<tr>
<td>1</td>
<td>Current Ratio</td>
<td>1.36</td>
<td>0.24</td>
<td>0.4</td>
</tr>
<tr>
<td>2</td>
<td>Quick Ratio</td>
<td>1.01</td>
<td>0.39</td>
<td>0.44</td>
</tr>
<tr>
<td>3</td>
<td>Debt Equity Ratio</td>
<td>1.55</td>
<td>0.52</td>
<td>0.72</td>
</tr>
<tr>
<td>4</td>
<td>Return on Capital Employed</td>
<td>3.77</td>
<td>0.15</td>
<td>1.43</td>
</tr>
<tr>
<td>5</td>
<td>Return on Net Worth</td>
<td>0.96</td>
<td>0.45</td>
<td>0.34</td>
</tr>
<tr>
<td>6</td>
<td>Total Income</td>
<td>1.79</td>
<td>0.26</td>
<td>0.63</td>
</tr>
</tbody>
</table>

Second table (table 2) reflect results of AA rated companies which were assigned by CRISIL, ICRA and CARE rating agencies. Table highlights none of the F-test value of selected financial ratio of companies of AA rating by CRISIL are significant.it means that there is no significant difference between the value of various ratio of the companies which were rated AA rating by CRISIL, therefore analysis depicts consistency in rating methodology of rating agency during the given period of time.

Table further shows that not any F-values are significant for financial ratio by ICRA. which implies that there is no significant difference between the value F value of ratios lie under AA rating group by ICRA rating agency and we interpret ate that similar methodology used for rating over time period of study.
The results of CARE depicts that none of the AA rated companies by the rating agencies have significant F-test. That implies that the companies which belong to similar rating class have similar ratio and thus shows consistent rating method for the period of study.

<table>
<thead>
<tr>
<th>S.No.</th>
<th>Ratio</th>
<th>CRISIL F Values</th>
<th>CRISIL P-value</th>
<th>ICRA F Values</th>
<th>ICRA P-value</th>
<th>CARE F Values</th>
<th>CARE P-value</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Current Ratio</td>
<td>1.37</td>
<td>0.28</td>
<td>1.02</td>
<td>0.46</td>
<td>2.41</td>
<td>0.07</td>
</tr>
<tr>
<td>2</td>
<td>Quick Ratio</td>
<td>2.05</td>
<td>0.17</td>
<td>1.01</td>
<td>0.42</td>
<td>3.33</td>
<td>0.16</td>
</tr>
<tr>
<td>3</td>
<td>Debt Equity Ratio</td>
<td>0.62</td>
<td>0.9</td>
<td>0.11</td>
<td>0.9</td>
<td>0.98</td>
<td>0.09</td>
</tr>
<tr>
<td>4</td>
<td>Return on Capital Employed</td>
<td>2.22</td>
<td>0.16</td>
<td>3.13</td>
<td>0.09</td>
<td>3.45</td>
<td>0.14</td>
</tr>
<tr>
<td>5</td>
<td>Return on Net Worth</td>
<td>3.34</td>
<td>0.07</td>
<td>1.53</td>
<td>0.35</td>
<td>4.04</td>
<td>0.13</td>
</tr>
<tr>
<td>6</td>
<td>Total Income</td>
<td>0.15</td>
<td>0.85</td>
<td>1.87</td>
<td>0.3</td>
<td>1.94</td>
<td>0.27</td>
</tr>
</tbody>
</table>

Table: 3 BBB rated companies Ratio comparison of CRISIL, ICRA, CARE

Third table (table 3) Interpretation reflects that f-value of selected financial ratio of the BBB rated companies by CRISIL, ICRA and CARE. The results shows that not any F-values are significant for financial ratio by CRISIL. Which implies that there is no significant difference between the value F value of ratios lie under BBB rating group by CRISIL rating agency and we understand that similar methodology used for rating over time period of study.

The table further reflects results of ICRA’s BBB rated companies financial ratio which are not significant to F-test which implies that there is no significant difference in financial ratio thus similar methods are used for rating of BBB rated companies.

Moreover when we see the F-test results of CARE also reflects the same no significant difference among the financial ratio during study period thus depict consistent and consecutive rating during study period.

**Conclusion**

It was concluded from the aforementioned study that all credit rating agencies use identical methodologies when determining individual rating ratings, since there is no substantial variation in the valuation of all ratios that apply to separate sets of related classified firms. Rating agencies expands breadth of market based on comparable analysis with fellow agencies. Rating is a tool for portfolio management and results into enhancement of secondary market liquidity. Credit rating evaluations are an assessment focused on analytical and discretionary analysis of financial soundness which helps management with independent, outside perspective on company and monitors counterparty risk. Rating organization play an important role in global market they better represent as gate keeper of financial
market. Rating assign by credit rating agencies should be non-biased and fair as the grades are recognized as risk assessing tools for safe investment decision.

**Reference**


Partnoy F. (2017), what’s (still) wrong with credit Rating? Washington law review 92