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A STUDY ON BANK'S CREDIT PROCEDURE AND CREDIT RISK ASSESSMENT AT PNB

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Abstract

This article titled "A Study On Bank's Credit Procedure And Credit Risk Assessment" is concerned with the study of the techniques and procedures followed by Punjab National Bank for determining and sanctioning the working capital limits andterm loan credits. The study is related to the review of the existing Credit Risk Model being implementedin PNB for the credit services. Various secondary data sources such as research papers, journals and online web portals have been used to arrive at benchmark data for analysis of the model. The RBI monitors the Credit Risk Models for all the banks inIndia and also provides guidelines for the bank to maintain their procedures. The study helps to understand the working of the Credit Risk Model of PNB in detail and also the various parameters it uses to rate a client/project. The model being discussed analyses the financial, operational, historical and industrial aspects of the business/project of the client. The analysis of the model is also done by comparing it with the industry benchmarks, and reviewing the compliance with the Basel-III and RBInorms. Various proposals and the general procedures followed at the bank were closely observed and the conclusions, thus, drawn upon.

INTRODUCTION

In India, the definition of the business of banking has been given in the Banking Regulation Act, (BR Act), 1949. According to Section 5(c) of the BR Act, 'a banking company is a company which transacts the business of banking in India.' Further, Section 5(b) of the BR Act defines banking as, 'accepting, for the purpose of lending or investment, of deposits of money from the public, repayable on demand or otherwise, and withdrawable, by cheque, draft, and order or otherwise.'

Banking is the business of providing financial services to consumers, The basicservices a bank provides are saving account, Time deposit, Loans that consumers canuse to purchase goods and services and basic cash management services such as foreign currency exchange.

Banking Industry at a Glance

The commercial banking industry in India started in 1786 with the establishment of the Bank of Bengal in Calcutta. The Indian Government at the time established three Presidency banks, viz., the Bank of Bengal (established in 1809), the Bank of Bombay (established in 1840) and the Bank of Madras (established in 1843). In 1921, the three Presidency banks were amalgamated to form the Imperial Bank of India, which tookup the role of a commercial bank, a bankers' bank and a banker to the Government. The Imperial Bank of India was established with mainly European shareholders. It wasonly with the establishment of Reserve Bank of India (RBI) as the central bank of the country in 1935, that the quasi-central banking role of the Imperial Bank of India came to an end.

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To better align the banking system to the needs of planning and economic policy, it was considered necessary to have social control over banks. In 1969, 14 of the major private sector banks were nationalized. This was an important milestone in the history of Indian banking. This was followed by the nationalization of another six private banksin 1980. With the nationalization of these banks, the major segment of the banking sector came under the control of the Government. The nationalization of banks imparted major impetus to branch expansion in un-banked rural and semi-urban areas,which in turn resulted in huge deposit mobilization, thereby giving boost to the overall savings rate of the economy. It also resulted in scaling up of lending to agriculture and its allied sectors. However, this arrangement also saw some weaknesses like reduced bank profitability, weak capital bases, and banks getting burdened with large non- performing assets.

To create a strong and competitive banking system, a number of reform measures were initiated in early 1990s. The thrust of the reforms was on increasing operational efficiency, strengthening supervision over banks, creating competitive conditions and developing technological and institutional infrastructure. These measures led to the improvement in the financial health, soundness and efficiency of the banking system.

One important feature of the reforms of the 1990s was that the entry of new private sector banks was permitted. Following this decision, new banks such as ICICI Bank, HDFC Bank, IDBI Bank and UTI Bank were set up.

Structure of Indian Banking Industry

The Reserve Bank of India (RBI) is the central banking and monetary authority of India, and also acts as the regulator and supervisor of commercial banks.

Scheduled banks comprise scheduled commercial banks and scheduled co-operative banks. Scheduled commercial banks form the bedrock of the Indianfinancial system, currently accounting for more than three-fourths of all financial institutions' assets. SCBs are present throughout India, and their branches, having grown more than four-fold in the last 40 years now number more than 80,500 across the country (see Table 1.1). Our focus in this module will be only on the scheduled commercial banks. A pictorial representation of the structure of SCBs in India is given in figure

Objective of the Project

- Understanding the different types of credit facilities and credit delivery mechanisms provided to industrial customers viz. Overdraft, Cash Credit, Drawing Rights, Fund Based Credit, Non Fund Based Credit etc.
- Understanding the different methods available for risk vetting of lending proposals, different risk assessment models and the different credit rating procedures used in Punjab National Bank.
- Understanding the appraisal process of Term Loan and working Capital financing and sanctioning of working capital, issuing term loan, to corporate, through different case studies, on the job training.

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- Assessing the qualitative factors which influence the decision making of lending
- to a particular client apart from theoretical parameters.

LITERATURE REVIEW

According to Mann and Srivastava, the fast changing financial environment exposes the banks to various types of risk. The concept of risk and management are core of financial enterprise. The financial sector especially the banking industry in most emerging economies including India is passing through a process of change. Rising global competition, increasing deregulation, introduction of innovative products and delivery channels have pushed risk management to the forefront of today's financial landscape. Ability to gauge the risks and take appropriate position will be the key to success.

Jain, Mukul in his research paper titled *'A Critical Review of Basel-III norms implementation in Indian Banks'* explains that the banking operations worldwide have undergone phenomenal changes in the last two decades since 1990s. The financial crisis episodes surfaced since 2006 have highlighted this paradox to a number of central banks operating in different countries and RBI and Indian banking sector is no exception to this phenomenon. The global Basel-III requirements, which require all banks to hold top-quality capital equal to 7% of their assets, adjusted for risk, are aimed at improving financial stability.

METHODOLOGY OF THE STUDY

Methodology is description of the process, rules, methods employed in a study. Research in common parlance refers to a search for knowledge. One can also define research as a scientific and systematic search for pertinent information on a specific topic. In fact, research is an art of scientific investigation. This chapter deals with universe of the study, locale of the study, method of data collection, tools used for data collection, types of sampling used, sample sized used for study and analysis of the study.

Universe of the Study

The universe of the study consists of all the employees of the organization (Punjab National Bank).

Locale of the Study

The locale of the study has been narrowed down to the PNB, Zonal Office Kolkata. The study is categorized into the credit department of PNB. The office receieved a number of proposals for Working Capital Limits and Term Loans on daily basis. So the researcher decided to take up these proposals for analysis purpose. The findings may or may not be similar to the other branches of the company.

Sample Selection

The sampling of study has been done as per convenience sampling. A convenience sample is a sample where the samples are selected, in part or in whole, at the

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convenience of the researcher. The researcher makes no attempt, or only a limited attempt, to insure that this sample is an accurate representation of some larger group or population. Owing to time constraint and being a learning experience the research was narrowed down to 20 samples out of average number of 70 proposalsreceived per month so that an in depth analysis can be carried out.

Data Collection

For the purpose of data collection, two different sources were adopted for the study:

Primary Sources

Secondary Sources

The primary data collection method has been used to complete the research activity. But the researcher has done secondary research study also.

Primary - For this study the researcher has considered the proposals and the observedthe procedures that were followed for the same. Various documents were taken from the company to complete the analysis. The management was interviewed for clarifications, wherever required. The researcher also consulted the manuals and guidelines provided by PNB.

Secondary - The researcher has gathered material from various risk management related research papers and journals. The official website of PNB, RBI and other web portals on financial topics were also studied to understand the process.

Analysis of Data

The gathered data has been analyzed to draw inferences and finding for this research study on Bank's Credit Procedure And Credit Risk Assessment and evaluate the feasibility and the soundness of the model under discussion.

For the research study, 20 proposals were shortlisted such that it covers a number of situtations that are/are not covered by the existing model that PNB follows. The proposals were then assessed based on the parameters defined under the model of the bank. The staff working on the cases and the authorized officials were consulted for the cases that could not be arrived on a conclusion under standard parameters of the model. The data gathered from Literature review was used in the comparison of the current model in use by PNB with the industry requirements from the same.

Analysis

The credit risk rating model has been developed with a view to provide a standard system for assigning a credit risk rating to the borrowers of the bank according to theirrisk profile. This model is applicable to all large corporate borrowal accounts availing total limits (fund based and non-fund based) of more than Rs. 15 crore or having total sales of more than Rs. 100 crore.

Inputs to the model are the financial data of the borrower, industry information and the evaluation of the borrower on various objective and subjective parameters.

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The model evaluates the credit risk rating of a borrower on a scale of AAA to D with AAA indicating minimum risk and D indicating maximum risk. The credit risk-rating model incorporates and includes possible factors of risk for determining the credit rating of the borrower. These risks could be internal and specific to the company, the industry in which the company is operating or the entire economy and can influence the repayment capacity and / or willingness of the company.

		limit in activities case of trading	
Small Loans	Above Rs.50.00 lakh and Up to Rs.5 Crores AND	Up to Rs.25 Cr.	All sectors Banks/FIs except NBFC/
Small Loans II	Above Rs. 2 lakhs & upto Rs. 50 lakh AND	Up to Rs.25 Cr.	All sectors Banks/FIs except NBF C/
NBFC	All Non-Banking Financial Companies irrespective of Limit		
New Projects	Above Rs. 5 CrOR	Cost ofRs.15Cr. Project above	All sectors, except NBFC/Banks/FIs and tradingup to two years of operations.
Entrepreneur New Business	Borrower setting up new business and requiring finance above Rs. 20 lakh and up to Rs. 5 cr. AND	Cost of project up to Rs. 15cr.	All sectors, except NBFC/Banks/FIs. However, all new trading business irrespective of limits shall be rated under this model.
Half Review Rating Yearly of	Applicable to all listed companies as well as all accounts having exposure from our bank (Fund Based+Non Fund Based) of above Rs. 50 crore		
Counter Party	All banks and Financial Institutions		

As shown in the Table above, the bank considers different business clients as different type of entities based on a certain criteria. These parameters are explained as follows:

- **Large Corporates**: The clients who have net sales of over Rs. 100 crore are categorized in this class. This class is qualified to avail limits of more than Rs. 15 crore from the bank. This class generally has clients from Manufacturing andService sectors.
- **Mid Corporates:** The clients who have net sales between Rs 25 crore and Rs 100 crore are categorized as Mid Corporates. This class is qualified for limits between Rs 5 crore and Rs 15 crore. This class generally has clients from Manufacturing, Trading and Service sectors.
- **Small Loans-I:** The firms that have sales upto Rs 25 crore can be classified asSmall Loans-I clients. These can avail limits ranging from Rs 50 lakh to Rs 5 crore. This class is applicable to all the sectors except NBFC/Bank/FIs.

Usage of the credit risk rating model

The following text describes the basic rating procedure followed when implementing the rating model for a client.

1. The scores are assigned to each of the parameters in the different sections on a scale of 0 to 4 up to two decimal points with 0 being very poor and 4 being excellent. The scoring

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of some of these parameters is subjective while for someothers it is done on the basis of pre-defined objective criteria.

Wherever a particular parameter is not applicable, no score should be given. The parameter should be made 'NA' so that the weight assigned to that parameter gets distributed among the other parameters in that section automatically.

2. The scores given to the individual parameters multiplied by allocated weights are aggregated and a composite score for the company is arrived at in percentage terms. Weights have been assigned to different parameters based on their importance.

The following table shows the various parameters and the weights assigned to them:

Table 2: Weightage of Parameters in the Model

S No.	Factor	Weight Assigned
1	Financial	40
2	Business / Industry	20
3	Management	20
4	Conduct of Account	20
	Total	**100**

3. The overall percentage score obtained from step 2 on a scale of 0 to 100 is then translated into a rating on a scale from AAA to D according to a pre-definedrange as under:

Table 3: Risk Rating Classification

Rating category	Risk Profile (Description)	Score (%) obtained	Grade within the rating category
PNB –AAA	Minimum Risk	Above 80.00	PNB- AAA
PNB-AA	Marginal Risk	Above 77.50 up to 80.00	PNB- AA+
		Above 72.50 up to 77.50	PNB- AA
		Above 70.00 up to 72.50	PNB- AA-
PNB-A	Modest Risk	Above 67.50 up to 70.00	PNB- A+
		Above 62.50 up to 67.50	PNB- A
		Above 60.00 up to 62.50	PNB- A-
PNB-BB	Average Risk	Above 57.50 up to 60.00	PNB- BB+
		Above 52.50 up to 57.50	PNB- BB
		Above 50.00 up to 52.50	PNB- BB-
PNB-B	Marginally Acceptable Risk	Above 47.50 up to 50.00	PNB- B+
		Above 42.50 up to 47.50	PNB- B
		Above 40.00 up to 42.50	PNB- B-
PNB-C	High Risk	Above 30.00 up to 40.00	PNB- C
PNB-D	Caution Risk	30.00 and below	PNB- D

The rating model contains several qualitative parameters that are to be evaluated subjectively. It is, therefore, necessary to be adequately familiar with the company and the industry. Visiting the company and interacting with its management generally helps the *rater* in understanding the underlying activity behind the financial data of the company being analysed; the business prospect of the company and itsmanagement.

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Information should be collected about the company from all possible sources toconduct this exercise completely, accurately and in an authenticated manner.

The data used to rate companies should be annualised & made comparable before itis used for rating purposes. Similarly the financials of the company should be mad\ comparable with peers in case of change in accounting policies, merger, demerger, acquisition, sell-off etc.

While evaluating a company against the industry the following points should be keptin mind:

- The company's value should be compared only with peers.
- Size / capacity / volume are indicative factors in selecting peers.
- The sample of companies chosen for the industry comparison should be identical as far as possible for rating all companies under one particular industryhaving similar size / capacity / nature of activity.
- The number of companies in sample should be reasonable i.e. neither too low nor too high.
- The sample size should be of at least 5 companies. The sample should preferably be selected from the activities in which company is operating.

3. Subjective assessment of the management of the client

The assessment of management on criteria like integrity, honesty, and track record is assessed in this section. This area is important as this indicates both the quality as well as integrity of management. Hence it is essential to be completely familiar with the management of the company and its track record, organisation structure and reporting relationships within the organisation as well as the qualifications of the top management personnel.

4.7.1 Assement of Conduct of Account of the Client

The evaluation of the conduct of an account is done on the basis of its PMS Rank or PMS Index Score (Maximum). The outlook and performance of an industry depend ona number of parameters that include the structure of the industry as well as its financials. Some of the broad parameters that are used for evaluating an industry are:

1. Expected industry growth rate
2. Capital market perception: The industry P/E ratio is a useful indicator in this regard
3. Regulatory framework
    - Tax Concessions
    - Tariff Protection
4. Demand-supply mismatch

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5. Financial performance of industry
    - Return on capital employed
    - Price stability
    - Operating profit margins
    - Earning stability
6. Threat from globalization
7. Structural attractiveness
    - Supplier power
    - Buyer power
    - Threat of product substitution
    - Threat of new entrants and entry barriers
    - Competition within the industry

Comparison of The Model with The Industry Standard

The current Credit Risk Model of PNB can be compared to the Industry standard that has been arrived at by the secondary research done through research papers. The model used by PNB is evaluated on the basis of each of those parameters that are considered important for a bank's credit rating system as follows:

- **Disciplined way of looking at Credit Risk and estimation of the overall health status of an account**: The model has predefined sub parameters in different sub areas that help the bank to evaluate a project on various different areas that can affect the Credit Risk to the bank. The financial, management, operation, industrial and historical data is all taken into consideration while evaluating an account.
- **Assessment of impact of a new loan asset on the portfolio**: The bank follows strict guidelines that limit the funding of the projects. These limits are prescribed as a percentage of the total funding available to the bank. This helpsthe bank to limit the risk involved in its operations. This characteristic of the model helps the bank to cover for the losses in case of defaults.
- **Sector wise Risk monitoring:** The bank has operational poilicies in the credit risk model that helps the bank to monitor its activites in a particular sector. This helps the bank to limit the risk involved in case of changing traditions and policies of the entire industry that might have an adverse effect.
- **Relationship managers for high value accounts:** Bank does not have a policy of appointing relationship managers for high value account. However, bank has included a structure of approval of the projects such that the projects are looked into by the different offices in terms of power and hierarchy. High Value projects are generally handled by Regional or Zonal Offices while smallerprojects can be handled at the District Headquarter level or Branch Office level.

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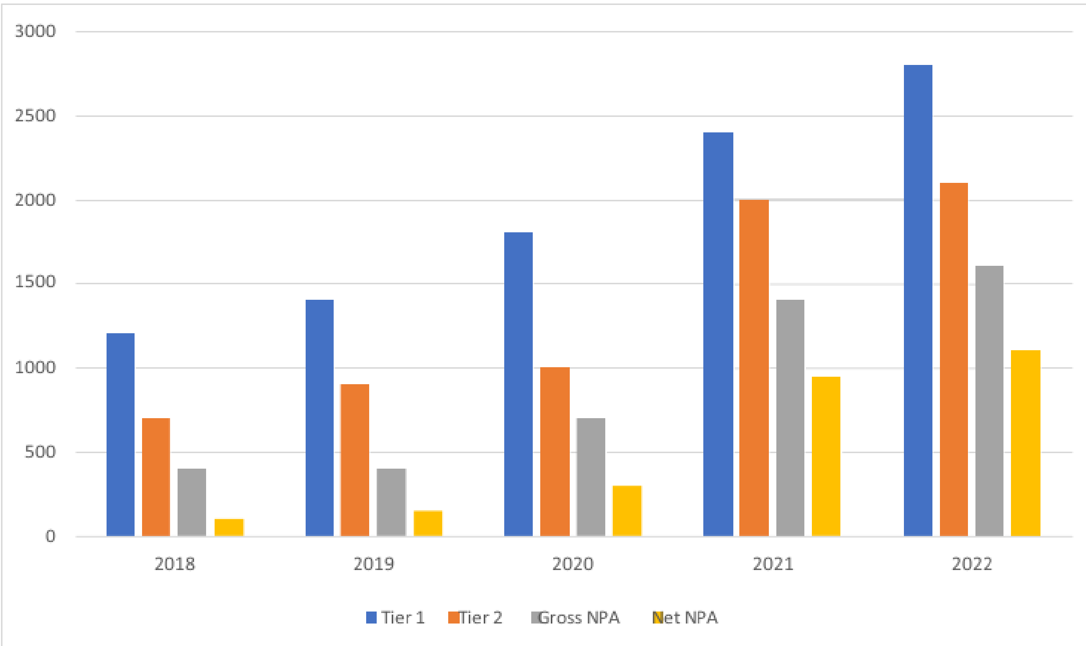
- **Rating procedures should be implemented:** PNB has a rating system of the clients set up in place that considers a number of parameters and sub- parameters to calculate the worthiness and risk quotient of the client. These parameters are based on financial, environmental, internal, operational and historical performance of the firms.



As shown in graph above, at present the bank is satisfactory capital adequacy but Net NPA has rose to almost 400% in past five years, which calls for additional provision.A combined impact of this could adversely affect overall capital adequacy especiallyin terms of Basel III. The Bank's profit in the latest year has grown by about 10 %. Government ownership is above 54 % and last Public Issue by the bank was brought in 2015 so if needed bank can look for raising public equity

Major Findings

The major findings from the study can be listed as follows:

- The Credit Risk Model of PNB is very well incorporated.
- The Model follows RBI Guidelines and strictly adheres to the instructions issuedby ĀRBI.
- The Model is quite ready for RBI's milestone set for the PSU banks to complywith the procedures as per Basel-III norms.
- The model does not comply well with the Basel-III norms of maintaining theratios of Tier-I and Tier-II Capital
- The financial status of the clients is a very important factor in determining thefunding limits and loans to the firms.

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- For new projects, viability of the projects is an essential factor in determiningwhether the project should be funded or not.
- For large corporate accounts, PMS rating and account history is the mostcrucial factors along with the project viability.
- The subjectivity in evalutating the parameters for a project provide the bank with a provision to incorporate the reports made by Lending Engineers for the projects.
- The model also has a provision for including the reviews of external rating agencies (CRISIL, ICRA etc.) in case of need of external verificaton.

5.2 Recommendations

Based on the analysis and the results arrived from the research, variousrecommendation that can be made to enhance the existing model for PNB are:

- Financial and operational performance of the company applying for loan should be compared with its industry peers. Relative performance comparisons will notonly highlight the management capability but also help in identifying any abnormalities in the information submitted by the company.
- Compliance with Basel-III norms has to be met by 2018, as prescribed by the RBI. The bank must be pro-active in developing and designing the policies to meet the requirements and stabilize the Tier-I and Tier-II capital ratios.
- Forward looking statements with respect to sales, profitability etc. provided in the DPR and other reports submitted by the company should be treated with caution. Market analysis, demand analysis, sales projections etc. should be evaluated on with prevailing norms of the RBI.
- If any of the critical ratios is marginally unfavorable, then additional collaterals could be charged or pricing of the loan could be revised upward to compensate for the additional risk
- Due to increased activism and regulatory crisis like that with spectrum allocation, mining leases, land acquisitions issues, environmental considerations etc. viability of otherwise sound projects is threatened. Social, political and economical risks should also be taken into consideration while deciding project viability. Evaluation of these risks should be made mandatory in TEV report

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