Addis Ababa University

College of Business and Economics

Department of Public Administration and Development Management

An assessment of credit appraisal and credit risk management practices of development finance institutions: The case of Development Bank of Ethiopia

A Thesis Submitted to the Department of Public Administration and Development Management of Addis Ababa University in Partial Fulfillment of the Requirements for the Master of Arts Degree in Public Management and Policy.

September 2015

DECLARATION

I Fekadu Meheretu hereby declare that this thesis is my original work towards the achievement of Master‟s degree in Public Management and Policy, specialized in Development Management, at Addis Ababa University College of Business and Economics, Department of Public Administration and Development Management. In that, to the best of my knowledge, it contains no material previously published by another person or material which has been accepted for the award of any other degree of the university, except where due acknowledgement has been made in the text.

Signature: ……

Date: ……

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By:
Fekadu Meheretu

APPROVED BY:

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ADVISOR	**SIGNATURE**
DATE	

EXAMINERS:

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INTERNAL EXAMINER	**SIGNATURE**
DATE	
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EXTERNAL EXAMINER	**SIGNATURE**
DATE	

DEDICATION

Who believes that such a tragedy has happened in my life? But, it did happen. After a week i admitted to the graduate school of CBE, I lost my beloved mother. Everything becomes messed up and life becomes so challenging. I lost my inspiration, my courage and even my passion to learn and live, but with the help of God, family members and some cloth friends i reorganized myself and continue this study, but after one year while I was preparing to submit a title for my thesis, the other most challenging and unbearable tragedy has happened again. I lost my father, who was my inspirations to continue this study. I again fell in a complete darkness and started to question the reason of my education and even my existence; finally, I took a little break and decided to finish what I have started and to dedicate it for my late parents.

Now the time has come, and I dedicate this work for my late parents and for those who helped me to finalize my education.

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I thank the ALMIGHTY GOD for making this project and my study a very successful one.

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Special thanks go to the management and staff of Development Bank of Ethiopia and more specifically for Ato Getachew Mengistu Credit approval team Chairman at DBE, who provided the necessary assistance to enable me carry out this research.

I must also acknowledge the moral support and cooperation accorded to me from my wife Meron Abebe and My close friend Wondwosson Taffa, without your support this paper will not be realized.

Thank you all very much!

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List of Abbreviations/Acronyms

ADB	Asian Development Bank
BHCs	Bank Holding Companies
BNDES	Brazilian National Development Bank
CA	Credit Application
DBE	Development Bank of Ethiopia
DFIs	Development Finance Institutions
EU	European Union
JDB	Japan Development Bank
KFW	Kredintaltanlt Fur Wei-darufban
KYC	Know Your Customer
LBO	Leveraged Buy-Out
NBE	National Bank of Ethiopia
NBECICN	National Bank of Ethiopia Credit Information Center
NPL	Non-Performing Loan
OeNB	Oesterreichische National Bank
RAAC	Risk Asset Acceptance Criteria
RAROC	Risk-Adjusted Return on Capital
ROA	Return On Asset
ROE	Return On Equity
SMEs	Small-to-Medium Enterprises
SPB	State Bank of Pakistan
SPSS	Statistical Package for Social Scientist
SPV	Special Purpose Vehicle
TIN	Tax Identification Number
VAR	Value AtRisk

ABSTRACT

The study focused on the Appraisal and credit risk management practices of Development Bank of Ethiopia, against the background that there was large amount of nonperforming loans beyond the set threshold of NBE, which could affect the overall status of the bank and the country as a whole. Based on the general objective of assessing the loan appraisal and credit risk management practices of Development Bank of Ethiopia, this study also tries to investigate the reasons for the accumulation of bad loan at DBE. A descriptive survey method was used for the study, by involving 32 questioner respondents comprising of all the technical staff from Development Bank of Ethiopia with a direct credit related functions and key informant interview were also held with the credit approval team chairman of DBE. A descriptive analysis was used to investigate about the loan appraisal, the loan buyout, risk transfer, risk diversification, risk retention and loan approval practices of DBE. The results of the study showed as there existed a very good loan appraisal process at Development Bank of Ethiopia as compared to other risk management technique like risk transfer and risk retention. The appraisal process helps identify and analyze loss exposures support to monitor risk which enhances normal loan repayment behavior of any creditor. Generally, except the issue of diversification in which the respondents response shows a positive result, DBE's credit risk management practice, in area of risk transfer and retention is weak, hence these weak credit risk management practice of the bank in line with the loan buy out services and implementation drawbacks were responsible for the accumulation of Nonperforming loans in the bank.

CHAPTER ONE

1. INTRODUCTION

The concept of development financing has evolved, to become what it is today. It was the evil market failure that necessitated the formation of development financing (Asrat, 2013).

Development finance institutions occupy the space between public and private investment. They are financial institutions which provide finance to the private sector for investments that promote development and these institutions provide finance and the finance in general offered in the form of long term loans (between 10 and 25 years). As well as providing finance, they often act in cooperation with governments and other organizations in providing management, consultancy, and technical assistance (Matthew, 2012).

In order to promote economic development in any economy, new investments in key productive sectors of the economy must be encouraged through development financing. National Development banks would simply follow the policy of the government and extend their credit to projects in areas prioritized by the government (Asrat, 2013).

Nevertheless, risk is one word that development banks around the world are highly familiar with. In that, the bulk of projects that the bank invests in are indeed the riskiest. An anonymous macroeconomists say that it is all about strong project assessment. Even in the category of government priority, projects which request financing from national development banks differ in quality. According to macroeconomists, a policy lending institution is not worthy of the same unless it has a strong project appraisal and risk assessment team on board. Since capital is scarce in underdeveloped countries, it must be put to the most effective uses. The purpose of project appraisal is to achieve this end by working as sure as the circumstances permit that the project is technically sound, that it will provide a reasonable economic and, where appropriate financial return, that its objectives cannot be achieved in some less costly way, and that it fits in which the overall economic objectives of the country (King, 1967).

Meanwhile, lending is considered the most important function for fund utilization of banks as major portion of their income is earned from loans and advances. Despite the fact that loan is a major source of banks income and constitutes their major assets, it is risky area of the industry. That is also why credit risk management is one of the most critical activities that must be carried

out by banks. In fact all of the risks banks face, credit risk is considered as the most lethal as bad debts would impair banks profit. Deterioration in banks loan quality is one of the major causes of financial fragility. A past experience shows that a rapid buildup of bad loans plays a crucial role in banking crisis (Geletta, 2012).

In light of the above facts, credit appraisal and credit risk management in development financing has attracted the student researcher‟s attention.

1.1 BACKGROUND OF DEVELOPMENT BANK OF ETHIOPIA

The development bank of Ethiopia (DBE) is a state owned development finance institution engaged in providing short, medium, and long-term development credits. DBE‟s distinguished feature is its “project” Based leading tradition.

Since its formation in 1909, DBE took different formats and organizational structures, while focusing on the same task of financing projects with no alternative cash source that were important to the country. According to information on the banks website, it is currently mandated to extend credits to commercial farming, agro processing, manufacturing, export sectors and all financing requests which are in line with the country‟s development strategy (DBE, 2012).

In its long years of experience DBE has established recognition at National and International levels. Nationally, it is the sole Bank with reputable experience in long term investment financing internationally, it is recognized as an important on leading channel for development programs financed by bilateral and/or multilateral sources (DBE, 2014).

The recent focus of the Government in relation to projects is projects which are fully engaged in producing exportable commodities. With regard to this, the economic sub- sectors for which the lone able financial resource will be availed are leather and leather products, textile and garment manufacturing industries cotton farming live animal export and meat processing industries as well as production of Horticultural crops including flowers and high value vegetables crops and other exclusively targeted for foreign markets. Ibid

Currently, DBE has been engaged in the following major activities.

A. Loan (credits) operation

Loan and technical assistance which are the major operations of the bank are currently undertaken. The bank extends loan services to applicants after undertaking feasibility studies in reliable methods to ascertain the viability of the proposed projects. The bank provides loans for

financing the establishment and expansion of agricultural agro-industrial, industrial transport, and communication, mining and energy, education, health, hotel and tourism, and other sectors of the national economy. In connection with lending activity, the bank provides counseling and technical services, to new applicants and its clients. The types of loans that are extended by the bank are:

- Short term loan: this is a loan advanced for the purpose of working capital, and is payable within a year
- Medium-term loan: This loan is given for the purposes of building construction, machinery, Equipment, furniture, and vehicles. It is paid back within three to five years.
- Long-term loan: The purposes of this type of loan are for construction of factory building. And acquisition of machinery, for irrigation agriculture and plantation crops, for transport vehicles and communication equipment, and for any other infrastructure related with the project to be financed. The loan payable within a maximum of twenty years.

B. Commercial Banking operations

The bank renders different allied services in both local and foreign banking spheres limited to its clients only.

C. Syndicate financing

As a strategy, a syndicate financing helps the bank to mobilize loanable fund for accomplishment of its development objectives. Moreover, syndicate financing minimizes the bank‟s risk in connection with long term lending.

D. Managing funds

Managed or trust funds are administered by the bank on behalf of the fund owners. Such funds are mobilized and used for specific selected projects by the fund owners. It is administered on the basis of the agreement entered between the bank and the owners, the government and non-government agencies.

Generally “The Development Bank of Ethiopia is a specialized financial institution established to promote the national development agenda through development finance and close technical support to viable projects from the priority areas of the government by mobilizing fund from domestic and foreign sources while ensuring its sustainability”. In this regard DBE has extended 1,041, 600, 000 birr to different social sectors of the economy i.e. 21.8 million to the state, 240.6

million to cooperatives and 1041.6 million to the private sector of which 268 million birr of loan were extended for agriculture and 721.3 million were for industry in the year 2009. This figure has grown from time to time in that in the year 2011 the bank has disbursed 3.79 billion birr for various projects respectively and this figure has reached Birr 5.34 billion in June 30, 2013 out of this total disbursement, Birr 1.2 billion was disbursed to agriculture, while Birr 3.17 billion and Birr 963 million was disbursed to industry and other business sector projects, respectively. And, an assessment of loan disbursement by sector shows that, out of the total disbursement Birr 3.94 billion was disbursed to the private sector, while Birr 71.6 million was disbursed to cooperatives. The share of public enterprises and Rural Financial Intermediation Program is Birr 419 million and 896.2 million respectively (DBE, 2013).

1.2 STATEMENT OF THE PROBLEM

The proponents of state involvement in the financial sector, in the development banking format, state that in underdeveloped economies there will always be projects that would have no takers as far as commercial banks are concerned. Pundits say that infrastructure projects and those projects having an impact on the overall economy of the country would generally fall in the jurisdiction of development banks. According to DBE annual report, it finance projects within the government priority areas (DBE, 2012) but, being policy lending institution, doesn‟t stop the bank from evaluating the feasibility of the projects, whether it is worthy of financing or not.

Despite the fact that loan is major source of banks income and constitutes their major assets, maintaining low level of nonperforming loans facilitates the economic development of a country. High level of NPL is linked with banks failures and financial crisis, and failure in banks may lead economic slowdown and crisis as has recently been experienced in the developed world Asrat (2013), thus, loan performance is a major constraint that affects the success and survival of development finance institutions, which in turn affects their development financing capability.
During the military rule, in Ethiopia, the banking sector was riddled with NPL as a consequence of weak lending practice, these things were also at play in Ethiopia during the early years of the current administration for instance, and the NPL of DBE reached 94% in 2003 (Banking sector review, 2010). Meanwhile, credit risk continuous to remain the largest source of risk for Development Bank of Ethiopia, for instance loan of birr 8,705,480.38 has been written off by the bank in the year 2011 (DBE, 2011). Furthermore, In Ethiopia context, the banks in the country

are required to maintain ratio of their NPL below five percent (5%), (NBE, 2008), despite this NPL of DBE stood at 7.54%, 8.37% and 8.00% in the year 2012, 2013 and 2014 respectively (DBE, 2014), which is relatively very high when compared with the set threshold. As (Kotoh, 2004), prescribes banks loan appraisal and loan management system can be responsible for the bad loan portfolio.

Meanwhile, several studies had been undertaken on DBE, for example, a study conducted by Tefera (2005), focused on the credit operation and financial performance of DBE, which mainly focuses on the financial performance of DBE by using different financial performance measurement tools, like Return On Equity (ROE), Return On Asset (ROA), etc. A study was also conducted by Gebeyehu (2002), on the loan repayment and it‟s determinants of small scale enterprise financing, but, this study is very narrow in concept and doesn‟t touch the appraisal and credit risk management process of DBE. Similarly Ayalew (2009), undertook a research on NPL realization, but his work mainly focuses on the legal problems to realize NPL, and the study doesn‟t touch the causes of the NPL, whether it is due to poor appraisal and/or weak credit risk management.

Generally, studies done so far on DBE are mainly focused on evaluating its financial performance and more or less on its NPL realization, in other words previous studies done on DBE do not focus on the credit appraisal and credit risk management of the bank, and this paper identifies as there is no research done on the appraisal and credit risk management of DBE in a comprehensive manner. Hence, this study takes a comprehensive approach to assess the credit appraisal and risk management i Development Bank of Ethiopia.

1.3 OBJECTIVES OF THE STUDY

The general objective of this study is to assess the loan appraisal and credit risk management practices of Development Bank of Ethiopia. And the specific objectives of this study are:-

- To assess how development projects are financed or how loan is appraised at Development Bank of Ethiopia.
- To explore how credit risks are managed at DBE.
- To examine the effectiveness of the credit appraisal &credit risk management processes of DBE

1.4 RESEARCH QUESTIONS

- What is the overall development financing (Appraisal) process that DBE passes through?
- What strategies were designed & implemented at DBE to improve the credit risk management of the bank?
- Is the credit appraisal process of DBE effective in bringing about loan performance?

1.5 SCOPE OF THE STUDY

1.5.1 GEOGRAPHICAL SCOPE

This study is undertaken at Addis Ababa where the head office of Development Bank of Ethiopia is located. The head office of Development Bank of Ethiopia is selected due to the fact that huge amount of credit is given at a head office level. "Loan in excess of birr 15 million is the jurisdiction of the head office credit process" (DBE, 2012).

1.5.2 SUBJECT SCOPE

This study focuses only on the credit Appraisal and credit risk management practices of Development Bank of Ethiopia.

1.6 SIGNIFICANCE OF THE STUDY

This study is believed to have the following significance:

- Yet until now, there appeared to be no attempt to investigate credit appraisal and credit risk management practice of DBE, in a comprehensive manner. Therefore, this study is the first to provide a comprehensive approach about the subject matter under study and it intend to fill the gap in this arena and provide empirical literature on the subject matter under study.
- This study is believed to contribute to the academic knowledge on how to implement effective credit appraisal methods.
- The result of this study shall also contribute as a source document to formulate credit risk management policy.
- This study will serve as a stepping stone to future researchers by providing literature and also by provoking them to undertake further research in this area.

1.7 ORGANIZATION OF THE STUDY

This study is organized into five chapters. Chapter one introduces the study beginning with a brief background about DBE, a statement of the research problem, the objectives and research questions, the significance and scope of the study. Chapter two presents a detailed review of relevant literature written about appraisal, technical feasibility, and financial viability. It also presents the risk management techniques namely risk transfer, risk diversification, risk retention, furthermore, it presents the conceptual framework of the study and finally an empirical literature review is presented. . Chapter three provides the methodology used to obtain data and how the data is analyzed. Chapter four gives the findings of the study and a brief interpretation of the results with respect to the objectives of the study. Chapter five is devoted for conclusions and recommendations for further research.

CHAPTER TWO

2. LITERATURE REVIEW

In this chapter a critical review of related literature is carried out. It begins by discussing the definition of development Banks & Development Banking and giving an overview of credit appraisal, financial viability, and technical feasibility. The second part focuses on other risk management techniques like risk transfer, risk diversification, risk retention. It ends by looking at loan performance.

2.1 DEFINITION OF DEVELOPMENT BANKS

Development banks are those financial institutions engaged in the promotion and development of industry, agriculture and other key sectors.

In the words of Kheradjou, (2008) "A development bank is like a living organism that reacts to the social-economic environment and its success depends on reacting most aptly to that environment". Kheradjou (2008) attaches an important task to the development banks. He feels that these banks should react to the socio-economic needs. They should satisfy the developmental needs of the economy and their success is linked to the satisfactory growth of the economy.

In the views of Diamond (1957) "A development bank has the opportunity to promote enterprises i.e. to conceive investment proposals and to stimulate others to pursue them or it to carry them through, from „conception" to „realization". In principle, a development bank is well suited to assume this kind of role. Yet, enterprise creation is fraught with costs and risks which development bank cannot neglect. Development banks can prudently undertake them only when they have the requisite financial strength, technical expertise and the managerial skill to bank". In his views, a development bank is an institution which takes up the job of developing industrial enterprises from its inception to completion. This process involves costs as well as risks. The bank should have sufficient financial sources and expertise to promote a new unit. Mithani (2010), states that. "A development bank may be defined as a financial institution concerned with providing all types of financial assistance (medium as well as long-term) to business units in the form of loans, underwriting, investment and guarantee operations and development in general and industrial". The role of a development bank has been emphasized in this definition. In this view a development bank aims to provide financial and promotional facilities for the overall development of a country (Mithani, 2010).

2.2 FEATURES OF A DEVELOPMENT BANK

Mithani, (2010) also identifies about 8 features that a development bank should have:

1. A development bank does not accept deposits from the public like commercial banks and other financial institutions who entirely depend upon saving mobilization.
2. It is a specialized financial institution which provides medium term and long-term lending facilities.
3. It is a multipurpose financial institution. Besides providing financial help it undertakes promotional activities also. It helps enterprises from planning to operational level.
4. It provides financial assistance to both private as well as public sector institutions.
5. The role of a development bank is of gap filler. When assistance from other sources is not sufficient then this channel helps. It does not compete with normal channels of finance.
6. Development banks primarily aim to accelerate the rate of growth. It helps industrialization specific and economic development in general
7. The objective of these banks is to serve public interest rather than earning profits
8. Development banks react to the socio-economic needs of development (Mithani, 2010).

2.3 POLICY BANKS

Providing credit in small volumes to dispersed and often remotely located borrowers increases transaction costs substantially. Further, the volatility of production, especially in rain-fed agriculture, often results in costly restructuring or large scale defaults. This implies that the risk premier associate with such lending would also be high. If these transaction costs and risk premier are to be reflected in interest rates charged on loans, rates could be so high that the loans concerned cannot be used for productive purposes. This implies that returns on lending to sectors such as these would be significantly lower than normal. This would require the state to intervene in one of many ways. It could insist on "social banking" on the part of ordinary banks, set low ceilings on interest rates chargeable to priority sectors and provide the banks a subsidy in the form of a subvention. Or it could require public banks to lend at low interest rates and cross-subsidize such lending with returns on normal commercial operations. This would imply that the returns expected of such banks would be lower than a normal purely "commercial" benchmark. Or it could create specialized development banks, provided state funds at extremely low interest rates to carry out these operations (Diamond, 1957).

Most countries have found that it is best to create separate development banks to provide long-term capital at near-commercial rates and "policy banks" to provide credit to special areas such as agriculture or the small scale sector where interest rates have to be subsidized and grace periods have to be longer. This allows different criteria to be applied to the evaluation of the performance of these banks, with profitability a more important consideration in the case of the former (Diamond, 1957).

2.4 DEVELOPMENT BANKING IN RETROSPECT

The rapid industrialization of the continental Europe in the 19th century was accompanied by the emergence of large financial institutions that were concerned with the provision of long-term loans as in France and Netherlands (Diamond, 1957). The existing commercial banks were unable to provide industry with long-term finance for two main reasons. Firstly, they were unwilling to bear the inevitable risks associated with the financing of new enterprises. Secondly, the commercial banks lacked the specialized skills required to deal with the higher risk related to long-term investments (Boskey 1961). Hence, given the scarcity of private provision of long-term finance, many of these new large financial institutions were sponsored by national governments.

As well, after the World War I, the need for reconstruction stimulated the development of state-backed financial institutions. The involvement of banking systems in the industrialization of Europe during the previous century spread to other European countries such as Belgium, Poland, Finland, Italy and Hungary (Diamond, 1957; Boskey, 1961; Alsahlawi and Gardener, 2004). Aware of the fact those financial institutions could play a proactive role in financing development; these banks also successfully functioned as catalysts for industrialization. As the reconstruction proceeded, the institutions were assigned with the role of providing long-term finance to relatively new industrial sectors, such as iron, steel and shipbuilding as required for rapid development. All the cost born by the projects were shouldered by the state itself. The state support took the form of share capital provision, cheap loans, the provision of state-guarantees to bond issuances by these institutions, or a combination of the three (Diamond, 1957). The notion of development banking structure was also adopted by Latin Americans during the Great Depression years of the 1930s. Corporacion de Fomento in Chile has pioneered development banking in this geography. The state itself employed development banks to enhance development

in a closed economy under the tough economic conditions of the Great Depression. While rising trade protectionism and competitive devaluations in many countries at that period contracted international trade, Latin American development banks‟ wanted to utilize this opportunity to divert local capital to their local industries. However in the period of 1925 and 1945, the diminishing export revenues and decreasing capital inflows led the Latin experience to be unsuccessful.

The demands for reconstruction after the World War II triggered another wave of state-sponsored financial institutions. The German Kreditanstalt fur Wilderaufban (KfW) and the Japan Development Bank (JDB) are the two major examples. Although they originally intended to channel external funds for reconstruction, these institutions later evolved to long-term financial institutions. After the World War II, many less developed countries also adopted development bank scheme to administer and channel World Bank loans and to provide long-term finance to newly created industrial enterprises (Diamond, 1957; Boskey, 1961). Unlike their predecessors, the majority of the post-World War II institutions were entirely state-owned and in this period, state acted as a catalyst and a coordinator and directed many economic activities via development banks (Bhatt, 1993). These banks played a crucial role in the dissemination of financial expertise in the new industries in periods of scarcity of capital and skill. The loans provided by these development banks were small in quantity but its importance vis-á-vis qualitative contributions were praiseworthy (Diamond, 1957). Their distinctive feature which separates them from other banks was their strategic decision-making in when and whom to support. Even in the post-1980 period, development banks continued to be highly involved in development. The Japanese and South Korean cases are the strong evidences of this claim. Although the neo-liberal orientation since the 1980s has affected the aforementioned countries, the development banks in those counties have survived and provided policy-based finance to productive sector. The South Korean experience is a unique case; she has supported many industrial sectors with protectionist policies and utilized development banks in order to channel credits to specific sectors. Apart from these very successful Asian experiences, Latin American countries have used the development banking scheme to bolster their industrial sectors and social projects even after the 1980s.

Development banking activities have remained crucial in many countries, yet, their functionality has developed under different forms since the 1980s. Nowadays, development banks have been

seeking opportunities to diversify their resources and in parallel they are actively tapping capital markets to use international money capital. They are mainly funding small-to-medium enterprises (SMEs) in developed countries, but their traditional role of bolstering heavy industries still goes on in developing countries. For the sake of risk diversification, development banks are operating co-lending activities. By doing so, they transfer monitoring-cost to a partner commercial bank and share credit risk. Besides their funding operations, they concentrate on consulting services like feasibility reports, technological consultancy, etc.

In sum, development banks have not only provided financial support to industrialization, but also contributed to the well-shaped distribution of capital within the societies by channeling their funds to the underdeveloped parts of the countries where commercial banks and other financial institutions were not eager to work. Their main objective by acting so was to promote productive investment in needy areas through technical assistance. The activities of development banks target those that have difficulty in gaining access to private financial markets, namely SMEs, agricultural sector, environmental projects and activities related to technological innovation. That is because they face higher intermediation costs and less diversified risks than those of large corporations. Within this streamline, development banks have been influential in balanced distribution of capital and have provided technical support to the less-developed parts of the countries. So the high effectiveness of development banks is also an indicator of reduced regional imbalances and poverty endeavor in that country.

2.5 SIMILARITIES OF PROJECT FINANCING TO OTHER FORMS OF FINANCING

David Gardner and James Wright (2012), expressed that the extent to which Project Finance should be regarded as a distinct wholesale banking product, or as a financing technique which incorporates a number of disciplines, is debatable. As a method of debt finance, project financing shares a number of the techniques and approaches found in other areas of wholesale banking and they summarized it as follows.

Table 1: Comparison of Project Finance versus other wholesale financing techniques

Form of financing	Parallels/commonalities	Key differences
Corporate Lending	Dependent on available cash flows to service debt Term loan structures used	Under and (unsecured) corporate loan, the lenders have recourse to all the assets of the company itself (regardless of whether the proceeds of the loan are used to finance a specific asset or not) or in the case of a secured loan, a specific asset of the company In Project Finance, the borrower (the Project Company) is a SPV and the principle Lender security is the future cash flows of the project itself – it is „cash flow lending"
Securitization (Asset Backed Securities)	The borrower is a SPV A form of „off balance sheet" financing for the originator The SPV issues bonds to fund	A securitization can only occur for cash generative assets (e.g. a loan portfolio which is generating interest payments). In a securitization, there are typically a large volume of assets being financed via a single SPV (e.g. a portfolio of mortgages). The pool of assets may therefore be of a variable credit quality and hence the financing instruments (bonds) are usually trenched accordingly. In a project financing, a single (or very small number) of assets are funded via a single borrower, presenting a uniform credit profile for all Lenders
Leveraged Buy-Out (LBO)	Highly leveraged transactions	In a project financing, the shareholders to the transaction are not contractually at risk if the project vehicle (borrower) defaults on its loans
Venture Capital	Discrete number of equity investors High focus on equity return of an investment	Venture Capital investments are speculative assessments of a company"s potential to generate returns. A project financing is predicated on robust, long term and highly predictable financial modeling of forecast cash flows

Source: (Gardner and Wright, 2012)

2.6 DEFINITIONS, TYPES AND FUNCTIONS OF CREDIT

Credit, in commerce and finance, is a term used to denote transactions involving the transfer of money or other property on promise of repayment, usually at a fixed future date. The transferor thereby becomes a creditor, and the transferee, a debtor; hence credit and debt are simply terms describing the same operation viewed from opposite standpoints (Donald, 2009).

According to (Donald, 2009)the principal classes of credit are:

i. Mercantile or commercial credit, which merchants extend to one another to finance production and distribution of goods;
ii. Investment credit, used by business firms to finance the acquisition of plant and equipment and represented by corporate bonds, long-term notes, and other proofs of indebtedness;
iii. Bank credit, consisting of deposits, loans, and discounts of depository institutions
iv. Consumer or personal credit, which comprises advances made to individuals to enable them to meet expenses or to purchase, on a deferred-payment basis, goods or service for personal consumption
v. Real-estate credit, composed of loans secured by land and buildings
vi. Public or government credit, represented by the bond issues of national, state, and municipal governments; and
vii. International credit, which is extended to particular governments by other governments, by the nationals of foreign countries, or by international banking institutions, such as the International Bank for Reconstruction and Development.(Donald, 2009)

The principal function of credit is to transfer property from those who own it to those who wish to use it, as in the granting of loans by banks to individuals and corporate bodies who plan to initiate or expand their business ventures. The transfer is temporary and is made for a price, known as interest, which varies with the risk involved and also with the demand for, and supply of, credit (Stiglitz, 1996).

Credit transactions have been indispensable to the economic development of the modern world. Credit puts to use property that would otherwise lie idle, thus enabling the world to fully utilize

its resources. One of the most significant differences between some nations of Africa, Asia, and South America and the advanced Western nations is the extent to which the use of credit permits the latter to keep their savings continuously at work. The presence of credit institutions rests on the readiness of people to trust one another and of courts to enforce business contracts.

The lack of adequate credit facilities make it natural and necessary for inhabitants of developing countries to hoard their savings instead of putting them to productive and profitable use without credit, the tremendous investments required for the development of the large-scale enterprise on which the high living standards of the West are based would have been impossible. The use of credit also makes feasible the performance of the complex operations involved in modern business without the constant handling of money. Credit operations are carried out by means of documents known as credit instruments, which include bills of exchange, money orders, checks, drafts, promissory notes, and bonds. These instruments are usually negotiable; they may legally be transferred in the same way as money. When the party issuing the instrument desires to prevent its use by anyone other than the party to whom it is issued, he or she may do so by inscribing the words "not negotiable" on the instrument (Stiglitz, 1996).

2.7 CREDIT RISK MANAGEMENT

Altman and Kao, (1991), argue that credit risk involves the possibility that the inherent risk of the asset migrates to a lower quality level, thereby resulting in lower security values in a market-to-market pricing environment. Over the last decade, a number of the world‟s major development finance institutions and banks have developed sophisticated systems to quantify and aggregate credit risk across geographical and product lines. The initial interest in credit risk models stemmed from the desire to develop more rigorous quantitative estimates of the amount of economic capital needed to support a bank‟s risk-taking activities, and more so to assess the overall risk management aspect of any given institution.

Altman, (2004) supported the above argument by discussing that in credit risk management, models are developed to allow a tailored and flexible approach to price measurement and risk management. In this paper, it was discussed that models are, by design, both influenced by and responsive to shifts in business lines, credit quality, market variables and the economic environment. Furthermore, models allow banks to analyze marginal and absolute contributions to risk, and reflect concentration risk within a loan portfolio hence contributing to an improvement

in overall credit risk management culture. According to the BIS, (1999) report, the degree to which models have been incorporated into the credit risk management and economic capital allocation process varies greatly from one finance institution to another. While some have implemented systems that capture exposures throughout the organization, others only capture exposures within a given business line or legal entity. These report further points out those internal applications of model output spans a wide range; from the simple to the complex. Current applications included: Setting of concentration and exposure limits, setting of hold targets on syndicated loans, Risk-based pricing, improving the risk/return profiles of the portfolio, Evaluation of risk-adjusted performance of business lines or managers using risk-adjusted return on capital ("RAROC") and Economic capital allocation. Institutions also rely on model estimates for setting or validating loan loss reserves, either for direct calculations or for validation purposes. From BIS, (2001) report on: "Update on Work on the New Basel Capital Accord", another important measure of credit risk is that of value at risk (VAR). According to this report, the estimated economic capital needed to support a bank‟s credit risk exposure is generally referred to as its required economic capital for credit risk. The process for determining this amount is analogous to value at risk (VAR) methods used in allocating economic capital against market risks.

2.8 CREDIT RISK MANAGEMENT PROCESS

Problem loans are usually recognized at the end of the credit channel. Before a loan becomes bad, it needs to be granted. Moreover, as we referred to so far, the poor quality of a loan is sometimes due to factors not attributable to the lending bank such as adverse selection and moral hazard or any other external shock that may alter the borrower's ability to repay the loan. Nevertheless, there are cases where the way banks grant and monitor credits can be responsible for the bad loan portfolio. In other terms, weak credit risk management systems can also be sources of problem loans (Nishimura, 2001).

For these last reasons, it was essential to overview the credit risk management process of Banks in order to capture the framework of the bad loans management. Significant details related to the credit management processes are revealed here. Banks credit management processes can be summarized in three main stages by (Kotoh, 2004). These stages are:

i. Credit initiation

ii. Documentation and disbursement

iii. Credit administration.

The above three stages are discussed in detail below.

2.8.1 CREDIT INITIATION

The credit initiation is a process that starts from a market analysis and ends at the credit application approval. The steps involved in credit initiation processes are listed below:

- Surveys and industry studies: Relationship Officers scan the market and economic sectors to identify key players and potential business for the Bank. In the same vein, industries with high potential of growth that can be good business for the Bank are also listed.
- Risk Asset Acceptance Criteria (RAAC): for each industry, criteria are designed to guide the relation with both industry and clients in order to limit the level of exposure at credit risk. Risk Asset Acceptance Criteria applied to industries include both quantitative and qualitative information such as net sales, net profit, years of experience in the business and the quality of corporate governance.
- Prospect lists: some prospects (companies and individual customers) identified as the main role players are short listed in accordance with the industry studies and the minimum risk criteria. This prospect list is ranked in order of preference.
- Customer solicitation: at that stage, although the primary source of target is the prospect list, the initiation of a credit comes either at the bank request in the frequent contact with existing customers or at the clients request if they have a need for financing.
- Negotiation: the relationship officer identifies the financing needs of the borrower and gathers background information such as the latest financial statements, project details, projections over the loan life. This information will allow the officer to check whether the risk is bearable by the Bank and its compliance with the bank's targets.
- Presentation: the conformity of information given with the market and industry analysis is the reliability of the information once again verified by consulting other sources. A draft of the credit application (CA) is prepared in conformity with the GCPPM and a consideration of the market and industry analysis by the account officer based on information collected.
- Credit committee approval: a copy of that CA is submitted to each member of the credit committee. The members review and approve submission of the final CA.

- Control and reporting requirements: the final CA package is submitted to the credit committee with highlights on the credit exposures of the bank.
- Advice to customers: once the credit is approved, the customer is advised in writing with details concerning the terms and conditions and with the statement that the credit can be subject to review, modification or cancellation at the Bank option (Kotoh, 2004).

2.8.2 DOCUMENTATION AND DISBURSEMENT

The documentation and disbursement refers to the compliance of documents provided with the law applicable and the requirements of the Bank's legal department. Documentation provided must satisfy the Bank's legal department and afford maximum protection to the Bank. The documentation is periodically reviewed to keep them in fine with ever-changing legal systems and practices. The Legal department is consulted before making any compromises with the customer. Any amendments are done in consultancy with the legal department. Once the credit application satisfies all these conditions, a thorough analysis is done and if the application complies with the Bank's conditions, instruction is given to the Credit administration for disbursement (Kotoh, 2004).

2.8.3 CREDIT ADMINISTRATION

The credit administration refers to the credit support, control systems and other practices necessary for the effective monitoring of credit risks taken by the Bank. Some of the important points of the credit administration are:

- Control of Credit files.
- Safekeeping of credit and documentation files.
- Follow-ups for expirations of essential documents like CA's and insurance.
- Control of credits and excesses over approved lines.
- Monitoring of collateral inspections, site visits and customer calls.
- Monitoring of repayments under term credits.
- Reporting: the portfolio is periodically reviewed to make sure that the names tiered are still complying with the risk acceptance criteria (Kotoh, 2004).

2.9 THE CREDIT POLICY MANUAL

Turning a credit evaluation process into a functional activity requires a detailed set of guidelines, procedures and processes. These go by the generic name of credit policy manual. Every firm that has a credit department or a credit manager needs to have a credit policy manual to formalize its decision processes regarding the day-to-day management of credit decisions and the resultant collection challenges when accounts are slow to pay, or fail to pay amounts when due. The thinking behind creating a manual, which is really a formalization of credit risk management procedures, is to be able to recognize and detail policy on important credit risk management issues, and to insure consistent thinking and action on these issues by people engaged in credit risk management (Ken Brown, 2012).

As a document which formalizes the management of credit risk, a credit policy manual should provide decision rules and guidelines on important aspects of the credit granting process being performed within the credit department and as discussed in earlier, one of the key points in such a document is to remember that, by formalizing the credit risk management process in a set of procedures, this will affect other elements of a firm"s operations, such as marketing and sales, the buying department and corporate treasury. Consequently, it will be a combined document based on agreed policies from the firm"s senior management, sales, and the other affected departments.

For the most part, credit policies will not change very often. However, as a matter of good practice, firms should review the manual annually including in the review the views from senior management and the other effected departments, as mentioned above, to insure that the procedures it details are up-to-date and reflect current thinking and practice. No two companies will have the same set of credit risk management policies (Ken Brown, 2012).

2.10 APPRAISAL (AVOIDANCE)

According to Rupp(2002), credit risk management is a process that involves a series of steps; identifying and analyzing loss exposures through the appraisal technique, measuring loss exposures, selecting the technique or combination of techniques to be used to handle each exposure, implementing the techniques chosen and monitoring the decisions made and making appropriate changes. It is also the support, control systems and other practices necessary to manage the outstanding risk assets, normal repayment and to monitor business risk. The appraisal technique involves credit initiation, evaluation, negotiation, and approval of facility. As

an important step in initiation process, credit officer should visit the potential customer to gather information on client‟s business, mode of operation, management, and financial situation. Banks should base their credit analysis on the five C‟s principals of lending. The 5Cs as discussed by (Pandey, 1997, Van Horne, 1998, Sinkey, 1998) include the customer‟s character as determined by their honesty and ethical reputation. It also refers to the capacity of the client as determined by their cash flows, and capital as determined by the client‟s real net worth. The collateral pledged for the credit facility is another aspect, and the condition, that is the vulnerability of economic fluctuations. In credit evaluation, a consistent and rating scheme to all investment opportunities should be applied if credit decisions are to be made in consistent manner which results in aggregate reporting of risk exposure Santomero, (1996). Several authors (Santomero, 1996, Bannet, 1984 and Harrison, 1996) agree that credit scoring should be used in the appraisal process to predict the credit worthiness of the would be borrowers. However, external factors like competition, economic cycle, natural disasters, technological advances, regulatory changes, industry changes, demographic factors affect the credit evaluation process and this at times results in problem loans (Wayne, 1998).

2.11 CREDIT APPROVAL PROCESS

According to OeNB, Oesterreichische National bank (2004), the individual steps in credit approval process and their implementation have a considerable impact on the risks associated with credit approval. The characteristics which have to be taken into consideration in planning credit approval processes and which usually stem from the heterogeneity of the products concerned are simply too diverse. That said, it is possible to single out individual process components and show their basic design within a credit approval process optimized in terms of risk and efficiency.

First of allOeNB(2012),asks what possible sources of error the credit approval process must be designed to avoid, and it puts down the errors encountered in practice most often in to these two sources:

- Substantive errors: These comprise the erroneous assessment of a credit exposure despite comprehensive and transparent presentation.
- Procedural errors: Procedural errors may take one of two forms: On the one hand, the procedural-structural design of the credit approval process itself may be marked by

procedural errors. These errors lead to an incomplete or wrong presentation of the credit exposure. On the other hand, procedural errors can result from an incorrect performance of the credit approval process. These are caused by negligent or intentional misconduct by the persons in charge of executing the credit approval process (OeNB, 2004).

2.12 TECHNICAL FEASIBILITY

An assessment of the technical viability of a project, appropriateness of production technology and availability of equipment are an essential component in credit risk management that determines production capacity of any given firm. According to Faria (2002), technologies produce impact on the production process. In fact, being first to adopt a new and more efficient technique means being able to enjoy productivity gains before rivals. In other words, technical change fuels productivity. Therefore, it is certainly useful both from the point of view of firms, financial institutions and policy makers to understand the rate of adoption of new technologies in order to assess the potential impact of technical change on productivity which has an implication on the efficiency in loan servicing. (Faria, 2002),

2.13 ECONOMIC ASPECT OF PROJECT APPRAISAL

According to (king, 1967) the appraisal of a proposed project from an economic point of view represents an attempt to answer three questions; is the project in a sector of the economy whose development is likely to contribute significantly to the development of the whole economy (i.e., is it in a sector which deserves priority); is the project likely to contribute effectively to the development of that sector, and is that contribution likely to be great enough to justify the use of the quantity of scarce resources that will be needed-investment capital, domestic and foreign; managerial talent; skilled labor and the like.

To answer the first question requires a study of the entire economy. Such a study may have been made by the government itself in the preparation of an economic development program, and in that case both the study and the program that rests upon it must be evaluated. These analyses can provide reasonable estimate of the general level of future requirements for goods and services and thus furnish indication of the relative priorities of various projects.

An important element in answering the second and third question is an analysis of the demand for the goods or services to be provided by the project. Although some indications of demand may be given in a development program, more precise and detail estimates are likely to be

required. The character of the analyses of demand (or market studies) needed will vary from sector to sector and even from project to project.

Generally, an economic analysis may sometimes lead to the conclusion that a project should be postponed a few years or even that its objective could better be attained by other means. This may be a disconcerting result, but its importance need hardly be emphasized. Its implication is that resources could be used more effectively elsewhere (King, 1967).

2.14 ASSESSMENT OF BORROWERS CREDIT WORTHINESS

The assessment of the credit worthiness involves the gathering, processing and analyzing of information on the loan applicant. An important aspect of information is by way of credit references and credit rating.

According to (Rouse, 1989) the question that must be dealt with before any other is whether or not the customer can service the loan – that is, pay out the credit when due, with a comfortable margin of interest. The factors underlying the assessment of pre-lending safeguards, in the opinion of (Rouse, 1989) are; character, capacity, cash, collateral, conditions and control (i.e. the 6Cs). In another context, (Rouse, 1989) referred to mnemonics used as common checklist to review loan application as: CCCPPARTS (Character, Capital, Capability, Purpose, Person, Amount, Repayment, Terms and Security); PARSER (Person, Amount, Repayment, Security, Expediency, Remuneration); CAMPARI (Character, Ability, Margin, Purpose, Amount, Repayment, Insurance/Security).

The variation in the mnemonics relates to the basic principle of assessing the potential of having loans repaid. The dimension of each of the factors outlined by (Rouse, 1989) is as follows:

Character: Customer‟s past payment records; experience of other lenders with the customer; purpose of loan; customer‟s track record in forecasting business or personal income and credit rating.

Capacity: identity of customer and guarantors, description of history, legal structure owners, nature of operations, products and principal customers, suppliers for a business borrower and management quality.

Cash: take-home pay for an individual, the past earnings, dividends, and a less record for a business firm, adequacy of past and projected cash flow; availability of liquid reserves, turnover

of payables, accounts receivable, and inventory; capital structure and leverage and expense controls.

Collateral: ownership of assets; vulnerability of assets to obsolescence and liquidation value of assets.

Conditions: Customer‟s current position in industry and expected market share; competitive climate for customer‟s products; sensitivity of customer and industry to business cycles and changes in technology.

Control: applicable banking laws and regulations regarding the character and quality of acceptable loans; adequate documentation for examiners who may review the loan.

Security: Securities for loans and overdrafts are to ensure recovery of the funds lent to the borrower in the event that the borrower becomes unwilling or incapable of meeting his commitments (Rouse, 1989).

Dunkman (1996), outlined reasons for security as: safeguarding against some doubts about borrowers repayment ability, basis for increasing amount of loans over and above existing facilities, and as a last resort to recover loan in the face of default. He expressed the view that even though security is necessary, its requirement by bankers must be adopted cautiously otherwise it is capable of being counterproductive. According to him, this can come about when bankable projects are funded solely because of availability of security.

Rouse (1989) however, held the view that no advances should be made until security procedures have been completed or at least at a stage where completion can take place without the need to involve the borrower any further. This suggests that the provision of adequate perfected security should be paramount in taking a credit decision. The rigidity in total secured collateral before disbursement of credit facilities needs to be relaxed in order not to delay the financing, which invariably impedes the success of projects. It should be also noted that the provision of security just provides secondary source of repayment and therefore to ensure sustained relations with customers in their business endeavors, it is pertinent to consider the viability of the project being financed to generate sufficient cash flows to liquidate the credit facility. Furthermore the foreclosure of immovable property pledged as security goes through a long legal tussle, which could not easily bring prompt liquidity relief to a bank. It is therefore very essential for banks to lay much premium on the viability of a project as a paramount consideration for lending financial support (Rouse, 1989).

2.15 LOAN BUYOUT

Loan buyout is a type of financial transaction in which loans issued by financial institutions are sold, sometimes at a discount, to new owners. At times, a number of loans are bundled into a single package and sold as a security to investors. The idea is for the originator of the loans to receive enough compensation from the buyout to cover expenses and make a small amount of profit, while the buyer or investor eventually recoups a larger return as the loans are paid off according to the original terms. A loan buyout also transfers the risk involved with the loans to the new owner, who stands to incur losses if the debtors associated with the purchased loans should default for some reason.

The idea of a loan buyout is very common in many business settings. Mortgages, car loans, and even credit card debt is sometimes bundled into this form of buyout and offered to investors as a means of benefiting from the returns earned from those financial debt instruments in years to come. For investors who participate in a loan buyout, the idea is often to create ongoing revenue streams that eventually cover the total amount paid for the bundled loans, while also providing income from the interest that the debtor repays along with the principal. Since the loans are often purchased at a slight discount over the actual remaining balance due at the time of the buyout takes place, this only helps to increase the returns that the investor eventually realizes from the venture.

A loan buyout is also beneficial to the institution that originally granted the loan. This is because the lender does not have to wait for the loan to be repaid according to terms in order to recoup the full investment. Often, the loan buyout is at a price that is slightly under the face value of the loan and the projected amount of interest that is remaining due at the time of the purchase. The lender has the benefit of receiving the lump sum invested in the loan earlier, often makes a small amount back over the actual costs associated with the loan itself, and is free to use those funds to underwrite additional loans that generate additional revenue. Best of all, the lender no longer is at risk of default on the loans that are sold to investors.

In many nations, it is not unusual for financial institutions to use the loan buyout model with private and commercial mortgages, car loans, and other types of lending activity. For the debtors themselves, the sale may mean little in the way of change, other than the need to remit the

monthly installment payments to a different entity with a different remittance address. Typically, the actual terms of the loan do not change, meaning that the debtor still pays the same rate of interest, has the same repayment schedule, and is subject to the same rights and responsibilities as originally contracted (Tatum, 2015).

2.16 CREDIT ORIGINATION

The State Bank of Pakistan, SBP (2012), states that banks must operate within a sound and well-defined criteria for new credits as well as the expansion of existing credits. Credits should be extended within the target markets and lending strategy of the institution. Before allowing a credit facility, the bank must make an assessment of risk profile of the customer/transaction. This may include

a) Credit assessment of the borrower"s industry, and macro-economic factors.

b) The purpose of credit and source of repayment.

c) The track record / repayment history of borrower.

d) Assess/evaluate the repayment capacity of the borrower.

e) The Proposed terms and conditions and covenants.

f) Adequacy and enforceability of collaterals.

g) Approval from appropriate authority

In case of new relationships consideration should be given to the integrity and repute of the borrowers or counter party as well as its legal capacity to assume the liability. Prior to entering into any new credit relationship the banks must become familiar with the borrower or counter party and be confident that they are dealing with individual or organization of sound repute and creditworthiness. However, a bank must not grant credit simply on the basis of the fact that the borrower is perceived to be highly reputable i.e. name lending should be discouraged (SBP, 2012).

2.17 CREDIT RISK

What is credit risk? Well the easiest way to consider that is to think of your own situation. Take the case where an acquaintance, someone you may have known at school or in a social situation, turns to you and asks you to lend them some money. Not a trivial amount to buy the bus fare home but a sufficient amount that, if they do not repay you as promised, you are left significantly

out of pocket. What do you do? Do you lend the individual the money? They may not repay you. Therefore it is better to refuse. But again, you may lose out on a possible profitable opportunity. The crux of the decision is whether the individual honors the promise to repay or de- faults. The desirable result occurs if the loan is repaid (with interest). The undesirable outcome that you wish to avoid is when the individual fails to repay the loan – or in the parlance of credit, defaults. Note how the example raises all sorts of issues. If you knew the individual better you might be more inclined to go with the lending decision. That is, if you knew the person‟s circumstances and their ability to repay. The past experience of others who may have lent money to the individual might also be useful. You may also wish to compare the individual to others who have borrowed money in a similar situation. As a result, you may be able to obtain a statistical estimate of the likelihood that the individual will repay you (or equivalently, will default on the loan). Your views as to whether you would be wise to lend the money to this acquaintance might change if the individual produced a guarantee to support the loan or some collateral. That is, something you could call upon if the individual were unable or unwilling to meet the obligation.

Whatever your thoughts, the decision requires you to make a judgment on the uncertain future outcome. This might take the form of gut feeling (or what professionals would term expert judgment) or you might be able to rely on a formal assessment model. In commerce, every time an individual or a firm borrows and hence makes a promise to pay, a financial asset is created. This promise can be informal and take the form of a verbal agreement or be based on a formal written contract. The promise can involve the purchase of an asset, product or a service from the provider. The promise can also be, as in the above example, to repay a loan. Regardless of the purpose of the transaction, the value of the promise will depend on the ability and willingness of the person or firm to make good on the promise.

Some financial assets are backed only by the general credit and good faith of the borrower to repay. Others are backed by legal obligations that would force payment or the forfeiture of a specific asset. Such collateralized promises include liens, mortgages, leases, and auto loans. Other contractual arrangements provide for a third party guarantee and hence, because the guarantor is also pledging their credit, require analysis of both the initial party and the quality of the guarantee (Ken Brown, 2012).

2.18 CREDITRISK MONITORING & CONTROL

Credit risk monitoring refers to incessant monitoring of individual credits inclusive of Off-Balance sheet exposures to obligors as well as overall credit portfolio of the bank. Banks need to enunciate a system that enables them to monitor quality of the credit portfolio on day-to-day basis and take remedial measures as and when any deterioration occurs. Such a system would enable a bank to ascertain whether loans are being serviced as per facility terms, the adequacy of provisions, the overall risk profile is within limits established by management and compliance of regulatory limits. Establishing an efficient and effective credit monitoring system would help senior management to monitor the overall quality of the total credit portfolio and its trends. Consequently the management could fine tune or reassess its credit strategy /policy accordingly before encountering any major setback. The banks credit policy should explicitly provide procedural guideline relating to credit risk monitoring. At the minimum it should lay down procedure relating to

a) The roles and responsibilities of individual‟s responsible for credit risk monitoring

b) The assessment procedures and analysis techniques (for individual loans & overall portfolio)

c) The frequency of monitoring

d) The periodic examination of collaterals and loan covenants

e) The frequency of site visits

f) The identification of any deterioration in any loan (SBP, 2012).

2.19 CLASSIFYING RISK AND PREDICTING DEFAULT

For operational purposes, it is often the case that the credit assessment is used to classify a particular firm into a given credit class. These are often called credit ratings or credit opinions. Different commercial credit assessors and firms using their own credit assessments use different rating systems. That used by rating agencies such as Standard & Poor‟s use four categories of investment credit quality and three categories of speculative credit quality. The intention here is to group cases in a consistent way such that, for decision making purposes, all firms in a particular group will treated as equivalent

Since all firms within a particular grouping can be considered as having the same degree of creditworthiness, the group experience can be applied to any new credit being analyzed. In this case both a formal quantitative approach and a more judgmental qualitative approach are used in

order to determine its credit category. In doing so, it is compared to similar firms whose credit quality has already been determined and hence the firm is deemed to be like a particular type of credit for default prediction purposes.

Given different default rates and types of firms, the number of classes of credit quality can be greater or lesser depending on the granularity of the model. For instance, many banks use a scale of ten credit classes, with the highest credit quality being that of the state of the country of incorporation and the lowest being default (Ken Brown, 2012).

2.20 RISK TRANSFER

According to Andersen who examined credit risk transfer between banks and non-bank financial sectors, including the insurance sector argue that banks are shifting credit risks from their balance sheets to insurance companies, amongst others, and insurance companies are issuing catastrophe bonds that are being sold to institutional investors such as investment funds and other end-investors. Although risk transfer markets have the potential to enhance financial stability by diffusing exposures, there are concerns that they may equally lead to more concentrated and non-transparent risks, Andersen, (2001). This was supported by Hausler, (2004) who discusses how the blurring of boundaries between insurance and other financial institutions implies heightened importance of insurers for financial stability. It is also in line with the work of Podpiera, (2003) who explored the potential for the insurance sector to affect the vulnerability of the financial system, focusing on the banking-type activities that life insurance companies have increasingly taken on, as well as risks stemming from the possible failure of a large reinsurer. To achieve the risk transfer, use of derivatives has gained significant importance in the financial sector as standard and Poor"s (2003) provide a review of the factors underlying banks" use of credit derivatives.

Rule, (2001) pointed out that that banks and insurance companies are exposed to various credit, market and insurance risks in the course of their business, and they can manage these risks in three ways: Arrange for another entity to take on the risk at the outset. For example, a bank might arrange a bond issue for a corporate customer rather than lending itself; or an insurance company might arrange for a customer to „self-insure" by establishing a captive insurance company rather than buy insurance cover. They can also retain risks on their balance sheets and seek to control them through careful monitoring, pricing and diversification and hold the risk

only temporarily before selling it into a secondary market, hedging it with another offsetting transaction or repackaging it in order to sell/hedge it. In principle, firms can use risk-transfer methods to disperse risks making them less vulnerable to particular regional, sartorial or market shocks. Banks have tended to take on a bundle of risks attached to term lending but more crucial among them all is the credit risk since it affects borrower"s willingness and ability to pay (Rule, 2001).

2.21 PORTFOLIO SECURITIZATION.

According to Modak (2001), securitization has emerged globally as an important technique for bundling assets and segregating risks into marketable securities. This typically involves the transfer of assets from the originator to a vehicle company which then issues securities to investors backed by the cash flows on the transferred assets. The transaction is intended to remove risk from the balance sheet of the originator while ensuring that investors are exposed to the transferred assets only. It allows investors to improve their yields while keeping intact or even improving the quality of investment Vora, (2001). In this era of bank consolidations, Collateralized debt obligation and assets backed securities can help banks to proactively manage their portfolio. This is supported by Standard and Poor, (2003) who argued that asset backed securities, and collateralized debt obligations can help banks in restructuring their stressed assets. Asset-backed securities typically shift credit risk on pools of relatively homogenous assets such as residential mortgage loans, credit cards or car loans. These transfers of credit risk on diversified corporate bond or loan portfolios are known as collateralized debt obligations. A critical element of asset securitization is the creation of a special purpose vehicle to purchase loans and issue asset backed securities on their collateral. The special purpose vehicles may be a subsidiary of the originator of the loan, or of the investment bank that underwrites and distributes securities. The whole essence of special purpose vehicle to is creating a clean and legal break in the transaction for it to be regarded as asset sale without recourse (Standard and Poor, 2003).

2.22 ALTERNATIVE RISK TRANSFER (ART)

ART is a catch-all term for a range of less conventional ways – some developed in the 1980s, others more recently in which general insurance companies can take on and shed risk. It embraces insurance of new types of risk such as credit portfolios. These instruments and techniques are being used increasingly to shift credit, market and insurance risks amongst banks,

insurance companies, reinsures and other capital market investors, such as pension funds and mutual funds.

According to the European Investment Bank report (2004) on "Credit risk transfer by EU Banks, it is discussed that banks involved in portfolio management use credit risk transfer instruments for credit risk shedding (protection buying) and/or risk taking (protection selling) purposes. In this activity, banks typically aim to run matched credit risk positions. From their survey conducted among European Union Banks, it reveals that for the portfolio management banks that were involved in risk- shedding, the main motivation was to reduce the risks related to single entities, to obtain capital management benefits and regulatory capital relief, and to access funding through securitization. For the banks that used the market to take on credit risk, the main reason given was to diversify credit risk by acquiring claims on firms that would otherwise not be accessible to them through regular client acquisition. The key motivation for banks to sell protection was the diversification of risk. In some countries, a need to find profitable additional investments was also regarded as an important motive, especially if the volume of deposits outweighed that of loans. In the case of banks with a wider customer base and more widespread activities (lending, asset management, investment banking), versatility has enabled them to buy protection on one side while selling it on the other (European Investment Bank, 2004).

2.23 RISK DIVERSIFICATION

Brannan, (2000), argued that diversification is the primary tool for lenders to control borrower risk, and highlighted the fact that risks arise well before default occurs and warned against the construction of "bullet-proof" portfolios that can under perform. Lopez, (2000), supported this by discussing that there was value in diversification of credit portfolios and pointed out how this value can be measured. However, there are several factors that contribute to the degree of diversification for a credit portfolio and because these factors vary over time, the measurement of credit diversification is particularly challenging. Wilson, (1998), brought out the benefits of diversification in credit portfolios. The finding indicate that there is a significant difference in performance of portfolios concentrated in one region from that diversified to different economies. Therefore, Wilson‟s argument focuses on advocating for diversification of loan portfolios across nations where the benefits are much stronger than they are when diversification occurs across sectors in a given economy. However, the above argument is criticized by

Campbell etal. (2001), who discussed that the degree of diversification for a credit portfolio will depend on several other factors like; Size of the portfolio, and issues of maturity variation.

2.24 RISK RETENTION

Today‟s business environment demands lean, cost efficient operations with no waste. As an important part of this process, risk managers seek to reduce the economic impact of risk on their organizations through opting for greater levels of risk retention. Risk retention analysis will help you decide how much risk you are able to retain which could be accomplished through risk rating models (Amato etal, 2004).

Gordy‟s, (2003) work shows that, knowing the right amount of risk to retain promotes financial efficiency. Risk retention analysis provides you with answers to the following question. How much risk is there in my current loan structure? This provides you with a risk retention capacity for your organization or financial institution. Consideration is given to a number of factors in order to derive an estimate of the ability to retain risk. These include; Historical financial information from reports & accounts, future financial projections for the organization, market conditions and economic trends. As a result of this, the rate of interest charged should be adjusted to reflect the level of risk being retained. It should be noted that risk retention review should be a never-ending process for the risk management professional. It should be noted that the decision to retain risk is a function of the materiality of the risk, its predictability, and the transfer costs avoided. The measure of a successful risk financing program is its responsiveness to a substantial occurrence. In a publicly traded organization, the reason for retaining added risk is to increase earnings, and earnings are a substantial factor in determining the price of the equity shares of the company and the company's overall value (Gordy, 2003).

Insurance industry trends show that risk retention groups emerge during volatile times, but their efficacy should still be questioned. From the work of Gordy (2003).the return of hard market conditions, buyers will seek options outside of the commercial marketplace and alternative risk funding vehicles promise pricing stability and more control for the insured. The question that remains is these promises that alternative markets, and specifically risk retention groups can keep? Does retaining additional risk yield additional earnings? Clearly, risk assumption can meet this test if loss experience is favorable and the cost of risk transfer is uneconomical compared to risk assumption. Increasing risk retention, regardless of risk financing structure,

may save premium payments, but without a thoughtful review of the return on investment, organization's economic value may not be maximized(Gordy, 2003).

2.25 LOAN PERFORMANCE

The concept of loan performance refers to the ratio of non-performing advances (loans) to the total portfolio. A non performing advance/loan is that part of loan whereby interest and principal installment are still outstanding for at least six months after they are due (NBE, 2011). It can be calculated as follows:

$$\text{None performing ratio} = \frac{\{\text{Non Performing advances}\}}{\text{Total loan portfolio}} \times 100$$

According to (NBE, 2011), a ratio of 5% is accepted to be non-performing and the higher the ratio, the worse the loan performance. Performance of loan portfolio may be measured using proxies for credit risk and measures of loan quality such as provision for loan losses, net losses or charge offs, non-performing assets, return on net assets and return on equity among others. A high proportion of loans to total assets and rapid growth of the loan portfolio are potential early warning signals of loan quality problems which indicate potential failure Sinkey (1998). As noted by Peterson (1981), simple comparisons of average loan performance between two groups of borrowers can be misleading if the groups do not exhibit similar distributions of expected returns. If, for example, the proportion of highly qualified non-minority borrowers is substantially higher than that of highly qualified minority borrowers, default rates of non-minority borrowers observed without controlling for other determinants of credit quality would be lower than those associated with minority borrowers. This finding, however, would simply reflect the differences in average creditworthiness for the two groups of borrowers and would not necessarily indicate differential underwriting standards Ferguson and Peters (1995). Simple bivariate correlations suggest that default probabilities differ significantly by loan, borrower, and location characteristics. For example, higher default rates appear to be associated with higher loan-to-value ratios, lower incomes, and smaller loan amounts. Another caveat is that the basic theoretical prediction that discrimination results in better observed relative loan performance depends on the assumption that lending bias takes the form of different standards of creditworthiness for different groups (Ferguson, 1995).

2.26 LOAN LOSS PROVISIONING

A common practice among financial institutions engaged in lending is to provision against expected losses. The provision of loan losses reserves is a mechanism used by such lenders to recognize in a timely fashion impending losses on troubled loans. The fact that a certain proportion of credits will default is acknowledged and accepted by financial institutions. In the same way, an industrial and commercial corporation would have a reserve for expected bad debts. Further, on occasions where changes in the business cycle or local factors have an adverse effect on the loan book or default experience, such reserves or provisions can be used to mitigate the consequences on the lender. For example, a downturn in a local economy may lead to defaults in real estate loans. These tend to occur in clusters due to the concentration effect of such loans. As a result, it may cause the lender financial distress to write-off a considerable loss within one reporting period, hence the reason for the loan loss provisions. These protect the lender‟s earnings stream and smooth over the losses (Ken Brown, 2012).

2.27 CONCEPTUAL FRAME WORK

According to King (1967), project appraisal means investigating the project from six different aspects: Economic, technical, managerial, organizational, commercial and financial.

1-The Economic aspects: The appraisal of a proposed project from an economic point of view.

2- The Technical aspects: In the technical appraisal of a project whether the project is sound from a technical engineering point of view.

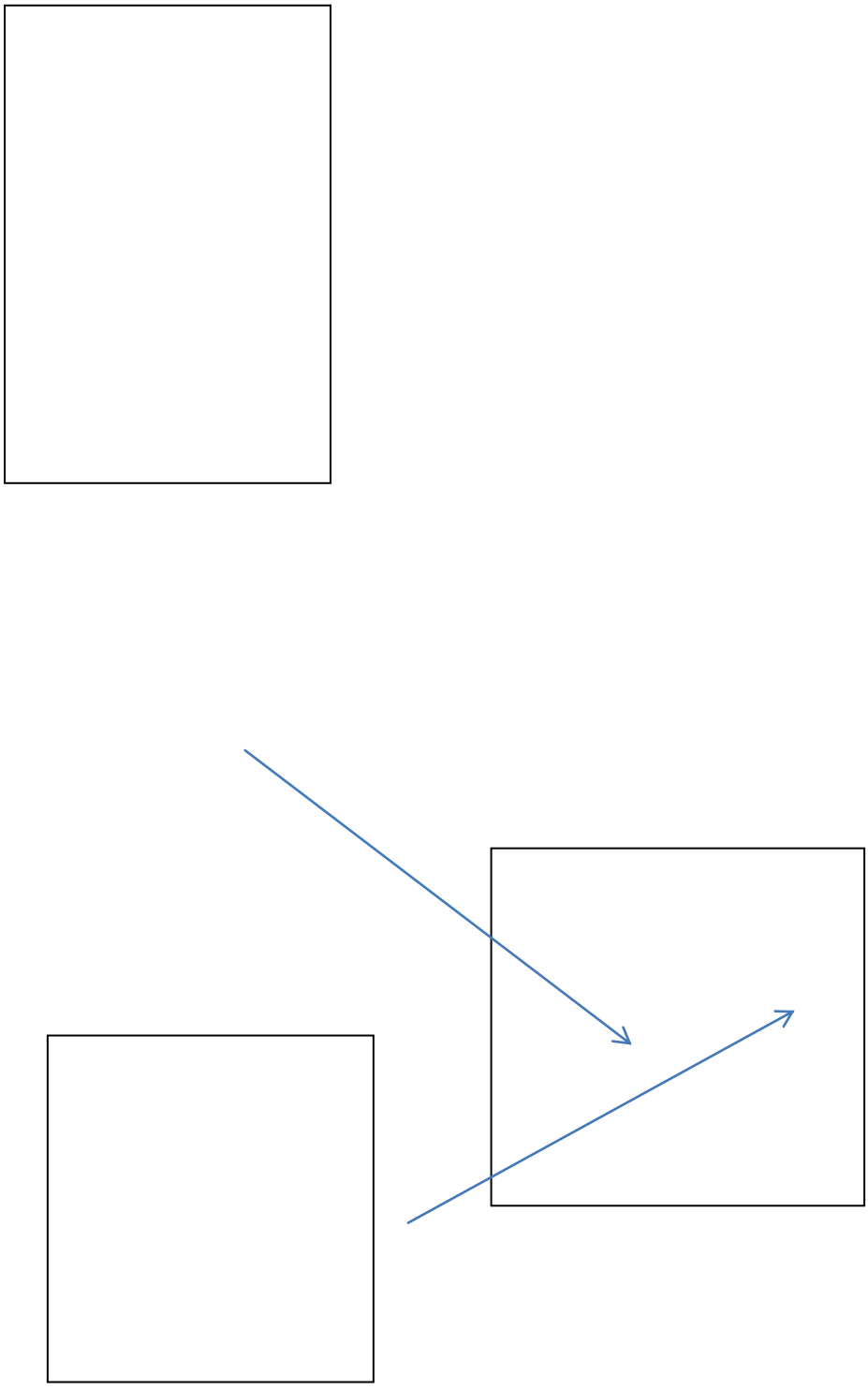
3-The managerial aspects: Management is perhaps the most difficult of all elements of a project to appraise. Where it is to be carried out by an existing organization, much can be learned about the quality of management from a study of what has happened in the past.

4-The organizational aspects: closely related to the question of management is the question of the sort of organizational structure best suited to carry out and operate the project successfully.

5-The commercial aspects: the best questions to be asked in appraising the project from the commercial point of view are whether adequate arrangements have been made for buying the materials and services needed to construct facility, and when construction is finished for obtaining power, labor and raw materials to operate the plant and market its product.

6-The financial aspects: The analysis usually examines two aspects of finance, the amount of money required to bring the facility into operation and the sources from which that money is to be obtained, and the probable operating costs and revenues, prospective liquidity and financial rate of return in the operating phase (King, 1967).

Meanwhile, According McNaughton etal, (1996), Credit risk management techniques has elements like risk transfer, risk diversification and risk retention. And Harrison, (1996) says that if the appraisal and risk management techniques applied in financial institutions, it will lead to loan performance. Thus this study will assess the loan appraisal and the credit risk management techniques of DBE based on the above theoretical frame work.



2.28 Empirical Research Review

2.28.1 The Case of Ethiopia

A survey report has been issued by NBE (2009), about the banking industry risk management; the main objective of the survey was to identify the status of risk management practices by banks and to forward recommendations to address weaknesses. The study acquired a data by forwarding a questionnaire to banks and the result of the study shows that in majority of the banks budget allocated by banks for risk management is relatively insignificant. The result of the study also shows that majority of the banks have policies, programs and procedures related to risk management and the research identifies insurance as a major risk management tool by majority of the banks.

2.28.2 The Case of DBE

A master thesis were done by Tefera (2005), under the title "Evaluating the credit operation and financial performance of DBE" at Addis Ababa University.

The main objective of the study was to evaluate the overall performance of DBE after the 1994 reform, to show whether the performance of BE is improving or deteriorating in various aspects.

The study was a case study and it uses both qualitative and quantitative data from secondary sources, it also uses DBE‟s financial statement as a primary source

The study concludes in general as the performance of DBE has increased in all aspects except the fact that banks provision for doubtful loan increased which indicates deterioration in loan receivables. But, Tefera‟s study couldn‟t see the reason behind this increase of doubtful loan at DBE.

2.28.3 The Case of Barclays Bank of Uganda

According to the study undertaken by Omara (2007), by the title credit assessment process and repayment of banks loans in Barclays Bank of Uganda LTD, the bank has faced poor management of its loan portfolio and this leads to the accumulation of bad loan portfolio, in that, the bank‟s provision and written off bad debits increased from 1.9 billion UgShs, In 2002 to UgShs 6.8 billion in 2004.

The main objective of the study was to examine the appropriateness of the credit assessment criteria‟s used by the bank and repayment of loans

It was a case study, and a sample survey was carried out to get the response of bank officials and customers through structured questionnaires. The data collected was analyzed by SPSS and arranged in form of tables, frequencies percentages and charts.

The result of the study shows that the bank doesn‟t make proper follow-up on customers and it lacks credible source of information on borrowers in that, during appraisal it relied primarily on information provided by customers about their previous borrowing history

2.28.4 The Case of Brazilian National development Bank

A study were done on Brazilian National Development Bank (BNDES‟) by Lazzarinietal(2011) with the title *"What do development banks do? Evidence from Brazil 2002-2009"*. It examines the selection/Appraisal process through which BNDES capital is allocated to firms. This study is a descriptive study and it started by setting a hypothesis of *"Industrial policy and political view on the role of development banks"* For this study data were collected from 286 publicly listed companies, between2002-2009, and secondary data were used from Brazilian National Development Bank (BNDES) on loans and equity allocation in the stated period.

The findings of the study reveals that BNDES‟ apparently selects firms with good operational performance based on their capacity to repay their loan but, it also provided more capital to firms with political connection.

Finally, the writer of this study couldn‟t find research done on the appraisal and credit risk management of DBE in a comprehensive manner and identifies it as a research gap where this paper is believed to fill in.

CHAPTER THREE

3. METHODOLOGY

This chapter specifies the research design used, data source, instruments used for data collection, data processing and analysis.

3.1 RESEARCH DESIGN

In this study, a descriptive survey design method was applied. Orodho (2003), defines descriptive survey as a method of collecting information by interviewing or administering a questionnaire to a sample of individuals. Descriptive survey method was used because the variables involved in the analysis are quantitative in nature. Thus, this study was mainly based on primary data that were obtained through questionnaires from technical staffs of Development Bank of Ethiopia with credit related functions.

Furthermore, Key Informant interview had been conducted with the credit approval team chairman of DBE and various relevant documents, proclamations, directives, policy documents, broachers and annual reports were used to conduct this study.

3.2 SOURCE OF DATA

Primary and secondary data were collected from the entirely technical staffs of DBE with a direct credit related functions and from other published documents.

3.2.1 PRIMARY SOURCE

The main primary source of data for this study was questionnaires. The questionnaires are both open ended and close ended. In addition to the questionnaires a key informant interview has been undertaken with the credit appraisal team chairman of DBE, so as to acquire primary data about the subject matter under study.

3.2.2 SECONDARY SOURCE

In the case of secondary source of data various relevant documents, proclamations, directives, policy documents, brochures and annual reports were used to conduct this study.

3.2.3 INSTRUMENTS OF DATA COLLECTION

Structured questionnaires and an interview were used for the collection of data. As indicated earlier these questions are both open ended and close ended and they are based on factors like Credit appraisal, credit risk transfer, credit risk diversification and credit risk retention which are identified in the conceptual framework .The variables were selected to answer research questions.

3.3 STUDY POPULATION

The study units are limited to all the member staffs of Development Bank of Ethiopia at Head office, who are directly involved in the credit operation of the bank.

3.4 SAMPLING

By using purposive sampling technique data were collected from all the 32 technical staffs of Development Bank of Ethiopia with direct credit related functions and an interview were also conducted with the credit appraisal team chairman of DBE. Purposive sampling is chosen because only technical staffs are the target to respond to questionnaires.

3.5 DATA PRESENTATION AND ANALYSIS

The quantitative data acquired through questionnaire were summarized by using SPSS and presented by means of tables and charts. This offers a pictorial presentation to enhance the understanding of the data. The data presented were also analyzed by using percentages and results interpreted accordingly.

3.6 LIMITATION OF THE STUDY

The major problem encountered was that of delays to fill questionnaire and to undertake an interview, which arose due to busy schedules of technical staffs of DBE who were targeted for the study. However, this was overcome by making repeated follow up and visit at DBE head office, until I get the interview and the entire questionnaire distributed fully received.

In addition, this research initially tried to include those DBE borrowers who appeared in the NPL list of the bank as a respondent but, DBE can‟t disclose those defaulted borrowers list due to confidentiality reason, however, by making purposive selection of respondents who are believed to have the knowledge about the subject matter of the study and also by preparing strong questionnaires and interview guidelines, this limitation can be managed without affecting the result of the study findings.

CHAPTER FOUR

4. DATA PRESENTATION, ANALYSIS AND INTERPRETATION

4.1 INTRODUCTION

This chapter comprises of presentations of data, and their interpretation. The results are presented according to study objectives which were:

- To assess how development projects are financed or how loan is appraised at Development Bank of Ethiopia.
- To explore how credit risks are managed at DBE
- To examine the appropriateness of loan appraisal & loan management processes of DBE

It begins by providing information about DBE"s credit operation which is important for data presentation and analysis thereafter. And the data presentation begins with demographic analysis of respondents. Despite the fact that socio-demographic characteristics of respondents has nothing to do with the subject matter under study, it would be helpful in providing information for readers of this research work about the background of the respondents. After this data presentation and analysis is made on the questionnaires and interview results which were designed in line with the objectives of the study.

4.2 DBE's CREDIT OPERATION

The Development Bank of Ethiopia (DBE) is a state owned development finance institution engaged in providing short, medium and long term development credits. Its distinguish feature is its "project" based lending tradition.

The Bank extends its credit service through the Head office and five Regional Offices and 32 Branch offices throughout the country. Each region is empowered to extend loan up to Birr 15 million in government priority area projects and loan in excess of Birr 15 million is the jurisdiction of the Head office credit department.

DBE"s credit policy is purely aligned with financing projects in line with government priority areas and the major areas of DBE"s financing include: (priority areas)

- Commercial agriculture
- Agro-processing

- Manufacturing & Extractive Industries

DBE is also mandated to extend investment credits to creditworthy borrowers and projects that have received a thorough appraisal and that are found to be financially profitable, economically viable and socially desirable. For the purpose of commitment to the success of the project to be financed, the applicant shall be required to make a contribution towards the project cost and the contribution shall not in any event be less than thirty percent (30%) of total project cost. Current interest rate for the priority areas of the Bank is 8.5% per annum.

4.3 DEMOGRAPHIC DATA

The under listed results show the background characteristics of the respondents that were involved in the study. 32 questionnaires were administered to respondents at Development Bank of Ethiopia and all the 32 respondents have responded to the questionnaires properly which represent a response rate of 100%.

Gender of Respondents

Out of the 32 respondents, as clearly seen in table 2 below, respondent‟s distribution by gender shows that, majority of the respondents 81.2% are males whiles 18.8% were females.

Table 2.Gender

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Male	26	81.2	81.2	81.2
	Female	6	18.8	18.8	100.0
	Total	32	100.0	100.0	

Source: Primary data

Age of Respondents

Table 3.Age

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	20-30 years	22	68.8	68.8	68.8
	31-40 years	9	28.1	28.1	96.9
	41-50 years	1	3.1	3.1	100.0
	Total	32	100.0	100.0	

Source: Primary data

As shown in table 3before,it was found that, staffs in the age of 20 – 30 years are more dominant in the Bank(68.8%). This is followed by those aged between 31 – 40 years (28.1%). The age with least representation in the bank is between 41 – 50 years (3.1%). This means that most of the workers in the bank are young adults.

Educational Qualification of Respondents

Table 4.Education

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Degree	21	65.6	65.6	65.6
	Masters	11	34.4	34.4	100.0
	Total	32	100.0	100.0	

Source: Primary data

The status of respondents with respect to the highest qualification attained was obtained and the findings are indicated in the table 4 above. According to table 4 above, about 65.6 % of the respondents have BA degree whereas about 34.4 % of the respondents had a postgraduate qualification. This implies that the respondents are believed to have a well understanding to give a valid response for the questionnaires that were designed for this study.

Banking experience

Table 5.Working experience in banks

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Less than 2 years	4	12.5	12.5	12.5
	2 – 5 years	17	53.1	53.1	65.6
	6-10 years	6	18.8	18.8	84.4
	above 10 years	5	15.6	15.6	100.0
	Total	32	100.0	100.0	

Source: Primary data

Credit related experience

Table 6. Work Experience in credit department

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	22	68.8	68.8	68.8
	No	10	31.2	31.2	100.0
	Total	32	100.0	100.0	

Source: Primary data

Data was collected from the respondent on their experience in banks and specifically on credit departments and as shown in table 5&6 above, all the respondents have more than two years of experience in banking and the great majority of the respondents have worked specifically in credit related functions. This implies that the respondents are capable of understanding the concepts presented in the questionnaires and they are believed to provide credible response with knowledge.

4.4 Appraisal

Table 7. Do you look at the relevant experience of the loan applicants while appraising loan?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	32	100.0	100.0	100.0

Source: Primary data

(Ken brown, 2012) says that "If you knew the individual better you might be more inclined to go with the lending decision". That is, if you knew the person"s circumstances and their ability to repay. The past experience of others who may have lent money to the individual might also be useful. You may also wish to compare the individual to others who have borrowed money in a similar situation. As a result, you may be able to obtain a statistical estimate of the likelihood that the individual will repay you, having this in mind as shown in table 7, above 100% of the respondents say that DBE studies the past experience of loan applicants before financing them, hence from this response rate we can say that this practice of DBE will help the bank to avoid

risks that may arise from loans that will be advanced for un trusted borrowers and it intern will contribute its part for the achievement of loan performance in the bank.

Table 8. Do you consider the cash flow projection of a given project before you finance it?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	32	100.0	100.0	100.0

Source: Primary data

According to (King, 1967), project appraisal means investigating the project from six different aspects one of which is the financial aspect which examines two aspects of finance, the amount of money required to bring the facility into operation and the sources from which that money is to be obtained, and the probable operating costs and revenues, prospective liquidity and financial rate of return in the operating phase. In this regard as shown in table 8 above, 100% of the respondents say that DBE considers and takes it as a requirement from borrowers to present a projected cash flow before it finance a given project, this implies that the bank has a well-organized credit appraisal system in this regard, which is vital as one ingredient for the bank to predict the future in line with other appraisal requirements, that whether the to be financed project is efficient enough to service its loan.

Table 9. Do you require collaterals to finance a given project?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	12	37.5	37.5	37.5
	No	20	62.5	62.5	100.0
	Total	32	100.0	100.0	

Table 9. Showing the response rate on collateral requirement

Source: Primary data

According to Pandey (1997), Banks should base their credit analysis on the five C"s principles of lending. One of the 5Cs is Collateral, similarly Vora (2001), advocates that, Collateralized debt obligation and assets backed securities can help banks to proactively manage their portfolio. Therefore, as shown on the above table, this study found that 62.5 % of the respondents say that,

DBE doesn‟t request collateral to finance a given project, only 37.5 % of the respondents reply as the bank request collateral to finance projects. Meanwhile, according to the interview I conduct with Ato Getachew, who is Chairman of Credit Approval Team at DBE, they doesn‟t request third party collateral, instead the bank held the financed project itself as collateral. Hence, we can say that DBE primarily rely on appraisal, in which the bank needs to work proactively in a way that could minimize the accumulation of bad loan in the bank.

Table 10. Do you consider the collateral as a secondary source of repayment?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	21	65.6	65.6	65.6
	I don't know	3	9.4	9.4	75.0
	No	8	25.0	25.0	100.0
	Total	32	100.0	100.0	

Table 10.Respondent's response on the degree of collateral

Source: Primary data

According to Rouse (1989), provision of security just provides secondary source of repayment and therefore to ensure sustained relations with customers in their business endeavors, it is pertinent to consider the viability of the project being financed to generate sufficient cash flows to liquidate the credit facility. Furthermore the foreclosure of immovable property pledged security goes through a long legal tussle, which could not easily bring prompt liquidity relief to a bank. Similarly Akakpo (1994) suggested that the view that security should always be the last consideration in any loan proposition and one should not lend purely because security is offered. Any loan proposition should stand on its own with the security only providing a cushion should things go wrong It is therefore very essential for banks to lay much premium on the viability of a project as a paramount consideration for lending financial support. In this regard as clearly seen on the above table, as high as 65.6 % of the respondents replied that despite DBE takes a financed project itself as a collateral, it considers it as a secondary source of repayment, meaning in order to appraise a given loan it primarily depend on the viability of the project. This idea further strengthened by the interview result. This implies that The Bank focuses on the viability of projects to sustain and generate sufficient cash flow to cover their debt, and we can say that DBE has a sound development financing practice that could give answer for investors to their

finance need and also this practice is suitable for developing nations, like Ethiopia, since it encourages investors to invest by filling the development financing gap without asking any extra collateral.

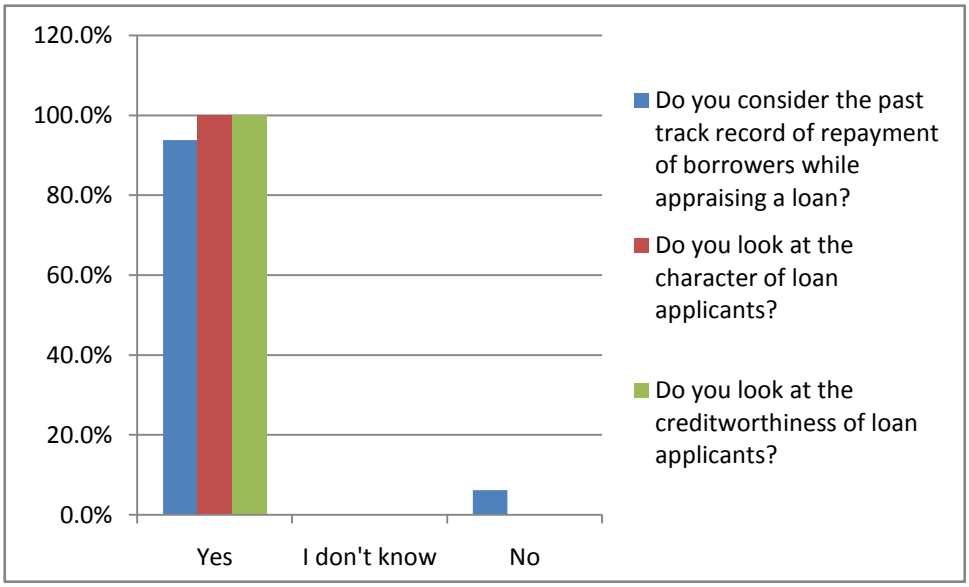


Figure 2. Bar Chart showing employees response on borrower's credit worthiness

Source: Primary data

According to Rose (1999) the question that must be dealt with before any other is whether or not the customer can service the loan that is, pay out the credit when due, with a comfortable margin of interest. (Ken brown, 2012) also says that "If you knew the individual better you might be more inclined to go with the lending decision". Based on this concept the researcher drafted various questions with similar concept to triangulate the respondent"s consistency in answering different questions with similar concept. Hence as shown on the above chart almost all the respondents including the interview result, shows that DBE usually assess loan applicant"s character, previous loan repayment record and their credit worthiness before it finance a particular project.

In this regard, DBE undertakes customer"s character and past track record assessment or what they call it "Customer due diligence" by means of:

- Reviewing different documents that are submitted by the loan applicants, like, Trade

registration, Tax payment clearance from ERCA, Audited financial statement of other business, the capital of the business.

- By asking the loan applicants to bring documents concerning their personal profile, like, certificate of participation in community services, letter of recognition from government bodies, by requesting academic report.
- By requesting NBE about loan applicants credit relationship and its status with other local banks and by using standard Credit information request format.
- DBE also requests Credit Information about borrowers from NBECIC by using their TIN.

Therefore, in terms of pre-lending assessment of borrower‟s character and credit worthiness we can say that DBE has a well-established work procedure that could protect the bank from further default due to borrower‟s misbehavior.

Table 11. Do you consider the leadership quality\Capacity of managers of the borrower company while appraising credit request?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	32	100.0	100.0	100.0

Source: Primary data

According to (King, 1967) one of the perspective to project appraisal is investigating the borrower company manager‟s capability that whether they are efficient enough to lead the project. In this regard as shown in table 11 above, 100% of the respondents say that DBE considers the borrower‟s company managers profile while appraising a credit request. And since the appraisal of management is an art not a science the investigator has to rely on her/his personal judgment and it is the most difficult one, but at DBE such a task is performed in a way that resembles to more of a scientific approach, in that, assessment of borrower company manager‟s capability is done through careful analysis of the document which is submitted to the bank at the time of credit request which shows the credentials and past experiences of borrower company managers. This implies that prior assessment of borrower company manager‟s capability will enable the bank to minimize credit risks and a possible future defaults that could result due to management inefficiency of borrower company.

Table 12. Do you periodically assess the credit quality of loan portfolio?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	32	100.0	100.0	100.0

Table 13. Do you periodically monitor financed projects?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	31	96.9	96.9	96.9
	I don't know	1	3.1	3.1	100.0
	Total	32	100.0	100.0	

Source: Primary data

According to (Kotoh, 2004), one of the important points for credit administration is monitoring of repayments as per credit terms and periodically reviewing the portfolio to make sure that the names tiered are still complying with the risk acceptance criteria. With regard to this as shown on table 12 above, 100% of the respondents say that DBE periodically assesses the credit quality of loans similarly in order to check respondents consistency in answering different questions with a similar concept another question were forwarded which has a similar concept and the response rate is almost the same in that as shown in table 13 above, 97% of the respondents say that DBE periodically monitors financed projects. Same question has also been forwarded to Ato Getachew, Credit Approval team Chairman at DBE, and he has given the same response as majority of the questionnaire respondents did. And the respondents also say that on monthly basis the bank prepares a report that shows the loan position of the borrowers and the loan portfolio of the sectors. This implies that DBE has good practice in this regard and help the bank to safeguard its resources closely and monitor the activities of the firms it lend to and in case of any signs of errors in decision making or operational shortcomings, corrective action can be taken earlier, hence it could help borrowers to get professional assistance from the bank and it intern is beneficial for the bank to properly manage credit risks in advance before it actually occurred.

Table 14. Do you look at the consumption behavior of a given product market before you finance a particular project

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	30	93.8	93.8	93.8
	No	2	6.2	6.2	100.0
	Total	32	100.0	100.0	

Source: Primary data

Credit is a process that starts from a market analysis and ends at the credit application approval in that industries with high potential of growth and industries that can be good business for the Bank are also listed (Kotoh,2004). As shown in the above table, the great majority that is 93.8% of the respondents says that DBE looks the availability of market for a particular product before it finance the production process. Hence we can say that this activity protects the bank from financing products which are not consumable in the market this in turn could save the bank for possible future defaults that may arise due to market loss of the financed products and this intern benefits the bank to minimize non-performing loan arrears that may arise due to market loss of financed projects.

Table 15. Do you look at the access to infrastructure before you finance a particular project?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	32	100.0	100.0	100.0

Source: Primary data

In order to make a given project to be functional, infrastructure is one of the basic necessities. As shown in table 15 above, 100% of the respondents say that an assessment of the availability of infrastructure is carefully done by DBE before financing a given project. This implies that DBE has good operation in this regard that could protect the bank from future loan default that may arise due to un functionality of projects as a result of infrastructural problem.

Table 16. Do you consider the availability of raw materials before financing a particular project?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	32	100.0	100.0	100.0

Source: Primary data

According to (King, 1967) the best questions to be asked in appraising the project from the commercial point of view are whether adequate arrangements have been made for buying the materials and services needed to construct facility, and when construction is finished for obtaining power, labor and raw materials to operate the plant. In view of this fact as shown in table 16 above, 100% of the respondents say that DBE usually considers whether the availability of raw materials needed for production is available or not, before financing a particular project. This shows that DBE has done well in this area and this practice can be considered as preventive measures to protect future loan defaults due to lack of raw materials for production.

Table 17. Do you require implementation plan of projects to appraise loan request?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	32	100.0	100.0	100.0

Source: Primary data

The Project Implementation Plan is a master plan that summarizes all of the individual tasks that needs to be performed to realize the project and as shown in table 17 above 100% of the respondents say that DBE request an implementation plan prior to financing a given project this implies that the bank"s credit operation of requesting an Implementation Plan prior to financing will possibly help the bank to see whether the project is realized or not in advance and this intern helps to minimize the risk of borrowers default that may arise due to implementation failure when the financed project is implemented.

Table 18. Does DBE have a credit risk management policy manual?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	31	96.9	96.9	96.9
	I don't know	1	3.1	3.1	100.0
	Total	32	100.0	100.0	

Source: Primary data

According to (Moles, 2012) every firm that has a credit department needs to have a credit policy manual to formalize its decision processes regarding the day-to-day management of credit decisions and the resultant collection challenges when accounts are slow to pay, or fail to pay amounts when due. The thinking behind creating a manual is to be able to recognize and detail policy on important credit risk management issues, and to insure consistent thinking and action on these issues by people engaged in credit risk management. In this regard as shown in the above table, 96.9 % of the respondents say that DBE has its own credit risk management manual, similarly during an interview I had with the credit approval team chairman he has confirmed that "DBE has its own credit risk management policy manual". Meanwhile (Moles, 2012) also stressed that, as a matter of good practice, firms should review the manual annually to insure that the procedures it details are up-to-date and reflect current thinking and practice. In view of this fact the researcher can discover that DBE doesn‟t review or update its credit risk management policy manual annually instead it review the manual as deemed they think is required and most of the time they amend the manual according to the changes in the policy requirement of the government. Based on the above facts we can say that DBE‟s effort of designing its own credit policy manual will enable the bank to provide decision rules and guidelines on important aspects of the credit granting process their management and it also will help them to solve collection challenges in advance. But, DBE‟s practice of reviewing its manual following changes in the policies of government shows that the bank is not doing proactively to tackle credit related challenges in advance.

Table 19. How is the bank currently disbursing loans?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Disburse in the three intervals by seeing the progress of the project	4	12.5	12.5	12.5
	Other	28	87.5	87.5	100.0
	Total	32	100.0	100.0	

Source: Primary data

Once the credit application satisfies all these conditions, a thorough analysis is done and if the application complies with the Bank's conditions, the loan will be disbursed. In this regard, as shown in table 19 above, DBE doesn‟t disburse the whole approved loan at a time instead as shown in the above table disbursement at DBE is made at various intervals based on various conditions such as:

- Based on the implementation schedule of the projects disbursement is made in different phases.
- Based on the nature of the projects disbursement could be done at various intervals
- Based on the type, implementation period and progress of the projects disbursement interval could vary.

Hence from the above finding we can say that since DBE doesn‟t request 2nd degree collateral or since its financing policy is70/30, ie. 70% of the project cost is from the bank and 30% of the project cost is from the borrower, making disbursement phase by phase or through careful assessment of the progress of the projects will enable the bank to minimize the possible credit risk that may arise from an intentional default of borrowers, hence this would be helpful to realize the project implementation this intern has a positive impact on in the achievement of loan performance.

Table 20. Does the bank consider the type of technology that would be in use in a given project, during appraisal?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	32	100.0	100.0	100.0

Source: Primary data

According to (Faria, 2002), an assessment of the technical viability of a project, appropriateness of production technology and availability of equipment are an essential component in credit risk

management that determines production capacity of any given firm and technologies produce impact on the production process. In line to this fact 100% of the respondents say that DBE usually takes a look on the type of the technology to be used in a given project, this implies that DBE is in good shape since technology has an impact on productivity which in turn has an implication on the borrowers efficiency in loan servicing.

4.5 Risk Transfer

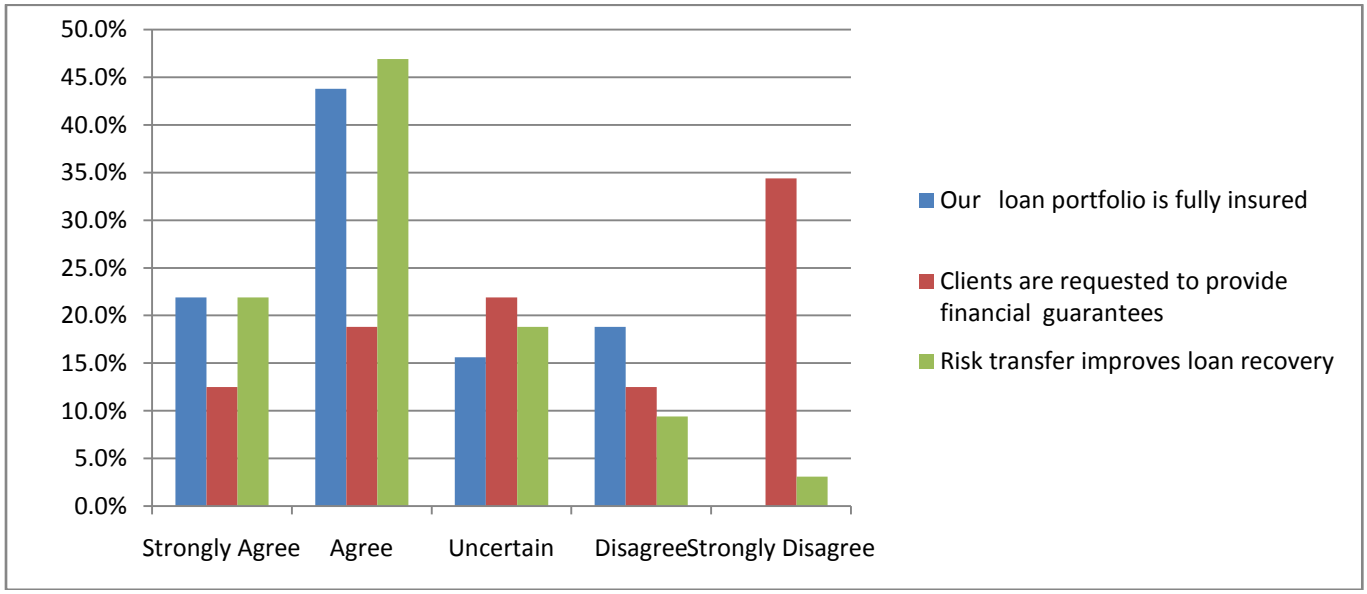


Figure 3. Bar Chart that showing respondent's response on risk transfer

Source: Primary data

Rule, (2001) pointed out that banks are exposed to various credit risks in the course of their business, and they can manage these risks in three ways, these are Risk Transfer, Retention and diversification. One of the means of arranging for another entity to take on the risk is through insuring portfolios. In this regard as shown in the above graph 65.6% of the respondents agree and/or strongly agree that DBE"s loan portfolios are insured where as a significant number of respondents that is 15.6% and 18.8% of the respondents are uncertain and disagree respectively with the full insurance coverage of DBE"s loan portfolios. This question has been asked for the credit appraisal team chairman and he has replied that "all the fixed assets of the financed projects are expected to be insured by the appropriate insurance policies by making DBE as a co beneficiary", but this insurance policy doesn"t protect the bank from possible default of borrowers it only protects the bank from a loss that may arise as a result of possible damage that

can happen on the fixed assets of the project due to fire and similar accidents that an insurance policy can cover the loss. This implies that despite the questioner is taken from employees that belong from one office there is some sort of paradox on their response and we can say that there is inconsistency of credit operation in this area at DBE. Similarly requesting financial guarantee is one of the means of transferring risk in this regard 32.2% of the respondents replied as they agree and/or strongly agree on the issue where as a significant amount of the respondents, that is 21.9%, 12.5% and 34.4% of the respondents replied as they are uncertain, disagree and strongly disagree with it. Hence from this we can conclude similar conclusion that there is inconsistency of credit operation in this area at DBE. This question was also forwarded to the Credit Appraisal team chairman and he has said that "since DBE financing policy is 70/30 we don"t ask any additional guarantee from the borrowers". This implies that DBE"s credit operation is encouraging for borrowers to invest in development projects, but unless and otherwise done carefully it is also very riskier for the bank because if a borrower is defaulted there is no any means of financial guarantee to recover back the loan.

4.6 Risk Diversification

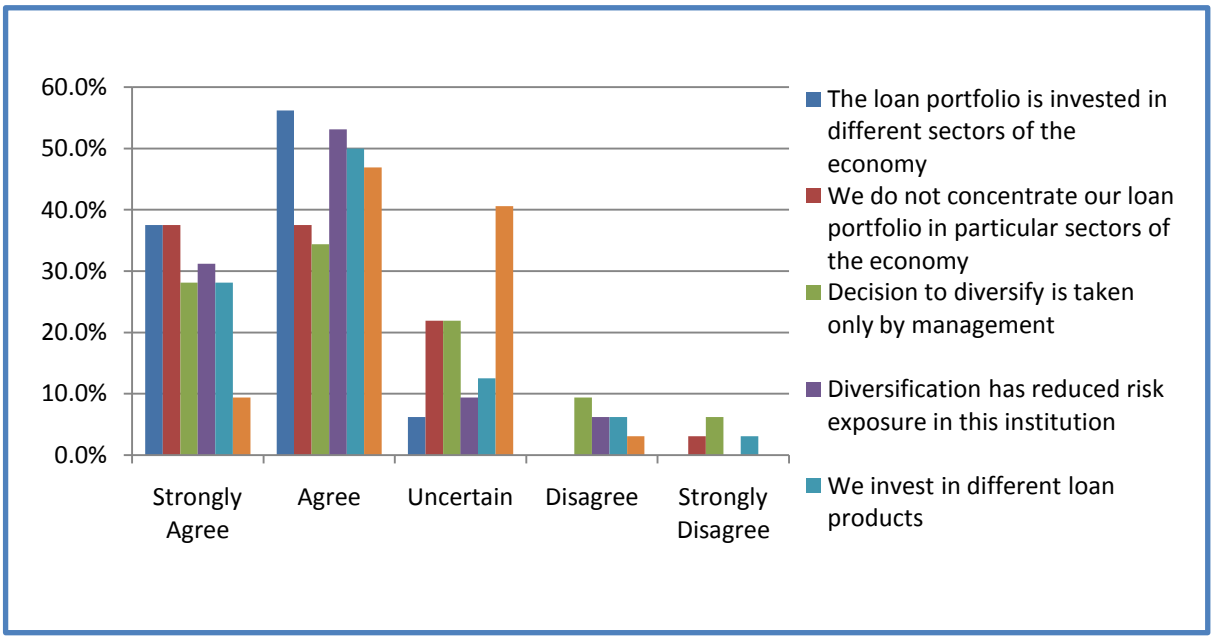


Figure 4. Bar Chart Showing respondents response on Risk Diversification

Source: Primary data

Brannan, (2000), argued that diversification is the primary tool for lenders to control borrower risk, and highlighted the fact that risks arise well before default occurs and it has been said by various authors that diversification is one of the risk management tools used in development finance institutions. In this regard I had forwarded various questions about the concept of diversification at DBE. As shown in the above chart a great majority of the respondents almost replied a positive response in that the respondents said that DBE tries to diversify its loan portfolio in to various economic sectors. This implies that DBE has a well done credit risk management operation in the area of diversification that could help the bank to achieve loan performance.

4.7 Risk Retention

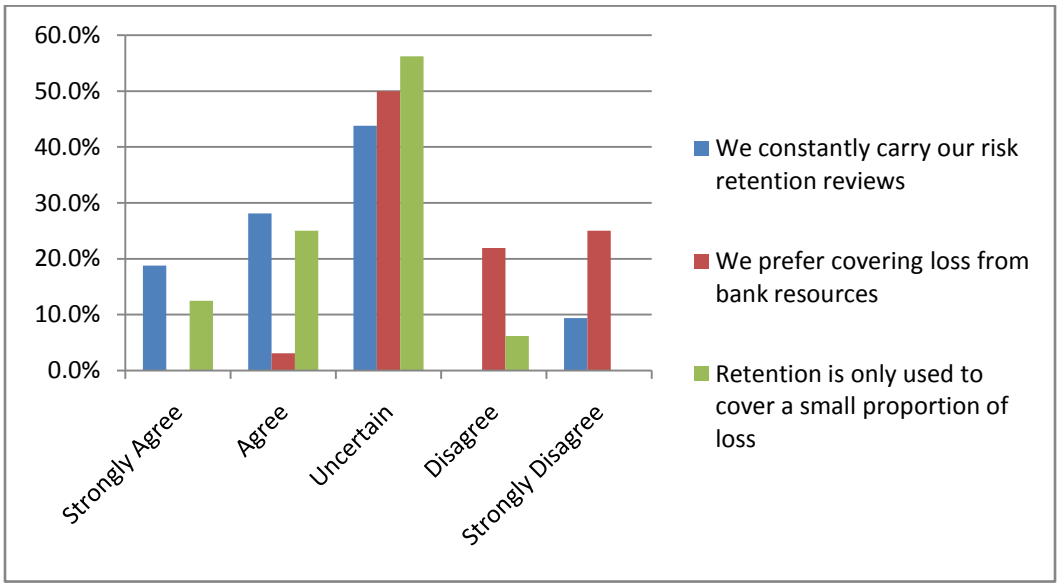


Figure 5. Bar Chart showing respondents response on Risk Retention

Source: Primary data

Risk retention analysis will help you decide how much risk you are able to retain which could be accomplished through risk rating models Amato et al, (2004). Gordy‟s, (2003) work shows that, knowing the right amount of risk to retain promotes financial efficiency. By the same token various questions with the concept of risk retention has been asked through questionnaire to DBE employees and as shown in the above chart there is a paradox of response among employee respondents on the issue of carrying out risk retention review, covering the whole losses from bank resource and covering only a small portion of loss through the bank‟s resource. From the above finding we can conclude that DBE has a deficiency in this area and it has to do far more in

the area of risk retention because, predicting the risk and building risk bearing capacity denotes a bank‟s ability to cover the risks by means of available financial funds, in case risks take effect, the resulting loss should be absorbed by these fund.

FINDINGS OF KEY INFORMANT INTERVIEW

Some of the findings that are obtained through an interview but has similar concept with the questionnaires has been discussed in line with the findings of the questionnaires and this section presents interview findings that were not discussed along with the findings of questionnaire.

About the overall project approval process of DBE;

It is true that the individual steps in the process and their implementation have a considerable impact on the risks associated with credit approval in this regard according to Ato Getachew, (Credit Approval team Chairman), DBE has a multi-level approval process in that when a borrower request a loan it will contact the credit process department first and in this department customer due diligence is made as part of KYC and the borrower provide all necessary documents to this department, hence when the borrower qualify and fulfill all the necessary pre requisites this department forwards the customer‟s request along with the supporting documents to the Appraisal department, here a thorough analysis of the customers documents will be made. If they found something is missed they will contact the credit process department, by no means an appraisal team can contact the borrower directly, then after this an appraisal department will compile and generate an appraisal report and this report is send to the credit approval team for final approval. The approval team will also evaluate the appraisal team report based on four dimensions;

1. Tax payment capacity of the financed project.
2. Employment creation capacity of the financed project.
3. The repayment capacity of the financed project.
4. The foreign currency generation capacity of the to be financed project,

and puts its final say. Hence, from the above process we can say that the four dimensions that the credit approval team follows are vital enough for the development of a country, and the credit process at DBE is also ideal in terms of its work flow design specially in minimizing defaults that could occur due to rent seeking activities made by credit analysts and credit approvers and the student researcher believes the overall process is sound in bringing about loan performance.

Financing Decisions by DBEs approval team

As per the credit approval team chairman of DBE, the credit approval team is comprised of 5 individuals that have well developed experience from different disciplines like Economics Engineering and finance having this in mind having a consensus of all the members of the approval team is not mandatory to finance a given project instead if 3/5 of the team approves, the financing will be made but those members who have an objection will write their justification of denial on the document that is presented to approval, hence, from this the student researcher looks a loop hole for default, because if a member that has an engineering background object the financing from an engineering point of view, say if she/he suspect that some technical gap will happen during production, but others still approves, it will possibly be a disaster for the bank and it will make the credit appraisal process not to be effective in bringing about loan performance.

DBEs Strategy to make borrowers eager for settlement of debt

As a means of bringing loan performance and minimizing risks, the student researcher believes that some mechanism has to be adopted by banks in order to make borrowers more eager to settle their loan on a timely manner, such as, interest rate discount, providing priority for future loan requests and providing priority for their request other than credit, say FX services. In this regard according to Ato Getachew, DBE has done nothing to reward those customers who have a good track record of loan repayment, and make other borrowers to be eager to settle their loan. Hence we can say that DBE has done nothing in providing positive and proactive incentive methods that could positively encourage borrowers to strive in settling their debit and minimize credit related risks, instead it focuses on the conventional and traditional methods of realizing debits.

Loan buyout services at DBE

DBE has been buying out project loans which were extended by other local banks, if the loan of the project is under the jurisdiction of the government priority areas. And the finding of the interview also reveals that majority of the loans that DBE buys out were sick loans, hence due to this it has been contributing its part for the accumulation NPL at DBE. This implies that, Loan buy out has been one of the factors that has created the accumulation of Bad loans at DBE for the stated period in the problem statement part of this study. But, since April 2013, the bank has issued an internal policy which restricts buying out loans that were extended by other banks

Government intervention on appraisal and/or Approval of projects at DBE

Since DBE is a government owned institution there might be some pressure on individuals that undertakes the feasibility analysis of a given project, and having this in mind I had forwarded the above question to the respondents of this research, but the result of the interview reveals that, both the appraisal and approval team members replied as if there is no any political push from the government officials towards the approval of a given project at DBE,

Accumulation of NPL at DBE beyond the set threshes hold of NBE

Majority of the credit appraisal process were designed and implemented in a good fashion, despite this there exist a large amount of NPL at DBE and as per the interview result Most projects appeared at NPL list due to implementation problem that arises as a result of lack of foreign currency to buy materials which are mandatory to make the project functional or due to power shortage. For example during appraisal a given project is scheduled or structured to start operation after a year and the bank expects repayment of loan as soon as the project begins production, but due to lack of foreign currency to import necessary materials or due to shortage of power the implementation of the project becomes delayed by two years, hence this loan becomes doubtful and reported as NPL. Hence in terms of its age this loan is NPL, but when we see its implementation cycle its regular,

Capacity building at DBE

As part of staffs capacity building program every employee is given the necessary in house and outsourced trainings both locally and in foreign countries so as to enable them to be more competent and proactive in analyzing the very dynamic business world, hence this will make the bank to achieve loan performance by minimizing errors that could emanate from inefficiency of staffs.

CHAPTER FIVE

5. SUMMARY, CONCLUSION AND RECOMMENDATION

5.1 SUMMARY

This study makes an assessment on the credit appraisal and the credit risk management practices of Development Bank of Ethiopia (DBE)

This was carried out by analyzing the appraisal and the credit risk management process of the bank against the background that whether DBE‟s appraisal and credit risk management system can be responsible for the bad loan portfolios that are accumulated as non-performing.

The descriptive survey method was used for the study. Questionnaire were drawn from all ,that is, 32 members staffs of DBE with a direct credit related function, and data were also taken from the Credit approval team chairman of DBE by undertaking a key informant interview with him.

The two main sources of data used for the study were, primary and secondary sources of data. Questionnaires were used as the main instrument to collect the primary data on appraisal and credit risk management practice of DBE.

5.2 CONCLUSION

This part presents the conclusion of results presented in chapter four, in line with the objectives of the study.

- DBE extends credit to credit worthy borrowers and projects that have passed a thorough appraisal and found to be financially and economically viable and socially desirable in terms of
    - Tax payment capacity of the project.
    - Employment creation capacity of the project.
    - The repayment capacity of the project.
    - The foreign currency generation capacity of the project.

It is found that DBE has a sound credit appraisal process that range from Document receiving up to disbursement. Specially DBE‟s work process of development financing is designed in a way that protect contact between the appraisal team and borrowers which the results of the study founds it as an ideal work process to minimize fraud that could occur due to an intentional rent seeking activities among credit analysts and borrowers and based on the

research findings we can concludes that the overall appraisal process is sound and appropriate enough in bringing about loan performance.

- After the appraisal is made a loan has to be approved and according to the research findings loan approval is made by an approval team which is composed of 5 individuals that have well developed experience from different disciplines like Economics Engineering and finance and a consensus of all the members of the approval team is not mandatory to finance a given project instead if 3/5 of the team approves, loan disbursement will be made, hence, on this activity of DBE there is a loop hole for default on credit approval process and it will make the credit appraisal process not to be effective in bringing about loan performance.
- DBE has its own credit risk management policy manual and the research findings can discover that DBE doesn‟t review or update its credit risk management policy manual annually instead it review the manual when there is a changes in the policy requirement of the government. From this the researcher concludes that DBE is not doing proactively to tackle credit related challenges in advance.
- The findings of the questionnaire and the interview show that DBE doesn‟t request third party collateral, meaning in order to finance a given project it primarily depend on the viability of the project itself, which is consistent with DBE‟s financing policy of 70/30.Furthermore, disbursement at DBE is made at various intervals based on various conditions, from these findings the we can conclude that DBE has a sound development financing practice that could be suitable for developing nations, like Ethiopia, because it encourages investors to invest by filling the development financing gap without asking any extra collateral. And making disbursement at various intervals will enable the bank to minimize the possible credit risk that may arise from an intentional default of borrowers, hence DBE has a well done operation in this regard that could have a positive impact in the process of achieving loan performance.
- DBE‟s practice of making proper follow-up on financed projects and preparing a report on monthly basis which show the loan position of each borrowers and the loan portfolio of sectors is a sound tool to manage risks in advance and it is a good practice that could benefit both the borrowers and the bank.

- DBE has been giving loan buy out services to borrowers, but, with the issue of loan buy out there existed a problem due to the fact that majority of the loan buy outs were sick loans, and the findings of this research reveals that despite DBE currently ceased buying out loans from other local banks, loan buy out was one of the reason for the accumulation of NPL at DBE for the stated periods in the statement of the problem of this research.
- The other possible reason for the accumulation of bad loan at DBE is implementation problem, which arise due to lack of FX (foreign Currency) and power shortage.
- Considering the findings from the empirical research undertaken by NBE (2009), majority of the banks have policies, programs and procedures related to risk management and they review it annually every two year of every five year, and it is in line with the finding of this study except the fact that DBE reviews it‟s manual as deemed necessary.
- The results of the empirical evidence on Barclays Bank of Uganda shows that the bank doesn‟t make proper follow-up on customers and it lacks credible source of information on borrowers in that, during appraisal it relied primarily on information provided by customers about their previous borrowing history. Whereas this study finds that DBE has a proper credit follow-up and it primarily acquire information about borrowers previous history from NBE credit information center, this deviation might happened due time gap of the two studies
- The empirical evidence acquired from Brazil concludes as BNDES; provide more capital to firms with political connection. Which is contrary to the findings of this paper, the results of this study imply as there is no any political push towards the approval/financing of a given project at DBE. This difference might happened due to methodological difference employed to acquire data or DBE employees may not respond accurately to such kind of questions due to the fact that they may assume as negative responses will put their job security in danger.

Finally, the general objective of the study was to assess the loan appraisal and credit risk management practice of Development Bank of Ethiopia, and the findings indicate that DBE has a good Appraisal practice. And except the issue of diversification in which the respondents response shows a positive result, DBE‟s credit risk management practice, in area of risk transfer and retention is weak, hence these weak credit risk management practice of

the bank in line with the loan buy out services and implementation drawbacks were responsible for the accumulation of Nonperforming loans in the bank.

5.3 RECOMMENDATIONS

Based on the findings of this study, the following recommendations are suggested.

- DBE should work closely with projects which are under implementation and give the necessary support like that of providing priority in FX(Foreign Currency) permit and it should also communicate and work with the concerned government organ so as to alleviate power shortages and make the these projects operational. Furthermore, DBE should communicate with NBE and restructure the loan repayment time of such projects so as to pull out such projects from the NPL list of the bank.
- Considering the positive response on the loan appraisal practice of DBE, it is important for the bank to further strengthen the appraisal process/ procedures and revising the appraisal process every time in a way that could identify and analyze all loss exposures in advance.
- DBE needs to check and revise its credit approval system since the finding of this research shows as there is a loop hole in credit approval practice of the bank.
- Despite the fact that DBE has credit risk management policy manual, the finding of this research shows that, there is also lack of continuous review of this manual, hence DBE needs to review and amend its manual every time in a way that could proactively tackle credit related risks.
- The study also revealed that there is a paradox of response among employee respondents on DBE‟s credit risk management practice; hence the bank needs to work on its credit risk management practices.

5.4 AREAS FOR FUTURE RESEARCH

This study was only focused on development Bank of Ethiopia, majored on the assessment of credit appraisal and credit risk management practices of development finance institutions. However, it could be expanded to cover other commercial banks and Micro finance institutions in Ethiopia. Furthermore the findings of this study are somewhat different with that of the findings of the empirical literature especially on the issue of political involvement to finance projects; hence other researchers can do more on this issue by using a different methodology.

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