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ASSESSMENT OF LOAN QUALITY: EVIDENCE FROM LISTED BANKS

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A Thesis submitted to the Institute of Distance Learning Kwame Nkrumah University of Science and Technology in partial fulfilment of the requirements for the degree of Commonwealth Executive Master Of Business Administration

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DECLARATION

I hereby declare that this submission is my own work towards the Commonwealth Executive Master of Business Administration (CEMBA) and that, to the best of my knowledge, it contains no material previously published by another person nor material which has been accepted for the award of any degree of the university, except where due acknowledgement had been made in the text.

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ABSTRACT

The study sought to assess the loan quality of listed banks in Ghana as well as the contribution of credit underwriting and administration to loan quality. Credits are given out with the hope of receiving principal as well as interest. The liberalization of the Ghanaian banking sector though the Financial Sector Adjustment Program (FINSAP) has led to the influx of foreign banks and the surfacing of some local banks over the last decade, which has brought with it significant growth in the size of non-performing assets and increasing rate of credit default by debtors. The problem of persistent loan default among businesses has become a most important and serious issue that has attracted the attention of bankers, financial market operators, international lending institutions such as the World Bank and policy makers in developing countries. It is in this regard that the researcher intends to assess loan quality of banks and also find out the contribution of credit underwriting on credit quality. The study used both primary and secondary sources of data. The research focuses on six banks in Ghana; namely CAL, SG-SSB, EBG, GCB, HFC and SCB. An overall cronbach alpha of 0.7562 for all variables as shown in table 4.1 indicates that the attributes representing credit origination and administration are strongly reliable in representing the construct. Apart from testing the reliability of the measurements, the factor analysis also helps check over-parameterization and multicollinearity. The results show that though banks continues to show impressive financial performance, their asset quality continue to deteriorate. Reasons for the deterioration were mixed based on questionnaire and interviews conducted with credit officers of these banks. Lastly, it was established that credit origination and administration has contributed greatly to minimize information asymmetry, though risk is still high among SMEs who form a larger chunk of bank customers. Following from the above, it is highly recommend that bank's should ensure strict adherence to credit policies, closely monitor loan especially problem loans as well as provide adequate training for its employees. . It is recommended that that credit origination and administration processes put in place by the banks should be reviewed periodically to minimise asymmetric information between banks and their clients, thereby reducing moral hazards in the banking industry.

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LIST OF ABBREVIATIONS

1. CAL BANK - Cal Bank Limited
2. SG-SSB - Societies General-SSB
3. SCB - Standard Chartered Bank Limited
4. GCB - Ghana Commercial Bank Ltd
5. EGB - Ecobank Ghana Limited
6. HFC - HFC Bank
7. UT - UT Bank

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DEDICATION

To my families Mr. and Mrs. Tetteh, Mr. and Mrs. Anyagre and mine siblings, Pamela, Joel, Maxwell, Phillip, Emmanuel, Samuel, Prince and Michael and to my best friend Gideon Aboagye

I love you all.

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My ultimate gratitude goes first and foremost to the Almighty God without whose guidance and mercies I wouldn't have had the strength and capability to come to this successful end.

Secondly, my heartfelt appreciation goes to my able supervisor Mr. Jonathan Welbeck who has been very co-operative right from the onset of this project to the very end. I am greatly indebted to my supervisor, who devoted valuable time to guide this work and placing at my disposal his splendid academic judgment, firmness, thoroughness and unusually fine research talents which were of enormous assistance in bringing this study into a final coherence and cohesion.

CHAPTER ONE

1.1 Introduction

The introductory chapter of this research will be composed of, background of the research, research problem, research objectives, research questions, significance of the research, scope and limitations of the research, and the organization of the research.

1.2 Background of the Study

The term credit has various applications to transactions that involve borrowing. Credit can be used in reference to the ability to postpone payment, as in the case of an individual who has credit with a local store that allows purchase of items and settlement of account due once a month. An individual might also be extended a credit line, which is an agreement between a bank and a borrowing indicating the maximum amount of money that a lender will put at a borrower's disposal. In such case, an individual enters into an agreement for the taking out of a series of loans. Since there is a fixed limitation on the amount to be borrowed, payments must be made to reduce the debt incurred when the maximum is reached. Credit is granted based upon a person's character, reputation, and business standing regarding his or her financial reliability. Credit is the provision of resources (such as granting a loan) by one party to another party where that second party does not immediately pay the first party for the resources in full, thereby generating a debt, and instead arranges either to pay for or to return those resources (or equivalent value) at a later date. The first party is called a creditor, also known as a lender. The second party is called a debtor, also known as a borrower.

Credit administration is a critical element in maintaining the safety and soundness of a bank. Once a credit is granted, it is the responsibility of the business function, often in conjunction with a credit administration support team, to ensure that the credit is properly maintained. This includes keeping the credit file up to date, obtaining current financial information, sending out renewal notices and preparing various documents such as loan agreements. Whereas credit origination is the process by which a borrower applies for a new loan and a lender processes that application. Origination fee generally includes all the steps from taking a loan application through disbursal of funds (or declining the application). Loan servicing generally covers everything after disbursing the funds until the loan is fully paid off. Loan origination is a specialized version of new account opening for financial services organizations. Any movement of financial capital is normally quite dependent on credit; (Wray 2003), which in turn is dependent on the reputation or creditworthiness or the entity which takes responsibility for the funds. Banking crisis throughout the world draw conclusions that the major cause of failure of banks has been poor asset, primary loan quality (Peter & Sylvia, 2008). Granting of credit depends on the confidence the lender has in the borrower credit worthiness. Generally defined as a debtor's ability to pay, credit worthiness is one of many factors defining a lender's credit policies. Creditors and lenders utilize a number of financial tools to evaluate the credit worthiness of a potential borrower. Much of the evaluation relies on analyzing the borrower's balance sheet, cash flow statements, inventory turnover rates, debt structure, management performance, and market conditions. Creditors favour borrowers who generate net earnings in excess of debt obligations and contingencies that may arise.

1.3 Statement of the Problem

Effective and efficient credit portfolio management is expected to yield high returns for a bank. Credit portfolio management involves credit origination, credit appraisal, credit disbursement and credit management and monitoring. Due to the competitive nature of the Ghanaian banking industry with banks targeting the unbanked sectors of the economy resulting in high non performing loans (Bank of Ghana annual bank review).The liberalization of the Ghanaian banking sector though the Financial Sector Adjustment Program (FINSAP) led to the influx of foreign banks and the surfacing of some local banks over the last decade, which has brought with it significant growth in the size of non-performing assets and increasing rate of credit default by debtors (borrowers). (Source: bank of Ghana, 2006). This problem may be due to increasing competition in the banking and non-banking industry. Increased competition erodes the surplus that banks can earn by identifying high risk borrowers. The increased competition has forced banks to reduce their credit underwriting processes of potential borrowers, which is likely to affect the soundness and stability of the banking industry. The study therefore intends to assess the contribution of credit origination and administration to overall loan performance.

1.4 Research Objectives

The main objective of the study is to assess to loan quality of listed banks.

Specific objectives of the study include the following:

1. To assess the financial performance of selected banks
2. To assess the loan quality of the selected banks over the period.
3. To ascertain the contribution credit underwriting and administration on credit quality.

1.5 Research Questions

1. Are the selected banks performing?
2. What is the trend in the loan quality of these banks?
3. What are the contributions of credit underwriting on credit quality?

1.6 Brief Research Methodology

All the banks listed on the Ghana Stock Exchange were used for the study. These are, CAL, SG-SSB, EBG, GCB, HFC, UT and SCB. However UT Bank had just joined the Ghana Stock Exchange and had not existed for more than 10years thus was not used for the study. These financial institutions were used because of their long years of providing loans and are among the leading banks in the country as at 2010 (Bank of Ghana).

1.6.1 Data Sources

For primary data:

1. Interviews with selected bank personnel were conducted based on convenience sampling technique because of their busy schedules. The mode of interview was personal (face to face) and telephone for contribution of unclear responses.
2. Questionnaires were administered to the bank personnel personally and also through mail (postal, e-mail) were necessary, and be given time to answer in order not to disturb their schedules of work. One (1) questionnaire was administered to each bank management/staff. Questions asked through the administering of questionnaire were largely base on credit management.

The secondary data was collected from

1. Internal records of the company e.g. Profit and loss statement, balance sheet, previous research reports relating to the topic under research.

1.6.2 Data Analysis

Financial ratios from the secondary data were used to establish the trend of the credit quality ratio, total loans and advances, provision for credit losses of each. Bank for the past ten (10) years (2000-2010) in the form of line graph and bar graph, and also help in forecasting. Descriptive statistics was used. Credit quality was measure by NPL/TL (non-performing loans divided by total loans and advances of each year).

1.7 Significance of the Research

The study will afford banks and stakeholders the opportunity to understand core challenges facing banks in Ghana. This could also inform stakeholders what the underlying causes to these challenges are and how they have denied these banks from achieving stated objectives. Besides, results of this study may be of great importance to regulatory bodies such as the Bank of Ghana, particularly in the policy formulation. The findings from this research would benefit both lenders and borrowers. Instead of using subjective evaluation decision-rules, which are bias and unreliable, lenders can apply an objective evaluation technique with a standard process and criteria to appraise their customers credit risks and creditworthiness. A good credit management tool can effectively control risk selection, manage credit losses, evaluate new loan programmes, improve loan approval processing time, and ensure that existing credit criteria are sound and consistently applied. The findings of the study will contribute to literature and existing knowledge related to asset quality of banks. It is also hoped that interesting and challenging issues that will be revealed by the study may encourage further academic study in the field.

1.8 Scope and Limitations of the Research

The study was limited to a few listed and unlisted licensed banks in Ghana.

1.9 Organization of the Research

The organization of this study will be as follows: Chapter one will elaborate on the introduction of the research that is the background of the research, the research problem, the objectives of the research, the research questions, the significance of the research, scope and limitations of the research, and the organization of the research.

Chapter two will review the existing literature in relation to the topic with the view to providing a contextual framework for the rest of the work. Chapter three will provide details about the methodology to be used in this study and sufficiently describe the data to be used. Chapter four will centre on the Analysis of data and the explanation of results.

Finally, chapter five will focus on drawing of conclusions and statement of recommendations.

CHAPTER TWO

LITERATURE REVIEW

2.1 Introduction

This section of the dissertation reviews relevant and related literature on the subject matter. The purpose of this chapter is to examine secondary sources of data relevant to the topic such as academic papers, articles, journals, etc and to set the tone for the background of this report.

2.2 Credit Underwriting and Administration

2.2.1 Credit Underwriting/Origination

Credit Origination is the process by which a borrower applies for a new loan, and a lender processes that application. Origination fee generally includes all the steps from taking a loan application through disbursal of funds (or declining the application). Loan servicing generally covers everything after disbursing the funds until the loan is fully paid off. Loan origination is a specialized version of new account opening for financial services organizations. Certain people and organizations specialize in loan origination, with mortgage brokers and other mortgage originator companies serving as a prominent example. A Loan Origination Fee is often required and this is one of the legal / approved fees required of borrowers. No other fee is expected from the borrower fee because it covers the originating and conclusion of the loan application.

2.2.2 Credit administration

Credit administration is a critical element in maintaining the safety and soundness of a bank. Once a credit is granted, it is the responsibility of the business function, often in conjunction with a credit administration support team, to ensure that the credit is properly maintained. This includes keeping the credit file up to date, obtaining current financial information, sending out renewal notices and preparing various documents such as loan agreements. Given the wide range of responsibilities of the credit administration function, its organizational structure varies with the size and sophistication of the bank. In larger banks, responsibilities for the various components of credit administration are usually assigned to different departments. In smaller banks, a few individuals might handle several of the functional areas. Where individuals perform such sensitive functions as custody of key documents, wiring out funds, or entering limits into the computer database, they should report to managers who are independent of the business origination and credit approval processes.

2.2.3 Credit Administration development

In developing their credit administration areas, banks should ensure:

1. The efficiency and effectiveness of credit administration operations, including monitoring documentation, contractual requirements, legal covenants, collateral, etc.

2. The accuracy and timeliness of information provided to management information systems;

3. The adequacy of controls over all "back office" procedures; and

4. Compliance with prescribed management policies and procedures as well as applicable laws and regulations.

For the various components of credit administration to function appropriately, senior management must understand and demonstrate that it recognises the importance of this element of monitoring and controlling credit risk. The credit files should include all of the information necessary to ascertain the current financial condition of the borrower or counterparty as well as sufficient information to track the decisions made and the history of the credit. For example, the credit files should include current financial statements, financial analyses and internal rating documentation, internal memoranda, reference letters, and appraisals. The loan review function should determine that the credit files are complete and that all loan approvals and other necessary documents have been obtained. Banks need to develop and implement comprehensive procedures and information systems to monitor the condition of individual credits and single obligors across the bank's various portfolios. These procedures need to define criteria for identifying and reporting potential problem credits and other transactions to ensure that they are subject to more frequent monitoring as well as possible corrective action, classification and/or provisioning. An effective credit monitoring system will include measures to:

(i) Ensure that the bank understands the current financial condition of the borrower or counterparty;

(ii) Ensure that all credits are in compliance with existing covenants;

(iii) Follow the use customers make of approved credit lines;

(iv)Ensure that projected cash flows on major credits meet debt servicing requirements;

(v) Ensure that, where applicable, collateral provides adequate coverage relative to the obligor's current condition; and

(vi)Identify and classify potential problem credits on a timely basis.

Specific individuals should be responsible for monitoring credit quality; including ensuring that relevant information is passed to those responsible for assigning internal risk ratings to the credit. In addition, individuals should be made responsible for monitoring on an ongoing basis any underlying collateral and guarantees. Such monitoring will assist the bank in making necessary changes to contractual arrangements as were as maintaining adequate reserves for credit losses. In assigning these responsibilities, bank management should recognize the potential for conflicts of interest, especially for personnel who are judged and rewarded on such indicators as loan volume, portfolio quality or short-term profitability. An important tool in monitoring the quality of individual credits, as well as the total portfolio, is the use of an internal risk rating system. A well-structured internal risk rating system is a good means of differentiating the degree of credit risk in the different credit exposures of a bank. This will allow more accurate determination of the overall characteristics of the credit portfolio, concentrations, problem credits, and the adequacy of loan loss reserves. More detailed and sophisticated internal risk rating systems, used primarily at larger banks, can also be used to determine internal capital allocation, pricing of credits, and profitability of transactions and relationships. Typically, an internal risk rating system categorizes credits into various classes designed to take into account the gradations in risk. Simpler systems might be based on several categories ranging from satisfactory to unsatisfactory; however, more meaningful systems will have numerous graduations for credits considered satisfactory in order to truly differentiate the relative credit risk they pose. In developing their systems, banks must decide whether to rate the riskiness of the borrower or counterparty, the risks associated with a specific transaction, or both. Internal risk ratings are an important tool in monitoring and controlling credit risk. In order to facilitate early identification, the bank's internal risk rating system should be responsive to indicators of potential or actual deterioration in credit risk. Credits with deteriorating ratings should be subject to additional oversight and monitoring, for example, through more frequent visits from credit officers and inclusion on a watch list that is regularly reviewed by senior management. The internal risk ratings can be used by line management in different departments to track the current characteristics of the credit portfolio and help determine necessary changes to the credit strategy of the bank. Consequently, it is important that the board of directors and senior management also receive periodic reports on the condition of the credit portfolios based on such ratings. The ratings assigned to individual borrowers or counterparties at the time the credit is granted must be reviewed on a periodic basis and individual credits should be assigned a new rating when conditions either improve or deteriorate. Because of the importance of ensuring that internal ratings are consistent and accurately reflect the quality of individual credits, responsibility for setting or confirming such ratings should rest with a credit review function independent of that which originated the credit concerned. Banks should have methodologies that enable them to quantify the risk involved in exposures to individual borrowers or counterparties.

2.3 Credit Risk

Banks should also be able to analyze credit risk at the portfolio level in order to identify any particular sensitivities or concentrations. The measurement of credit risk should take account of:

(i) The specific nature of the credit (loan, derivative, facility, etc.) and its contractual and financial conditions (maturity, reference rate, etc.);

(ii) The exposure profile until maturity in relation to potential market movements;

(iii) The existence of collateral or guarantees; and

(iv)The internal risk rating and its potential evolution during the duration of the exposure.

The analysis of credit risk should be undertaken at an appropriate frequency with the results reviewed against relevant limits. Banks should use measurement techniques that are appropriate to the complexity and level of the risks involved in their activities, based on robust data, and subject to periodic validation.

2.4 Credit Appraisal

The business of the bank has involved from the seventeenth century to today where there is innovations and the use of high technology in banking. The first bank to the established in Ghana is the Standard Bank of Ist Africa, now known as Standard Chartered Bank. Currently there are about twenty-seven banks in the country. Banks initially started as deposit takers and soon matured into intermediates of funds (moving funds from surplus units to deficit units) thereby assuming risk (Naughton et al 2003). Credit appraisal is as old as the act of borrowing itself, much as their essences remain the same from bank to bank, its processes vary. The area of credit assessment has become an area of renewed interest for academics, regulatory authorities, financial intermediaries themselves. This renewed interest is justified by the financial crisis in the 1980's and 1990's. For example, the U.S S&L crisis with an estimated cost in hundreds of billions of dollars or the fact that from 1989-1992, the Nordic countries injected around 16 billion dollars into their financial system in other to keep them away from bankruptcy. Japan's bad loans are estimated to be in the range of 160-240 billion dollars in October, 1993. According to Basu & Rolfes (1995), the ability of a bank to manage credit risk effectively and efficiently is the foundation upon which the success of a bank is built. Loans comprise a very large portion of banks total asset and form the back bone of the banks structure, Hardikar and Bedi (2001). Hence credit appraisal is key if banks and for that matter nations want to succeed, ensuring quality of loans is vital thus the need for the credit appraisal. One of the tools banks use to manage risk inherent in loans they grant is by use of credit policy. (McNaughton et al 1992) refers to credit policy as the "decision made in advance."

2.5 Credit Policy

The credit policy is the statement of basic principles and standards that govern the extension and administration of credit. Loans granted must meet standard policy. The policy statement sets out the bank's lending philosophy and specifies procedures and means of monitoring lending activity. It serves as a guide and focus to the bank's lending activity (Duesenbury, 2003).

Credit policy statement component include;

1. Legal consideration; the legal binding limit of lending operations are clearly spelt out to avoid any variation of regulations.

2. The maximum size if the portfolio in relation to the size of deposit, capital or some other benchmark.
3. The loan portfolio makes; that is the type of loan the bank will or will not make and the amount involved in each type of loan. The mix also includes the combinations of various types of loans.
4. The credit policy also sets limit on the delegation of authority to loans officers, combinations of various types of loans.
5. Pricing of loans facility is also a factor that is taken into consideration in a credit policy. This ensures that the bank gets commensurate compensation for the cost of funds it lends out and the risk those funds are exposed to.
6. The credit policy spells out the qualitative standards for acceptable credits. Acceptable loans usually include the primary functions to grant short term loans to firms customers in the catchment area to the extent that resources and opportunities permit. These conditions also apply to collateral.
7. The credit policy needs to address quality issues and the liquidity of the portfolio, but foremost are the deposit mix and the liquidity of other assets.

A good loan administration set up is therefore needed to see to it that the policy is informed and that proper procedures are put in place and adhered to.

2.6 Types Of Credit Underwriting Models

Banks in Ghana classify loans according to the purpose for which they are made, these types of loans are; Personal loans, small and medium enterprise loans, corporate loans and government loans. Irrespective of the type of loan, a critical analysis of the credit worthiness of the loan applicant is needed, especially the financial statement on both secure and unsecured corporate loans. This gives the lender a better understanding of the basis for valuing the assets, particularly inventory.

2.6.1 Judgement Model

This is basically a model that evaluates a debtor based on value judgment on various indicators of risk associated with the potential borrower.

The major demerit of this model is that it does not take cognizance of any Iighted mathematical computation of risk of default.

2.6.2 Credit Scoring Model

The credit scoring model identifies various indicators of default, evaluates each indicator independently and grades the indicator with a percentage score.

The process is repeated for each the other indicators identified. Finally the score of the individual indicators are aggregated to arrive at a Iighted score representing the total risk level of the borrower.

2.6.3 Portfolio Model

Credit statement starts with the credit policy statement of the bank in question, since the composition and quality of a bank's loan portfolio is a direct reflection of its policy.

2.7 Appraisal Framework

Banks take pains to assess the credit worthiness of loan applicants in terms of consumer loans using the following frameworks;

2.7.1 CAMPARI

C (Character); the character of the borrower is of great importance to the bank because a banker would not like to lend to a compulsive gambler, nor to a drunkard. The lender must assess whether the borrower is someone who would be committed to paying the facility back. The background and experience of the individuals or business can be an indicator to the potential for success. This includes integrity, past performance, and evidence of financial acumen. A banker will initially look at the character of their customer and ask some question. Some of the questions asked is; is this person of honesty and integrity? How long have they been a customer? Has there been a good working relationship? Other questions are, if the customer is new, why is he approaching us? Can the bank use bank statements to assess the conduct of the account? How reliable is the customer's word as regards the details of the proposition and the promise of repayment? Does the customer make exaggerated claims that cannot be supported or is he modest? Is his track record good and did he pay any previous borrowing with ease?

A (Ability); this is similar to character but relates to borrower's aptitude in managing financial affairs.

In the case of business customers, the Bank would like to know whether there is a good spread of skills amongst management, and whether they hold relevant professional qualifications. The bank would also be concerned about whether management has experience in the relevant area they want to embark on. What key skills does the organization's management possess for the proposal presented? Are there areas of weakness in the management team? Other concerns are whether there is a succession plan for the business, whether the business has a performance management regime in place, or whether previous business ventures have been a success or failure.

M (Margin); Margin relates to the interest rates, fees and commission the bank would charge on the facility. This should be agreed from the start. Interest rate applicable would invariable hinge on the risk associated with the borrower. Commission and fees would depend on the volume of work involved in the processing. Commitment fees are charge on facilities like overdraft where there commitment on not very certain. Again customers with good track record should not pay the same margin is those with poor track record.

P (Purpose); the lender would want to verify that the purpose of the facility is acceptable.

It could be that the purpose of the facility would not be in the best interest of the customer. In such a situation, it would be prudent for the bank to bring a degree of realism into the proposition at the outset, which would be more beneficial to the customer than approving the facility. Again the purpose should be in line with the bank's policy.

Other questions are whether the purpose is legal. If illegal, the bank may not be able to enforce payment. Does the asset being purchased have a longer useful life than the term of the loan? Will the funds be utilized for the purpose intended?

Could the bank consider that the proposal is too risky, development capital will often attract a premium margin when compared to normal working capital or owner occupied premises finance.

A (Amount); this relates to instance where the bank will look in detail at customer's projections, and challenge the assumptions. The bank would like to know whether all important expenses have been taken into consideration. They will also be interested in the customer's stake in the presented proposal. The amount of the facility should be in proportion to customer's own resources and contribution. A reasonable contribution by customer shows commitment to the success of the facility and furthermore provides a buffer to the Bank in the event of default. If the advance is for working capital, a cash flow projection could test the adequacy of the request.

R (Repayment); this is the real risk assessment task and a major component is usually the assessment of the historic trading figures and the projections. The source of repayment should be made clear from the outset and the lender must establish with an appreciable degree of certainty that the funds would accrue to the business as projected, example; Trading profits turned into cash-flow, trade sale, asset disposal, market quotation, whatever the source this needs to be set out for the bank. It must also be identifiable not merely a promise. When the source of repayment is income or cash flow, this should be supported with a cash flow. In many instances, the bank would develop the business's cash flow from information provided. Above all the Bank should establish that the funds generated would be sufficient to cover repayment of the facility after the business has met its other commitments e.g. payment of workers' salaries, insurance, rent etc.

I (Insurance); Microsoft Encarta® 2008 (2007); defines insurance as ‘an arrangement by which a company gives customers financial protection against loss or harm such as theft or illness in return for payment premium.

In case something goes wrong the bank will normally seek some form of appropriate collateral – ideally something that is easy to take value and if necessary realize. The Bank nonetheless, lends on the basis of the above principles and not on the customer providing any security. Security is only used a buffer just in case the repayment proposals do not materialize. No advance should be made unless security provided has been perfected. In many instances, the Bank would call for insurance to be taken e.g. on the asset being purchased or on the life of a Key person in the business (key man insurance).

Full details should be provided, besides description of security as the alternative loan repayment source and its realizable value, where possible. It should be properly insured by a Bank approved Insurance Company and covered against various risks. Documentation must be precise, while security evaluation should cover control, marketability and lending margin, to protect against price fluctuations. Frequent independent verification of the security should take place.

If the security taken is not saleable, then this should be recognized and the risk addressed e.g. if there is only a sole seller of the product, then there will be no other buyer for his assets, in event of a forced sale. The Bank will thus be left with an unrealizable asset. Where receivables are taken as security, then quality/ageing should be reviewed, which would enable the Bank to assess the reliability of this asset as a loan repayment source.

Banks should not lend in an inferior position; all charges on security should be First Registered and pari passu with other lenders, to ensure the Banks interests are properly covered. If the Directors' guarantees are taken then separate individual Net worth statements or tax returns should be provided to support these guarantees and judge their capacity to repay guaranteed amounts.

The important thing to remember is not to be overwhelmed by marketing or profit center reasons to book a loan but to take a balanced view when booking a loan, taking into account the risk reward aspects. Generally firms remain optimistic during the upswing of the business cycle, but tend to forget to see how the borrower will during the downturn, which is a shortsighted approach. Furthermore I tend to place greater emphasis on financials, which are usually outdated; this is further exacerbated by the fact that a descriptive approach is usually taken, rather than an analytical approach, to the credit. Thus a forward looking approach should also be adopted, since the loan will be repaid primarily from future cash flows, not historic performance; however both can be used as good repayment indicators. Having postulated above guidelines, following is a suggested general procedure for reviewing short term lending proposals:

a. **Company Profile / Ownership:** This should cover the legal structure of company, i.e. is it public / private / listed. If listed then broker reports can be an additional source of information besides share price. Sole proprietorships / partnerships tend to be higher risk. Potential support can be provided by sister concerns, multinationals etc. While this can be a support it can also work as a disadvantage with possible diversion of funds to sister concerns, transfer pricing etc. which should thus be addressed. When dealing with individual Group companies it is essential to review overall Group exposure to ensure that the Group Risk is adequately analyzed and monitored, and Group limits also set.

b. Proposed Transaction: Following key items should be addressed:

1. **Purpose of facility:** This must be specific and general term should be avoided, such as "working capital facility". A specific need would be to "finance inventory" or "receivables" (or both). These two assts generally constitute the rationale for short-term borrowings.
2. **Source of repayment:** The cash cycle including payment and selling terms must be reviewed, which impact cash flow. Normally there should be reliance on identifiable cash flows for the first way out to repay the loan rather than the security itself. The lending officer should understand the cash production cycle and its tenor, and should question how the Bank will be repaid if things do not work out as expected for the customer e.g. slow sales, increases in inventory costs, etc.
3. **Credit Limits** – Bank experience to date with borrower and use of facility should be reviewed. Limits with other Banks should also be provided, besides

ability to obtain additional debt i.e. Bank should avoid being in a situation of lender of last resort. Sole Banking relationships are undesirable as it shows too much reliance on one source. Proposed Limit will give the overall exposure to the company, which should be reviewed to see if it is warranted, in relation to facility purpose, size of sales, capital etc., besides the usual credit criteria.

4. **Security:** Full details should be provided, besides description of security as the alternative loan repayment source and its realizable value, where possible. It should be properly insured by a Bank approved Insurance Company and covered against various risks. Documentation must be precise, while security evaluation should cover control, marketability and lending margin, to protect against price fluctuations. Frequent independent verification of the security should take place. If the security taken is not saleable, then this should be recognized and the risk addressed e.g. if there is only a sole seller of the product, then there will be no other buyer for his assets, in event of a forced sale. The Bank will thus be left with an unrealizable asset. Where receivables are taken as security, then quality / ageing should be reviewed, which would enable the Bank to assess the reliability of this asset as a loan repayment source. Banks should not lend in an inferior position; all charges on security should be First Registered and pari passu with other lenders, to ensure the Banks interests are properly covered. If the Directors' guarantees are taken then separate individual Net worth statements or tax returns should be provided to support these guarantees and judge their capacity to repay guaranteed amounts.

5. **Financial Analysis:** Normally a spread sheet should be used for analysis, which shows ratios, trends etc. At minimum the last three years financials should be spread to analyze trends. Figures should be updated and not more than six months old. Quality of auditors should be ascertained to judge reliability of figures, and check if the accounts are qualified. The figures should be analyzed, not described, in order to judge the financial position of the company. Where possible projected financials should also be obtained as repayment will be from future cash flows. Key items such as trends, market position, industry risk, industry status, capitalization, liquidity, dependence on borrowings, leverage, profitability, inventory/receivables position, besides capital/debt structure should be reviewed. Asset Turnover ratio is useful, besides leverage which shows net worth coverage of liabilities. Day's inventory and Days Receivable are crucial indicators of a Company's liquidity and show the need for an amount of borrowed funds, which are repaid through the liquidation of these assets. Earnings are keys to a company's success. Therefore one should review long term earning power, consistency and trend of core earnings, earnings mix, and dividend policy. Balance sheet figures are at a point of time – therefore it is essential to analyze realistically e.g. borrowings/inventory can be reduced for balance sheet date purposes. Thus average figures are more reliable where available. Figures can also be inflated for seasonal factors e.g. inventory build-up during the cotton-buying season, which should be recognized accordingly. For Project Finance one should analyze both historic and projected figures, with full sensitivity analysis, to

ascertain repayment ability. The Bank should rank pari passu on cash flows with the lenders i.e. for long-term loans the tenor should not exceed that of other lenders. Periodic project monitoring is essential to check progress of the project both during implementation and after it is completed.

6. **Management Evaluation:** This aspect is often not given the importance it warrants. It should not be overlooked since the management impacts overall performance of the company and hence its ability to repay loans. The following items should be noted when assessing management:
    1. Quality and depth of management, particularly the CEO.
    2. Experience, qualifications, and capability.
    3. Succession and back up plans.
    4. Management style i.e. conservative, centralized/decentralized approach,

8. **Organization Culture, Corporate strategy.**
    1. Career progression, training and development policies
    2. Staff turnover/personnel policies
    3. Training, motivation, morale, besides staff quality.

    People are the most important resource a Company has and are crucial for its successful running. Those Companies are successful which treat and recognize its talent properly and have a clear, careful and thought out business strategy, formalized in a Business Plan which is then followed accordingly. Besides this they have an organized change culture, solid customer relationships and a strategic brand management / differentiation. Above items are not found in the Balance Sheet, and should be analyzed by lending officer, after careful scrutiny and discussion with management.

1. **Risk Areas:** The lending order should review all risks officer relating to the lending point wise along with the mitigants and justified why lending is warranted, i.e. can the risks be covered or are these acceptable risks. Each borrower will have different risk profiles and therefore it is important to ensure there are adequately understood and addressed.
2. **Checkings:** Written checkings from other lenders should be obtained. Trade/market checking does can be obtained from various sources e.g. suppliers, etc. Talking to suppliers and other market information can give updated input on the company's financial position, e.g. if company is delaying payment to suppliers this could indicate liquidity problems. Also checks should be made from the market how the company's product is selling in the market or if it suffers from quality problems – these items are important since they impact sales and ultimately cash flow.
3. **Loan Profitability:** Again this is an important area which helps evaluate the risk/reward aspects of a transaction. It is important to earn an acceptable spread on a loan, and therefore to arrange necessary funding, to compensate for the credit risk. Apart from this the Bank should make an adequate return on the loan to help build the up net worth which is a cushion to absorb loan losses. The Bank should maximize return on assets not only through spread income but other non funds income such as commissions, exchange etc. which are

generated from contingent risk and do not involve the use of Bank funds. There is no insurance against loan losses or problems, nor is lending a rocket science. The lending officer must therefore exercise common sense and follow basic lending rules when a analyzing a credit. There is no short cut to this – after disbursement it is also essential to maintain contact with the company and remain abreast of its financial position. A lending officer must not only have requisite credit skills, but develop problem recognition abilities to enable him to take necessary and timely action, as and when required. The above is a basic guideline to reviewing short-term credits and is not all exhaustive. It should thus be reviewed on a case by case basis. Each borrower has different circumstances and should be reviewed as such. I have attempted to cover short-term borrowings only – project finance and other form of lending have different risk criteria, which have not been addressed here.

2.8 Five (5) Cs Framework

Hughes (1996) pointed out that when a lender extends credit to its customers, some customers will be unable or unwilling to pay. According to Sinkey (1986) the bankers problem is to attempt to qualify the 5C's so that meaningful and consistent decisions can be made regarding borrowers creditworthiness. Most banks over time have developed structured means of evaluating credit proposals. One such structure is the 5C's upon which banks build their credit policy. However 5Cs of a credit are crucial and relevant to all borrowers/lending which must be kept in mind at all times.

1. **Character** refers to the borrower's honesty and trustworthiness. An analyst must assess the borrower's integrity and subsequent intent to repay. If there are any serious doubts, the loan should be rejected
2. **Capital** refers to the borrower's wealth position measure by financial soundness and market standing. Can he firm or individual withstand any deterioration in its financial position? Capital helps cushion losses and reduces the likelihood of bankruptcy.
3. **Capacity** involves both the borrower's legal standing and management's expertise in maintain operations so the firm or individual can repay its debt obligations. A business must have identifiable cash flow or alternative resources of cash to repay debt. An individual must be able to generate income.
4. **Conditions** refer to the economic environment or industry-specific supply, production, and distribution factors a firm's operations. Repayment source of cash often vary with the business cycle or consumer demand.
5. **Collateral** is the lender's secondary source of repayment or security in the case of default. Having an asset that the bank can seize and liquidate when a borrower defaults reduces loss, but not justifies lending proceeds when the credit is originally made.

If any one of these is missing in the equation then the lending officer must question the viability of the credit. There is no guarantee to ensure a loan does not run into problems; however if proper credit evaluation techniques and monitoring are implemented then naturally the loan loss probability / problems will be minimized, which should be the objective of every lending officer. Golden and Walker (1993) further identify the 5Cs of bad credit, representing things to guard against to help prevent problems.

1. **Complacency** refers to the tendency to assume that because things Ire good in the past they will be good in the future. Common examples are an over reliance on guarantors, reported net worth, or past loan repayments success because things have always worked out in the past.
2. **Carelessness** involves poor underwriting typically evidenced by inadequate loan documentation, lack of current financial information or other pertinent information in the credit files, and a lack of protective covenants in the loan agreement. Each of these makes it difficult to monitor a borrower's progress and identify problems before they are unmanageable.

3. **Communication** ineffectiveness refers to when a bank's credit objectives and policies are not clearly communicated. This is when loan problems can arise. Management must effectively communicate and enforce loan policies and loan officers should make management aware of specific problems with existing loans as soon as they appear.
4. **Contingencies** refer to lenders' tendency to play down or ignore circumstances in which a loan might default. The focus is on trying to make a deal work rather than identifying downside risk.

5. **Competition** involves following competitor's behaviour rather than maintaining the bank's own credit standards. Doing something because another bank is doing it does not mean it's a prudent business practice.

2.9 Credit Approval

Upon successfully evaluating the loan applicants, the application is sent for approval. The process of reviewing and approving applications for credit extension varies widely throughout the banking industry. Hence the approval process depends on the individual banks and its adequacy and effectiveness is subject to examination by Bank of Ghana examiners. The culture/policy of the bank depicts the approval process and may be controlled by one or a few senior officers, with the utmost authority being the Board of Directors.

2.10 The Role Of Credit Appraising Process

A prospective borrower knows more than its potential lenders about its own creditworthiness, and thus is in a position to disclose information selectively in a way that would favourably bias an outsider's opinion. Because potential lenders know that a borrower has an incentive to provide a distorted picture of its prospects, it can be a challenge, even for a low-risk borrower, to convince lenders that it would be unlikely to default. Without some means for reliably transmitting relevant information, there can be a market failure, in the sense that worthy investment projects fail to be financed.

When a bank acts as an intermediary between a borrower and the ultimate suppliers of funding, the bank can alleviate this information problem by conducting a thorough inspection of a firm's financial condition and future prospects before deciding whether, and on what terms, credit will be extended (credit appraisal process). Substantial evaluation and monitoring costs might be worth bearing for a bank that expects to be fully exposed to the risk that the borrower would default. In contrast, if the financing instead Ire being provided directly by a large number of small lenders, it might be the case that no single one of them would have enough at stake to provide an incentive for an adequate information-gathering effort.

When a firm borrows in the bank, it can be difficult to assess the risk that the borrower will default, because the cost of an adequate credit analysis may be prohibitive. Under these circumstances, credit appraisal committee can play a useful role by collecting information about a firm and sharing it with a large number of banks. Similarly, a regulatory environment that enforces accurate financial disclosure by firms wishing to issue securities also helps to enhance the flow of reliable information to banks. Such disclosure requirements could only tend to improve the quality of information available to appraising committees, even when they also have access to non-public data. Thus, banks, credit appraising committees, and disclosure requirements all serve to reduce the extent to which profitable opportunities are left unfunded.

In order for a bank or credit appraising committee to have an incentive to extend significant resources in assessing a borrower's creditworthiness, it must be able to capture a portion of the benefit of the information that is uncovered. For example, when a bank bases a lending decision on proprietary information, it may prefer to keep the details of the transaction private to prevent others from capitalizing on its knowledge. If a bank could not keep its credit evaluations secret from other market participants, competitors might be able to mimic the banks' lending decisions without the expense of performing independent assessments. Such "free-riding" would erode the incentive for the bank to undertake credit analysis in the first place. Note that potential competitors do not necessarily have to know the details of a commercial bank's assessment of borrower risk to be able to "free-ride" – if they can observe the terms of the bank's loan contract, then they can simply offer the same deal.

Thus, the ability to exclude others from one's own assessment process increases the payoff to commercial banks from undertaking assessments of creditworthiness. However, a credit market with independent information-gathering and analysis by each bank has some drawbacks, with respect to efficiency. It may require either concentration of credit risk (if there is only one bank or a small number of banks vying for a borrower's business) or wasteful duplication (with many competing banks).

Credit rating agencies, unlike commercial banks, do not risk their own money on the basis of their default risk assessments. Thus, in contrast to bank financing, with credit ratings, the funding activity can be potentially separated from credit analysis, which may enable both functions to be provided in more competitive markets. Nevertheless, the viability of a credit rating agency, like a bank, depends on its ability to extract a private benefit from its credit assessment. When ratings are publicly disclosed, as has been the predominant practice for the past several decades, the rating agency obviously cannot exclude "free-riders" from learning their ratings once they are announced. Most rating agencies ensure that they will capture a portion of the benefit of their credit analysis by charging the borrower for their service rather than the investor community, which effectively spreads the cost of the ratings evenly across investors. (It is worth noting, however, that some of the more recent debt rating industry entrants make their assessments available only by subscription. It is not clear to what extent these firms are losing revenue from customers sharing information, but many other types of information and publishing businesses are similarly vulnerable).

An appraising bank committee's reputation would also tend to be bolstered if it avoided conflicts of interest created, for example, when the bank is owned, managed, or otherwise influenced by those institutions being appraised. However, market forces can also help keep appraisers hones. In the long run, as investors routinely compare appraising across bank and the correspondence between appraising and default, a deliberate systematic bias on the part of any given bank would risk eventual discovery. In the shorter term, unsolicited appraising can also serve as a useful form of market discipline when the bank appraising committee has been too generous.

In some countries, credit information about bank loans and borrowers is shared through private credit bureaus. With participation voluntary, member banks implicitly are judging that it is worth revealing information about their own customers in exchange for access to information about other potential customers. In some other countries, banks are required to share information about their borrowers through publicly administered national credit registers. Interestingly, there is evidence that the existence of a credit register or credit bureau is a deterrent to borrower default and consequently a stimulus to aggregate bank credit (see Jappelli and Pagano, 1999), despite the clear impediment to individual banks benefiting from proprietary credit information.

Although the principal motivation for these assessments has been for direct use in bank supervision, one could imagine an expansion of their application to ratings-based capital requirements.

Nevertheless, it does not seem that credit assessment is an activity that would be performed most effectively in the public sector, given that a number of viable competitors have arisen in the private sector. The prevalent economic view suggests that governments should only provide goods and services that cannot be produced profitably by private firms because non-paying customers cannot be prevented from enjoying the benefits. (An often-cited example of a so-called public good is national defence). However, even though it may be difficult to prevent investors/bank from using published credit appraising without explicitly paying for them, certain banks have found an alternative way to make their business profitable – charging appraising fees to borrowers.

CHAPTER THREE

METHODOLOGY

3.1 Introduction

This chapter of our research identifies the methods of data collection that was designed to fit the research topic and its objectives. The various sections of the chapter looked at the sources from which I gathered out data, the method of sampling used and a general discussion of the data collection process.

Methodology deals with processes and procedures by which researcher's uses to explore and obtain information to identify the exact nature and scope of the research problems. In other words, it is about how the researcher approaches the study of a problem so as to answer the research questions. Kumekpor (1999) explained that it is the methods, processes and techniques I use in attempting to discover what I want to know. The aim of this chapter is to establish a rational argument for choosing a specific method and/or technique for the research. The discussion focused on the specific objectives of the research, which investigate why there is credit default, secondly to ascertain if banks adhere to their credit appraisal policies, thirdly to know the relationship between credit appraisal and credit quality, and to evaluate the nature and extent of credit appraisal of the banking industry.

In order to accomplish the objectives of the study, the methodology for the research has been divided into three parts. The first part considers the research the research strategy, target population; a variety of sampling techniques employed and provides a good reason of chosen sample. The second describes the instruments employed for data collections, the type of data used for the study and response rate. The final part deal with an assortment of estimation techniques draw on and conclude with the specification of the model for the study.

3.2 Research Strategy

In conducting research, there are many strategies that can be used. The research strategy could be experiment, survey, case study, grounded theory, ethnography, action and archival research. (Saunders et al, 2007). No research strategy is inherently superior or inferior to any other. What is most important is not the label that is attached to a particular strategy, but whether it will enable you to answer a particular research question(s) and objectives (Saunders et al, 2007). The research will employ the use of a case study because it represents a comprehensive description and explanation of the many components of a given social situation. Robson (2002:178) as cited by Saunders et al, 2007; defines case study as 'a study for doing research which involves an empirical investigation of a particular contemporary phenomenon within its real life context using multiple sources of evidence'.

Further, the study being an explanatory one necessitates personal contact, so the questionnaires are administered and face-to-face interviews are conducted by the researcher to enable us access information which could not be revealed by the questionnaire.

3.3 Target Population

A population is set of all possible elements that could theoretically be observed or measure (Ronald, 2005). The respondents for this research were drawn from staffs of CAL, SG-SSB, EBG, GCB, HFC and SCB, within the Accra metropolis.

As at 31st December, 2010 there were twenty seven (27) banks in Ghana. The banking industry was chosen due to its enormous contribution to every economy. Banks dominate the financial industry in Ghana and their importance has been enumerated in countless researches.

The current global crisis when emanated from the United States of America from the year 2007 testifies the role of banks in the economy. Failure to banks due to credit default (resulting from poor credit appraisal, where they were interested in giving out loans without properly assessing their client's credit worthiness) can lead to the collapse of the banking system and whole economy.

In addition, Accra was considered because credit approvals are centralized at head offices of these banks. Furthermore, the aggregate of loans may well be gotten from head offices of these banks and not the branches.

One (1) questionnaire was administered to staff/management of the selected banks.

3.4 Sampling: Sample Size and Sampling Technique

Sampling is simply the process of selecting a number of units from a population for a study in such a way that the units represent the larger group (population) from which they are selected.

Realizing that collecting data from all banks in the country would not be achievable, the researcher affirms that sampling was essential. Thus, the study was restricted to a small number of banks who participated in the case study, but the center of attention was on those involved in appraising credit.

In the selection of banks for the study, simple random sampling with a relatively small sample size is used because it gives representative view of the population, Lind and Mason (1997). In reality, one is faced with constraints (i.e. bank confidentiality, financial, administrative, and time). Hence, the use of other non-probability methods was adopted. Convenience and Purposive sampling technique are used for the study. Purposive technique was to enable the researchers use their judgment to select cases, which best enable one to answer the research question(s) and meet the objectives of the study. According to Saunders et al, (1997), besides the above advantages, this technique is useful for small samples and cases that are particularly informative.

On the other hand, convenience sampling involves selecting members who are readily available and willing to participate. This was adopted because some staffs are either not available or willing to participate. Convenience sampling techniques was used by the researchers because of the busy lifestyles of the management. The above are chosen, taking into account the non-probability nature of the sampling technique.

In spite of the large numbers of banks in Ghana, only six (6) banks were chosen, additionally having a large sample is not enough to prove that a sample is representative of the population on the study (Biha 2002). He further stressed that gathering a reasonable sample is good enough to make a sample representative.

The chosen banks consist of: CAL, SG-SSB, EBG, GCB, HFC and SCB. On the basis that nine to ten year data on disbursed loans and advances, provision for credit losses and also credit quality ratio are considered necessary. The researcher made sure that, the chosen banks had been in existence for at least 10 years. The sample chosen was representative of the population and big enough to permit reasonable analysis of data.

3.5 Data Sources

Data for my dissertation was gathered from both primary and secondary sources. Primary data include administering of questionnaires and conducting of interviews with respondent banks. These sources were considered because they gave deeper insights into the topic, challenges facing these banks and the way forward. They also served as the fastest means of getting first hand information from officers from sampled banks and other stakeholders within the rural banking community.

Secondary data used include reviewing journals, research papers, articles and financial performance reports by the selected banks and other relevant materials from the industry. This type of data is normally not drafted with a specific dissertation topic in mind; however, data gathered were useful as they were scrutinized and used especially where primary data was not available or insufficient. I believe these means of data gathering were useful in addressing the research questions.

3.6 Research Approach

The following techniques were adopted under the primary sources in an attempt to address the research objectives:

3.6.1 *Questionnaires*

Questionnaires were designed and administered to selected banks to collect data on the topic. Both open and close-ended approaches were used in gathering data to achieve specific objectives in the research problem. The open - ended questionnaire was aimed at ensuring that adequate data was gathered to enable me carry out detailed assessments of the issues identified by respondents. Questions were carefully designed to throw up the issues that could support the research problem.

3.6.2 Interviews

Apart from questionnaires, data for the dissertation was also gathered via interviews and results obtained were written down for use. This technique was useful as it helped in gathering data that could not be obtained via the administering of questionnaires. Few unstructured interviews were also conducted with Bank of Ghana examiners who have had the opportunity examine these banks.

In all techniques employed under the primary data sources were preferred because:

1. They were tailor - made and specifically designed to meet the needs of my dissertation.
2. The results obtained from these sources were intact and up to date.
3. Longitudinal information was gathered from one respondent bank at a time, thereby aiding clarity of interpretation and analysis.

It is however, important to mention at this point that although these techniques were useful, there were challenges that the approach came along with:

1. The approach was time consuming in designing, conducting and interpreting data.
2. Some of the techniques were relatively expensive as compared to the secondary methods.

3.6.3 Secondary data

In addition, my research work explored a number of relevant secondary data available in the industry. I made use of credit policies of the banks as well as annual financial reports for a reasonable number of years. The following materials were carefully reviewed to gather relevant data for this exercise:

3.7 Method of Analysis

Various methods were employed in the analyses of the data. Microsoft Office Excel 2007 and SPSS were used in analysing responses received via questionnaires and results obtained were written down for use in addressing research objectives. Other statistical analysis of the data such as frequency dispersion averages, percentages, graphs and tables were used in interpreting results for this report.

CHAPTER FOUR

DATA ANALYSIS, INTERPRETATION AND DISCUSSION OF RESULT

4.0 Introduction

This study seeks to assess the contribution of credit underwriting to loan quality of banks listed on the Ghana Stock Exchange (GSE). This chapter provides a detailed analysis, and discussion of results. The chapter starts with the financial performance of these banks, followed by a descriptive analysis and analysis of the credit quality of these banks. It ends with an identification of the some of the credit underwriting challenges of these banks and its effect on loan quality.

4.1 Descriptive Analysis: Performance Indicators of selected banks

This section provides a description of key financial performance indicators including return on shareholders' funds, return on assets, interest income to total loan performance and loan quality measured by non performing loans to total loans. The financial performance of a business is an assessment that gives an indication whether a business would survive or collapse in the future. The study seeks to examine financial performance indicators of these banks in an attempt to identify potential challenges.

Table 1: Return on Equity (ROE %) of Banks between 2005-2010							
BANK	**2005**	**2006**	**2007**	**2008**	**2009**	**2010**	**AVERAGE**
CAL	16.6	23.2	24	22.5	15.6	19	20.2
EBG	52.8	53.3	48.4	41.6	26.4	28.9	41.9
GCB	19.9	32.1	19.6	18.2	9.1	10.8	18.3
HFC	7.1	11.4	26.9	20.8	17.2	16.5	16.7
SCB	24.6	42.3	39.1	37.1	36	39	36.4
SG-SSB	24.3	20.4	20	22.3	17.8	19.5	20.7
DESCRIPTIVE STATISTICS							
Maximum	52.8	53.3	48.4	41.6	36	39	45.2
Minimum	7.10	11.40	19.60	18.20	9.10	10.80	12.7
Median	22.10	27.65	25.45	22.40	17.50	19.25	22.4
Average	24.22	30.45	29.67	27.08	20.35	22.28	25.7
Standard Deviation	15.41	15.37	11.61	9.73	9.46	10.07	11.9
INDUSTRY	28.4	28.4	26.5	21.7	12.1	13	21.7

Researcher's Computation (2011)

One of the most important profitability metrics is return on equity (or ROE for short). Return on equity reveals how much profit a company earned in comparison to the total amount of shareholder equity found on the balance sheet. Shareholder equity is equal to total assets minus total liabilities. It's what the shareholders "own". Shareholder equity is a creation of accounting that represents the assets created by the retained earnings of the business and the paid-in capital of the owners. With the need for all banks in Ghana to meet Bank of Ghana's December 2012 deadline for banks to have a stated capital of 60million, shareholders of these banks would expect more profits to boost retained earnings. A careful look at the average ROE of all the six banks over the period shows a mixed performance (see figure 1). A business that has a high return on equity is more likely to be one that is capable of generating cash internally. For the most part, the higher a company's return on equity compared to its industry, the better.

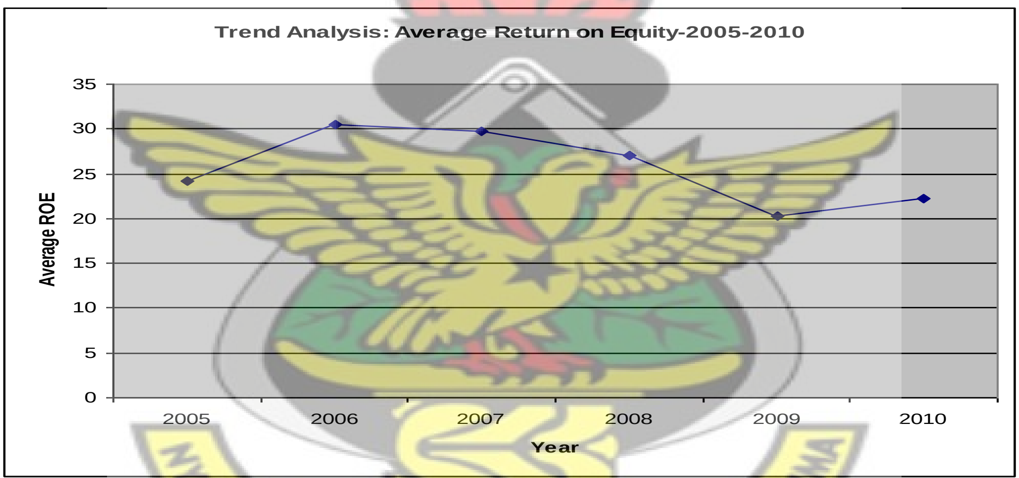

Figure 1: Trend Analysis: Average Return on Equity-2005-2010

Table 2: Return on Assets (ROA %) of Banks 2005-2010							
BANK	**2005**	**2006**	**2007**	**2008**	**2009**	**2010**	**AVERAGE**
CAL	3.10	3.60	3.10	4.40	4.10	4.50	3.80
EBG	4.20	4.40	3.70	4.00	3.50	3.90	3.95
GCB	2.20	3.70	2.60	2.70	3.40	3.60	3.03
HFC	1.10	1.40	2.40	3.00	4.50	4.80	2.87
SCB	4.90	5.00	4.30	4.70	4.20	4.70	4.63
SG-SSB	3.50	3.00	3.00	3.20	3.10	3.50	3.22
DESCRIPTIVE STATISTICS							
Maximum	4.90	5.00	4.30	4.70	4.50	4.80	4.70
Minimum	1.10	1.40	2.40	2.70	3.10	3.50	2.37
Median	3.30	3.65	3.05	3.60	3.80	4.20	3.60
Average	3.17	3.52	3.18	3.67	3.80	4.17	3.58
Standard Deviation	1.37	1.25	0.71	0.81	0.54	0.57	0.88

Researcher's Computation (2011)

ROA tells you what earnings were generated from invested capital (assets). The assets of the company are comprised of both debt and equity. Both of these types of financing are used to fund the operations of the bank. The ROA figure gives investors an idea of how effectively the bank is converting loanable funds it has to invest into net income. The higher the ROA number, the better, because the bank is earning more money on its earning assets. The trend in ROA over the period shows that these banks are better at converting its loanable funds into profit (see figure 2). When you really think about it, management's most important job is to make wise choices in allocating its resources. Anybody can make a profit by throwing a ton of money at problem but very few managers excel at making large profits with little investment.

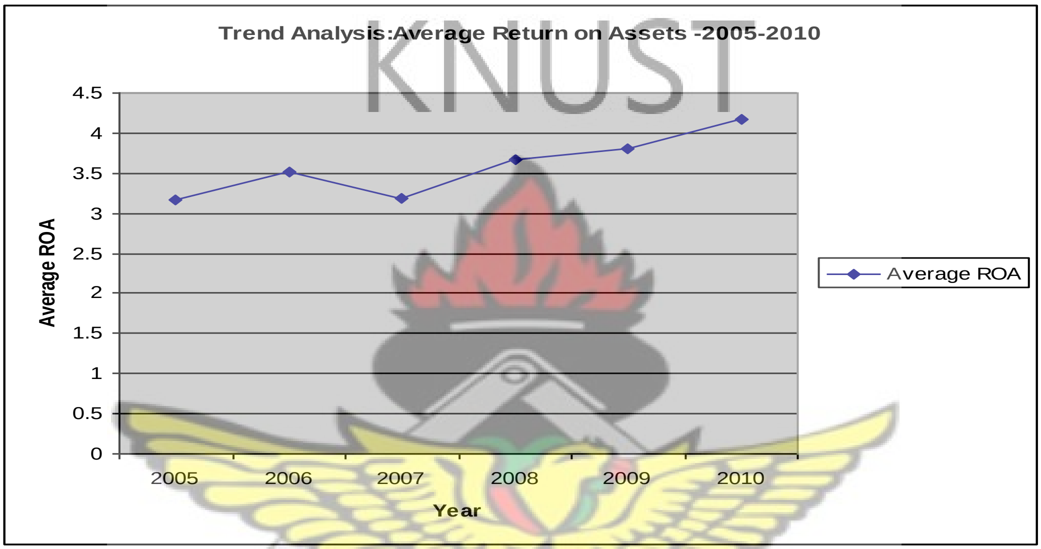

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Figure 2: Trend Analysis: Average Return on Assets-2005-2010

Table 3: Interest Income to Total Loan Portfolio of Banks in Ghana 2005 to 2010							
BANK	**2005**	**2006**	**2007**	**2008**	**2009**	**2010**	**AVERAGE**
CAL	18.89	9.98	15.06	14	20.9	21	15.77
EBG	11.75	13.8	9.39	9.4	13.8	14.5	11.63
GCB	13.04	16.69	9.02	12.3	14.6	14.7	13.13
HFC	3.19	6.14	12.33	17.8	22	24	12.29
SCB	12.57	17.87	12.86	13.6	18	19	14.98
SG-SSB	12.6	12.98	9.11	9.9	14.5	16	11.82
DESCRIPTIVE STATISTICS							
Maximum	18.89	17.87	15.06	17.8	22	24	15.77
Minimum	3.19	6.14	9.02	9.40	13.80	14.50	11.63
Median	12.59	13.39	10.86	12.95	16.30	17.50	12.71
Average	12.01	12.91	11.30	12.83	17.30	18.20	13.27
Standard Deviation	5.04	4.34	2.50	3.08	3.55	3.82	1.73
INDUSTRY	3.5	3.5	3.5	3.5	3.5	3.5	3.5

Researcher's Computation (2011)

As banks acquire deposits, it is expected that they generate enough interest income to compensate for their risk taking behaviours. On the average, Interest income to total loans shows an upward growth indicating that the listed banks are achieving the objective for which they were established. This is reflected in the return on assets growth.

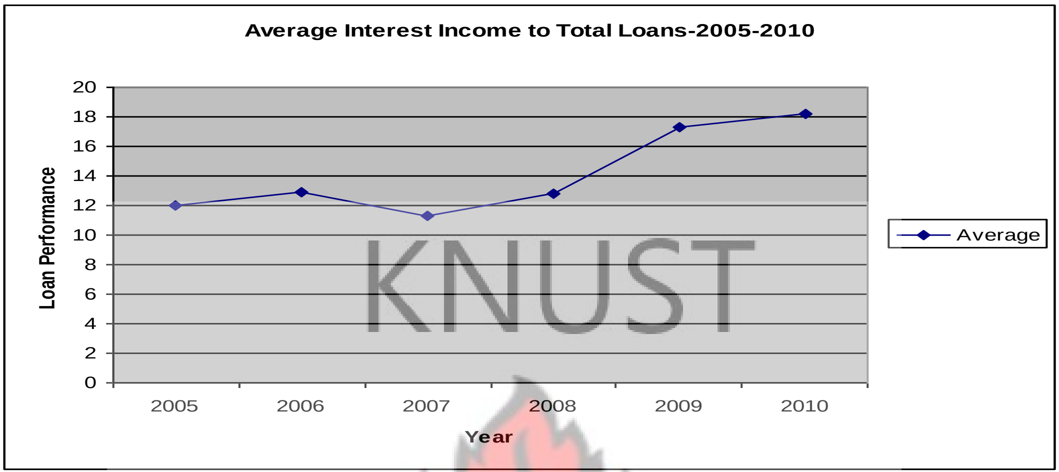

Figure 3: Trend Analysis: Interest Income to Total Loan Portfolio-2005-2010

Table 4: Loan Portfolio Quality of Banks in Ghana 2005 to 2010

BANK	2005	2006	2007	2008	2009	2010	AVERAGE
CAL	6.1	9.98	15.06	18.1	19.2	21	15.77
EBG	5.75	6.8	9.39	9.9	10.8	14.5	11.63
GCB	8.2	10.8	12.5	13	14.6	16	13.13
HFC	9.9	10.13	12.33	13.5	18	21	12.29
SCB	5.4	6.9	7.8	9.1	10.5	11.2	14.98
SG-SSB	5.6	7.1	9.11	9.9	14.5	16	11.82
DESCRIPTIVE STATISTICS							
Maximum	9.9	10.8	15.06	18.1	19.2	21	15.77
Minimum	5.40	6.80	7.80	9.10	10.50	11.20	11.63
Median	5.93	8.54	10.86	11.45	14.55	16.00	12.71
Average	6.83	8.62	11.03	12.25	14.60	16.62	13.27
Standard Deviation	1.82	1.87	2.72	3.39	3.58	3.82	1.73

Researcher's Computation (2011)

Most bankers, shareholders, researchers, regulators etc will agree that the single greatest risk in banking is the risk of loan losses. This is because loans typically comprise a majority of the assets in most banks. It's not hard to imagine an entire year's worth of earnings being completely eliminated because of one or two large loans being charged off. Because the exposure is so vast, bank managers spend a significant amount of time assessing asset quality, primarily loan quality. Of course, given the size of the exposure, board of directors spend a significant amount of time assessing this risk as well, in formulating loan policies, attending loan committee meetings, reading credit reviews, and reviewing various management reports on the condition of the loan portfolio. Asset quality has deteriorated over the period under review for all the banks considered. The increase in classifications is a direct result of more liberal credit practices and lax loan documentation, particularly within the banking sector loan portfolios. Management of these banks has aggressively pursued these loans despite the economic downturn in its trade area. The banks now have significant concentrations of credit in SME and corporate and construction loans.

Management of these banks's monitoring of loan concentrations is deficient. Concentration reports from Bank of Ghana show only the bank's aggregate exposure to corporate and government backed loans rather than segmenting the portfolios by loan type/collateral, etc. The Loan Policies of these banks do not establish prudent guidelines for loan concentrations and provides inadequate guidance for SME and construction lending. As a result, loan concentrations are excessive and are not being properly monitored or controlled. Additionally, asset quality has deteriorated due to weak loan underwriting and credit administration practices. The Loan Policies are again criticized for its lack of sufficient guidance for underwriting SME and construction loans. Almost all the credit policies do not: (1) Establish prudent credit concentration guidelines,(2) Establish effective concentration monitoring and reporting procedures, (3) Require comprehensive analysis of cash flow and repayment ability,(4) Specify the type of financial information and other documentation necessary for each loan type ,(5) Require strict adherence to purpose of loan.

Loan Underwriting Weaknesses such as credit memos do not provide a clear assessment of repayment capacity - many credits are approved based solely on collateral values with no cash flow analysis performed. In addition, credit administration weaknesses such as (i) Ongoing loan documentation is poor as updated financial statements are not being acquired from customers,(2) Management's internal credit review is based solely on delinquency,(3) The watch list is inadequate and not monitored etc.

4.2 Asset quality discussion (questionnaire and interview)

To assess the internal consistency of each factor group obtained, the factors were subjected to reliability test. The assumption behind this approach is that the items of a measure work together as a set and should be capable of independently measuring the same construct. The items should be consistent in what they indicate about the concept being measured. The Cronbach alpha was used to measure internal reliability by unit weighting items with salient loadings in a factor where Cronbach's alpha coefficient at 0.7 or higher was considered acceptable (Kerlinger and Lee, 2000). The credit origination function performance variable contains 4 items that define unique component of credit underwriting. These 4 measurements include application, appraisal, approval and disbursement whilst the credit administration measurement includes pre-disbursement management, collateral registering, monitoring and maintenance of loan files (soft and hard). On a scale of 1 to 5, respondents were asked to indicate the extent to which they agree or disagree with 10 distinctly identified aspects of the credit underwriting and administration of these banks.

A unique variable representing credit underwriting was generated using the Cronbach's analysis (see appendix one). Table 4.1 reports the Cronbach's alpha measuring the average reliability of the items used as a proxy for the construct. The table shows the number of variables or items constituting the new variable the scale reliability coefficient and average interim covariance and the tables in appendix one show the extent to which each item is correlated with the generated variable. A high (alpha greater than 0.7) interim correlation coefficient was obtained between each of the items and the new variable generated as shown in column 5 of table 1 in appendix one. The overall alpha of 0.7562 indicates that the items are strongly reliable in representing the construct. The factor loading for each of the measurement items are shown in appendix one. The tables in appendix one show that all measurement items independently and significantly represent their respective constructs. Table 1 reports high overall reliability scores for all items representing the four constructs. The minimum Cronbach alpha of 0.72 for all variables suggest at the items, as shown in appendix one, are strongly reliable in representing the construct. Apart from testing the reliability of the measurements, the factor analysis also helps check over-parameterization and multicollinearity. Over-parameterization (the inclusion of several variables), though improves the goodness of fit, it reduces the degrees of freedom (df) and hence inefficient estimates. It further increases the likelihood of type one error and multicollinearity.

Table 4.1 Reliability Analysis of Key Covariates

Composite Variable	Number of Items	Sign	Average Inter-item Covariance	Overall Alpha
Credit Underwriting/origination				
Application	4	+	0.78458	0.8567
Appraisal	6	+	0.59145	0.8147
Approval	6	+	0.34870	0.7047
Disbursement	3	+	0.51404	0.7706
Authorisation and Approval	3	+	0.51783	0.8014
Credit Administration	3	+	0.50631	0.7243
pre-disbursement management	3	+	6063187	0.6543
collateral registering	8	+	2977889	0.7562
monitoring	3	+	6063187	0.7543
maintenance of loan files	3	+	5063187	0.5843
Loan Software	3	+	5063187	0.8293
Overall Indicator				0.7562

Source: Computation from Survey Data, 2011

CHAPTER FIVE

SUMMARY, CONCLUSION AND RECOMMENDATIONS

5.1 Introduction

This chapter provides a general summary and conclusion for the study, as well as recommendations for policy analysis and further studies. At the end of the chapter, limitations of this study are provided.

5.2 Summary and Conclusion

The study assessed loan quality of banks listed on the Ghana Stock Exchange form 2005-2010 in Ghana. This was in line with the empirical works that provided support for the proposition that financial stability of the banking industry strongly depends on asset quality of banks. Though this proposition has a well established theoretical base and is further supported by a number of empirical evidences, its conclusion of maintaining a low and stable economic environment may not be applicable to all countries.

The purpose of the study was thus to ascertain if the conclusion is applicable to the economy of Ghana by particularly examining the asset quality of these banks.

To accomplish this, financial performance indicators such as ROE, ROA, Loan quality etc were calculated over the period under review. In addition cronbach alpha was used to test the reliability of questions that intended to assess the contribution of credit underwriting and administration to loan performance.

The results show that though banks continues to show impressive financial performance, their asset quality continue to deteriorate. Reasons for the deterioration were mixed based on questionnaire and interviews conducted with credit officers of these banks. Lastly, it was established that credit origination and administration has contributed greatly to minimize information asymmetry, though risk is still high among SMEs who form a larger chunk of bank customers.

5.3 Recommendations for Policy Analysis and Further Studies

Based on the above conclusions, the following policy recommendations are suggested. Accompanying these recommendations are proposed areas for further studies.

First, the current monetary policy objective of ensuring price stability should be given a high priority by monetary policy decision makers in Ghana. This recommendation is arrived at from the conclusion that loan pricing tend to have an impact on defaults

Second, bank credit policies should be implemented in a more holistic approach (both policy-wise and in terms of the establishment of financial institutions and their instruments), as this does not cause the rate of deterioration to either accelerate or decelerate.

Lastly, another useful exercise may be to identify the capacity of credit officers and bank employees in general in credit origination and administration since that is the main object of banks.

5.4 Limitations of the Study

As with other studies, there were some limitations to this study.

One of the challenges was with the availability of longer period time series data for research. During the study, it was established that for some of the responses from the questionnaire were not verifiable, there were no official records on management accounts and variance analysis, and when they were available, one could not obtain data for longer periods.

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APPENDIX B

QUESTIONNAIRE

TOPIC: Assessment of loan quality: Evidence from listed banks

I am researching into the contribution of Assessment of Loan Quality: Evidence from listed banks of banks in Ghana. I will be very grateful if you could take some few minutes to complete the questionnaire. You are of utmost confidentiality as the questionnaire will be used solely for academic work.

1. Does your bank have a credit policy? A. Yes [ ] B. No [ ]
2. If Yes, how often is it reviewed?

   A. Monthly [ ] B. Quarterly [ ] C. Semi Annually [ ]

   D. Annually [ ] E. Others [ ]
3. What kinds of loans do you grant? Please rank them using 1 – 5, i.e. (5) as highest and (1) as the lowest.

   A. Individual loans [ ] B. Corporate [ ] C. Government [ ]

   D. SME [ ] E. Others [ ]
4. What percentage of the loan portfolio is given to each of the categories?

   A. Individual, i. 0-25% [ ] ii. 26-50% [ ] iii. 51-100% [ ]

   B. Corporate i. 0-25% [ ] ii. 26-50% [ ] iii. 51-100% [ ]

   C. SME i. 0-25% [ ] ii. 26-50% [ ] iii. 51-100% [ ]

   D. Government i. 0-25% [ ] ii. 26-50% [ ] iii. 51-100% [ ]
5. What is/are the criteria for qualifying for a loan? (SME and Corporate)

   A. 3 months or more audited financial statement [ ]

B. Collateral [ ]

C. Business proposal [ ]

D. Regular source of income [ ]

6. What type of assessment tool is employed in appraising loans?

A. PESTE Analysis [ ] B. SWOT Analysis [ ] C. CAMPARI [ ]

D. 5C's [ ] E. Internal Models [ ]

7. How is the appraised loans communicated to the approving authorities, via?

A. Email [ ] B. Postage [ ] C. Telephone [ ] D. Others [ ]

8. How many levels of approval authorities do you have?

A. One [ ] B. Two [ ] C. Three [ ] D. Above three [ ]

9. Do you have an approval limit for each level? A. Yes [ ] B. No [ ]

10. If yes, what is your approval limit for?

A. Board of Directors

____

B. Management

____

C. Head Office

____

D. Zonal Office

____

E. Branch Committee

____

F. Others

____

11. When loans are approved what documents are given to the customer?

A. Offer letter

B. Loan Repayment Schedule

C. If others, please

Specify____

12. How are approved loans disbursed, through?

A. Bank Account in the same bank [ ]

B. Cash payment [ ]

C. An account in another bank [ ]

D. Payment Order [ ]

13. How do you charge interest rate?

A. T. bill plus risk premium [ ] B. Prime interest rate plus risk premium [ ]

C. Base rate plus premium [ ] D. Competitive pricing [ ]

E. Inflation Indexed [ ]

14. Does credit underwriting help solve the problem of information asymmetry?

A. Yes [ ] B. No [ ]

15. Do you think the credit policy is adhered to in granting of these loans?

A. Yes [ ] B. No [ ]

16. If Yes, is it adhered to A. Strictly [ ] B. Partially [ ]

17. If No, why?

____

18. Is there a way of ensuring that it is followed? Yes [ ] No [ ]

19. Do customers follow the loan repayment schedule?

    A. Yes [ ] B. No [ ]

20. What are some of the factors that contribute to quality loans?

    A. A sound credit policy [ ]

    B. Strict adherence to the credit appraisal system [ ]

    C. Monitoring of disbursed loans [ ]

    D. Flexible loan repayment schedule [ ]

    E. Others, please specify;

    ____

21. What factors contribute to the loan default?

    A. Poor appraisal [ ]

    B. Lack of monitoring [ ]

    C. Tight repayment schedule [ ]

    D. Economic conditions [ ]

    E. Others, please specify;

    ____

22. What tools do you use to measure credit risk?

    ____

23. What is the responsibility of Board of Director's in terms of credit?

    ____

24. What is the responsibility of management in terms of credit?

    ____

25. Do you have a credit risk management committee? A. Yes [ ] B. No [ ]

26. Do you have a department responsible for credit monitoring? A. Yes [ ] B. No [ ]

27. If yes how do they monitor credit?

____I

28. Do you have a department that handles non performing loans? A. Yes [ ] B. No [ ]

29. How do you calculate for provisions, is it by calculation of:

A. IFRS Loan impairment model [ ] B. BOG classification [ ]

31. How are loan documents maintained, is it in,

A. Cabinet [ ] B. Shelving [ ] C. Soft copy [ ] D. Others [ ]

32. What type of collateral do you accept? Rank form 1-5, using (5) as the highest and (1) lowest.

A. Cash [ ] B. Building [ ] C. Land [ ] D. Others [ ]

33. Do you do internal risk rating of credit facilities? A. Yes [ ] B. No [ ]

34. Who is in-charge of reviewing the rates?

____

35. How do you handle problem loans?

A. Outsourcing [ ] B. Going to court [ ] C. Discounting [ ] D. Write offs [ ]

36. What is the recovery rate for appraised loans?

1. Low [ ] B. Reasonable [ ]C. High [ ] D. Very High [ ]

37. Has the use of credit underwriting improved your credit quality? A. Yes [ ]

    B. No [ ]

38. Do you encounter problem loans even when loans are appraised before disbursement?

    A. Yes [ ] B. No [ ]

39. Do you monitor the loan to assess if it is being used for the intended purposes?

    A. Yes [ ] B. No [ ]

40. Are there activities in the bank that affect its credit quality?

    A. Government intervention [ ]
    B. Good policy [ ]
    C. Economic Conditions [ ]
    D. Top management decision making [ ]

41. Provide any additional information if necessary.

    ____