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Unveiling the Ripple Effect: Exploring the Dynamics of Financial Performance on Credit Risk Management in Islamic Banking

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ABSTRACT

Purpose: This study aims to investigate how credit risk management practices affect Islamic banks' financial performance, with a focus on identifying key variables such as AFR and NPF. This study investigates how financial performance influences credit risk management in Islamic banks, emphasizing ripple effects.

Design/Methodology/Approach: The research employs a quantitative approach, utilizing longitudinal data (2019-2023) from annual reports of five major Islamic banks in Pakistan. Key variables such as ROA, NPF, and AFR are analyzed using long-term co-integration analysis to assess their impact on financial performance.

Findings: The study finds that AFR has a significant positive effect on ROA, indicating its crucial role in enhancing financial performance in Islamic banks. Conversely, NPF negatively impacts ROE, highlighting the challenges posed by credit risk in Islamic banking operations.

Research Limitations/Implications: Limitations include the reliance on financial data from annual reports, which may not fully capture real-time dynamics. Future research could incorporate qualitative methods to deepen understanding of managerial practices in credit risk management.

Social Implications: The findings underscore the importance of robust credit risk management practices in Islamic banks to maintain stakeholder trust and stability in financial markets, contributing to broader economic resilience.

Practical Implications: Practically, the study informs Islamic banking practitioners and regulators about the critical role of AFR in enhancing financial performance and the need for effective NPF management to mitigate risks and sustain profitability.

Originality/Value: This research contributes to the literature by providing empirical evidence on the dynamics between credit risk management and financial performance specifically in Islamic banking contexts, offering insights relevant to stakeholders, policymakers, and researchers.

Keywords: *Islamic Banking; Deposit Funds Bank (DFB); Assumed Financial Risk (AFR); Return on Equity (ROE); Long-term Co-integration Analysis*

JEL Code: *O5, E11, G22, L45.*

INTRODUCTION

Islamic banks provide monetary assistance by transferring funds from donors to investors and partners, resulting in mutual benefits. Islamic banks efficiently and profitably transfer assets from the excess segment to the debit segment by functioning as monetary intermediaries. Financial organizations are crucial for economic security. The citation comes from Ahmed et al. (2018).

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Banks provide banking services to assist the transferal of finances from depositors to investors to generate profit. Economic prosperity of a country depends on commercial banks (Parkash et al., 2017; Brahmana et al., 2018). IBs assist as monetary agents to allocate resources efficiently and equitably from areas with surplus to areas with scarcity. Given the importance of market stability for any nation, it is imperative to implement adequate financial institution regulation. The rate at which credit is developed fundamentally impacts practical activities. The primary source of income for a commercial bank is interest earned on loans and advances (Ahmed et al., 2018; Iqbal et al., 2023 and Iqbal et al., 2022).

The main factor contributing to banks' financial challenges is closely associated with regulations that control the process of giving loans to defaulters (Lam et al., 2018; Tian et al., 2021). The board's fundamental actual is to mitigate risk impact on business associations, particularly business banks (Bouteille et al., 2021; Demand et al., Zhang, 2019). Advances serve as a reliable measure of an Islamic bank's credit risk exposure as they often constitute a significant amount of its assets and financial liabilities (Muye et al., 2017; Qamar et al., 2023). Islamic banks should prioritize successful credit risk management (Kimondo et al., 2012). Islamic banks generate revenue through premium collections on credits and loans. Islamic banks face various risks due to their liquidity and lending possibilities to credit departments (Bolarinwa et al., 2019; Kargi, et al., 2011 and Iqbal et al., 2023).

Different analyses have been supervised to determine the effect of CRM on the business operation of businesses or retail finance organizations in Pakistan. Their choices differ. Multiple studies indicate that credit risk management significantly impacts deposit-taking organizations in Pakistan (Nwude et al., 2018; Alalade et al., 2015). In their research, Echobu et al. (2019) found that banks' financial performance was negatively impacted by non-performing loans and difficulties with advance charge-offs. The study conducted by Sulaiman (2019); Gambo et al. (2019) and Gana et al. (2022) indicates that CRM have no significant impact on mutual fund organizations' business execution. Studies examining the effect of credit risk on business or credit-taking reserves in Pakistan show significant differences. This research addresses a previously undiscovered area in the literature. In addition, this study enhances current knowledge of how credit risk impacts commercial or retail banking institutions' financial performance. Moreover, Islamic finance institutions could gain advantages from the study's findings by acquiring guidance on enhancing their credit risk management techniques.

This study analyzed five significant Islamic banks in Pakistan. The study examined the impact of CRM on IBs financial performance. Islamic Meezan Bank, HBL Islamic bank, Dubai Islamic Bank, Bank of Islami, and Faysal Islamic Bank have been selected as Islamic institutions for testing. The review examines the correlation between non-performing financing (NPF) and Islamic banks' financial performance. Furthermore, it aims to elucidate the correlation between preventative measures taken to mitigate credit crises and financial performance. The evaluation will also evaluate the influence of non-performing financing (NPF) on Islamic banks' performance and determine the factors contributing to NPF. Additionally, the evaluation will provide suggestions for Islamic banks to enhance their financial performance (Iqbal et al., 2023).

The study is organized as follows: following the introduction, the next section comprises a literature review using quantitative, theoretical & empirical perspectives. The last section

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examines the examination strategy and hypothesis improvement. The statistics is examined, and results are discussed. As a result, the conclusions and concepts presented in this work are highlighted.

LITERATURE REVIEW

This chapter focuses on the discussion of relevant literature, including implemented, hypothetical, and empirical techniques. The hypothesis of research has also been developed.

Islamic Banks (IBs)

It has been shown that Islamic banks accept investments and give loans for business & savings commitments (Elshaday et al., 2018; Echobu et al., 2019). IBs can be called Deposit Funds Banks (DFBs) (Njoku et al., 2017; Apochi et al., 2022; Ajo et al., 2019 and Agbamuche et al., 2022). Islamic banks produce income but can also experience losses when customers default on their financial commitments (Kumar et al., 2019; Suganya et al., 2018). The Islamic banking industry promotes financing through monthly installments made by customers. However, Islamic banks' inability to pay on their financing has a negative impact on their performance (Bouteille et al., 2021; Witzany et al., 2017). Default risk develops when creditors fail to fulfill their contractual responsibilities and default. The probability of default may arise due to a negative assessment of borrowers' reliability and their inability to meet stringent financial requirements (Cost et al., 2019; Tian, 2021). Research has shown that Islamic banks' financing can lead to positive results in cases where customers fail to fulfill their financial responsibilities properly (Kumar et al., 2019; Suganya et al., 2018 and Iqbal et al., 2023). Islamic banks offer significant benefits than traditional banks due to the practice of premium-free benefit sharing. It should be noted that Islamic banks are exposed to greater credit risk due to the absence of a fixed interest rate and may suffer losses if customers fail to meet their financial obligations due to the lack of a fixed interest rate. As a result of default risks, Islamic banks may suffer serious consequences, their reputation may be damaged, and their credibility may be diminished. Additionally, it may affect their ability to borrow funds from external sources, as lenders may be hesitant to lend to a bank that is more likely to default.

Credit Risk Management (CRM)

Having a strong CRM structure is essential for improving the image of Islamic banks (Siriba, 2020; Molla, 2018 and Witzany, 2017). Credit risk is primarily derived from advances by Islamic banks. Islamic banks, however, are exposed to other sources of credit risk. Therefore, Islamic banks should establish a credit monitoring group to confirm that credit is accurately monitored and controlled. Successful credit risk boards must provide a reasonable environment, implement a reliable credit concession procedure, & maintain a suitable credit organization in order to screen the cycle and reduce credit risk openings (Almekhlagi et al., 2016; Akomeah et al., 2017 and Iqbal et al., 2023). By establishing a credit monitoring group, potential risks can be identified early, as well as current risk management strategies can be evaluated for effectiveness. Furthermore, it may be able to assist the bank in complying with applicable laws and regulations. As a findings, Islamic banks are expected to ensure the acceptance and implementation of an effective strategy by their executive management. A creditworthiness assessment may be conducted using either qualitative or quantitative methods. The borrowers' attributes are assessed using both quantitative and qualitative models, which assign numerical values to the extent to

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which these attributes meet a certain threshold (Werner, 2016; Echekoba et al., 2014). The term "credit scoring" refers to this technique (Tian, 2021; Demand and Zhang, 2019). Commercial banks can mitigate credit risk by employing robust grading systems when they borrow money. Counterparties failing to fulfill its obligations poses a major find of credit risk for Islamic banks (Afolabi et al., 2021; Kinyua et al., 2017 and Iqbal et al., 2023).

Islamic banks should examine credit risk in their portfolios & liabilities. CRM contains of measures designed to mitigate credit risk. CRM involves the management of credit risk within the financial sector, including operations such as credit risk analysis, calculation, evaluation, observing, & management (Tian, 2021; Request et al., 2019). It includes determining probable risk influences, analyzing the outcomes, analyzing measures taken according to the identified risk factors, and implementing regulator actions that mitigate or minimize negative effects (Cap et al., 2020; Suganya et al., 2018). Business banks should implement a robust credit risk management framework in their strategy and operational system (Kumar et al., 2019; Kegninkeu, 2018). Islamic banks should enhance their regulated financing requirements. A thorough credit score is essential for finding out if an individual would be denied credit due to health or bankruptcy (Afolabi et al., 2020; Ajao et al., 2019). The FICO score assesses an investor's reliability in preventing default, which can lead to financial losses. The FICO measurement assesses the customer's probability of defaulting on a loan (Apochi et al., 2022; Bhattarai, 2019 and Iqbal et al., 2023). Credit analyzers and loan managers use borrower knowledge to determine financial choices. In order to determine the probability of credit default, it is crucial to conduct a reliability examination that considers both public and private reputations. FICO rating authorities should adopt an unbiased and objective approach when determining the defaulter's financial position & skill to refund the obligation (Cheng et al., 2020; Bogale et al., 2019 and Al-Husainy et al., 2021).

Islamic Banks (IBs) and Corporate Performance

Measuring an organization's performance is a difficult task that requires many variables, such as profitability, value to the market, growth, return on equity, strength, and monetary valuation of the organization (Bogale, 2019; Suganya et al., 2018 and Werner, 2016). Financial customers, including investors, lenders, lawmakers, and any other appropriate parties, can make informed economic decisions by examining Islamic banks' financial performance (Garcia et al., 2019; Herciu, 2017). Islamic financial transactions yield both benefits and drawbacks (Al-Homaidi et al., 2018; Almaqtari et al., 2019 and Bhattarai, 2020). EPS is crucial for reporting on business finances. EPS, or Earnings Performance Score, is a measure used to assess Islamic banks' act (Alalade et al., 2015; Ahmed et al., 2018). EPS are required in organizational financial reporting as a regulatory requirement in several countries, particularly Pakistan (Cho et al., 2022; Power, 2021). The Return on Assets (ROA) metric measures the relationship between a bank's net profit & its overall resources, while the Return on Equity (ROE) metric is determined based on the connection among net income after taxes and shareholder equity (Power, 2021; Cho et al., 2022). NIM is an important indicator that represents the ratio of interest revenue to earning assets. It serves as a significant indicator of total income in the financial services sector (Grochulski et al., 2018 and Iqbal et al., 2023).

Financial Performance

Financial performance analyzes the impact of an organization's techniques, methods, and operations numerically. Financial performance relates to a bank's capacity to effectively usage its

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incomes resources to produce profits (Herciu, 2017; Molla, 2018). Financial performance inspection involves an examination of profits, liabilities, and profits. The most important indicators of performance, represented as ratios, consist of productivity, liquidity, market influence, and investor ratio (Bouteille et al., 2021; Order et al., 2019 and Iqbal et al., 2023). Net revenue refers to the proportion of profit generated after reducing direct expenses for the product or service from all revenue. Operating margin refers to a range that includes net profit computations, but also total revenue. This includes all expenses. Liquidity ratios reflect the ability to fulfill immediate monetary obligations. Company effectiveness in using resources is measured by performance ratios (Lam et al., 2018; Tian, 2021 and Iqbal et al., 2023). A design of the monetary influence and item percentages can determine the viability of long-term debt in the future (Tian, 2021; Lam et al., 2018). The economic growth and profitability rate of a corporation can be computed using at least two proportions. An assessment of an organization's success heavily relies on its stock valuation. Return on assets (ROA) and return on equity (ROE) are metrics used to assess an organization's financial health (Bouteille et al., 2021; Request et al., 2019 and Kodithuwakku, 2015). Association performance can be assessed by analyzing return on assets (ROA). Return on Assets (ROA) quantifies the efficiency of an organization's management in utilizing its economic resources to generate profits. ROE) is a ration of monetary profitability. ROE measures an organization's ability to effectively use investors' funds to enhance its net profit. An organization's regulatory sustainability increases as its return on assets (ROA) and return on equity (ROE) increase. On the contrary, a decrease in return on assets (ROA) and return on equity (ROE) indicates a decreased degree of managerial effectiveness inside the organization. Generally, the percentage of benefits is determined by net income, which is the amount of money left after subtracting the direct costs associated with deals and benefits. A working margin can be defined as the difference between net revenue after all expenses have been taken into account and gross productivity. Ratios of liquidity demonstrate an organization's ability to meet unexpected obligations.

Return on Assets (ROA)

Return on assets (ROA) is a financial performance measure. ROA is a determine that assesses banks' effectiveness in producing earnings from their limited assets (Kauko, 2012; Muye et al., 2017 and Kiptoo et al., 2021). ROA, which stands for Return on Assets, is a statistic that makes it possible to determine an organization's effectiveness and performance in operations. The organization's earnings are predicted based on the assets it funds (Lam et al., 2018; Tim et al., 2021). The expression describes the share of gross profit to entire assets. A developed proportion indicates higher financial performance. Performance is the most recognized measure of bank financial performance. Productivity is determined by ROA, ROE, & Price of Payment Determinations (Nwude et al., 2018; Nwosu et al., 2020). The research utilized ROA as the dependent variable (Nwosu et al., 2018; Iqbal et a., 2023). ROA is calculated by dividing net profit by total assets. The Return on Assets (ROA) metric assesses leaders' ability to purchase businesses at an acceptable price and transform them to profitable businesses (John et al., 2019; Hosna et al., 2019). But IBs are projected to experience a certain amount of unsatisfactory credit and liabilities in their lending business. The bank attempts to minimize such unfortunate events to further improve its productivity.

Assumed Financial Risk (AFR)

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Assumed financial risk (AFR) refers to the non-cash cost experienced by banks for compensating for expected losses from credit defaults in the future (Tian, 2021; Lam et al., 2018). In this assessment, AFR was utilized as a mediator for CRM. Due to Islamic banks assuming that a specific percentage of their mortgages may default or postpone payments. Banks use the rate as an expense when calculating net profits. Due to a default, this assures the bank's financial health and financing. Fakhrunnas et al. (2019) determined that the granting of financing by a specific bank involves a risk that results in an increase in the yearly provision for credit losses. Njoku et al. (2017); Nelly et al. (2019) conducted the research. IBs with a lower percentage of high-risk loans will use a lesser sum of money for future loan losses than a bank with a greater amount of high-risk loans (Malik et al., 2021; Mudanya et al., 2018). Bank credit loss provisions have significant effects on their effectiveness. CRM affects relating possible hazards, assessing their impact & consequences, examining actions exposed to these hazards, & effecting monitor procedures to avoid or mitigate adverse outcomes (Zhang, 2019; Bouteille et al., 2021 and Iqbal et al., 2023). This system has a broad effect on the bank's functional organization, procedures, and strategies. Islamic banks face increased credit risk when they are incapable of repaying advances, which are commonly referred to as non-performing loans (Otieno et al., 2020; Inegbedion et al., 2020). Implementing efficient CRM decreases non-performing loans. It reduces possible losses by ensuring that consumers repay their financial obligations.

This study utilized AFR as a credit risk-the-board mediator since IBs organize on the belief that a specified ratio of advances will not be repaid or will be late. Because of this, Islamic banks consider rates to be a cost when calculating pre-charge income. As a result, a financial institution is capable of being dissolved and capitalized in the event of a default. IBs are able to supervise their recognize hazard by using AFR to determine the cost of default in a standardized manner. As a result, they will be able to remain solvent even if a large number of defaults occur. Recent studies have shown that the credit assumed financial risk (AFR) limitations provisions given out each year increase as the risk of the loans provided by an Islamic bank increases (Fakhrunnas et al., 2019). Compared to an Islamic bank with greater issues, a bank issuing less risky loans will have a lower credit disaster arrangement (Malik et al., 2021; Mudanya et al., 2018 and Iqbal et al., 2023). Bank performance is most affected by the arrangements for predicting bad luck. In this case, less risky loans represent less risk to the bank, so the bank does not have to set aside as much money for credit disasters. Therefore, they are able to reduce their overall operating costs and, as a result, increase their profits. Credit risk is managed by the board by identifying potential threats, evaluating their outcomes, observing exercises that test the identified threats, and putting control measures in place to minimize or prevent negative effects (Bouteille et al., 2021; Duty et al., 2019). During this cycle, the Islamic bank's operational system, methodologies, and methods are examined. Non-performing financing, also known as non-payment of advances by Islamic banks and financial institutions, increase in intensity their credit chances (Otieno et al., 2016; Inegbedion et al., 2020).

Non-Performing Financing (NPF)

Failure of financial organizations to pay back debt, also referred to as NPF, rises credit danger for IBs (Otieno et al., 2016; Poyeraz et al., 2019 and Hamza, 2017). NPF is difficult to recover in Pakistan. IBs & Extra Financial Organizations Act (BAFO) 2020 provides a governing body to enhance the financing climate and recovery of credit operations within Pakistan's financial system. NPF refers to an obligation that is past its due date, but a portion of the principal balance remains unpaid (Ari, 2019; Iqbal et al., 2023). The exact meaning is determined by the specific

expressions are used to explain the development. To continue to ensure the stability of the monetary system, it is crucial to maintain effective and sustained profitability. If stability is high, a low profit diminishes a bank's ability to absorb unexpected events and enhances solvency. Islamic banks should mitigate credit risk, including reducing non-reimbursed loans. NPF assesses the practicability and reliability of bank CRM. Depending on the terms of the credit, the specific definition will vary. Sound and realistic output is essential for maintaining the financial framework's security. Poor benefits weaken an Islamic bank's ability to withstand unfavorable shocks and increase dissolvability if dissolvability is high. Consequently, Islamic banks are required to decrease their credit risk, which includes NPF. An Islamic bank's CRM is judged by its NPF. As a result, it is important for Islamic banks to monitor their non-performing financing levels in order to minimize their credit risk. To achieve this, it is necessary to set appropriate credit policies, provide adequate training, and ensure that proper risk management systems are in place.

Financial Mediation Concept

Mises' (1912) theory of financial mediation in banking argues that banks promote financing for customers by operating as mediators on the credit markets and as issuers of mortgages. Banks offer stability by obtaining funds from banks through short-term deposits and offering them to consumers via long-term loans (Tian, 2021; Zhang, 2019). Banks gain by collecting deposits from consumers and lending money at higher interest rates (Krugman, 2015; Werner, 2016). Islamic banks face significant liability for significant credit risks as a result of their operations including foreign currency operations, international operations bonds, trade finance, equity investments, and options (Olson et al., 2017; Siddique et al.,2022 and Afolabi, 2021). Concept of financial mediation applies to Islamic banking, which acts as a lender of advances and a credit regulator when people borrow money from one another. Liquidity is created by Islamic banks by purchasing assets from contributors with rapid growth & financing to defaulters with slower growth (Tian, 2021; Duty et al., 2019 and Iqbal et al., 2023). In addition to Krugman (2015); Werner (2016), Islamic banks also benefit from accepting client assets to lend at a higher interest rate. In accordance with Islamic banks are gradually likely to accept significant credit risks in their involvement in bonds, interbank exchanges, unfamiliar trade exchanges, exchange funding, values, and trades. This is due to the fact that Islamic banks are able to offer higher interest rates and more flexible terms than their traditional counterparts. Moreover, Islamic banks can take advantage of the growing demand for Shariah-compliant investments, as Muslims are increasingly looking for ethical and socially responsible investments.

Hypothesis Development

The following hypothesis was created for this study based on the literature review:

H1: *Islamic banks and financial performance is affected by credit risk management.*

H0: *Islamic banks and financial performance is not affected by credit risk management.*

RESEARCH METHODOLOGY

This study used a semi-experimental approach. A total of fifteen (15) significant periods of board data covering (2019-2023) were got from the assessed financial reports of 5 prominent publicly

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traded banks and utilized for the review. For this assessment, a purposeful inspection technique was employed to select five (5) first-level banks. The chosen banks include access Meezan Bank, HBL Islamic, Dubai Islamic Bank, Bank of Islami, and Faysal Islamic Bank. IBs included in this research are Deposit Funds Banks (DFBs) registered on the PSE. The population of this research involves of twenty recorded DFBs in Pakistan's financial district as of December 2020. The design of this research is established on a semi -experimental methodology. Five first-level registered Islamic banks analyzed financial reports were analyzed over five (5) years (2019-2023) for the purpose of this study.

The assessment uses a comprehensive regression assessment exhibit constructed on the hypothesized causal link among CRM & financial performance. The evaluation considers non-performing financing (NPF), expected assumed financial risk (AFR), and Return on Assets (ROA) as variables. The dependent variable in this study is return on assets (ROA), whereas the independent variables are expected assumed financial risk (AFR) and non-performing financing (NPF). The model was evaluated with regression methods, including random effect, fixed effect, or polled ordinary least square (OLS).

The following model was utilized to test the study hypothesis: The formula is expressed as: Return on Assets (ROA) equals the intercept (β0) plus the coefficient of Non-Performing Loans (NPL) (β1), multiplied by the coefficient of Expected Credit Losses (ECL) (β2), plus the error term (ε).

$$ROA = \beta 0 + \beta 1\ NPG + \beta 2\ AFR + \varepsilon$$

Where:

- ROA- Return on Assets
- The variables β0, β1, and β2 represent regression constants.
- Non-performing financing (NPF) shows how banks manage credit risk.
- Assumed financial risk (AFR) is a credit estimate that considers default probability.
- The measure ε serves as a form of background activity that is expected to reflect the influence of external factors on the dependent variable.

The model is assessed using the Ordinary Least Squares (OLS) regression technique. Ordinary Least Squares regression (OLS) is an analysis used for determining the coefficients of linear regression models that analyze the connection between independent and dependent variables.

ANALYSIS AND RESULTS

Appendix 1 contains the data obtained for this study. The data were analyzed utilizing explanatory data, the unit root test, the co-integration test & regression analysis. Table 1 shows significant quantitative measurements.

Table 1: Descriptive Data

VARIABLES	ROA	NPF	AFR

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Mean	0.034041	0.063882	-1.245268
Median	0023964	0.039001	-0.215273
Maximum	0.079030	0.300001	0.506159
Minimum	-0.029899	0.014001	-43.51334
Dev-Std.	0.023139	0.053089	5.218445
Skewness	0.666451	2.630881	-6.530807
Kurtosis	4.837922	11.51569	53.59314
Bera-Jarque	6.690195	279.7144	7317.973
Prob*	0.041212	0.000000	0.000000
Sum	1.727994	3.816056	-91.48503
Dev-Sq-Sum	0.012774	0.137385	1969.107
Obs*	77	77	77

Source: *Scholar's Estimate with Eviews-10*

Table 1 presents an in-depth assessment of return on assets (ROA), non-performing financing (NPF), and assumed financial risk (AFR). The mean is the average value of a series, concluded by dividing the sum of the absolute values by the sum of interpretation. Table 1: indicates a mean ROA of 3.4%, a mean NPF of 6.3%, and an average AFR of -124.5%. Assuming that the variables are arranged in ascending order, the middle value represents the series' center. Table 1: displays that the average Return on assets is 2.3%, the median NPF is 3.9%, & the median AFR is -21.5%. This study's analysis is based on the information series with the highest and lowest upsides. In regard to ROA, 0.07 and -0.02 are the most extreme and least extreme attributes, respectively, followed by 0.30 and 0.014 for NPF and 0.50 and -43.5% for AFR. Standard variation is a determine of the divide or distribution of a sequence. According to Table 1, the standard deviations for ROA, NPF, and AFR are 0.02 and 0.05, respectively. As a result, ROA and NPF data points are evenly distributed around the median, while AFR data points are not evenly distributed. The ROA and NPF values are more reliable indicators of performance, while the AFR values may be less reliable.

Skewness measures differences between a series' mean dispersion and its variance. Positive skewness implies a long right tail for the channel, whereas negative skewness implies a long right tail for the dispersion. The skewness of a typical circulation is zero. In general, but the skewness of the data is between -0.5 & 0.5, the data is reasonably symmetrical. When the skewness is among - 1 and - 0.5 or 0.5 & 1, the data are extremely skewed. In the case where the skewness is not approximately - 1 or more extreme than 1, then the information is extremely skewed. In addition, ROA (0.66) and AFR (-6.53) have acceptable skewness because they are less than 1, while NPF has a significant skewness at 2.63. This indicates that the data points of ROA and AFR are distributed more evenly, while NPF's data points are highly concentrated. Therefore, it is important to consider the skewness of the data when analyzing its distribution.

In aggregate, there is a proportion of kurtosis between the two tails. It is estimated that there is a probability in the tails. In common usage, the kurtosis of a normal distribution, which can be compared to a 3-Mesokurtic distribution, is contrasted with its value. Generally, if the kurtosis is greater than 3, then the data set has a heavier tail than the normal distribution (more tails-Leptokurtic). In the case of a data set with kurtosis less than 3, the data set has fewer tails than its normal distribution (less tails-Platykurtic). Based on the kurtosis, ROA (4.83), NPF (11.5), and AFR (53.5) exhibit leptokurtic transfer. This indicates that the distribution of the ROA, NPF, and AFR data is leptokurtic, meaning it has heavier tails than its normal distribution. This indicates that the data has a higher probability of occurring in the tails, or extreme values, than

its normal distribution.

Similarly, to AFR, ROA and NPF are strongly skewed. An indicator of positive skewness is one that indicates a positive deviation from the normal distribution. The positive skewness indicates that there will be an upward trend from 2019 to 2023, while the negative skewness indicates a downward trend. Moreover, it is shown in Table 2 that ROA (004), NPF (0.00), & AFR (0.00) have a minimal likelihood and are not commonly used to establish variables. The findings of Jarque-Bera support this conclusion as well. This table summarizes the results of the unit root test. This means that the variables ROA, NPF, and AFR are not stationary and should not be used in time series analysis. Furthermore, the unit root tests indicate that the variables are non-stationary and should not be used for establishing variables.

Table 2: Unit Root Test Summary

Technique	ROA		NPF		AFR	
	Statistic	**Prob.***	**Statistic**	**Prob.***	**Statistic**	**Prob.***
Chu t* - Levin, Lin	-657687	0.000	-7.97545	0.000	-8.79405	0.000
Chi-squared Fisher - ADF	47.2403	0.000	57.4879	0.000	67.5221	0.000
CHI-squared Fisher - PP	94.6667	0.000	90.0168	0.000	100.156	0.000
Integration Order	I(1)		I(1)		I(1)	

Source: *Scholar's Estimate with Eviews-10*

For determining and confirming the unit root value of the series as well as the model's stationarity, this review utilized the Chut* - Levin, Lin, Chi-squared Fisher - ADF, and Chi-squared Fisher - PP techniques. Using the fixed test, the deceptive regression problems typically associated with time series econometric testing can be eliminated. When the time series data is not stable, it is important to establish the request for combination and to determine whether the elements are coordinated in a comparable manner. Co-mix is based on the assumption that at least two series will move together closely over time, regardless of whether they are moved or not; the difference between them will not change. This means that if two series are co-mixed, they will move in tandem, even if one series is shifted or changed. This is different from a traditional correlation, where the two series must be identical in order for the correlation to be valid. The study has been conducted on each component and it has been found to be fixed at the most distinct memories. In Table 2, it can be seen that the most recognizable distinction structure for ROA, NPF, and AFR is fixed and managed at request one (1).

Analysis of Hypothesis

The hypothesis was assessed using the T-test, R2 coefficient of measure, & Regression Coefficient for assessing the level of relationship among each aspect. Our decision rule is to reject the null hypothesis if the t-value determined is higher than the important t-value. However, if the measured t-value is less than the significant t-value, we fail to reject the null hypothesis. The research suggested hypothesis is:

H0: *Islamic banks financial performance is not affected by credit risk management.*

Testing the hypothesis existed conducted using the resulting show:

$$ROA = \beta 0 + \beta 1\ NPF + \beta 2\ AFR + \varepsilon$$

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Co-integration describes the numerical implications of longstanding-term relationships among financial components. Essentially, co-integration implies that at least two series will move close to one another over time, regardless of whether they are moved or not; the difference between them will remain constant. However, the non-existence of cointegration indicates that the factors do not have a long-term correlation. In table 4:: the findings of the co-integration test are presented. The results of the test suggest that there is a positive and significant relationship between financial components, indicating that there is a long-run connection between them. This suggests that investors should consider the financial components when making investment decisions.

Table 3: Test of Co-Integration

			Statistic-t	**Prob.***
AFD			1.571343	**0.02717**
Variance Residual			6.177044	
Variance HAC			1.977054	
Variables	**Coefficient**	**Error-Std.**	**Statistic-t**	**Prob.***
(-1) Resid	-0.49474	0.136393	-2.639309	0.0007
(1-) D (Resid)	-0.08745	0.132112	-0.766201	0.5154
Square-R	0.267451	Mean D-V		0.0039
Square-R-Adj.	0.252111	S.D D-V		0.0083
Regression SE	0.007991	Info. Creation		-7.0299
R-square Sum	0.003167	Sch. Creation		-6.9533
Prob* Log	230.4910	HQ. Criter		-7.0023
Watson-Durbin	2.077431			

Source: *Scholar's Estimate with Eviews-10*

Table 3 indicates no cointegration between all variables because the probability (0.027) is below 0.05. Based on the model estimate regression, the ROA, NPF, and AFR variables do not have any long-run relationships. This resulted in the identification of an inaccurate claim. It can be concluded from this that Islamic banks' performance in Pakistan is not affected by credit risk management. For the hypothesis model, table 4: confirms the regression effect by random effects. The random effects demonstrate indicates that there is a positive correlation among CRM & effectiveness for IBs in Pakistan. This indicates that credit risk management does not affect Islamic banks' performance in the country.

Table 4: Mode 1; GLS – Hypothesis of Random Effects

Variables	**Coefficient**	**Error-Std.**	**Z**	**Prob***
Constant	0.02715	0.00398	7.2558	<0.01
NPF	−0.0655	0.02455	−3.253	0.011
AFR	0.00025	4.10522	14.532	<0.01

Mean – D.V	0.0210	S.D – D.V	0.0132
Resid – Sum-square	0.0107	Regression – S.E	0.0125
Prob* Log	227.25	Criterion Akaike	−443.25
Sch-Criterion	−439.24	Quinn-Hunnam	−442.22
Rho	0.5001	Watson-Durbin	0.9522

Source: *Scholar calculation with Gretl.*

Based on the erratic influence of the Breusch-Agnostic test, a regression study was conducted ($p<0.05$). Since it involves predicting anything about the population from which the instance is

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selected, a random effects model is presented. Table 4 shows that NPF has a significant ($p<0.05$) and negative ($\beta1 = -0.0655$) effect on ROA. The findings indicate that NPF has a negative effect on ROA, indicating that NPF should be managed in a proactive manner so that ROA can be maximized. Additionally, Table 4 indicates that assumed financial risk (AFR) has a significant ($p<0.05$) and positive ($\beta2= 0.00025$) influence on ROA.

DISCUSSION OF RESULTS

This research analyzed the effect of credit risk on the financial performance of IBs, with 5 major IBs in Pakistan as the focus of analysis. The analysis's findings indicate that:

a) NPF has a statistically significant negative effect on ROA with a coefficient of 0.0655 ($p < 0.05$). This shows that ROA is projected to decline by 0.0655 units for each part improve in NPF, while the other factors remain coefficient. The findings also suggest that NPF has a negative effect on IBs' financial performance. Additionally, they have a significant role in assessing ROA in Pakistan's Islamic banking sector. This corresponds to previous research findings indicating that NPF have a negative effect on IBs' liquidness & efficiency (Li et al., 2014; Serwadda 2019; Echobu et al., 2019; Ajao et al., 2019 and Agbamuche et al., 2022).

b) The assumed financial risk (AFR) prevention measures have a statistically significant and positive influence on return on assets (ROA), with a beta coefficient of 0.00025 and a p-value of less than 0.05. This indicates that a one-unit increase in AFR should result in a corresponding increase of 0.00025 units in ROA, while holding all other factors constant. The results also indicate that AFR has a crucial role in determining return on assets (ROA) in the Pakistani financial sector. In contrast to prior studies, which found that AFR had a detrimental impact on Islamic banks' profitability (Olawale, 2014; Gizaw et al., 2015; Alshatti, 2015; Nwude et al., 2018 and Serwadda, 2018).

CONCLUSIONS

This research assessed the effect of credit risk on Islamic banks' financial performance, utilizing 5 major Islamic banks in Pakistan as a basis study. This research indicates that credit risk organization does not significantly influence Islamic banks' financial performance.. As well as accepting deposits, Islamic banks are also known as deposit funds banks (DFBs). They provide financing for use and hypotheses. Islamic banks promote repayment, but if borrowers don't make payments, they risk being affected. As a result of collecting financing for borrowers' advances, Islamic banks earn a profit. Islamic banks use a risk management system to protect themselves from potential losses. This system includes risk assessment, credit scoring, and financial analysis. This system helps identify potential risks associated with a borrower's loan. It can help banks make informed decisions about whether or not to accept a loan application.

However, a bank's financial performance is affected by borrowers not paying off their financings (defaulting risk). When defaulters fail to know their requirements and defaulting on their loans, default risk is created. The risk of credit default will be reduced by a strong board of directors and excellent corporate management. As a result of compliance obligations, Islamic banks are required to maintain very low levels of AFR in order to protect their funding sources' investments.

As a result, the stability of the financial system will be enhanced. Therefore, Islamic banks should effectively manage and filter non-performing financing (NPF). If banks are unable to do this, they risk defaulting on their financing, which could lead to a credit crunch and a wider economic crisis. Strong corporate governance and well-structured risk management systems are necessary to protect financial system stability.

Based on the results of this research, it is suggested that:

1. Islamic banks should ensure sound credit risk across their entire management team in order to protect the assets of contributors, avoid Islamic bank difficulties, and increase contributor profits. All in all, Islamic banks must actively manage their credit risk to ensure a secure and profitable future.
2. Islamic banks should conduct a proper credit risk assessment and create an advanced recovery mechanism before making any developments. In addition, advance installment defaulters should be subject to sufficient penalties. Therefore, Islamic banks should ensure that proper measures are taken to protect lenders and investors.
3. To increase the accessibility of credit, Islamic banks should adopt an effective deposit strategy. They should also create a strong credit risk management strategy to increase benefits and support against credit risk. Overall, these strategies would promote greater financial inclusion and usage of Islamic banking products.
4. Compliance organizations should train their employees to understand the generally recognized practices for regulating Islamic banks.

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REFERENCES

Afolabi, T. S. (2021). Impact of credit management strategies on loan performance among microfinance banks in Nigeria. *Academy of Accounting and Financial Studies Journal, 25*(S4), 1-10.

Afolabi, T. S., Obamuyi, T. M. & Egbetunde, T. (2020). Credit risk and financial performance: evidence from microfinance banks in Nigeria. *IOSR Journal of Economics and Finance, 11*(1), 8–15.

Agbamuche, F. A., Yusuf, A. A. & Shuaibu, H. (2022). The effects of credit risk on financial performance of quoted deposit money banks. *International Journal of Management, Social Sciences, Peace and Conflict Studies, 5*(2), 75-85.

Ahmed, A. S., Takeda, C. & Shawn, T. (2018). Bank loan loss provision: A re-examination of capital management and signaling effects (pp. 1-37). *Working Paper, Department of Accounting, Syracuse University*.

Ajao, M. G. & Oseyomon, E. P. (2019). Credit risk management and performance of deposit money banks in Nigeria. *African Review of Economics and Finance, 11*(1), 178-198.

Akomeah, M. O., Kong, Y. S., Hu, X. & Afriyie, S. O. (2017). Bearing of credit risk management on financial performance: Evidence from financial institutions in Ghana. *American Journal*

of Multidisciplinary Research, 5(2), 150-160.

Alalade, S. Y., Agbatogun, T., Cole, A. & Adekunle, O. (2015). Credit risk management and financial performance of selected commercial banks in Nigeria. *Journal of Economic & Financial Studies, 3*(1), 1-9.

Al-Homaidi, E. A., Tabash, M. I., Farhan, N. H. S., Almaqtari, F. A. & McMillan, D. (2018). Bank-specific and macro-economic determinants of profitability of Indian commercial banks: A panel data approach. *Cogent Economics & Finance, 6*(1), 1-26. https://doi.org/10.1080/23322039.2018.1548072.

Al-Husainy, N. H. M. & Jadah, H. M. (2021). The effect of liquidity risk and credit risk on the bank performance: Empirical Evidence from Iraq. *IRASD Journal of Economics, 3*(1), 58-67. https://doi.org/10.52131/joe.2021.0301.0025.

Almaqtari, F. A., Al-Homaidi, E. A., Tabash, M. I. & Farhan, N. H., (2019). The determinants of profitability of Indian commercial banks: A panel data approach. *International Journal of Finance & Economics, 24*, 168-185. https://doi.org/10.1002/ijfe.1655.

Almekhlafi, E., Almekhlafi, K., Kargbo, M. & Hu, X. (2016). A study of credit risk and banks' performance in Yemen: Panel evidence. *Journal of Management Policies and Practices, 4*(1), 57-69. https://doi.org/10.15640/jmpp.v4n1a4.

Alshatti, A. S (2015). The effect of credit risk management on financial performance of the Jordanian Commercial banks. *Investment Management and Financial Innovations, 12*(1), 338-345.

Apochi, J. G. & Baffa, A. M. (2022). Credit risk and financial performance of deposit money banks in Nigeria: moderating role of risk management committee. *European Journal of Accounting, Auditing and Finance Research, 10*(10), 98-115.

Ari, A., Chen, S. & Ratnovski, L. (2019). The dynamics of non-performing loans during banking crises: A new database. *Washington, DC: International Monetary Fund*.

banks in Sri Lanka. SCMS Journal of Indian Management, 15(2), 5-12. https://doi.org/10.18374/jife- 18-1.6.

Bhattarai, B. P. (2019). Effect of credit risk management on financial performance of commercial banks in Nepal. *European Journal of Accounting, Auditing and Finance Research, 7*(5), 87-103.

Bhattarai, B. P. (2020). Effect of credit risk management on financial performance of commercial banks in Nepal. *Research Journal of Finance and Accounting, 7*(5), 87–103. https://doi.org/10.7176/rjfa/11-18-13.

Bogale, Y. W. (2019). Factors affecting profitability of banks: empirical evidence from Ethiopian private commercial banks. *Journal of Investment and Management, 8*(1), 8-15.

Bolarinwa, S. T., Obembe, O. B. & Olaniyi, C. (2019). Re-examining the determinants of bank

Bouteille, S. & Coogan-Pushner, D. (2021). The handbook of credit risk management: originating, assessing, and managing credit exposures (2nd ed). London*: Wiley Finance*.

Brahmana, R., Kontesa, M. & Gilbert, R. E. (2018). Income diversification and bank performance: Evidence from Malaysian banks. *Economics Bulletin, 38*(2), 799-809.

Central Bank of Nigeria (2020). The Banks and Other Financial Institutions Act (BOFIA). *Abuja, Nigeria: CBN*.

Cheng, L., Nsiah, T. K., Charles, O. & Ayisi, I. L. (2020). Credit risk, operational risk, liquidity risk on profitability. A study on South Africa commercial. *Revista Argentina de Clínica Psicológica, XXIX(5),* 5-18. https://doi.org/10.24205/03276716.2020.1002.

Cho, C. H., Kajuter, P. & Stacchezzini, R. (2022). The future of corporate reporting. *Accounting in Europe, 19*(1), 1-6.

Echekoba, F. N., Egbunike, C. F. & Ezu, G. K. (2014). Determinants of bank profitability in

Nigeria: Using Camel rating model (2001 - 2010). *IOSR Journal of Business and Management, 16*(9), 44-50.

Echobu, J. & Okika, N. P. (2019). Credit Risks and Financial Performance of Nigerian Banking Industry. *4(1),* 44-57.

Elshaday, T., Kenenisa, D. & Mohammed, S. (2018). Determinant of financial performance of commercial banks in Ethiopia: Special emphasis on private commercial banks. *African Journal of Business Management, 12*(1), 1–10. https://doi.org/10.5897/ajbm2017.8470.

Fakhrunnas, F. & Imron, M. A. (2019). Assessing financial risk and regional macroeconomic influence on Islamic rural bank performance. *Global Review of Islamic Economics and Business, 7*(1), 49-55. https://doi.org/10.14421/grieb.2019.071-05.

Gambo, H., Bambale, A. J., Ibrahim, M. A. & Sulaiman, A. S. (2019). Credit risk management and financial performance of quoted deposit money banks in Nigeria. *Journal of Finance, Accounting and Management, 10*(1), 26-42.

Gana, U., Tijjani, M. S. & Abubakar, S. (2022). Effect of credit risk on financial performance of listed deposit money banks in Nigeria. *Gusau International Journal of Management and Social Science, 5*(1), 49-65.

Garcia, M. T. M. & Trinidade, M. J. (2019). Determinants of banks' profitability in Angola. *African Journal of Economic and Management Studies, 10*(1), 116-128. doi:10.1108/ajems-06-2018-0161.

Gizaw, M., Kebede, M. & Selvara, S. (2015). The impact of credit risk on profitability performance of commercial banks in Ethiopia. *African Journal of Business Management, 9*(2), 59-66.

Grochulski, B., Schman, D., Steelman, A. & Zhang, Y. (2018). The differing effects of the business cycle on small and large banks. *Federal Reserve Bank of Richmond Economic Brief,EB*18-11.

Hamza, S. M. (2017). Impact of credit risk management on banks performance : A case study in Pakistan banks. *European Journal of Business and Management, 9*(1), 57-64.

Herciu, M. (2017). Drivers of firm performance: exploring quantitative and qualitative Approaches. *Studies in Business and Economics, 12*(1), 79-84.
in Nigeria. *Journal of Economic Studies, 46*(3), 633-651. https://doi.org/10.1108/JES-09-2017-0246.

Inegbedion, H., Vincent, B. D. & Obadiaru, E. (2020). Risk management and the financial performance of banks in Nigeria. *International Journal of Financial Research, 11*(5), 115-128. https://doi.org/10.5430/IJFR.V11N5P115.

Iqbal, M. S. ., Fikri, S. M. ., & Ahmi, A. . (2023). Relationship Between Musharakah, Credit Risk, and Profitability in Pakistan's Islamic Banks. *Journal of Applied Economics and Business Studies, 7*(3), 75-91. https://doi.org/10.34260/jaebs.735.

Iqbal, M. S., & Fikri, S. M. (2023). Comparison of Credit Risk Management Practices among Islamic and Public Commercial Bank's in Pakistan. *International Journal of Management Research and Emerging Sciences, 13*(3). https://doi.org/10.56536/ijmres.v13i3.509.

Iqbal, M. S., & Fikri, S. M. (2023). The Determinants of Growth in Banking Sector: Time Series Analysis of Conventional and Islamic Banking In Pakistan. *Islamic Banking and Finance Review, 10*(1), 51-67. https://doi.org/10.32350/ibfr.101.03.

Iqbal, M. S., & Sofi, M. F. B. (2022). Analyzing the impact of oil prices on commodity future listed on Pakistan mercantile exchange (PMEX) in the era of Covid-19. *South Asian Review of Business and Administrative Studies (SABAS), 4*(2), 103-112. https://doi.org/10.52461/sabas.v4i2.1513.

Iqbal, M. S., Fikri, S. M., & Ahmi, A. (2023). Relationship Between Musharakah, Credit Risk, and Profitability in Pakistan's Islamic Banks. *Journal of Applied Economics and Business Studies, 7*(3), 75-91. https://doi.org/10.34260/jaebs.735,

Iqbal, M. S., Fikri, S. M., Ali, M., Umar, M., & Yahaya, H. D. (2023). The Effect of Car Ijarah/Lease Financing on the Pakistani Islamic Banking Sector's Performance. *Pakistan Journal of Economic Studies (PJES), 6*(3), 219-230.Retrieved from https://journals.iub.edu.pk/index.php/pjes/article/view/2330.

Iqbal, M. S., Fikri , S. M., Imtiaz , A., & Yahaya , H. D. (2023). Impact of House Financing Accessibility on the Productivity of Private-Public Relationships in Mortgage Financing Conditions. *Journal of Contemporary Business and Islamic Finance (JCBIF), 3*(2),324–335. https://journals.iub.edu.pk/index.php/jcbif/article/view/2130.

John, E. & Okika, P. N. (2019). Credit risks and financial performance of Nigerian banking industry. *Amity Journal of Finance, 4*(1), 44-57.

Kauko, K. (2012). External deficits and non-performing loans in the recent financial crisis. *Economics Letters, 115*(2), 196-199.

Kegninkeu, F. T. (2018). The impact of credit risk management on the performance of commercial banks in Cameroon. Case study of BICEC Cameroon. *Global Journal of Management and Business Research, 18*(7), 19-40.

Kinyua, A. (2017). Effects of credit risk management practices on loan performance of commercial banks. *European Journal of Economic and Financial Research, 2*(2), 1-12.

Kiptoo, I. K., Kariuki, S. N. & Ocharo, K. N. (2021). Risk management and financial performance of insurance firms in Kenya. *Cogent Business and Management, 8*(1). https://doi.org/10.1080/23311975.2021.1938350.

Kodithuwakku, S. (2015). Impact of credit risk management on the performance of commercial banks in Sri Lanka. *International Journal of Scientific Research and Innovative Technology, 2*(7), 24-29.

Kumar, V. & Kishore, M. P. (2019). Macroeconomic and bank specific determinants of non-performing loans in UAE conventional bank. *Journal of Banking and Finance Management, 2*(1), 1-12.

Lam, Y., Kwan, E. T. & Lai, K. (2018). Managing credit risk under the Basel III framework. United States of America, USA: *CreateSpace Independent Publishing Platform*.

Levy, A. & Zhang, J. (2019). Credit risk measurement and management. London: *Risk Books.*

Malik, M. & Shafie, R. (2021). The effect of risk management committee on audit fees : Malaysian Evidence. *DLSU Business & Economics Review, 31*(1), 81–94.

Mises, L. V. (1912). Theorie des Geldes und der Umlaufsmittel. Leipzig: *Duncker und Humblot.*

Mudanya, L. E. & Muturi, W. (2018). Effects of financial risk on profitability of commercial banks listed. *International Journal of Social Sciences Management and Entrepreneurship, 2*, 75-93.

Muye, I. M. & Muye, I. Y. (2017). Testing for causality among globalization, institution and financial development: Further evidence from three economic blocs. *Borsa Istanbul Review, 17*, 117-132.

Nelly, K. M., Ambrose, J. & George, K. (2019). Bank size and financial risk exposure on financial performance of commercial banks in Kenya. *International Journal of Financial Research, 10*(6), 250-264. https://doi.org/10.5430/ijfr.v10n6p250.

Njoku, P. O., Ezeudu, I. J. & Ifeanyichukwu, E. L. (2017). The Impact of Credit Risk Management on Deposit Money Banks Performance in Nigeria. *Nigerian Journal of Management Sciences, 16*(10), 174-186.

Nwosu, C. P., Okedigba, D. O. & Anih, D. O. (2020). Non-performing loans and profitability of

the Nigerian commercial banks. *Economic and Financial Review - Central Bank of Nigeria, 58*(3), 35-58.

Nwude, E. C. & Okeke, C. (2018). Impact of Credit Risk Management on the Performance of Selected Nigerian Banks. *International Journal of Economics and Financial Issues, 8*(2), 287-297.

Olawale, L. (2014). The effect of credit risk on the performance of commercial banks in Nigeria. *African Journal of Accounting, Auditing and Finance, 4*(1), 29-52.

Olson, D. & Zoubi, T. (2017). Convergence in bank performance for commercial and Islamic banks during and after the Global Financial Crisis. *The Quarterly Review of Economics and Finance, 65*, 71-87.

Otieno, S., Nyagol, M. & Onditi, A. (2016). Relationship between credit risk management and financial performance: Empirical Evidence from microfinance banks in Kenya. Research *Journal of Finance and Accounting 7*(6), 80-84.

Power, M. (2021). The financial reporting system – What is it? *Accounting and Business Research, 51*(5), 459-480.

Poyraz, G. & Ekinci, R. (2019). The effect of credit risk on financial performance of deposit banks In Turkey. *Procedia Computer Science, 158*, 979-987.

Prakash, P., Iqbal, T., Habeeb, U., Rajesha, T. & Adel, S. (2017). An evaluation of financial performance of commercial banks. *International Journal of Applied Business and Economic Research 15* (2), 605-615.

Qamar, A., & Ain, Q. U. (2023). Examining the Influence of Organizational Inequity and Counterproductive Work Behavior on Workplace Misconduct within Pakistan's Power Industry. *Journal of Excellence in Management Sciences, 2*(1), 34-48.

Serwadda, I. (2018). Determinants of commercial banks' profitability: Evidence from Hungary. *Acta Universitatis Agriculture et Silviculturae Mendelianae Brunensis, Mendel University Press, 66*(5), 1325-1335.

Siddique, A., Khan, M. A. & Khan, Z. (2022). The effect of credit risk management and bank-specific factors on the financial performance of the South Asian commercial banks. *Asian Journal of Accounting Research, 7*(2), 182-194.

Siriba, R. M. (2020). Credit risk and financial performance of commercial banks in Kenya. *International Journal of Scientific and Research Publications, 10*(4), 448-454.

Suganya, S. J. & Kengatharan, L. (2018). Specific factors and financial performance of domestic

Tam, D. H. N. & Linh, P. T. T. (2020). Determinants of bank financial performance: The role of credit. *International Conference on Contemporary Issues in Economics, Management and Business, 3*, 2-19.

Tian, G. F. (2021). Unsecured lending risk management: A practitioner's guide. Ontario, Canada: *Green Wheat.*

Werner, R. A. (2016). A lost century in economics: Three theories of banking and the conclusive evidence. *International Review of Financial Analysis, 46*, 361-379.

Witzany, J. (2017). Credit risk management: Pricing, measurement, and modeling. *London: Springer.*

Zou, Y. & Li, F. (2014). The impact of credit risk management on profitability of commercial banks: A Study of Europe. *London: Macmillan.*

APPENDIX

Appendix 1: Return on Assets (ROA), Non-Performing Financing (NPF), & Assumed Financial Risk (AFR). ROA measures a company's profitability by taking into account all the assets it has and comparing them with the returns it has generated. NPF measures the amount of loans that a

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company has generated that are unpaid and AFR measures the risk of a company defaulting on its financing.

Islamic Banks	Years	ROA - %	NPF - %	AFR - %
Meezan Bank	2019	0.77%	11.87%	-150.53%
	2020	0.43%	13.58%	-143.02%
	2021	1.83%	2.99%	-25.25%
	2022	1.53%	3.60%	-20.24%
	2023	2.53%	2.28%	-3.58%
HBL Islamic Bank	2019	3.19%	2.14%	-19.25%
	2020	2.81%	3.41%	-21.553%
	2021	2.73%	3.00%	-5.42%
	2022	2.11%	1.82%	-0.53%
	2023	2.63%	1.85%	-2.58%
Dubai Islamic Bank	2019	3.31%	2.26%	-14.99%
	2020	2.95%	3.85%	-15.48%
	2021	2.54%	4.52%	-14.52%
	2022	2.91%	4.25%	-5014%
	2023	1.17%	4.88%	-4380.0%
Bank of Islami	2019	3.18%	1.25%	-24.25%
	2020	1.99%	1.87%	-10.22%
	2021	2.00%	2.25%	-11.91%
	2022	2.24%	3.00%	-15.50%
	2023	1.15%	5.53%	-180.25%
Faysal Islamic Bank	2019	1.87%	1.85%	-10.25%
	2020	1.99%	1.25%	-11.24%
	2021	2.50%	1.99%	-15.22%
	2022	1.18%	6.58%	-177.22%
	2023	2.87%	11.52%	-41.50%

Source: *Selected Islamic Banks' 2019–2023 Audited and Signed Annual Financial Statements. This source provides audited and signed financial statements for five Islamic banks from 2019 to 2023. This source is essential for understanding the financial performance of Islamic banks during this period.*

Note:

ROA = Net Profit Income / Total Assets*/100%

NPF = Financing Losses Amount / Total Financing Amount *100%

AFR = Assumed Financial Risk / Write Back on Financing / Net Profit