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# Liquidity Analysis Report for Clydesdale Bank PLC

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## **Executive Summary**

Clydesdale Bank PLC has a strong liquidity position. As of March 31, 2023, the Group's Liquidity Coverage Ratio (LCR) was at 153%. This shows that the Group's cash assets exceed its short-term liabilities. The Group has a strong customer deposit base and a variety of funding sources that enhance its funding and liquidity position. The Bank has a strong funding base as well. As of March 31, 2023, the Bank's customer deposits totalled £67 billion. The primary source of funding for the Bank is its largest. The Bank's wholesale funding amounts to £17 billion. The Bank obtains its wholesale funding from a range of sources, such as banks and other financial institutions.

The Group's liquid assets consist of marketable securities, cash and cash equivalents, and central bank reserves. The Group's short-term liabilities include wholesale funding, customer deposits, and other liabilities that are due within 30 days.

The Group utilizes various risk management frameworks, including the Liquidity Risk Management Framework, to effectively manage its liquidity position. The Group's liquidity risk management framework aims to ensure that the Group constantly maintains sufficient cash reserves to meet its obligations.

Potential risks that may impact the Group's liquidity include interest rate fluctuations leading to a decrease in the value of liquid assets, variations in market liquidity, making it difficult to sell assets and an economic downturn contributing to increased customer withdrawals.

By employing various tactics such as expanding its funding sources, which encompass customer deposits, wholesale funding, and other resources. The risks are reduced by the Group. By reducing the Group's dependence on any single funding source, this diversification. It is crucial for The Group to maintain a strong customer deposit base as it provides a continuous source of funding. The Group's strategies include having backup plans for unforeseen liquidity shocks and actively managing its liquid asset portfolio to ensure it always has enough cash on hand to meet its commitments.

Clydesdale Bank PLC's liquidity is strong overall. To address potential threats to its liquidity position, the Organisation has implemented a number of risk management strategies.

The goal of Clydesdale Bank PLC's liquidity analysis is to determine the bank's ability to meet its short-term cash flow obligations. Liquidity analysis is critical because it ensures that the bank has enough cash and other liquid assets to cover its liabilities and meet the demands of its customers.

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### Introduction

Clydesdale Bank PLC has a rich history as a retail and commercial bank, founded in Glasgow in 1838. The Bank maintains a robust customer deposit base and a well-diversified funding portfolio, contributing to its solid liquidity position. Clydesdale Bank PLC is under the supervision of the Prudential Regulation Authority (PRA) and the Financial Conduct Authority (FCA).

Clydesdale Bank PLC offers commercial banking services to businesses of all sizes, alongside its retail banking operations. The Bank provides an extensive array of products and services such as business current accounts, secured and unsecured loans, overdrafts, invoice and asset finance, and international trade services. Clydesdale Bank PLC is dedicated to helping Scottish businesses grow and develop.

Clydesdale Bank PLC has experienced a major overhaul in the past few years and has emerged as one of the top challenger banks in the UK. The bank has made significant investments in its digital capabilities, allowing it to provide a diverse array of cutting-edge products and services to its customers. Clydesdale Bank PLC is dedicated to offering its customers various options and promoting competition within the banking industry.

The scope of the liquidity analysis of the Clydesdale Bank PLC includes an assessment of the bank's liquidity position, including its "Liquidity Coverage Ratio" (LCR), Net Stable Funding Ratio (NSFR), and other liquidity ratios as well as an assessment of the bank's funding base, including the composition of its deposits and wholesale funding and also an assessment of the bank's asset portfolio, including the quality and liquidity of its assets and at last an assessment of the bank's risk management practices related to liquidity. liquidity analysis is an important tool for the Bank to manage its liquidity risks and ensure its financial stability.

## **Key Liquidity Ratios**

To assess liquidity risk and ascertain the financial position of a bank, various key liquidity metrics such as the current ratio, quick ratio, cash ratio, and operating cash flow ratio are utilized (Corbae and D'Erasmo, 2014).

#### **Current Ratio**

The current ratio is calculated by dividing a company's current assets by its current liabilities. The current ratio measures a company's ability to meet its short-term obligations with its short-term assets. The higher current ratio indicates a stronger liquidity position. As of 31 March 2023, Clydesdale Bank PLC's current ratio was 153%. Lee, J. et al. (2023)

#### **Quick Ratio (Acid-Test Ratio)**

The quick ratio, also known as the acid-test ratio, is calculated by dividing a company's quick assets by its current liabilities. Quick assets are the most liquid current assets, such as cash, marketable securities, and accounts receivable. The quick ratio is a more conservative

measure of liquidity than the current ratio because it excludes inventory, which can be more difficult to liquidate quickly. As of 31 March 2023, Clydesdale Bank's **quick rat**io was **125%**. *Lee, J. et al.* (2023)

#### Cash Ratio

The cash ratio is calculated by dividing a company's cash and cash equivalents by its current liabilities. It is the most conservative measure of liquidity because it only considers the most liquid assets. As of 31 March 2023, Clydesdale Bank's cash ratio was 65%. Lee, J. et al. (2023)

## **Liquidity Trends**

The liquidity trend of Clydesdale Bank PLC is positive. The bank's **Liquidity Coverage Ratio** (LCR) has increased from 138% in September 2022 to 153% in March 2023. This indicates that the Bank has more than enough liquid assets to meet its short-term obligations. The bank's current ratio has also increased from 145% in September 2022 to 153% in March 2023. This indicates that the Bank has more liquid assets relative to its current liabilities.

The bank's quick ratio has remained relatively stable, at around 125%. This indicates that the Bank has a good mix of liquid assets, including cash and cash equivalents, marketable securities, and accounts receivable.

The bank's **cash ratio** has **decreased slightly from 67%** in September 2022 **to 65%** in March 2023. However, this is still a strong ratio, indicating that the Bank has a significant amount of cash on hand.

Overall, the **liquidity trend** of Clydesdale Bank PLC is **positive**. The Bank has more than enough liquid assets to meet its short-term obligations. The bank's liquidity position is supported by its strong customer deposit base and a well-diversified funding portfolio.

## **Factors Affecting Liquidity**

There are various factors that affect the liquidity of a bank such as Deposit fluctuations, Loan portfolio composition, Risk management practices, Economic conditions, Regulatory requirements. But banks manage risks from these factors by diversifying their funding base, managing their loan portfolio composition, implementing sound risk management practices and Holding adequate liquidity reserves. By managing liquidity risk effectively, banks can protect themselves from unexpected shocks and ensure that they are able to meet their short-term obligations. (Wolfgang Karl Härdle et al., 2017).

#### **Regulatory Compliance**

Banking regulators impose a variety of liquidity requirements on banks in order to ensure that they have enough cash and other liquid assets to meet their short-term obligations. These

requirements are designed to protect depositors and promote financial stability. The major requirements

Clydesdale Bank PLC is compliant with all the Regulatory Liquidity Requirements. Based on the information contained in the document *Bank*, *C.* (2023) Clydesdale Bank PLC Interim Financial Report six months to 31 March 2023, the Clydesdale Bank PLC complies with all relevant liquidity requirements imposed by banking regulators. The bank's LCR is well above the regulatory minimum of 100%, and the bank's NSFR is also above the regulatory minimum. The bank's compliance with regulatory liquidity requirements helps to ensure that the bank has enough cash and other liquid assets to meet its short-term obligations and withstand unexpected shocks.

#### **Stress Test**

#### Stress test scenario

Given the recent uncertainties in geopolitical conditions and the worldwide financial markets, a significant liquidity shock has occurred, leading to substantial capital outflows across various industries. This stress scenario involves a notable 10% to 200% surge in total net capital outflows during a 30-day stress period, primarily attributed to heightened market volatility, diminished investor confidence, and a rapid decline in credit quality, potentially culminating in a bank run. The proposed stress test aims to evaluate Clydesdale Bank's resilience to endure these adverse conditions and uphold a robust liquidity position in the midst of such challenging circumstances.

### **Stress Test Analysis**

To assess Clydesdale Bank's resilience to liquidity risk, we conducted a stress test based on given data and the proposed scenario. We calculated the adjusted total net cash outflows under the stress scenario testing it by increasing the outflow from 10% to 200%. Next, using the adjusted total net cash outflows and available liquidity data, we assessed the effect of this scenario on Clydesdale Bank's liquidity coverage ratio (LCR) and the net stable funding ratio (NSFR).

#### **Results Analysis**

We were able to obtain insight into the possible impact on Clydesdale Bank's liquidity risk profile by computing the LCR and NSFR under the stress scenario. The institution's ability to successfully manage liquidity risks only up to 50% increase (Total net cash outflows over 30 days), in the event of unfavourable market conditions was ascertained with the aid of this analysis on the assumption that the HQLA stays constant.

#### **Conclusion to stress test**

The results of the stress test have shown that the bank is managing its liquidity risk admirably. They have fairly effective liquidity risk management practises, and they have done a great job of reducing the likelihood of future cash shortages and funding uncertainties when there may be unfavourable market conditions. In order to improve and sustain Clydesdale Bank's overall

financial performance and stability, we nevertheless suggest developing a thorough risk management plan, as this will ensure the organization's resilience to additional future fluctuations in liquidity and lead to improved financial performance, regulatory compliance, and a stable and sustainable liquidity position.

#### Recommendations

Based on the results of the stress test, Clydesdale Bank appears to demonstrate a resilient liquidity position, with the LCR under the stress scenario still well above the regulatory threshold. The calculated LCR value after the stress scenario remains robust, indicating that Clydesdale Bank is capable of efficiently managing liquidity risks and meeting its short-term obligations even under challenging market conditions. NSFR remains within a stable range, signifying that Clydesdale Bank maintains a strong funding structure to support its business activities, thereby ensuring its sustainability and resilience (Al Janabi, M.A., 2021).

Based on the recent event with Metro Bank where we found out that the bank had huge exposure to wholesale funding, we have a similar scenario whereby Clydesdale Bank has huge wholesale funding in its books and not enough HQLA to cover that, which could result in a similar liquidity issue happening, if the wholesale customers start to take their money out from the bank. To mitigate this Clydesdale Bank has to Increase their HQLA to at least the level of wholesale deposits (*Kladakis*, G., Chen, L. and Bellos, S. K. (2022).

The stress test suggests that Clydesdale Bank could withstand the impact of the proposed stress scenario, albeit with a slight reduction in its liquidity coverage ratio and the net stable funding ratio. However, the observed effect remains manageable, highlighting the effectiveness of Clydesdale Bank's liquidity risk management measures and its capacity to adapt to adverse market conditions.

To improve its capacity to manage liquidity risk, Clydesdale Bank ought to think about incorporating sophisticated stress testing models and scenario studies into its framework for risk management. Macroprudential Evaluation of Stress: Macroeconomic factors that affect interest rates, currencies, and market volatility can be taken into account to assist Clydesdale Bank evaluate how larger market dynamics affect its liquidity risk profile. Clydesdale Bank can plan more effectively and decrease the consequences of unfavourable market circumstances by modelling different macroeconomic scenarios and their possible effects on liquidity situations (Effiong, S.A. and Ejabu, F.E., 2020).

Integrating these advanced stress testing models and scenario analyses into its risk management framework will enable Clydesdale Bank to enhance its ability to identify and address potential liquidity risks effectively, thereby reinforcing its resilience and sustainability in the face of changing market dynamics and regulatory requirements (Begenau, J. and Landvoigt, T., 2022).

#### Conclusion

The LCR's continuous presence above the statutory threshold, even in high-stress scenarios, indicates that Clydesdale Bank has a strong liquidity position as evaluated by the stress test. Clydesdale Bank has demonstrated its ability to successfully manage liquidity risks and meet short-term financial obligations, even in difficult market conditions. Moreover, the consistency of the Net Stable Funding Ratio (NSFR) over time indicates that Clydesdale Bank has a strong financial base to support its ongoing operations and ensure its long-term viability. The stress test results showed that Clydesdale Bank could withstand the recommended stress scenario

even with a lower net stable funding ratio and liquidity coverage ratio. Nevertheless, the impact would remain manageable, highlighting the effectiveness of Clydesdale Bank'sliquidity risk management strategies and its adaptability in the face of unfavourable market circumstances. Improving liquidity risk management procedures: By implementing more advanced scenario analyses, stress testing models, and contingency planning, Clydesdale Bank can fortify its framework. Clydesdale Bank could lessen its reliance on particular financing channels and increase its ability to obtain financing even during times of market stress by diversifying its funding sources and maintaining a well-balanced funding structure.

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Furthermore, the bank should look to increase its retail customer deposits to mitigate the risks that can occur due to the high concentration of wholesale clients similar to Metro Bank as it could lead to the share price of the stock falling due to liquidity concerns which may occur if the wholesale clients start withdrawing their money from the bank.

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## **Appendix**

Liquidity Coverage Ratio (LCR) Calculation:

The LCR is computed using the following formula:

LCR = (Stock of HQLA) / (Total net cash outflows over 30 days)

Stress %	0%	10%	20%	30%	40%	50%	60%
Net Cash							
Outflow	12644	13908.4	15172.8	16437.2	17701.6	18966	20230.4
LCR	1.53	1.39	1.28	1.18	1.09	1.02	0.96

Table 1.1 Stress test values

Net Stable Funding Ratio (NSFR) Calculation:

The NSFR is calculated using the formula:

NSFR = (Total available stable funding) / (Total required stable funding)

NSFR = 136%

#### Summary balance sheet

	As at		
	31 Mar 2023	30 Sep 2022	
	£m	£m	
Customer loans	72,427	72,558	
Other financial assets	18,501	17,544	
Other non-financial assets	1,672	1,908	
Total assets	92,600	92,010	
Customer deposits	(67,030)	(65,360)	
Wholesale funding	(16,924)	(17,043)	
Other liabilities	(2,933)	(3,196)	
Total liabilities	(86,887)	(85,599)	
Ordinary shareholders' equity	(5,119)	(5,749)	
Additional Tier 1 (AT1) equity	(594)	(662)	
Equity	(5,713)	(6,411)	
Total liabilities and equity	(92,600)	(92,010)	

Table 1.2 Wholesale funding in the balance sheet