



THE NEW SETTLEMENT FRAMEWORK: THE JOURNEY SO FAR

By

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1. INTRODUCTION

The improvement in payments system owes much to improvement in payment instruments and information technology. From cowries to salt and from silver to gold, from the primitive barter system of exchange to the present electronic system, the role and importance of efficient payments systems have been closely monitored and promoted by monetary authorities in all countries. In particular, advances in automated cheque processing and the spread of personal chequing accounts have promoted cheques to the position of dominant payment instrument for medium to large value payments. Thus, in advanced economies, cheques and other paper payment instruments accounted for about 98 per cent of total payment instruments in 2000 compared with about 33 per cent in Nigeria.

In addition, effective implementation of monetary policies has evolved in tandem with the evolution and improvements in payments system, especially the use of paper-based payment instruments and improvement in information technology.

Settlement system, as an important component of a country's payments system, is an act that discharges obligations in respect of funds or securities transfer between two or more parties. Typically, in today's world, each bank involved in payments directly or indirectly has an account with the Central Bank, so that at the end of a settlement process, payments due to and from various banks could be posted into the banks' respective settlement accounts. Liquidity is crucial to the survival of any bank as illiquidity can have dramatic and rapid negative consequences on even well-capitalized banks. The importance of liquidity

transcends the individual bank as illiquidity in one bank can create systemic problems for other banks.

Traditionally, Central Banks the world over have continued to evolve a viable framework for the management of settlement accounts of banks, in line with international best practices. This is aimed at ensuring settlement finality at the central bank given the important role that well-functioning payments systems have on monetary policy, financial stability and overall economic activity.

Central Banks have tended to play a more active role in payments system since the late 1970s because of rapid technological changes, dramatic growth of financial activity and the consequent enormous growth in both volumes and values of payment transactions. As a result, liquidity and credit risks for central banks, commercial

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banks and other participants involved in payment systems have increased dramatically. Furthermore, payments and settlement systems have become potential sources of domestic and cross-border financial crisis. In this new environment, promoting stability and efficiency of payments and settlement systems, developing measures to reduce risk and ensuring payment system arrangements and changes if such arrangements do not jeopardize monetary management have become crucial Central Bank objectives.

Over the years, the Central Bank of Nigeria has grappled with the problem of clearing banks over-drawing their accounts with the Bank, albeit by default, arising from the settlement arrangements. The Bank had taken a number of measures to manage the problems caused by banks over-drawing their accounts, ranging from moral suasion, imposing penal interest rates, to outright suspension from the clearing house, as a last resort. Experience however, has shown that while the option of suspension of a bank from the clearing house may be inevitable, its effects are usually grievous, and capable of inducing systemic repercussions. It is

in the light of this experience that the Bank on 1st April 2004 installed a new settlement framework, which is the focus of this paper. The objective is to examine the new settlement arrangement and its impact on settlement and systemic risks. The paper is divided into five main sections. Following the introduction is Section 2 which discusses the evolution of Clearing and Settlement System in Nigeria. Section 3 reviews the new settlement system, while section 4 appraises the new system. Finally, section 5 summarises and also concludes the paper.

2. EVOLUTION OF CLEARING AND SETTLEMENT SYSTEM IN NIGERIA

The development of an automated clearing system is recognized as an essential and vital infrastructure project in the development of the banking sector within the country. Not only does it provide improved banking facilities, it also acts as a baseline for the development and integration of other payments and settlement systems in the area of electronic banking. A modern payments infrastructure eliminates systemic risk and brings stability into the national banking system. The need

for implementing a modern system to enable efficient payments, clearing and settlement is driven by international standards and the desire to increase international investor confidence in the national market.

To automate the clearing and settlement processes, to reduce settlement cycles and to eliminate the risks, the financial communities are introducing modern payment systems around the three key components of the national infrastructure namely, high value payments, low value payments and securities clearing.

The Nigerian Clearing And Settlement System-Pre MICR Period

Subsequent to the establishment of the Central Bank of Nigeria in July 1959 and the gradual widespread use of cheques and other paper-based instruments, the Bank established the first bankers clearing house in 1961 for the Lagos Clearing zone. This was followed by Kano and Port Harcourt clearing zones as well as clearing houses in each of the then Regional Headquarters.

The clearing house system, based on multilateral exchange of financial instruments, were directly operated and managed by

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✍ clearing process was generally undisciplined, rowdy, late in balancing and prone to human error,

✍ all the clearing banks, irrespective of weaknesses, maintained settlement accounts with the CBN. Many of the banks consistently retained overdrawn position, creating in the process, systemic crisis.

Four options were then proposed as follows:

✍ breaking the Lagos area into zones. Spreading the clearing process over a number of zones would be quicker and more efficient. However, it was felt that duplication of infrastructure and personnel outweighed the benefits,

✍ reducing the number of Clearing and Settlement banks. This would make the clearing process more manageable, faster and efficient.

✍ reducing the number of clearing days. This would bolster consumer confidence and encourage the use of non-cash instruments,

✍ automating the Clearing House. This would make use of the MICR

✍ technology and make the clearing process faster and more accurate and thereby reduce the float. It would introduce networking between parties, and start to introduce the benefits of electronic banking to all concerned.

Following the proposal by the Governor, in conjunction with the Bankers' Committee, the CBN on 2nd October, 1997 appointed Messrs Logica UK Ltd as consultants for the Nigeria Automated Clearing System (NACS). A full Strategy Report in July 1998 recommended a Decentralised Data Processing Solution for the Nigeria Automated Clearing System (NACS).

The Bank subsequently directed that the NACS should be private sector driven, with shareholding open to all banks. Nigeria Inter-Bank Settlement System (NIBSS) Plc was mandated to facilitate and coordinate the NACS project in Lagos Clearing zone. The Central Bank maintained the role of an umpire to provide the rules and regulations of the entire clearing, settlement and payments system. The Bank was of the view that the development of cheque clearing and settlement arrangement should be

through cooperation by those financial institutions that participate actively in the payments business.

The major long term benefits include:

✍ the membership will be based on technical efficiency and ability to work in a controlled environment,

✍ MICR information can be utilized,

✍ handwritten control documents can be replaced by a computer generated audit trail,

✍ human error can be eliminated through automated balancing and reconciliation.

✍ clearing cycle, and float could be reduced, thereby reducing the opportunities for fraud.

✍ CBN can examine national net settlement figures that can be consolidated from other payment systems and identify potential problems.

The Nigeria Automated Clearing System was therefore conceived to take advantage of state of the art technology to improve the clearing and settlement processes. Specifically, the

the CBN. All the clearing banks which were relatively few directly participated at the clearing houses and maintained accounts with each branch of the Central Bank. The clearing system was manual in operation and could take as much as eight hours after the commencement of the clearing house before banks could know their net settlement positions and as long as twenty-seven days before customers of banks could take value for their clearing cheques.

Although, the banks were not required to deposit clearing collateral against adverse net settlement positions, there were low incidences of banks overdrawing their accounts beyond 24 hours as there was market discipline.

MICR PERIOD

With the deregulation that began in 1987, the economy witnessed rapid increase in the number of deposit money banks with the attendant sharp rise in the volume of financial instruments being multilaterally exchanged in the clearing house. Pursuant to enhancing the processing of clearing instruments, the CBN in 1982 commissioned Messrs KOMPLEX Limited to carry out full feasibility study on the

domestic payments system. In its report submitted in 1983, the company recommended the introduction of Magnetic Ink Character Recognition (MICR) technology into the payments system to facilitate document processing, shorter clearing duration and boost confidence of the banking public. In line with the recommendation of the consultant, a phased approach to the implementation of MICR was adopted, starting with the CBN in 1988. The second phase took off in 1991 with the implementation by First Bank, Union Bank and United Bank for Africa. The full implementation of the project in Lagos Clearing zone commenced on 1st July, 1994, when the exchange of conventional cheques ceased at the Clearing House.

The introduction of the MICR technology did little to improve the clearing and settlement system. In the first instance, there were critical problems arising from lack of cheque standards. As a consequence of the problems, the MICR reject rate at 30% of the total clearing instruments remained high. Besides these problems, operation of the clearing system remained long. There were over eighty banks directly participating

in the clearing house activities and each of them maintained account with the CBN with virtually no clearing collateral. Thus by 1995 over thirty banks had their accounts with the CBN persistently overdrawn, thereby creating systemic crisis.

It is in consideration of these, that in November, 1995, the Governor of the Central Bank of Nigeria stated that the Nigerian clearing and settlement system has to be drastically overhauled. The challenges then were;

- ✍ efforts to convert the public to use non-cash items was being hampered by the clearing and settlement process, which was largely manual, using handwritten control documents.
- ✍ cheque usage and settlement process were prone to fraud and abuse.
- ✍ long clearing cycle, taking between 9 to 15 days for customers to take value on cheques
- ✍ too many banks directly participating in clearing house activities with all of them maintaining accounts with the CBN,

risks in the banking industry, particularly the CBN and customers' exposure to the banks. The persistent overdrawn position of banks rebounded with intensity, with unprecedented large amounts. Many of such banks had since been suspended from further participation in clearing house activities but they left behind huge overdrawn position in their accounts with the CBN and tremendous pains for their numerous customers as well as a low confidence in the use of cheques.

In effect, while payments risk increased because of increased transaction flows, increased instruments and shorter clearing and settlement cycles; the settlement framework and institutional arrangements were too weak to provide the necessary tool for payment and settlement risk management. Given the peculiarity of the domestic clearing and settlement system, particularly the high number of weak banks in the system, the major flaw of the settlement arrangement under NACS was that all the participating banks, direct and indirect banks, 80 of them, were all allowed to maintain settlement accounts with the CBN. Hence the persistent overdrawn positions of banks.

3.0 THE NEW CLEARING AND SETTLEMENT SYSTEM

3.1 Aims and Objectives

The new clearing and settlement system aims at improving efficiency in payments systems by eliminating settlement lag for high value and time sensitive payments. It also minimizes settlement risks.

3.2 Operational Guidelines

Given the problems associated with the earlier cheque clearing and settlement system the Bank on 1st April 2004 installed a new settlement framework. This new arrangement included the following:

- ✍ Clearing banks (seventy-five of them) were classified into settlement and non-settlement banks.
- ✍ Only settlement banks should maintain settlement accounts with the CBN to meet settlement obligations and for other transactions in CBN.
- ✍ Non-settlement banks should maintain only operations account with the CBN, for their foreign exchange, cash withdrawing operations as well as cash reserve

✍ requirements.

✍ Non-settlement banks should maintain agency arrangement with settlement banks and the cheque clearing balances plus the up-country transfers of the non-settlement banks should be posted into the settlement accounts of the settlement banks at the CBN, under an Agency arrangement.

✍ The operations accounts of the non-settlement banks shall be in credit at all times.

Any bank applying for direct participation as a settlement bank shall be required to meet the following conditions:

- ✍ Possess the capacity to provide the required clearing collateral, which for a start was fixed at N15 billion, and subject to periodic review.
- ✍ Ability to offer agency facilities to other banks and to clear and settle on their behalf.
- ✍ Adequate branch network, in the CBN twenty-two clearing areas.
- ✍ Meet the volume and value criteria which

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their funds.

Other achievement of the new clearing and settlement arrangement, include:

- ✍ Overdrawn position of banks' accounts with the CBN, through the cheque clearing beyond 24 hours has been effectively eliminated. In effect, CBN exposure to the banks and injection of high powered money has been eliminated.
- ✍ Generally, the new system has continued to instil discipline in many of the clearing banks
- ✍ The new Settlement System is currently providing the platform for bank consolidation, as merger /acquisition discussions are being driven by the current settlement/non-settlement relationship
- ✍ Deliberate wrong delivery of cheques to banks has been put under firm control
- ✍ There has been effective monitoring of liquidity and settlement risks, leading to a significant reduction in panic borrowing, reduced pressure on the interest and exchange rates.

✍ There has been increased confidence in the cheque clearing system.

Despite the achievements in both NACS and the current settlement arrangement, some fundamental problems still remain, particularly the:

- ✍ exposure of settlement banks to the non-settlement banks, as some of them continuously and persistently overdraw their accounts with the settlement banks.
- ✍ suspension of defaulting non-settlement banks from participation in clearing house activities by their settlement banks, without following the due process as specified and defined in the guidelines on the new settlement system.
- ✍ runs on some non-settlement banks as a consequence of the crude method used by their settlement banks to 'suspend' them from clearing house activities.
- ✍ frequent changing from one settlement bank to another, by non-settlement banks who see their former settlement banks as not too accommodating.

The Bank is addressing the above problems along with the on-going banking consolidation. It is expected that after the consolidation exercise, all banks would become settlement banks, as they would possess the capacity to provide appropriate discountable clearing collateral. Currently under review by the Bank is the guideline on clearing and settlement systems to the extent that there may be a cap on the amount that can be paid through the cheque clearing system, so that high-value payments are handled by the RTGS system which has been positioned to go live in August 2005.

5 SUMMARY AND CONCLUSIONS

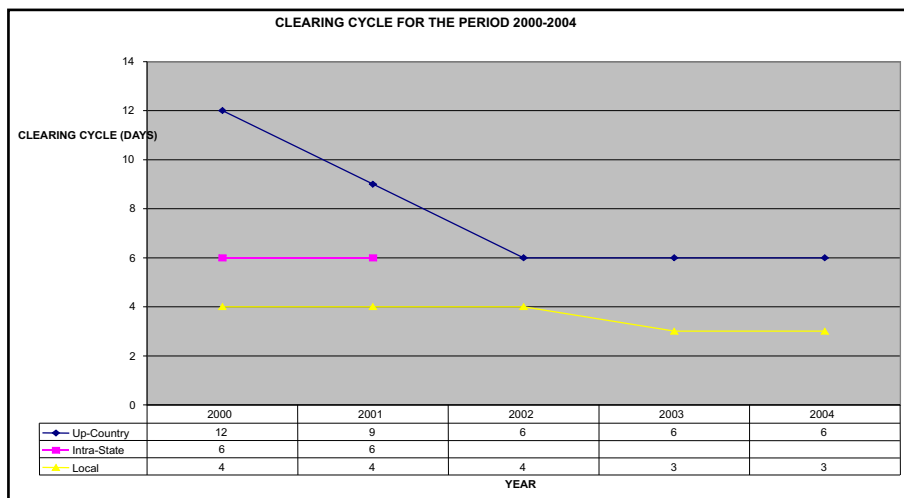
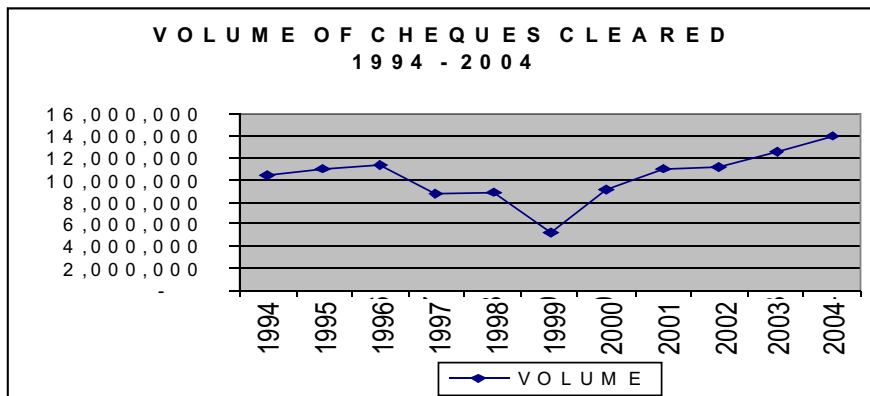
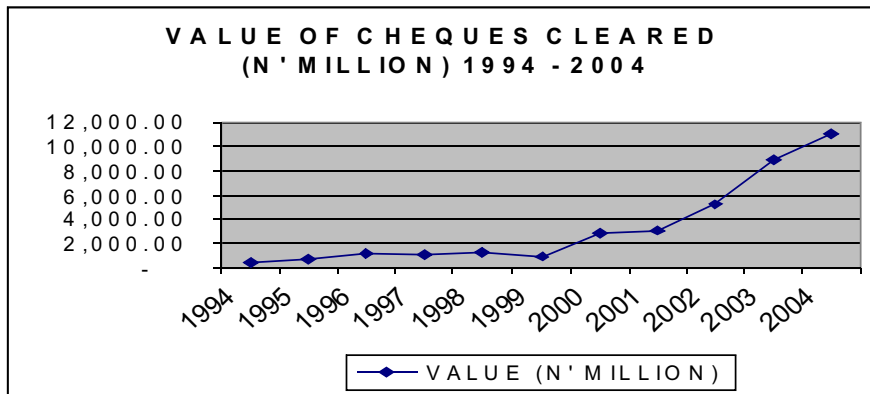
This paper has examined the clearing and settlement system since the introduction of Nigeria Automated Clearing System (NACS), which allowed all banks not only to participate directly in settlement activities, but also maintain settlement accounts with the CBN, without providing adequate collateral to reduce the CBN exposure to the banks and prevent frequent injection of high powered money into the system. The paper also highlighted the problems associated with the old settlement system, particu-

OVERDRAWN POSITION OF BANKS THROUGH CLEARING

YEAR (AS AT DECEMBER 31,)	2002	2003	2004
NUMBER OF BANKS	12	32	-
OVERDRAWN AMOUNT (N' MILLION)	18,238.39	55,053.65	-

Overdrawn position of the clearing banks declined to zero as at 2004 from N55.1 billion as at 2003.

Boosted by the NACS infrastructure and the new clearing and settlement arrangement, the efficiency of the payments system continued to improve as illustrated by the sustained growth in both volume and value of cheques cleared during the year 2004 as shown by the charts below:



Source: Banking Operations Database, CBN Annual Report, and 2002 Banking Supervision Department Annual Report

larly liquidity, credit and settlement risks.

The new settlement framework which segregated clearing banks into settlement and non-settlement banks was examined. While the settlement banks maintained settlement accounts to meet settlement obligations to counterparties and other transactions, including inter-bank large payments and foreign exchange transactions with the CBN, the non-settlement banks were required to maintain only operations account for limited transactions in CBN, particularly, foreign exchange and inter-bank fund transfers, provided the

account is funded.

The key objectives were to reduce clearing and settlement risks, as well as to improve macro-economic management. The achievements so far recorded under the new system though an admixture is encouraging as the new system has succeeded in eliminating the incidence of banks overdrawing their accounts with the CBN. However, while the new arrangement eliminated settlement risk from the CBN, the risk was transferred to the settlement banks, which are carefully managing it.

So far, the new settlement

framework has brought to focus the need for a holistic payments system reform to achieve a robust system, especially the establishment of an efficient and effective legal and institutional framework so as to reduce settlement risk for all stakeholders to a minimum and further enhance the efficiency of the payment system. While the CBN continues to rely on S.41 of the CBN Act in the regulation of the payments system, it is pertinent to develop a comprehensive legal framework for the payments system. In addition, the Dishonoured Cheques Act has to be effectively enforced.

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