

# US DOLLAR CLEARING SYSTEM IN HONG KONG

*The US dollar clearing system will be an important milestone in the development of the financial infrastructure of Hong Kong. This article gives a detailed account of the prospective benefits of this system and the steps taken so far towards its implementation in the second half of 2000.*

## Introduction

Developing Hong Kong's financial infrastructure is, along with maintaining currency and banking stability, one of the three main policy objectives of the HKMA. Financial infrastructure, when it works efficiently, is something which is so much taken for granted that it is barely noticed. It is generally a far less prominent public issue than currency or banking stability. Yet, without a properly functioning financial infrastructure, there is little chance of currency and banking stability. Effective financial infrastructure is as important to Hong Kong as the extensive and far more visible physical infrastructure that we see around us.

Since 1994 the HKMA has implemented a number of major reforms to Hong Kong's payment and settlement systems. The most significant of these reforms was the launch in December 1996 of the real time gross settlement (RTGS) system for interbank payments in Hong Kong dollars. This system is widely acknowledged to be one of the most advanced and robust of its kind. It has served Hong Kong remarkably well, and made an important contribution to maintaining financial stability during the Asian financial crisis, which erupted not long after its introduction. Our experience with the RTGS system, and in particular the technology developed for it, provides us now with a firm basis for the development of a US dollar clearing system in Hong Kong.

## The Case for a US dollar Clearing System in Hong Kong

The US dollar is the single most widely used currency for the denomination of world trade in merchandise and financial products. Given Hong Kong's role as an international financial centre, and the fact that our own currency is linked to the US dollar, there is extensive holding of US dollars and

a considerable trade in US dollar-denominated assets. As at the end of 1999, US dollar deposits in the Hong Kong banking system amounted to US\$106 bn, or a quarter of total deposits. US dollar / HK dollar transactions dominate the trades involving the HK dollar in the foreign exchange market, accounting for 93% of the daily turnover of US\$18.7 bn in April 1998.

These activities suggest that there already exists a business case for introducing improved mechanisms for settling US dollar payments in Hong Kong. Moreover, looking ahead, development of a local US dollar clearing and settlement infrastructure will facilitate enterprises, both local and from Mainland China and elsewhere around the region, to issue securities denominated in US dollar or trade such securities in Hong Kong during Hong Kong hours. The launch also coincides helpfully with the initiative of The Stock Exchange of Hong Kong to launch and develop the Growth Enterprise Market (GEM) which allows the listed shares to be denominated and settled in US dollar. The enhanced risk management inherent in the new system should also reinforce the confidence of global investors to invest through Hong Kong.

## Benefits of Developing a US Dollar Clearing System

The system is expected to have the following benefits -

- (a) Capability to enhance settlement efficiency and eliminate settlement risk Under existing arrangements, the HK dollar leg of a US dollar/HK dollar foreign exchange transaction is settled ahead of the US dollar leg because of the different time zones. The buyer of the US dollar is therefore exposed to a daylight settlement risk. With the planned payment-versus-payment (PvP) link between the HK dollar and US dollar clearing systems, both

legs can be settled simultaneously during business hours in Hong Kong and hence the daylight exposure will be eliminated. Likewise, delivery-versus-payment (DvP) settlement for US dollar-denominated instruments will eliminate the settlement risk to the investors.

- (b) Facility for the opening of local US dollar chequing accounts At present, the clearing process for US dollar cheques deposited in Hong Kong takes at least two weeks, as the cheques have to be sent back to the drawee bank in the US for signature verification and checking of account balance. The establishment of a local US dollar cheque clearing system will allow the opening of local US dollar chequing accounts with banks in Hong Kong. This will reduce the settlement time to two days for those US dollar cheques drawn upon banks in Hong Kong and deposited locally.
- (c) Providing services to customers elsewhere in the region Since our US dollar clearing system is likely to be the most extensive and sophisticated in the region, the potential clientele is not merely the local community but also the financial community in the Mainland of China and the rest of the region. Subsequently it would be possible to explore the replication of the system for other foreign currencies, provided that a business case existed.
- (d) Supporting monetary stability By reducing the need to use the Hong Kong dollar as a vehicle currency for non-domestic financial business, introduction of the US dollar clearing system should reduce the impact on local monetary conditions of movements in portfolio capital unrelated to economic developments intrinsic to Hong Kong, thereby supporting the objective of monetary stability.

## Consultation

In the course of examining options for implementing a US dollar clearing system in Hong Kong, we made soundings among local financial institutions and received useful advice from them

on the functionality and features of the clearing system.

We have also been in dialogue with the Federal Reserve Bank of New York, which has been supportive and has offered useful suggestions on our project. They indicated a preference that the settlement institution should be a commercial bank, as is the case for the offshore US dollar clearing systems in Japan, Singapore and the Philippines. A private sector solution is also consistent with the recommendation in earlier reports prepared by the Bank for International Settlements and is working well in other countries. As this would also be in line with Hong Kong's tradition of adopting market-led solutions, it was decided that a commercial bank should be selected as the settlement institution.

## Appointment of a Settlement Institution

With the approval of the Exchange Fund Advisory Committee (EFAC), the HKMA decided in October 1999 to proceed with the implementation of the proposed US dollar clearing system.

Several banks in Hong Kong expressed an interest in serving as the settlement institution for the System. At the end of a rigorous selection process, a Selection Panel made up of disinterested members of the EFAC and senior executives from the HKMA recommended to EFAC in January 2000 that HSBC be appointed the settlement institution for a franchise period of five years starting from 1 August 2000.

## System Design by the HKMA

Functions and design features The System will consist of the following -

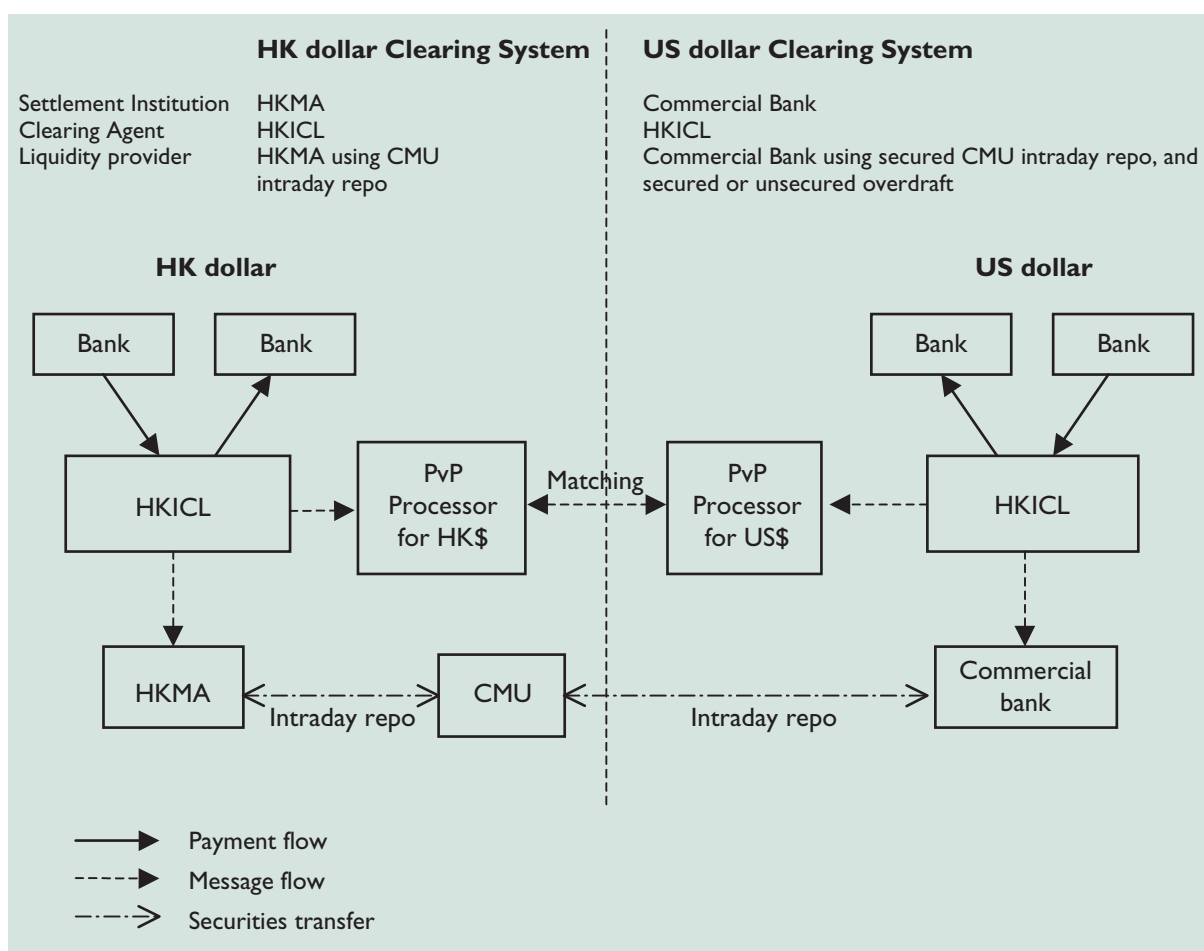
- (a) US dollar RTGS system: as in the case of the HK dollar RTGS system, US dollar payments settled in real-time mode across the books of the settlement institution will be final and irrevocable;
- (b) Pvp settlement for HK dollar/US dollar foreign exchange transactions through linkage with the HK dollar clearing system;

- (c) DvP settlement for US dollar-denominated debt securities and shares through linkages with the respective clearing systems (i.e. Central Moneymarkets Unit (CMU) for debt securities and the Central Clearing and Settlement System (CCASS) for shares); and
- (d) US dollar cheque clearing: the system design and operating procedures will essentially be a replication of the HK dollar cheque clearing system, i.e. the US dollar cheques to be settled on a next day and multilateral (position) netting basis.

opening sub-settlement accounts with the direct participants. The settlement institution itself performs mainly the following three functions—

- (a) operating the clearing accounts of the system to allow payment instructions to be settled across its books;
- (b) providing intraday liquidity and credit facilities to the participating bank to ensure smooth payment flows and avoid gridlocks; and
- (c) instituting risk management devices to address credit risks or other risks that could jeopardise the security and integrity of the system.

A high-level architectural design of the US dollar RTGS system and its interfaces with the CMU and the HK dollar RTGS system is as follows—



Settlement arrangement Directly participating banks will open US dollar settlement accounts with the settlement institution (HSBC). Banks which do not wish to open such accounts could still take advantage of the US dollar clearing system by

The role of the HKMA will be to oversee the design, implementation and performance of the system, including in particular the risk management aspect, to ensure that it meets the highest international standards.

Clearing Agent Included in HKMA's franchise agreement with the settlement institution is a condition that the latter will appoint Hong Kong Interbank Clearing Limited (HKICL), the current operator of the HK dollar clearing system, to develop and operate the system. The reasons for this condition are as follows:

- (a) as the system will be linked with the HK dollar clearing system to settle real-time US dollar/HK dollar PVP transactions, the system operators must be of undoubted reliability to minimise the risk of undermining the integrity of the HK dollar clearing system through contagion; and
- (b) Hong Kong's RTGS system has proven to be highly efficient and reliable. Appointing HKICL as the clearing operator to run the US dollar system that is a replication of the HK dollar system will command the confidence of the participating banks. It will also substantially reduce the cost and time required for developing the system.

## Legal Framework

Clearing House Rules A set of US dollar Clearing House Rules specific to the US dollar system is being prepared.

Rules on Interest Rates and Deposit Charges Clause 5 of Section III of the Rules on Interest Rates and Deposit Charges made by the HKAB Committee in pursuance to the HKAB Ordinance provides that "Members shall not permit customers to draw cheques, whether in HK dollar or in any other currency, on any Foreign-Currency Current Account held in Hong Kong". This clause will be amended to cater for the use and clearing of US dollar cheques.

## Implementation Timetable

The major components of the new system will be implemented in accordance with the following timetable -

CHATS with overdraft facilities but without CMU interface	August 2000
Electronic Clearing (ECG) for CCASS items	August 2000
Payment vs. Payment Device	September 2000
Paper cheque clearing	December 2000
CMU interface	December 2000

It is appreciated that the project is running against a very tight schedule. However it is desirable to have the system up and running as soon as possible. HKMA is confident that this can be achieved through co-operation between the various parties, including the participating banks, all of which have valuable experience from implementing the HK dollar RTGS system in 1996. 🌐

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