Box 4 Observations from turnover statistics¹ in the foreign exchange market for the South African rand²

The methodology for the compilation of over-the-counter (OTC) foreign exchange (FX) turnover statistics is based on the reporting guidelines of the Bank for International Settlements (BIS).³ Global FX market activity in South African rand comprises turnover in both the domestic and offshore markets. Turnover in the domestic FX market, as measured by the South African Reserve Bank's (SARB) daily survey of Authorised Dealers in foreign exchange, consists of spot, outright forwards and FX swap transactions against counterparties, delineated as the monetary sector, other residents and non-residents⁴ against both the rand⁵

¹ Domestic turnover statistics reflect the net daily average value of foreign exchange transactions in a specific period which is calculated as the amount traded in a specific period divided by the number of business days in the period, as adjusted for double-counting within the monetary sector. The global turnover statistics analysed in this box were sourced from the Bank for International Settlements (BIS), and are on a net-net basis (i.e. adjusted for domestic and cross-border inter-dealer double-counting).

² The turnover statistics of the South African foreign exchange market referred to in this box are based on the South African Reserve Bank's daily survey of Authorised Dealers in the South African foreign exchange market, as published on page S-107 of this Quarterly Bulletin, and statistics from the Triennial Central Bank Surveys of Foreign Exchange and OTC Derivatives Markets of the BIS, measured for the month of April in the respective years. See, https://www.bis.org/statistics/rpfx19.htm?m=6%7C381%7C677 for Triennial Central Bank Survey of foreign exchange and OTC derivatives markets in 2019.

³ See, https://www.bis.org/statistics/triennialrep/2019survey_guidelinesturnover.pdf

⁴ Non-resident counterparties reflect transactions between the domestic reporting Authorised Dealer and any counterparty residing, or with its centre of economic interest outside the borders of South Africa.

 $^{5\,}$ FX transactions against the rand are rand trades against foreign currencies.

and third currencies.⁶ The BIS Triennial Survey supplements these statistics at regular three-yearly intervals, while also reflecting rand turnover in offshore markets. A further addition to the BIS survey is transactions in currency swaps and options. These statistics provide information on the size and structure of the FX market, and are used by authorities and market participants. FX transactions are classified according to the characteristics listed in the accompanying table.

Types of FX transactions

The SARB's survey of Authorised Dealers includes:

Spot: Single outright transaction exchanging two currencies at an agreed rate, on the date of the contract for value or delivery (cash settlement) within two business days. Excludes the spot-leg of swap transactions.

Outright forwards: Transactions that exchange two currencies at an agreed rate, on the date of the contract for value or delivery (cash settlement) at some time in the future (more than two business days later).

FX swaps: Transactions that exchange two currencies (principal amount only), on a specific date, at a rate agreed on at the time of the conclusion of the contract (the short leg), and a reverse exchange of the same two currencies at a date further in the future at a rate (generally different from the rate applied to the short leg) agreed on at the time of the contract (the long leg). Includes 'spot/forward swaps' and 'forward/forward swaps' and also short-term swaps, such as 'overnight swaps', 'spot next swaps' and other 'tomorrow/next day' transactions.

In addition, the BIS Triennial Survey also includes:

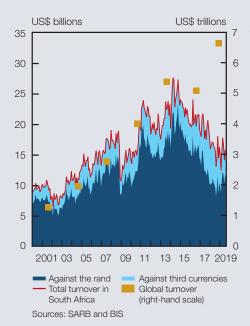
Currency swaps: Two counterparties commit to exchange streams of interest payments in different currencies for an agreed period of time and/or to exchange principal amounts in different currencies at a pre-agreed exchange rate at maturity.

OTC options: Contracts that confer the right to buy or sell a currency with another currency at a specified exchange rate during a specified period. Includes exotic foreign exchange options such as average rate options and barrier options.

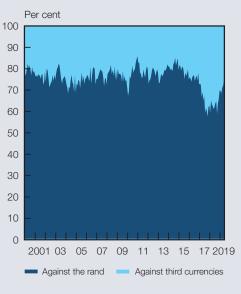
Sources: BIS and SARB

The trend in international total net average daily FX turnover and that in South Africa followed one another closely, with a then global peak of US\$5.4 trillion in April 2013 and a domestic high of US\$27.6 billion in March 2014. Following recommendations regarding OTC derivative transactions at the Group of Twenty (G20) Pittsburgh Summit in 2009, FX transactions are also cleared through central counterparties⁷ (CCPs), though remaining only a small portion of the total derivatives market.

Net average daily foreign exchange market activity



Composition of total turnover in the South African foreign exchange market by currency



Source: SARB

⁶ FX transactions against third currencies are trades between two foreign currencies.

⁷ CCPs reduce counterparty credit and liquidity risk through netting and stand between two counterparties as the buyer to every seller, and seller to every buyer.

The decline in global FX turnover since 2014 reflects the effect of regulations in the aftermath of the global financial crisis to manage risks, such as the Volcker Rule, which prohibits proprietary trading by banks in particular. Changes in FX trading volumes also reflect changes in risk aversion, commodity prices and trade volumes over time. At the time of the BIS Survey in 2016, turnover in the South African domestic market amounted to US\$20.0 billion, but has subsequently declined to US\$13.8 billion in July 2019. In contrast, global turnover reached an all-time high of US\$6.6 trillion in April 2019, according to the BIS Survey of 2019.

In the domestic South African FX market, transactions against the rand dominate relative to those against third currencies. Since 2000, on average, most of the turnover of the rand has been against the US dollar (95%) followed by the euro (2%). Transactions against the rand accounted for 75% of total domestic turnover, on average, with a record high of 85% in January 2011. However, transactions against the rand declined to as low as 57% of the total domestic market towards the end of 2017. In value terms, transactions against the rand contracted by about US\$12.0 billion from March 2014 to December 2017.

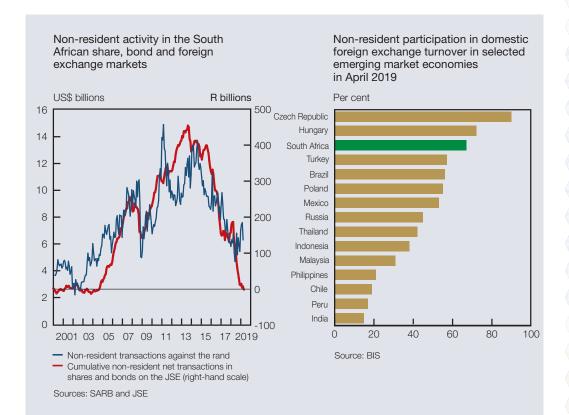
Relative to total turnover in the domestic FX market, transactions against third currencies stagnated at just below 24%, on average, for most of the period prior to 2014, before increasing to almost 43% in November 2017. More recently, however, the proportion declined again to 25% due to fewer transactions against the euro. The US dollar accounts for the majority of transactions against third currencies, with half of those between the US dollar and the euro, and one third between the US dollar and the Great British pound (GBP). The US dollar against the Japanese yen (JPY) and the Swiss franc (CHF) each account for less than 5%. The euro's share among third currencies has declined from about 5% to around 1% against the GBP, JPY and CHF.

In the domestic South African FX market, FX swaps are the most prominent transaction type, accounting for 71% of total turnover, on average, since 2000, followed by spots at 23% and outright forwards of 6%. FX transactions in the domestic market against the rand are generally well supported by non-residents, particularly swap transactions, mostly to hedge their exposure to South African government bonds.

Composition of total turnover in the South African foreign exchange market

By type of transaction By counterparty Per cent Per cent 100 100 90 90 80 80 70 70 60 60 50 50 40 40 30 30 20 20 10 10 0 2001 03 05 07 09 11 13 15 172019 2001 03 05 07 09 11 13 15 17 2019 Spot Outright forwards Monetary sector Other residents Foreign exchange swaps Non-residents Source: SARB

Non-residents dominated the domestic South African FX market and accounted for almost 70% of total domestic turnover, on average, and peaked at 80% prior to the collapse of Lehman Brothers in September 2008, according to the SARB survey. Non-residents' presence in the domestic FX market also reflects changes in their participation in the South African share and bond markets, driven by a search for return and diversification in emerging market economies. This is not unique to South Africa, as reflected by a breakdown of BIS data between domestic and cross-border counterparties, of which the latter is comparable to non-residents.



In addition to trading in domestic FX markets, countries' currencies also trade in offshore markets. In the case of South Africa, the rand trades extensively offshore. According to the BIS, 80% of global trading in the rand is conducted offshore, similar to the Brazilian real and other selected emerging market currencies. In April 2019, global turnover in the rand contributed US\$72 billion to total global FX turnover of US\$6.6 trillion. At this level, though small in global terms, South Africa's ranking declined from the 13th most traded currency in April 2001 to 18th in April 2019, based on the most recent BIS survey in April 2019.

Global foreign exchange turnover in selected currencies in April 2019 US\$ billions 100 120 100 80 80 60 60 40 40 20 20 0 0 Turkey TRY Hungary HUF Russia RUB Malaysia MYR Chile CLP South Africa ZAR India INR Mexico MXN Szech Republic CZK **Thailand THB** Poland PLN Brazil BRL Domestic currency traded offshore as a percentage of global turnover Global turnover, domestic and offshore (right-hand scale)

Source: BIS