



SOUTH AFRICAN RESERVE BANK

2023 Market Practitioners Group Conference

19 April 2023















Derivative Breakaway Session

Derivative Workstream Mandate

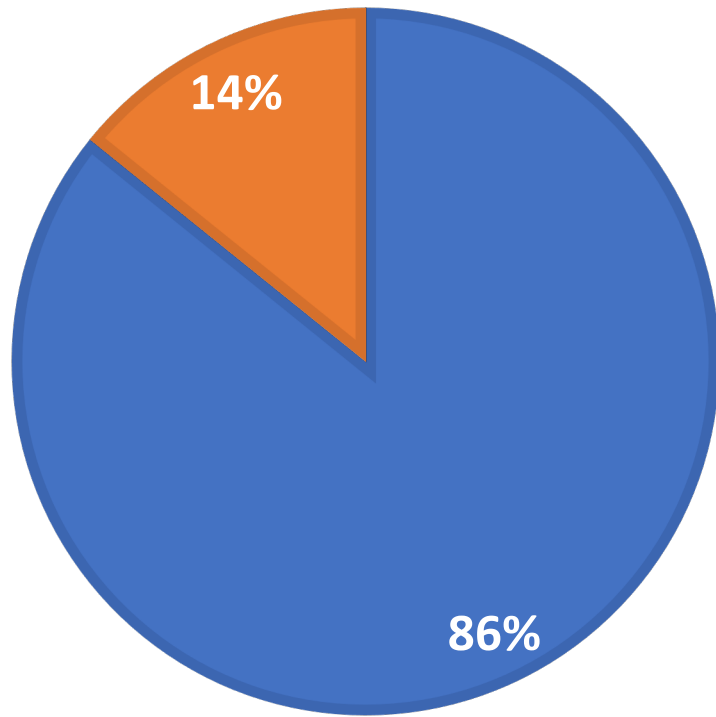
- Consulting widely and making recommendations on the development of derivative markets and contracts that reference the successor rate
- Formulating and implementing strategies to facilitate the market adoption of derivatives that reference the successor rate
- Formulating and recommending strategies to derive term risk free rates from underlying derivatives activity
- Providing input to the finalization and refinement of the transition plan and monitor the progress made in the derivative markets
- Aligning with progress and recommendations of all workstreams of the MPG

IOSCO Principles: ZARONIA vs JIBAR

	JIBAR	ZARONIA
Integrity		
• Reliability		
• Robustness		
• Representativeness		
Efficacy		
• Frequency		
• Availability		
• Transmission		

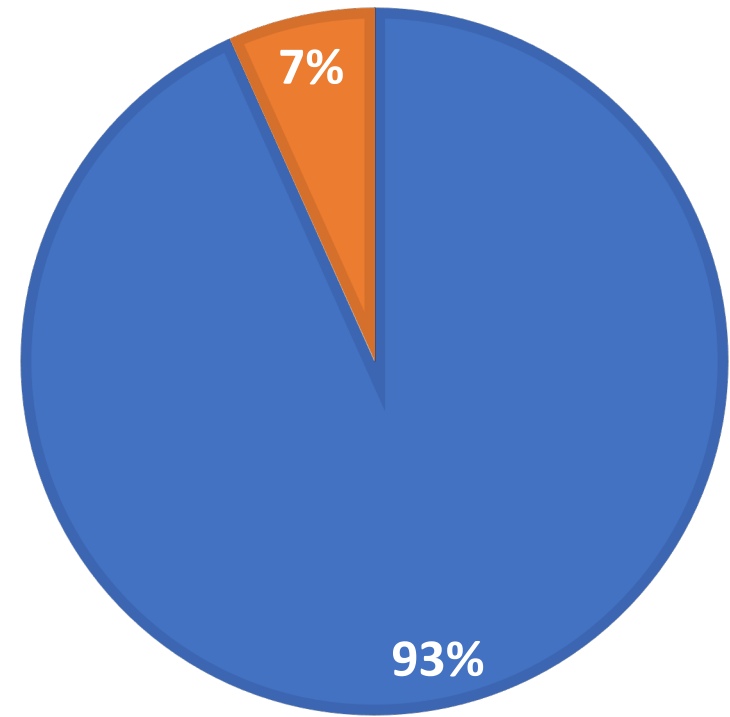
Derivative Market vs Cash Market Depth

LIBOR Survey 2016 – Notional Reference



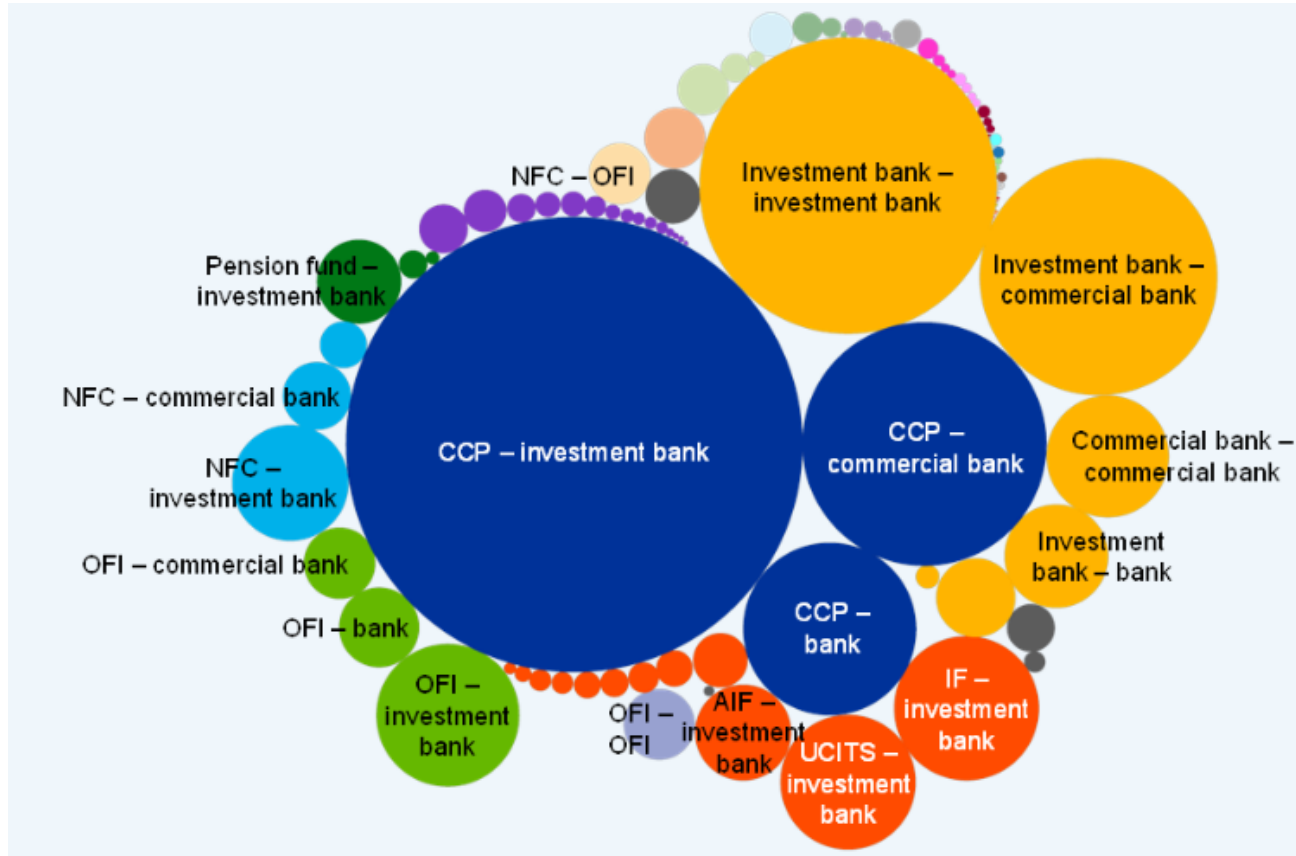
■ Derivatives ■ Cash

JIBAR Survey 2015 – Notional Reference



■ Derivatives ■ Cash

Non-Bank Derivative Users: European Derivative Ecosystem



Banks	Investment	43.1%
	Commercial	13.2%
	Not allocated	4.8%
CCPs		23.3%
Investment funds (IFs)	UCITS	1.7%
	AIFs	1.2%
	Not allocated	2.0%
Other financial institutions (OFIs)		4.3%
Non-financial corporations (NFCs)		3.0%
Insurance companies	Life and composite	0.3%
	Non-life	0.1%
	Not allocated	0.3%
Pension funds (PFs)	Private	0.4%
	Public	0.1%
	Not allocated	0.1%
Government institutions		0.4%
Central bank		0.1%
Money market funds		0.0%

Minimum requirements in foundational and adoption phases

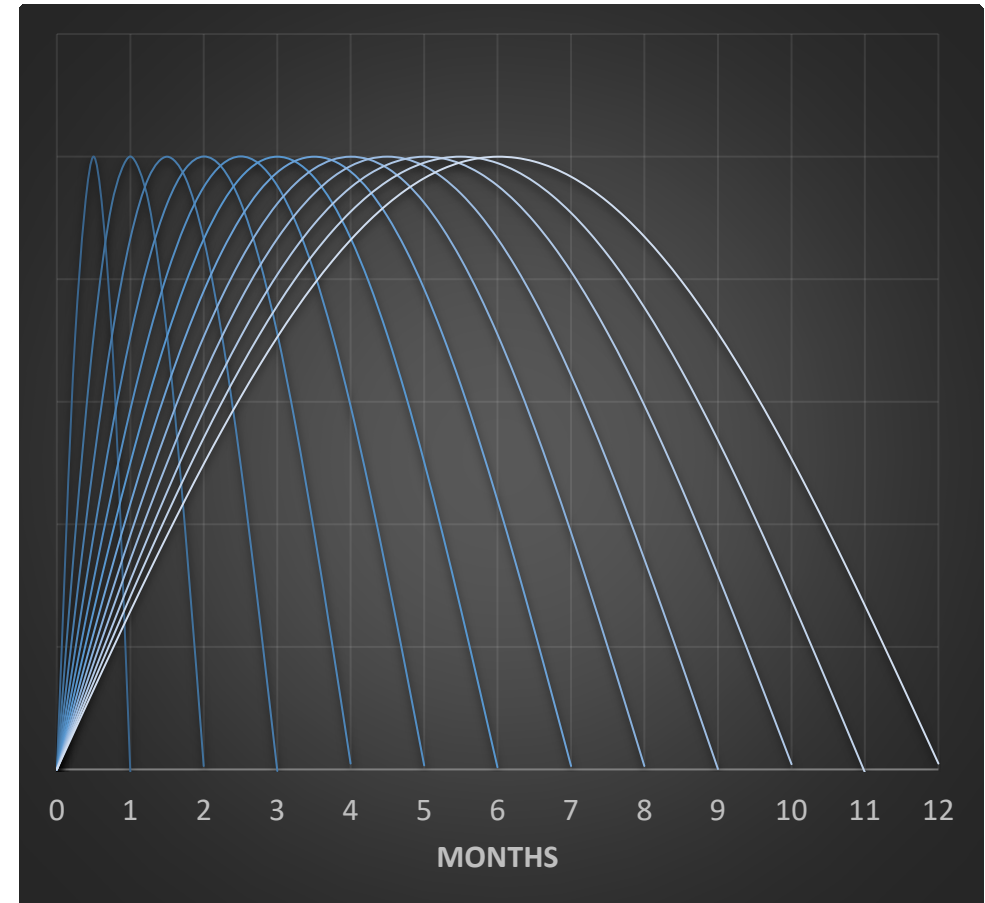
- Market Education to enable convention commentary
- Finalised product conventions
- Derivative Infrastructure Requirements – clearing house eligibility
- Alternative Reference rate data analytics including a back-filled time series
- Add ZARONIA to ISDA definitions

White Paper: Objectives

- Facilitate **professional** participants to drive liquidity build
- Participants require a well-informed blueprint
- Intended outcome to ensure depth, market stability and global alignment
- **Technical detail and consistency is important**

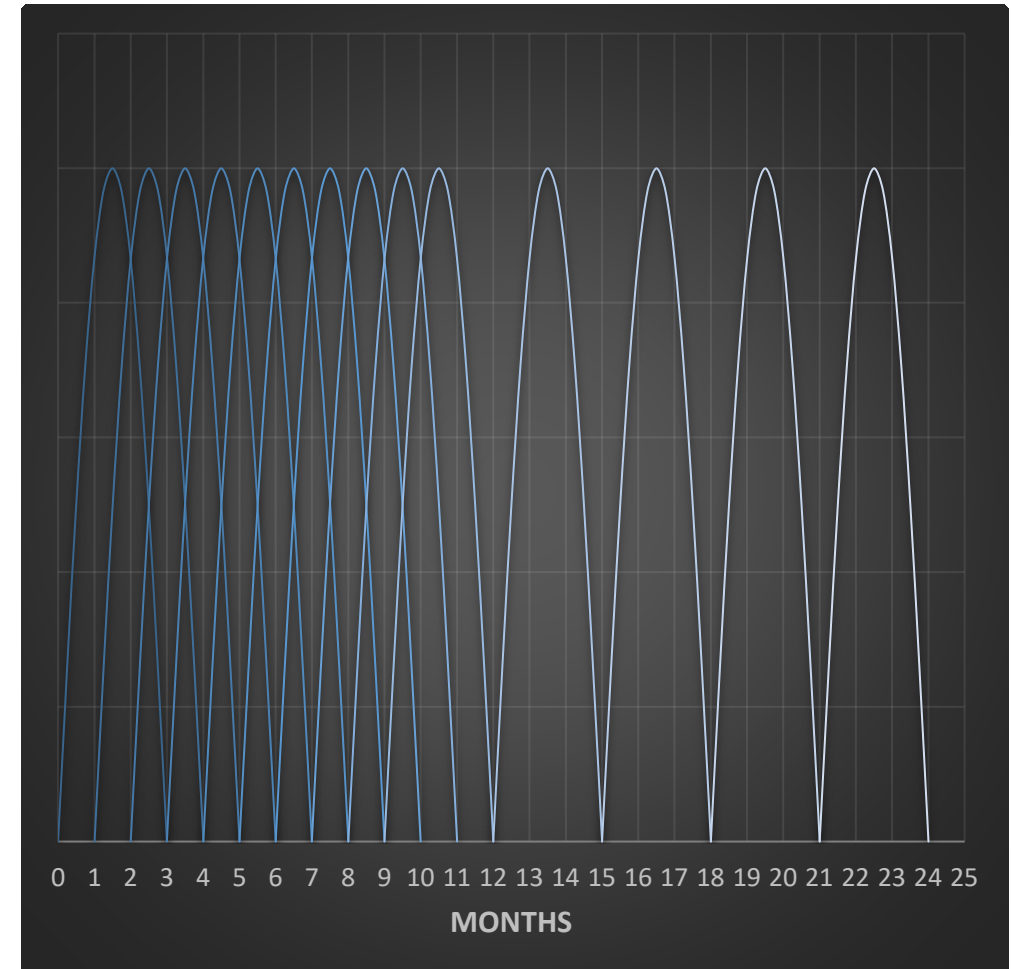
Spot-Starting Single-Period Overnight Indexed Swaps

The main objective for creating a market in short-term (i.e., tenors less than or equal to 12M) spot-starting single period OISs, with the recommended conventions below, is to **facilitate the production of term reference rates**. Unlike the current suite of JIBAR rates, it should be understood that these OIS rates will provide equivalent term rates that are near risk-free, i.e., they will not constitute term credit and funding spreads.



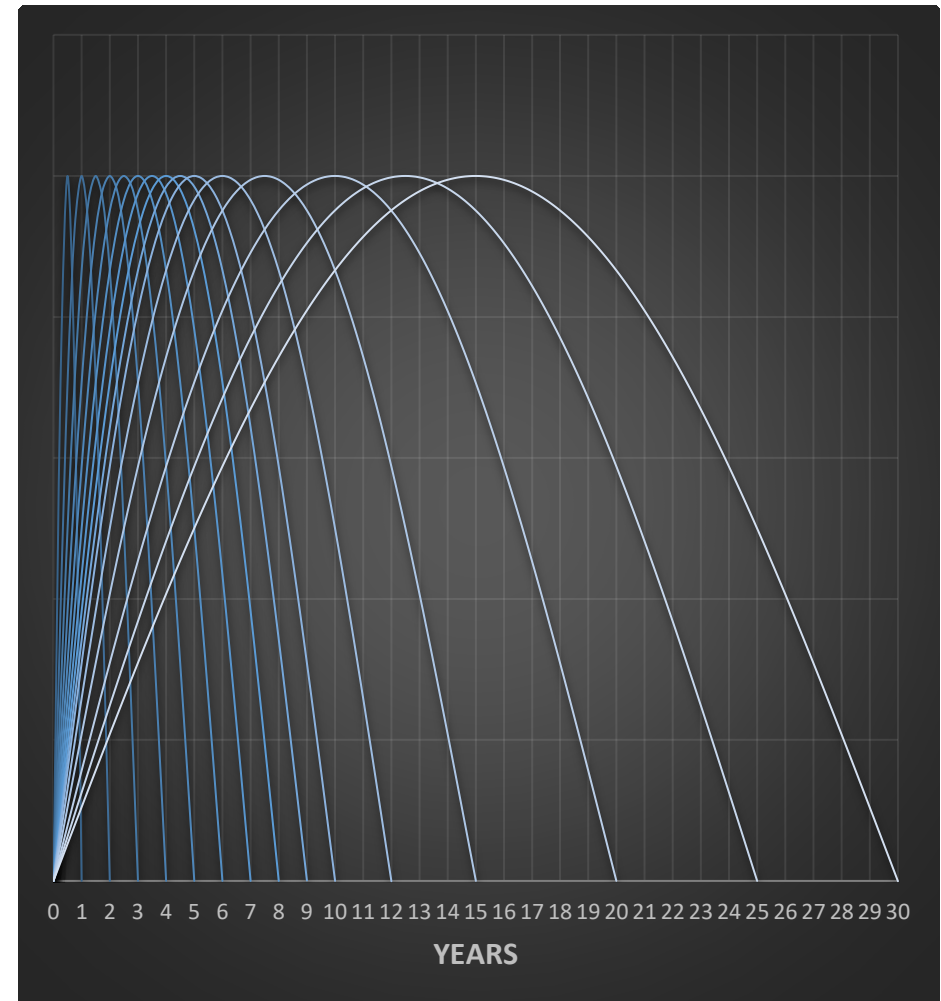
Forward-Starting Single-Period Overnight Indexed Swaps

The current Forward Rate Agreement (FRA) market provides deep hedging and speculation capability. This market also provides a strong underpin for derivative market depth as well as insight into monetary policy expectations. The main objective for creating a market in forward-starting single-period OISs, with the recommended conventions below, is to **create a “replacement” for the aforementioned FRAs that reference 3-month JIBAR.**



Spot-Starting Multi-Period Overnight Indexed Swaps

The current available set of vanilla Interest Rate Swap (IRS) contracts that reference 3-month (JIBAR) provides an important building block for interest curve construction as well as a fundamental underpin to valuation. The main objective for creating a market in spot-starting multi-period OISs, with the recommended conventions below, is to **create a “replacement” for the aforementioned IRS contracts.**



Key Next Steps

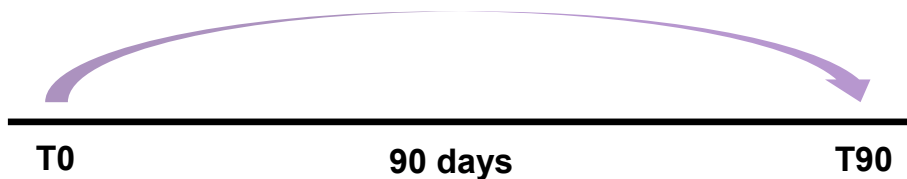
- Engage infrastructure providers to ensure that OIS product can be hosted appropriately
- Finalise and publish White Paper Conventions
- Add ZARONIA to ISDA definitions
- Produce ZARONIA data analytics
- **Above detail to feature in a formalized transition plan**

2023 is a critical year for establishing the necessary conditions for adoption

Annexures

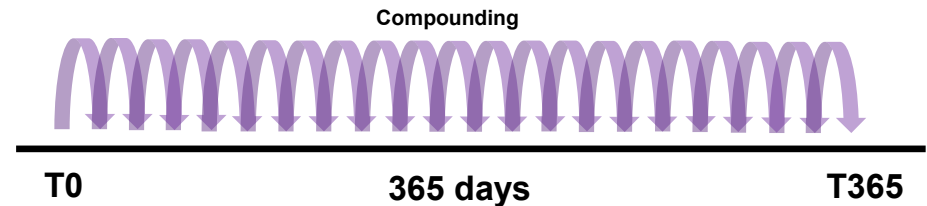
Annexure

Old World



- One rate required to calculate payment.
- Rate set at T0.
- Cash flow known 90 days in advance.
- Sufficient time to load into payment systems.
- Operationally simple

New World



- Multiple rates required to calculate payment.
- Require historic observation of rates over the entire reset period.
- Cash flow only known on day 365 due to rate publication delay.
- **Convention provision to made to allow sufficient time to calculate and make payment.**
 - **Calculation lag**
 - **Payment lag**
- Operationally more complex

Above construct change in not unique – for commercial banks, change management may be less of an issue. Corporates etc. may require term reference rates to preserve operational simplicity.

Annexure: Derivative Market vs Cash Market Depth

Table 1: USD LIBOR Market Footprint by Asset Class¹

		Volume (\$BN)	% LIBOR Related
Loans	Syndicated loans ²	~3,400	97%
	Corporate business loans ²	1,650	30–50%
	Noncorporate business loans	1,252	30–50%
	CRE/Commercial mortgages	3,583	30–50%
	Retail mortgages	9,608	15%
	Credit cards	846	Low
	Auto loans	810	Low
	Consumer loans	139	Low
	Student loans	1,131	7%
Bonds	Floating/Variable Rate Notes	1,470	84%
Securitization	Residential mortgage-backed securities	~7,500	24%
	Commercial mortgage-backed securities	~636	4%
	Asset-backed securities	~1,400	37%
	Collateralized loan obligations	~300	71%
Over-the-Counter Derivatives	Interest rate swaps	106,681	65%
	Forward rate agreements	29,044	65%
	Interest rate options	12,950	65%
	Cross currency swaps	22,471	65%
Exchange Traded Derivatives	Interest rate options	20,600	98%
	Interest rate futures	12,297	82%

¹ Source: Market Participants Group (2013). Data as of year-end 2013. Some overlap exists between estimates of syndicated and corporate business loans.

> \$5 Trillion Estimated USD LIBOR Exposure
 \$1-\$5 Trillion Estimated USD LIBOR Exposure
 < \$1 Trillion Estimated USD LIBOR Exposure

Table 1 Jibar footprint in the South African financial markets¹⁶

		Amount outstanding (ZAR billion)	% growth since 2015
Derivatives that reset against Jibar	Forward rate agreements	R 26,821	72
	Interest rate swaps	R 9,654	52.3
	Cross-currency swaps	R 745	6
	Other	R 645	-16.7
Non-derivative assets that reset against Jibar	Secured assets	R 19	65.9
	Unsecured assets	R 968	25.4
	Liabilities	R 766	10.6

Source: SARB