LCH

SwapClear

Managing the transition to RFRs

LCH SwapClear's approach to the conversion process





Contents

01.	LIBOR transition	3	06.	Enhanced Reporting
02.	Robust CCP risk management	4	07.	Accessing reports
	Building liquidity in		08.	Accessing the Enhanced
	RFR-Linked swaps	4		LCH Portal
03.	Conversion to RFRs	5	09.	Trade booking and reporting
04.	How the conversion process works	7	10.	ATSS Synchronisation
05.	Special Case Trades	9		MarkitWire

.....10

01. Enabling an efficient LIBOR transition

LCH SwapClear's structured approach to the conversion process will help members and clients manage their transition to RFRs smoothly and efficiently.

LCH Group ("LCH") and its LCH SwapClear business support ongoing industrywide benchmark reform initiatives, including the proactive transition away from IBORs and into RFRs. In line with <u>regulatory</u> guidance, LCH strongly recommends that participants consider proactively transitioning away from fallen-back benchmarks. The LCH conversion process is designed as a last resort for those participants that are otherwise unable to transition away from fallen-back rates.

We work closely with industry bodies and consult with our market partners to ensure our approach promotes market integrity, robustness and transparency. We conducted a consultation with members and clients at the beginning of 2021 on proposals that would enable the transition from outstanding cleared LIBOR contracts to be completed.

On 5 March 2021, the announcements by the FCA, IBA and ISDA served as a trigger for an index cessation event that applies to all LCH-cleared LIBOR swaps. The Index Cessation Effective Date has been set as:

- 1 January 2022 for all CHF, EUR, GBP and JPY LIBORs
- 1 July 2023 for all relevant USD LIBORs1

To ensure our members and clients are prepared for these dates and are equipped to manage their transition to RFRs at LCH SwapClear smoothly and efficiently, we are following a structured approach to the conversion process, which we outline in this brochure.

02. Robust CCP risk management

Maintaining outstanding LIBOR swaps past the relevant Index Cessation Effective Date could prove problematic in the event of a default, as trades would need to be hedged in a market whose liquidity is severely constrained. Risk management is at the heart of what CCPs do, and our ability to neutralise and resolve our exposures is paramount.

In line with consultation feedback, LCH is implementing a proactive conversion process to ensure that legacy LIBOR trades are converted into corresponding trades with market-standard RFR legs.

This will ensure:

- All cleared contracts remain liquid
- Risk profiles of legacy swaps are minimally impacted

Building liquidity in RFR-Linked swaps

Registered RFR trade count



Cleared RFR volumes

LCH continues to support members and clients to transition to alternative RFRs with clearing eligibility for swap products that help to drive their adoption.

At LCH SwapClear, we have seen a continuous upward trend in volumes for swaps linked to €STR, SOFR, SONIA and other RFRs, both in terms of trade count and notional. Total registered notional of USD 31 trn from March 2020 to 2021.

O3. Conversion to RFRs: SwapClear's structured approach

LCH's structured approach to the conversion process helps ensure members and clients are prepared for the transition to RFRs at LCH SwapClear.

5 June 2021 Dress rehearsal #1: EONIA to €STR swap conversion 26 April 2021 10 July 2021 **25 September 2021** 25 January 2021 **30 October 2021 31 December 2021** Publication of dedicated Dress rehearsal #2: Dress rehearsal #5: Implementation of LIBOR conversion Last publication of CHF/ LIBOR to RFR swap conversion ISDA Fallbacks into reports to support tools and reports EUR/GBP/JPY LIBORs EONIA to €STR swap conversion **EONIA** conversion made available LCH contracts (CHF, EUR, GBP, JPY) 11 September 2021 5 March 2021 10 May 2021 **2 October 2021** 4 December 2021 Launch of further Dress rehearsal #3: Production: Production: LIBOR to RFR IBA announcement of cessation of CHF/EUR/ Basis swap splitting Basis swap splitting swap conversion (CHF, EUR, JPY) **EONIA** conversion tools GBP/JPY LIBOR from and reports 31 December 2021 **16 October 2021** Production: **25 September 2021 18 December 2021** EONIA to €STR swap conversion

Dress rehearsal #4:

(CHF, EUR, GBP, JPY)

LIBOR to RFR swap conversion

Production:

LIBOR to SONIA swap

conversion (GBP)

04. How the conversion process works

As the markets' partner, LCH invited SwapClear participants to take part in its LIBOR Cessation Consultation. The majority of those consulted agreed that LCH should follow through with its standardised cash compensation conversion process.

All outstanding cleared LIBOR trades in EUR, CHF, GBP and JPY will therefore be converted to contracts with market-standard OIS legs at the end of this year. Following participants' feedback, we will incorporate the standard spread adjustment on the RFR leg.

4.1 LIBOR is replaced by the relevant compounded RFR, plus a non-compounded spread adjustment

4.2 Observation and payment dates in that leg will follow the market standard for the relevant RFR contract. We are keeping as many of the terms of the original LIBOR leg the same as possible to ensure minimal impact.

4.3 Non-LIBOR leg (the fixed leg) of the contract is left unchanged.

4.4 Any difference in swap valuation preconversion and post-conversion will be captured via cash compensation.

To ensure as much consistency and continuity as possible with the pre and post-conversion risk profiles, we will be leaving as many of the terms of the contract as possible unchanged. Note that the interest accrual period dates on the floating leg and payment dates on the fixed leg will remain the same.

LCH will be putting a cash compensation in place to neutralise any valuation differences between the pre-conversion LIBOR trade and its post-conversion RFR replacement, and will be calculated as a change in present value between the two contracts.

4.5 Spread Adjustment: LCH will apply the spread adjustment produced by Bloomberg. LCH will add this spread adjustment to the floating leg on a non-compounded basis. We plan to respect the periodicity of the original LIBOR index (e.g. 1M, 3M, 6M) and use the spread adjustment corresponding to it.

4.6 Where possible, LCH plans to preserve LIBOR fixings before the Index Cessation Effective Date through a LIBOR-RFR basis swap. All inscope LIBOR trades will be converted to RFR equivalents, with an overlay as the operational mechanism to preserve any LIBOR fixings until the Index Cessation Effective Date.

We work closely with industry bodies and consult with our market partners to ensure our approach promotes market integrity, robustness and transparency.

ISDA fallbacks and lch conversion – what's the difference?

LCH is fully supportive of ISDA's Fallbacks and the relationship they establish between the outgoing LIBORs and their corresponding RFRs. Indeed, LCH's conversion processes rely on this relationship. However, allowing these Fallbacks to become operational would generate a mismatch between the economic driver of the contract (the RFR) and its legal representation (still LIBOR). In order to maintain alignment, LCH's process represents a legal conversion.

There is also a small difference in economics to account for. ISDA's Fallback methodology employs

what can be described as an observation period shift of two business days to the RFR accrual so as to preserve the same payment date as on the LIBOR contract. In line with the consultation feedback, LCH plans to convert into a market standard RFR leg: this preserves the original interest calculation period but may introduce a payment lag according to the OIS conventions of the currency in question. LCH plans to account for this differential in its compensation calculation.

LIBOR fallback and conversion fees

A Fallback fee will apply to cleared contracts for which an index cessation event has occurred

and which remain outstanding. This fee is meant to encourage early transition before the LCH conversion processes are run, thereby mitigating LCH's concerns in relation to ongoing risk and default management.

A conversion fee will apply to cleared contracts converted as part of our conversion processes. The conversion process is designed as a last resort for participants who have not already performed an active transition.

Fees will apply to both LCH SwapClear Clearing Member House and Client accounts. Please reach out to LCHGlobal.SRM@lch.com if you have any questions or if you require further information.

05. Special Case Trades

LCH is working with the industry to ensure that all trades have been accounted for.

Basis Swaps:

To convert LIBOR basis swaps in a secure manner and to mitigate any technical risks, LCH plans to split each basis swap into two interest rate swaps prior to the date of the main conversion process. The split will convert each Basis Swap contract that would otherwise result in an RFR/RFR contract into a pair of fixed/floating contracts, each against its original benchmark.

Swaps Incorporating Compounding:

For swaps that involve compounding of the floating rate, whether that results in regular periodic payments or in a single terminal payment (such as in a zero coupon swap).

Please contact your LCH SwapClear representative for further details.

06. Enhanced Reporting and Analysis Capabilities

LCH Margin Calculators

Ahead of the cessation of LIBOR in December 2021, LCH has enhanced the <u>LCH Portal</u> and LCH Margin Calculator tool with new functionality to provide customers with visibility into the potential impact of the conversion process on their portfolio.

The LCH Margin Calculator optimisation service allows users to optimise their pre-trade and post-trade workflows and enables them to model the impact of the transition on their portfolios using LCH Margin Calculators analytics with indicative

results. LCH Margin Calculators will also enable clients to rebalance their portfolio once the transition has taken place.

The LCH Margin Calculators desktop tool will be further enhanced to enable a view of NPV of the converted swaps.

LCH Margin Calculators access

For access to LCH Margin Calculators, log in to the <u>LCH Portal</u>, or contact the dedicated support team at <u>SMARTTechSupport@lch.com</u> to request access.

Reporting

Per the €STR and SOFR discounting transition last year, a dedicated report (REP00315) has been utilised to provide the indicative compensation amount based on today's portfolio, with a granular view of the compensation per trade. An additional report (REP00318) will capture Fallback and Conversion fees. LCH will be providing the reference report (REP00319) to outline the details of the spreads applied to the newly converted RFR trades.

07. Accessing reports

Reports are available via existing reporting delivery methods. For client access to reports via Direct Client Reporting, please contact the onboarding team at SwapClear.ClientOnboarding@lch.com

TOOLS AND REPORTS	TITLE	DESCRIPTION		TITLE DESCRIPTION ACCESSIBILITY		
REQUIRED		DESCRIPTION	MEMBER	CLEARING BROKER	CLIENT	
Access to Portal		Use the LCH Portal to submit requests for Non-Economic Amends (NEAs)	\bigcirc			
Access to NEAs on Portal		A step-by-step user guide is available in the Non-Economic Amends tool	\bigcirc	\bigcirc		
REP00001/c REP0000F1		 Trade Level Details For users looking to unwind positions ahead of the conversion: contains trade level details, including the SD Trade ID (Client ID), which can be used to "link" LIBOR positions to new RFR positions For members: the Index Name can be found under columns "T" and "U" (ReceiveLeg and PayLeg) 				
REP00315/c	Trade Level Compensation Reports	Trade Level Report — Provides the computed cash compensation under an RFR scenario — Compensation is calculated as the difference between the NPV of all future cash flows — Produced: EOD				
REP00318/c		 A new daily report for House Members providing a list of all their trades that have incurred a Fallback or conversion fee Includes the fee amount per trade, which will be reported on the last business day of the month Live since 30 May 2021; data only visible from 30 September 2021 				
REP00084c		 Newly created trade details All trade level economics will be reported 				

TOOLS AND	TITLE	DESCRIPTION		TITLE DESCRIPTION ACCESSIBILITY		
REPORTS REQUIRED				CLEARING BROKER	CLIENT	
REP00045/c		 Explains the Settlement of Compensation Amount for the EONIA to €STR conversion LCH will book the cash compensating swaps for members and clients Cash compensating swaps will be 1 euro notional €STR trade with a minimum remaining term to maturity 				
REP0002/c and REP00016/c	EONIA to €STR	 A coupon on trades to be settled on the Monday/Tuesday following the conversion will have been instructed on the LIBOR trade prior to the conversion weekend, rather than on the RFR convertWed swap The LIBOR trade will not be populated in the Monday reports, having been terminated over the conversion weekend Any such coupons from these trades will be shown as "OTC Settled" (as opposed to "Settled") in REP0002 Friday's REP0002 and REP00016 can be used to reconcile the coupon settlement 				
REP00093/c	Compression	 Generated 5 times per day and lists all trades eligible for blended rate compression w3Can also be used for LCH Margin Calculators for compression to simulate the results of blended rate compressionsettlement 				
REP00094/c	Compression	Generated after each netting or blending cycle to show the results of the most recent compression cycle				
REP00319	Index Transition Spread	This is a reference report that details the spreads applied to RFR converted trades, per IBOR currency/index/ tenor combination				

08. Accessing the Enhanced LCH Portal

LCH continues to support members and clients to transition to alternative RFRs with clearing eligibility for swap products that help to drive their adoption.

A new <u>LCH Portal</u> screen provides visibility into the indicative impact of the conversion, enabling members, clients and clearing brokers to view their in-scope swaps, indicative cash compensation, RFR swaps and overlay swaps.

Log in to the <u>LCH Portal</u> here or email the onboarding team at <u>SwapClear.ClientOnboarding@lch.com</u> to request access.

09. Trade booking and reporting

In order to update participants on the booking and reconciliation of any new swaps (i.e. amended RFR conversion outputs and compensation swaps), LCH will leverage its existing messaging and reporting functionality.

Members will receive details of the swaps via LCH Trade Sharer messaging, and reports will be provided to participants (members and clients) via existing delivery methods. In addition, members and clients will also be able to extract the details of the compensating swaps via the LCH Portal. The LCH Portal will be available on the Saturday of the conversion weekend for members to retrieve reports. Members and clients can also retrieve their reports through SFTP at any time.

TOOLS AND REPORTS REQUIRED	DESCRIPTION	MEMBER	CLEARING BROKER	CLIENT
LCH Trade Sharer	 Messaging tool designed to keep members and clearing brokers updated on new trade activity, communicated directly from LCH to members and clearing brokers via the LCH Trade Sharer API 			
Sildiei	 Members can use LCH Trade Sharer during the IBOR conversion to manage IBOR terminations and RFR bookings 			
	 Messaging service that allows participants to synchronise their LCH and MarkitWire portfolio by auto-delivering new LCH trade events to MarkitWire 			
ATSS Sync	 Members and clients can use ATSS Sync to ensure their MarkitWire portfolio is up to date with their LCH trade portfolio during the conversion 			
	 Members and clients can register for ATSS Sync using the forms available win the <u>LCH Knowledge Centre</u> 			
	 Trade delivery tool enabling participants to auto-deliver trade details from their LCH portfolio to a SEF 			
LCH Trade	 Available to members and clients via the LCH Portal 			
Sharer	 Members and clients can use LCH Trade Sharer ahead of the conversion to manage their IBOR portfolio by routing trade details to SEFs, simplifying the trade unwind and compression process 			

10. ATSS Synchronisation

ATSS Synchronisation allows LCH SwapClear users to synchronise their cleared portfolio and their MarkitWire trade population. This functionality is being enhanced to include the results of LIBOR conversions to be communicated to MarkitWire.

Customers are required to submit the relevant onboarding forms via the LCH Knowledge Centre to gain access to this functionality:

10.1

Direct members with existing access:

Members are required to submit an amended onboarding form requesting to receive messages for the conversion events. In addition, the Markit Sync .csv form requesting to receive new trade messaging is required, and members should also contact MarkitWire with their onboarding request.

10.2

Direct members without existing access:

Members wishing to be onboarded to this functionality are required to submit an ATSS election form to LCH and MarkitWire. The Markit Sync .csv form requesting to receive new trade messaging is also required. The LCH form can be found in the LCH Knowledge Centre.

10.3

Clients with existing access:

Onboarding to the enhanced functionality is handled via an online submission by each clearing broker with whom the client has a relationship. Clients are to request that each clearing broker submit an enhancement request to LCH via the existing LCH Onboarding tool.

10.4

Clients without existing access:

Clients wishing to be onboarded to the functionality are to request that each clearing broker they have a relationship with submit an onboarding request form via the existing LCH Onboarding tool. Clients should also contact MarkitWire with their onboarding request.

MarkitWire

Members and clients can access more information on the MarkitWire implementation via their MarkitServ Documentation Portal. For onboarding to MarkitWire, the 'Netting Synchronisation – Onboarding Instructions' form should be used to request setup for reconciliation of the termination of the original LIBOR trade, the newly booked RFR and the cash compensation swap.

LCH. The Markets' Partner.

LCH builds strong relationships with commodity, credit, equity, fixed income, foreign exchange (FX) and rates market participants to help drive superior performance and deliver best-in-class risk management.

As a member or client, partnering with us helps you increase capital and operational efficiency, while adhering to an expanding and complex set of cross-border regulations, thanks to our experience and expertise.

Working closely with our stakeholders, we have helped the market transition to central clearing and continue to introduce innovative enhancements. Choose from a variety of solutions such as compression, sponsored clearing, credit index options clearing, contracts for differences clearing and LCH SwapAgent for managing uncleared swaps. Our focus on innovation and our uncompromising commitment to service delivery make LCH, an LSEG business, the natural choice of the world's leading market participants globally.

Disclaimer

This document has been provided to you for informational purposes only and is intended as an overview of certain aspects of, or proposed changes to, the SwapClear, Listed Interest Rates, SwapAgent and/or any other service provided by LCH Group Holdings Limited ("LCH Group") or any of its group undertakings (group undertakings shall be construed in accordance with section 1161 of the Companies Act 2006; each an ("LCH Group Company").

LCH Limited is supervised by the Bank of England within the UK regulatory framework, registered as a derivatives clearing organisation with the U.S. Commodity Futures Trading Commission ("CFTC") and recognised as a third-country CCP under Regulation (EU) No. 648/2012 of the European Parliament and of the Council of 4 July 2012 on OTC derivatives, central counterparties and trade repositories ("EMIR"). LCH S.A. is regulated and supervised in France by the Autorité des Marchés Financiers, the Autorité de Contrôle Prudentiel et de Résolution and the Banque de France, authorised as an E.U. CCP under EMIR, registered as a derivatives clearing organisation with the CFTC and as a clearing agency with the U.S. Securities and Exchange Commission. LCH Limited and LCH S.A. also hold licenses or authorisations in other jurisdictions in which they offer their services. More information is available at www.lch.com.

The relationship of an LCH Group Company with its members is governed solely by its rulebook and certain other ancillary documentation, as applicable. This document does not, and does not purport to, contain a detailed description of any aspect of a service provided by an LCH Group Company or any other topics discussed in this document, and it has not been prepared for any specific person. This document does not, and does not seek to, constitute advice of any nature. You may not rely upon the contents of this document under any circumstance and should seek your own independent legal, investment, tax and other advice. The information and any opinion contained in this document does not constitute a recommendation or offer with respect to any derivative contract, financial instrument, security or service. No LCH Group Company makes any representation, warranty, condition or guarantee (whether express or implied) that the contents of this document are accurate, complete or up-to-date, and makes no commitment to offer any particular product or service. No LCH Group Company shall have any liability for any losses, claims, demands, actions, proceedings, damages, costs or expenses arising out of, or in any way connected with, the information contained in this document, except that each LCH Group Company accepts liability that cannot be excluded by applicable law.

Copyright © LCH Limited 2023. All rights reserved. Copyright © LCH S.A. 2023. All rights reserved. LCH SwapClear, LCH ForexClear, LCH RepoClear, LCH EquityClear, LCH SwapAgent and €GCPlus are registered

The information contained in this document is confidential. By reading this document, each recipient agrees to treat it in a confidential manner and will not, directly or indirectly, disclose or permit the disclosure of any information in this document to any other person (other than its regulators or professional advisers who have been informed of the confidential nature of the information) without the prior written consent of the relevant LCH Group Company to whom such confidential information belongs

Contact us

For more information on SwapClear, please contact your sales team representative, email lchsales@lch.com or visit lch.com. For more information on our compression offering, please contact us at:





Europe

+44 20 7426 7543

SwapClearInformation@lch.com

Americas

+1 212 513 8282

USSwapClearSales@lch.com

Asia-pacific +61 2 8259 4109 AsiaPacinfo@lch.com

