

SUPPORTING THE REPOTRADE LECYCLE



CONTENTS

Overview	4
Supporting the Repo Trade Lifecycle	5
Client Onboarding - Set-up of Legal Entity Identifiers	9
Bilateral and Cleared Trades	10
Bilateral Trades:	
Provision of Settlement Instructions	11
Matching, Confirmation and Archiving of Trade Executions	12
Cleared Trades:	
Central Counterparty (CCP) Transactions–Netting and Clearing	14
Regulatory Trade Reporting	16
Driving Success Through Repo Post-Trade Efficiency	18

OVERVIEW

Repurchase Agreement (repo) transactions play an important role in financial markets. The repo market is a critical source of funding for broker-dealers and an important cash management tool for institutional counterparties.

Over recent years the repo market has been subject to volatility and market dislocation. This has raised concerns on whether the repo market is truly functioning efficiently and effectively. Market participants that embrace the value automation can bring to their post-trade process will be well placed to reap the financial and operational advantages of straight-through processing while reducing risk for their firms.

Regulatory compliance also continues to be of paramount importance to market participants

across all regions, with regulations and directives such as SFTR, BASEL III, MiFID II increasingly impacting on both repo trade execution and the post-trade process.

DTCC offers a range of solutions that helps clients who are active in the repo market to reduce risk, maximize operational efficiency and ensure regulatory compliance. We work with a range of market participants to bring collaboration, automation, and risk management to the repo trade process.

SUPPORTING The Repo trade lifecycle

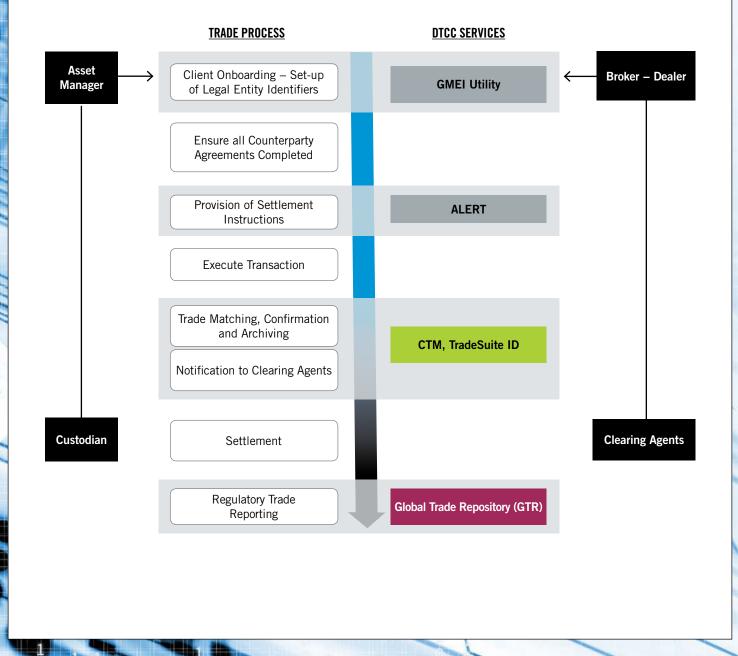
Our suite of solutions includes services that enable market participants to achieve operational efficiency and compliance across the trade lifecycle, including:

- Client onboarding
- Provision of settlement instructions
- Matching and confirmation
- Netting and clearing
- Settlement
- Trade reporting

The following diagrams demonstrate the end-to-end touch points for bilaterally cleared institutional trades, Centrally Cleared Institutional Tri-Party (CCIT) trades and broker-to-broker processing.

BILATERALLY CLEARED INSTITUTIONAL TRADES

This workflow is applicable to money managers trading in bi-lateral and buy-sell back repo transactions. These DTCC services provide automated platforms for efficient trade processing through to settlement and various lifecycle events.

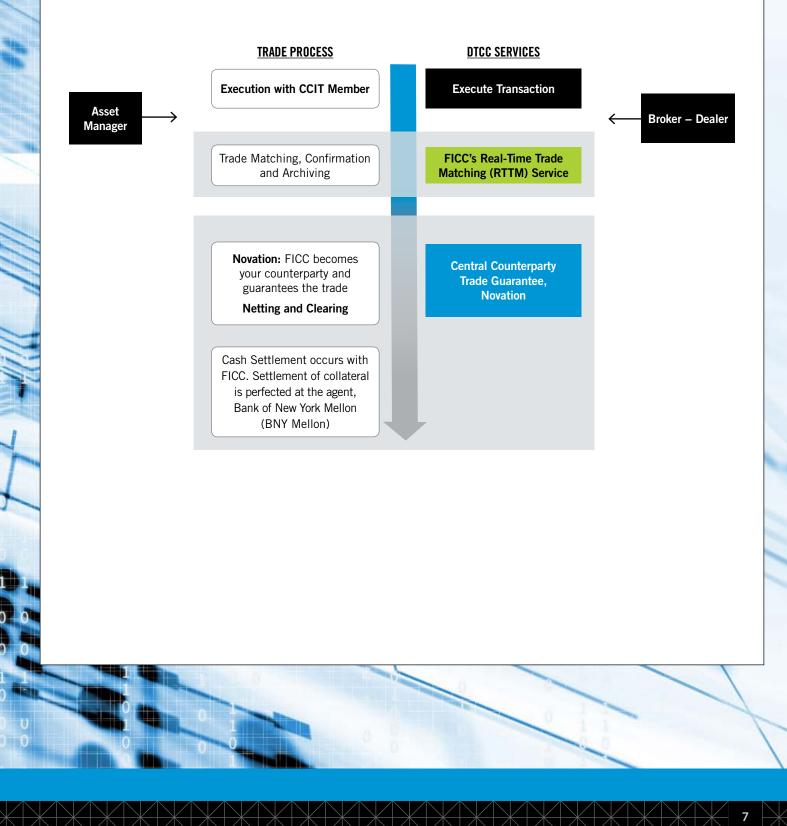


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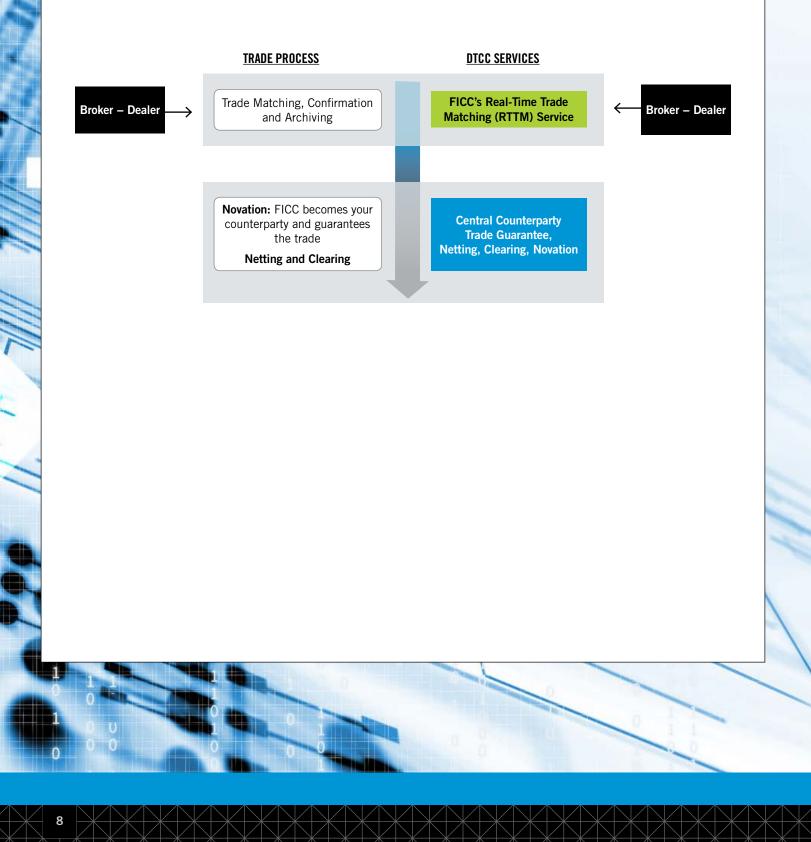
CENTRALLY CLEARED INSTITUTIONAL TRIPARTY (CCIT) TRADES

This workflow allows both buy-side cash investors and broker-dealers to process, novate, net and settle these transactions via a central counterparty (CCP), leveraging the credit risk management tools of DTCC.



BROKER-TO-BROKER

This workflow allows broker-dealers trading with other broker-dealers or inter-dealer brokers the ability to compare, novate, net and settle these transactions. These DTCC platforms bring tremendous efficiency and effective risk management to the industry.





CLIENT ONBOARDING - SET-UP OF Legal Entity Identifiers

GMEI®

GMEI® HIGHLIGHTS

- **PROVIDES ENHANCED USER DASHBOARD** and electronic user notifications for upcoming maintenance deadlines
- HELPS REPO CLIENTS to meet reporting obligations (e.g. MiFID II, SFTR, etc.)

GMEI® Utility, a Global Legal Entity Identifier Foundation (GLEIF) – accredited Local Operating Unit (LOU), is designed to provide a single, universal standard identifier to any repo client involved in a financial transaction internationally, thereby helping them to meet their transaction reporting obligations. The GMEI utility helps repo clients to comply with regulations such as MIFID II which requires the use and application of legal entity identifiers (LEIs) for proper legal identification of the counterparties to a transaction. A proper LEI ensures repo market participants have the ability to properly identify and manage counterparty credit exposure.

FOR MORE INFORMATION, or to register, visit gmeiutility.org



BILATERAL AND CENTRALLY CLEARED TRADES

DTCC provides services to repo clients for both bilateral and cleared trades.

For bilateral trades, DTCC enables clients to:

- Populate and communicate accurate account settlement instructions
- Match, confirm and archive trade executions

For centrally cleared trades, DTCC helps clients to:

Net and clear Central Counterparty transactions

BILATERAL TRADES: PROVISION OF SETTLEMENT INSTRUCTIONS

ALERT®

ALERT[®] HIGHLIGHTS

- **ENABLES** asset managers, custodians and broker-dealers to store and communicate their Repo settlement instructions electronically
- PROVIDES ABILITY TO USE FULL MAKER/CHECKER AND INTERNAL CONTROLS including audit trail for cash wire instructions
- **UTILIZES VALIDATION RULES** to ensure proper field level data population for repo and the various product types such as treasuries, agency, corporates and sovereigns
- ALLOWS AUTOMATED ENRICHMENT to matching platforms CTM and TradeSuite

ALERT[®] is the industry's largest and most compliant online global database for the maintenance and communication of account and standing settlement instructions (SSI). ALERT enables repo market participants to populate and communicate accurate account and SSI data automatically for both cash and securities movements. It helps helps to reduce risk and operational costs associated with repo trade failure, by providing a complete and standardized process for storing, updating and communicating account and settlement details.

FOR MORE INFORMATION, visit dtcc.com/alert

MATCHING, CONFIRMATION AND ARCHIVING OF TRADE EXECUTIONS

DTCC's institutional trade matching solutions helps clients to ensure that repo trades are executed effectively on counterparty, direction, cash and settlement.

СТМ™

CTM HIGHLIGHTS

- SINGLE TICKET MATCHING MODEL where open and close legs of the agreement are matched on trade date
- SUPPORT for block and allocation/confirmation matching
- **FLEXIBILITY TO MATCH OPEN AND TERM REPOS** in a central matching system
- **CTM CONFIRM ARCHIVE STREAMLINES** archive management for effective retention and safekeeping of electronic confirmations

The CTM service[™] allows investment managers and broker-dealers to automate their repo trade block and confirmation processing in a solution that supports industry best practices. The CTM platform allows trade counterparties to match trade fundamentals for the open and close legs of repo agreements on trade date using a single trade ticket, ensuring the terms of the deal are clear to both parties. CTM also supports subsequent changes to repo trades – if necessary – by keeping an open repo trade available for re-matching.

Matching information on CTM helps clients to obtain high quality data that can be reported to a trade repository (e.g. SFTR).

CTM Confirm Archive also allows users to electronically search and retrieve matched trade confirmations through a real-time, web-based service. Users need only log in to the service from the comfort of their desk to access up to 10 years of confirmation history quickly, easily and efficiently.

FOR MORE INFORMATION, visit dtcc.com/ctm

TRADESUITE ID[™]

TradeSuite ID[™] HIGHLIGHTS

- STREAMLINE POST-TRADE PROCESS by electronically processing trade messages between all trading and settlement counterparties
- STREAMLINED AUTOMATED CONFIRMATION PROCESS for repos including life cycle events
- ENABLES DEALER ELECTRONIC SEC 10B-10 COMPLIANCE for client notification allowing paper confirm elimination for market participants
- PROVIDES FULL 10 YEAR AUDIT TRAIL of these transactions

The TradeSuite ID[™] service offers a streamlined, end-to-end process that reduces operational risk for repo clients by eliminating manual and verbal communications, while accelerating the time from trade date to settlement. The TradeSuite ID platform, a cornerstone of the U.S equity and fixed-income markets, allows broker-dealers to centrally store the confirm backer information and enables automated electronic trade agreement between counterparties.

FOR MORE INFORMATION, visit dtcc.com/tradesuiteid



CLEARED TRADES: CENTRAL COUNTERPARTY (CCP) TRANSACTIONS - NETTING & CLEARING

The Fixed Income Clearing Corporation (FICC), a wholly-owned subsidiary of DTCC, matches and nets repo transactions as part of its netting process for government securities trading activity, including all buy/sell transactions and U.S. Treasury auction purchases.

- Real-Time Trade Matching (RTTM[®]) enables dealers, broker-dealers and other market participants to automate the processing of fixed income securities trades throughout the trading day. The result is an immediate confirmation for trade executions that is legal and binding.
- Since the Repurchase Agreements Service (Repo Services) was introduced in 1995, it has rapidly outpaced all other products and accounts for the largest dollar volume of U.S. Government securities trades processed through FICC. Today, on average, FICC matches, nets, settles and risk manages repo transactions valued at more than \$1.7 trillion a day, bringing substantial cost-reduction benefits to its netting members and reducing positions requiring delivery by as much as 75%.

CCP services offered by the FICC Government Securities Division allows firms to novate the repo transaction to a central counterparty and realize benefits such as guaranteed trade settlement, netting transactions and allowing balance sheet relief. Dealers have long enjoyed these benefits and now the buy-side can also take advantage via new membership structures.

CENTRALLY CLEARED INSTITUTIONAL TRIPARTY (CCIT[™]) SERVICE

CCIT HIGHLIGHTS

- CCIT and sponsored member services aim to EXPAND THE AVAILABILITY OF CENTRAL CLEARING in the repo market
- Enables the overall **REDUCTION OF COUNTERPARTY CREDIT RISK** in the repo market
- Centrally clearing transactions at FICC could also PRESENT NEW OPPORTUNITIES FOR POSSIBLE BALANCE SHEET NETTING AND CAPITAL RELIEF, increasing lending capacity and income to investors

DTCC has expanded the availability of central clearing in the repo market, strengthening both the safety and efficiency of the marketplace. Institutional investors can participate in FICC either directly in the new Centrally Cleared Institutional Triparty (CCIT[™]) Service or indirectly through a sponsoring member bank.

THE CCIT[™] SERVICE

FICC is the only central counterparty (CCP) platform in the U.S. that clears tri-party repo and debt transactions. Since 1998, FICC's GCF Repo® Service has enabled its dealer members to trade FICC-cleared general collateral repos with each other based on rate, term and underlying product through the day without requiring intra-day, trade-for-trade settlement on a Delivery-versus-Payment (DVP) basis. As an expansion of the GCF Repo® Service, the CCIT Service extends FICC's CCP services and guarantee of completion of eligible trades to tri-party repo transactions between GSD netting members and eligible tri-party money lenders.

SPONSORED MEMBERSHIP SERVICE

Since 2005, FICC has also offered a service that allows well-capitalized bank members to sponsor their Registered Investment Company clients into FICC. With the expansion of the sponsored membership program, FICC will now permit additional Qualified Institutional Buyer clients to lend cash and U.S. treasuries via their sponsoring member banks throughout the day.



REGULATORY TRADE REPORTING

GLOBAL TRADE REPOSITORY (GTR)

DTCC's GTR service, through locally registered, recognized or licensed trade repositories, holds detailed data on OTC derivatives transactions globally and has grown to become the largest provider of OTC derivatives reporting services in the world. The GTR service enables users to meet their regulatory reporting obligations and provides transparency to the regulators. **This service maintains approximately 40 million open OTC positions per week and processes over one billion messages per month.** The GTR service is now being extended to offer securities financing transaction reporting (SFTR).

TO LEARN MORE visit www.dtcc.com/sftr

GTR enables effective reporting on repo transactions and ensures compliance with regulations such as European SFTR and EMIR. SFTR is the latest European regulation that calls for the reporting of repo transactions in a similar vein to derivatives. Matching and locking down the trade details, as a best-practice prior to reporting to regulators, can help to minimize reporting breaks.



GTR HIGHLIGHTS

- ENABLES COMPLIANCE WITH KEY REGULATIONS such as SFTR and EMIR
- **OFFERS SINGLE POINT OF CONNECTIVITY,** reconciliation, and control to reduce the cost burden of adhering to different regulatory standards
- PROVIDES 60+ REGULATORS WITH ACCESS TO DTCC'S TRADE REPORTING DATA

FOR MORE INFORMATION, visit dtcc.com/gtr

DRIVING SUCCESS THROUGH REPO POST-TRADE EFFICIENCY

DTCC is working closely with the repo industry, including trade bodies such as the Securities Industry and Financial Markets Association (SIFMA), the International Capital Markets Association (ICMA) and others to ensure that our solutions mitigate risk, create market efficiencies and reduce costs for our clients.

To find out how our solutions can help firms to streamline their posttrade process and ensure regulatory compliance, please email us at solutions@dtcc.com or visit us on the web at www.dtcc.com

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