



2004 Development Agenda

January 2004

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2004 Development Agenda

DTCC Enterprise-wide Activities

BUSINESS CONTINUITY

Implement new remote data processing capabilities and advance other business continuity efforts.

As reported previously, DTCC brought its remote data processing capabilities live in Q2 2003 and these capabilities now routinely support most data processing functions for DTC and some for NSCC. In 2004, certain additional data processing functions will be “backed up” at the remote data processing sites. The most significant changes provide for back-up of additional NSCC and EMCC applications (as described more fully in the “Clearing Corporation Insourcing” section below), and for back-up of most FICC applications. FICC’s implementations of back-up capabilities will involve an initial implementation, in mid-year, encompassing the Real-Time Trade Matching (RTTM), netting and settlement systems for government securities, and a second phase implementation, by year-end, including the RTTM system for mortgage-backed securities. The implementation of FICC’s remote data processing capabilities will be conducted in a manner to minimize the impact on participants, but its impact may vary based on a participant’s current interface with FICC.

Telecommunications for participants connected to DTCC’s Securely Managed and Reliable Technology (SMART) complex are now routinely routed through each of DTCC’s data processing locations, providing an ongoing testing of participants’ ability to communicate with all of these data processing sites.

In 2004 DTCC will begin to establish an out-of-region operations center supporting critical operations functions for DTC, NSCC, FICC and EMCC. A staffing model and the implementation timeline for this site have been finalized, and the location is expected to be determined during Q1. Limited operations at this site are scheduled to begin by year-end 2004, with additional functions migrated in phases throughout 2005 so that the site is fully operational by year-end 2005. DTCC anticipates that, with this remote operations site fully operational, it will have an “active/active” operating model for all critical functions, with aspects of these functions supported routinely each day at all DTCC operating locations. The depository’s physical certificate processing functions will not be supported routinely at the remote operating site.

To enhance business continuity efforts for NSCC and DTC, DTCC maintains a record of clients who have successfully tested connectivity from their own back-up sites to these two DTCC subsidiaries and will be reporting the results to our regulators as requested. During Q1, Relationship Management will be contacting those firms who are required to test with these two subsidiaries, but have not yet done so. To schedule a test of your back-up connectivity to the DTCC data centers, depository clients should contact our Participant Interface Planning group at 212-855-1482. NSCC clients should contact SIAC at 212-383-HELP to arrange for connectivity tests.

DTCC plans to publish a more detailed review of its business continuity planning efforts in February. In addition, during Q4, FICC will publish to its members an overview of new business recovery procedures, addressing FICC’s implementation, earlier in the year, of its new remote recovery capabilities. Specifically, this overview will detail requirements for interacting

with the remote site, procedures for synchronizing participants' systems with FICC in the event of a business interruption forcing recovery at the remote site, and other business continuity issues.

CLEARING CORPORATION INSOURCING

Continue to migrate technology support services from SIAC to DTCC.

DTCC expects to complete major aspects of its plan to "insource" data processing support for clearing corporation applications from SIAC's Shared Data Center to DTCC's data center complex in 2004. This insourcing effort will permit DTCC to realize significant cost savings over time, and will also provide for a consistent business continuity and data recovery plan for all DTCC subsidiaries. Key applications were "insourced" in 2003, and this process will proceed at a more rapid pace in 2004.

Certain NSCC applications will be insourced in connection with the implementation of an application redesign. Examples of applications insourced in this manner include the July 2003 launch of the Trade Repository Processing (TRP) system and the December 2003 implementation of the consolidated settlement reporting system. The redesigned Continuous Net Settlement system will be implemented in the DTCC data centers in mid-2004.

In other cases, an existing application will be "re-hosted" from SIAC to DTCC. For those applications to be re-hosted in DTCC's data centers, DTCC expects to complete distributed application re-hosting by the beginning of Q2. Additional mainframe NSCC and EMCC applications will be re-hosted in phases throughout the year, with the migration of these applications to the DTCC data centers projected to be completed by year-end.

Customers will not be required to make any changes in connection with the initial migration of these services into the DTCC data centers, but certain modest changes will be required later to ensure continued connectivity in the event of a serious regional disaster. DTCC and SIAC have held discussions to ensure that customers' communications on NSCC services can continue using existing telecommunications facilities for the near term. To ensure enhanced availability and recoverability of all clearing corporation services in the event of a regional disaster, all customers will be required to make changes to the transmission and receipt of data (DataTrak and AutoRoute, respectively) and communication connectivity. These changes are required so services are independent of regional resources. Detailed information about these requirements and changes will be available in future Important Notices.

DTCC Important Notice Z#0008, dated October 30, 2003 provides information about the SMART-SFTI interconnectivity effort and the communication changes required by customers. Interoperability is a cooperative offering between DTCC and SIAC that provides a new level of reliability for customer communications with the market infrastructures. This notice is available from the DTCC Web site at: <http://www.dtcc.com/CustomerFocus/notices/z0008.htm>. Additional information about insourcing efforts can be found in DTCC Important Notice Z#0009, dated January 15, 2004, which can be accessed at <http://www.dtcc.com/CustomerFocus/notices/z0009.htm>.

COMMUNICATIONS UPGRADES

Improve service availability and business continuity by migrating customer communications to more robust services.

To improve overall reliability and reduce costs to the industry, DTCC is extending its SMART network to its clearing services. To complete this upgrade, customers accessing NSCC,

FICC, and/or EMCC applications via SIAC's Broker or Access networks must convert network connections by December 31, 2004. Customers have the choice of accessing these DTCC services through direct connections into SMART or via SIAC's Secure Financial Transaction Infrastructure (SFTI) into SMART. Customers electing to access DTCC services via SFTI into SMART are required to maintain and routinely exercise connectivity to SFTI in at least two of its three geographic regions (currently the New York area, Boston, and Chicago) and to convert all interfaces to TCP/IP. Customers using direct SMART connections may continue using SNA protocols, although DTCC strongly encourages conversion to TCP/IP from SNA. RJE and NJE interfaces will not be supported over SMART or SFTI.

Concurrently, DTCC will be continuing with its efforts, announced in June 2000, to retire proprietary file transfer and messaging applications. The remaining applications are scheduled to be sunset in 2005. DTCC will be working with participants during 2004 to achieve this timing.

DTCC and SIAC demonstrated interconnectivity between the SMART complex and SIAC's SFTI during the third quarter of 2003. Activities in 2004 are focused on completing customer deployments and upgrades. During the first half of 2004, DTCC relationship managers will be working with each DTCC customer to help identify the best choices and to coordinate upgrade activities. For most customers, DTCC has identified opportunities to consolidate a number of existing connections with DTCC and SIAC into a smaller number of higher-bandwidth SMART connections to improve performance and service levels with little or no increase in cost.

Further information on communications upgrades can be obtained from your relationship manager or from Jim Umberger at 212-855-1252 or jumberger@dtcc.com.

BILLING MODERNIZATION

Launch revised fee schedules and invoices

Revised DTC and NSCC invoices, to be made available in Q3, will include a simpler presentation that will make the invoices more intelligible and easier to correlate with participants' books and records. Drawing on suggestions provided by participants, the redesigned invoices will be delivered as a printable (PDF) document via e-mail, and current and historical invoices will be available for download via SMART/Search. In addition, invoice data in spreadsheet "comma separated value" (CSV) format will be made available.

A revised fee schedule available at the beginning of 2004 is designed for ease of use and for easy cross-reference to invoices in their print or spreadsheet forms.

These changes will not have direct systems implications for most participants. Participants that have built automated processing of DTC or NSCC invoices may need to revisit these provisions. Further information on this billing initiative can be obtained from Dwight Arthur at 212-855-1087 or dwight.arthur@dtcc.com.

INTERRUPTIONS IN PROCESSING

Gain industry input on a white paper that will outline DTC's and NSCC's plans for addressing processing interruptions.

During Q1, DTCC will distribute a white paper addressing the actions to be taken in the event of a significant disruption in processing including an unscheduled closing of one or more of the major markets or exchanges and/or the closing of the Federal Reserve. The paper will address the steps DTC and NSCC will take in the event of a major systemic processing disruption.

Clearance and Settlement

The principal focus of DTCC's 2004 development efforts in clearance and settlement continues to be on furthering industry progress on STP. Equity clearance and settlement systems initiatives include the following:

MARKET TRADE INPUT AND OUTPUT

Obtain trade input in real time from certain Qualified Special Representatives (QSRs)/ Electronic Communications Networks (ECNs) and regional marketplaces.

At year-end 2003, more than 55% of all trades were being reported to the clearing system in real time, with the New York Stock Exchange, the American Stock Exchange, and the Nasdaq Stock Market all reporting in this fashion. In 2004, DTCC will work with QSRs/ECNs as well as regional marketplaces to convert their input to real-time. The submission of real-time input will not impact participants' systems.

In addition, DTCC will work with the Securities Industry Association and all U.S. equity marketplaces to expand contract output to include the entering broker (also referred to as introducing broker) identifier, client order unique identifiers, and branch and sequence (also referred to as market control) numbers for all markets. Upon implementation in early second quarter, participants will be required to submit the buy and sell entering broker identifiers as part of their Correspondent Clearing input. Failure to submit both the buy and sell entering broker information will result in a rejected trade.

In 2004, DTCC also plans to provide for the trade recording of cash, next day and sellers' option trades executed in the over-the-counter and regional markets. A similar service exists for the NYSE and Amex. This effort is also targeted for implementation by early second quarter.

Further information on DTCC's trade input efforts is available from Hank Belusa at 212-855-5693 or hbelusa@dtcc.com.

CNS REDESIGN

Provide a real-time processing platform with new features for same-day settlement and create automated delivery instructions for non-CNS, DTC-eligible securities.

The current Continuous Net Settlement system is being rewritten from a batch to a real-time application to improve the speed and efficiency of the system, support STP and provide the flexibility to move to a shorter settlement cycle should the industry decide to do so. The first phase of the CNS redesign, implemented in 2003, automated balance order processing and changed the Consolidated Trade Settlement reports to provide "one-stop shopping" for balance order information and to eliminate redundant reporting.

Phase II of the CNS Redesign includes the development effort to rewrite the system from a batch to a real-time application and will accommodate the real-time delivery of positions. The basic features of the CNS system will not be altered. The most significant changes will be timing changes and the ability to process transactions, such as fully-paid-for account transactions, real-time throughout the day cycle. Also included in Phase II is a modification to the CNS Stock Borrow program. Currently, participants provide excess collateral to be used in the CNS night cycle to cover temporary shortfalls in CNS. This capability will be extended to the CNS day cycle processing to facilitate the settlement of CNS open fails resulting from as-of trades and

other priority needs during the day cycle. Phase II also includes the creation of intra-day, real-time messages to notify participants of changes to their CNS positions, caused by same-day settling trades, after the start of the day cycle.

The implementation of Phase II will also include the creation of automated delivery instructions for non-CNS, DTC-eligible securities as well as the production of two supplemental Consolidated Trade Summaries for same-day settling trades. The new delivery instruction feature will enable NSCC to create automated Deliver Orders (DOs) for non-CNS, DTC-eligible securities at the request of the delivering participant. This feature, which is optional, automates and streamlines the current process whereby NSCC creates receive and deliver instructions or balance orders for non-CNS, DTC-eligible securities that participants then enter into the depository as DOs. NSCC will also produce supplemental Consolidated Trade Summaries to support the settlement of T+3 and older trades received up until 11:30 AM on settlement day (T+3) for same-day settlement in the day cycle.

The coding of the Phase II changes was completed in 2003, and the redesigned system is now in parallel testing. DTCC will support participant testing during the first half of 2004 with implementation targeted for the second quarter. Further information on the CNS redesign can be obtained from Edlyn Meringolo at 212-855-5697 or emeringolo@dtcc.com.

NON-STANDARD SETTLING TRADES IN CNS

Enable settlement of non-standard trades in CNS.

Currently, non-standard trades such as cash trades, next-day trades and seller's options are reported on trade contracts but are not passed to the Trade Repository Processing system (TRP) or to CNS for settlement. This enhancement, targeted for Q4, will provide the capability for TRP and CNS to handle non-standard trades. Participants will have to indicate on their trade input whether the specific non-standard trade should go to CNS. This feature will allow participants to settle more trades through CNS. DTCC is working with an ad hoc industry committee to determine whether non-standard settling trades should automatically default to CNS with an exemption capability or feed to CNS on an individual trade basis at the discretion of the participant.

Further information about non-standard settling trades in CNS can be obtained from Elena Staloff at 212-855-5699 or estaloff@dtcc.com.

INDEX SHARE PROCESSING

Provide greater flexibility in distributing portfolios as well as greater flexibility in creating and redeeming Exchange Traded Funds (ETFs).

Consistent with ETF market place trends, DTCC will examine its index share process to provide for next-day create and redeem instructions, process actively managed ETFs and provide additional data fields on its domestic and foreign portfolio composition files including shares outstanding for each ETF index receipt, dividend amount per ETF index receipt, ex-distribution amount per ETF index receipt and, potentially an indicator if an index component is undergoing a corporate action.

Customers receiving the portfolio composition files as well as broker/dealers and index receipt agents who engage in creating and redeeming ETFs will need to modify their processes consistent with any index share process changes. Specific information about particular changes will be publicized as these changes, planned for the second half of 2004, are developed and

implemented. Further information on DTCC's index share processing effort can be obtained from Hank Belusa at 212-855-5693 or hbelusa@dtcc.com.

SMART/Track

Implement a messaging and tracking system for corporate action liability notices and other inter-participant notifications.

In 2003, DTCC developed SMART/Track, an automated messaging hub that accommodates a variety of notifications and communications among participants. In 2004, DTCC will expand SMART/Track to include messaging and tracking of corporate action liability notices between broker/dealers and banks. This enhanced functionality is expected to be available during Q3.

SMART/Track for corporate action liability notices offers participants the benefits that result from automating a manual process and establishing standards for communicating information. In addition, it reduces message delivery risk for participants through the generation of a confirmation for each liability notice processed. The tracking component and the various searches and sorts provided should help participants better manage their open liability in a timely manner.

The system requires the development of a web-based front end for easy access. Through SMART/Track, users will be able to enter and send a notice of liability for a DTC- or non-DTC-eligible security to its counterparty or counterparties. Features of the corporate action liability notice application include the autopopulation of fields; the ability to send a liability notice for the same security to multiple parties; a link to DTC's Reorganization Inquiry for Participants (RIPS) system for corporate action information; and an alert function that will notify participants when RIPS envelopes are updated after a liability notice has been generated. Each liability notice will have a control number so that participants can track it throughout its life cycle and participants will receive a confirmation from SMART/Track when the notice is delivered.

Through a view function, participants will be able to see all of the notices sent or received and the status of each notice. They will be able to accept, reject and reduce the quantity as well as sort the notices based on the status or specific data fields such as participant or security identifier.

Further information on SMART/Track for corporate action liability notices can be obtained from Margaret Koontz at 212-855-5695 or mkoontz@dtcc.com.

INVENTORY MANAGEMENT SYSTEM

Leverage new Inventory Management System (IMS) authorization capabilities to accept real-time CNS deliveries.

Modifications to IMS planned for mid-year incorporate expanding the transaction and authorization process to include Night Deliver Orders and balance orders issued by NSCC. The reintroduction of all settlement-related participant input in addition to institutional deliveries and automated ACATS instructions along with the acceptance of instructions regarding deliveries with future settlement dates are scheduled for Q2. The modifications will permit pre- or partial authorization exemption instructions for CNS deliveries. IMS will also accept real-time CNS delivery instructions from NSCC, which will include intra-day same-day settling trades.

Implement new transaction management capabilities for settlement.

New features of IMS will support centralized transaction inventory management at DTC and offer customers efficient management of their settlement activities and potentially reduced costs. These capabilities will be optional and principally accessible through standard profiles set up using terminal-based functions. The complex transaction management capabilities will require extensive testing and DTCC anticipates initial implementation in Q4 with additional functionality implemented in the second half of 2005.

Contact your relationship manager or John Kiechle at 212-855-3900 or jkiechle@dtcc.com for additional information.

SETTLEMENT INPUT REDESIGN

Update legacy code supporting all settlement-related input systems to facilitate system efficiency and the development of service enhancements.

During 2004 DTCC will be redesigning the depository's settlement input systems. This settlement input redesign project, scheduled to begin a phased implementation in 2005, will overhaul the legacy code currently supporting all settlement-related input systems, and create a consistent methodology for accepting, editing, enriching, and applying business rules to all input transactions. The redesigned system will employ a single, standardized, table-driven transaction editing and cutoff process for all settlement transaction types. The redesign will simplify the transaction input systems, reduce system maintenance costs, and allow new services to be implemented more quickly and less expensively.

NEXT-DAY MATCHED RECLAMATIONS

Enhance settlement finality by eliminating the ability to process next-day matched reclaims for all securities.

Reclamations, especially next-day reclamations, impair settlement finality and prolong the period when delivering participants and the depository are at risk. In June 2003, DTC eliminated the ability to process next day reclaims for money market instruments. In Q2, the ability to process next-day matched reclaims will be eliminated for all securities. After implementation, participants may continue to reclaim transactions processed on a prior day, but these reclamations will not be "matched" and will not qualify for the special processing rules available for matched reclamations. Therefore, reclamations related to an original delivery processed on a prior day will be subject to DTC's standard transaction risk management controls and cutoffs. DTC will also begin "linking" reclamation transactions with original transactions processed in the preceding 60 days and include the transaction number of both the reclamation and the original transaction on all reclamation output to facilitate participant processing of these reclamations.

Additional information regarding next-day marched reclamations is available from John Abel at 212-855-8434 or jabel@dtcc.com.

TRANSACTION LOOK-AHEAD

Implement the ability to link transactions for settlement.

The depository's existing transaction look-ahead capability, implemented in mid-2003, identifies a receive transaction in fixed income securities pending due to a net debit cap insufficiency, and determines whether an offsetting delivery transaction pending because of a

quantity deficiency in the same security would permit both transactions to be completed in compliance with system controls. If there is such an offsetting delivery transaction, the system permits both transactions to complete, reducing participants' recycling transactions and decreasing the need for intra-day progress payments.

Look-ahead processing has, on average, reduced transactions recycled in the system by more than 20% or approximately \$10-15 billion during the 1 p.m. peak processing period, allowing for greater settlement certainty and reduced customer intra-day funding.

In mid-year, look-ahead processing will be expanded to include (1) equity transactions and (2) valued pledges and releases in addition to deliveries, which will further reduce transaction blockage.

Further information regarding this initiative is available from John Kiechle at 212-855-3900 or jkiechle@dtcc.com.

AUTOMATED CUSTOMER ACCOUNT TRANSFER SERVICE (ACATS)

There are four principal ACATS initiatives during 2004.

Implement ACATS enhancements to interface with Insurance Processing Services (IPS).

DTCC will develop an interface between ACATS and IPS to automate and improve efficiency in transferring retail customers' insurance product assets through ACATS. The insurance processing link will require a re-registration process (similar to the ACATS-Fund/SERV link) that will interface with the insurance carriers via IPS. The deliverables include new data elements specific to annuity assets on the asset record; participant input/output files for the re-registration of the insurance products; and a new file from ACATS to IPS for the re-registration to be sent to the carrier. Also, the ACATS balance and control process will be modified and a new ACATS IPS link will be established. All of the above deliverables are targeted for pilot by year-end.

PC Web Direct Enhancements for Cost Basis Reporting Service (CBRS)

Enhancements to PC Web Direct will allow participants to use the full functionality of PC Web Direct for CBRS, the companion service to ACATS that standardizes and automates the transfer of cost basis information. This initiative has two components: providing participants with the ability to upload or send a CBRS variable-length file via PC Web Direct and the development of PC Web Direct data entry screens for the CBRS application.

Currently, participants can only send a fixed length machine readable output (MRO) file through PC Web Direct. The enhancements to PC Web Direct will enable those participants that only use ACATS via PC Web Direct, primarily banks and small broker firms, to access CBRS.

These enhancements to PC Web Direct, planned for Q4, will expand the input mechanisms for the new CBRS application and broaden the appeal of CBRS to a wider participant base.

Enhance CNS Eligibility

This initiative will increase CNS eligibility for municipal and corporate bonds in ACATS. Currently, a significant number of municipal and corporate bond and Unit Investment

Trust positions submitted into ACATS settle outside of ACATS through individual Deliver Orders at DTC because CNS eligibility is based on trading activity in municipal and corporate bonds and UITs and not on ACATS activity. This enhancement, planned for Q4, will modify the process that establishes CNS eligibility for bonds and UITs by incorporating ACATS activity into the pricing file for these instruments and will significantly increase the bonds and UITs that get assigned a CNS settlement location in ACATS.

Modify PIER and Regulatory Reporting for Mandating Non-Standard Transfers

DTCC plans to modify the Participant Information and Efficiency Report (PIER) in anticipation of the self-regulatory organizations' (SROs) mandating the use of ACATS for non-standard transfers which include partial transfers, reclamations, fail reversals and mutual fund clean-ups. ACATS processing currently excludes non-standard transfers from any of the PIER and regulatory reporting streams. When the SROs mandate the use of ACATS for non-standard transfers, expected at mid-year, DTCC plans to modify the PIER and SRO reporting streams to accommodate the type of data that the SROs determine is required for regulatory reporting functions. The modification is contingent upon discussions with the SROs and timing of implementation is expected to be identified at mid-year.

Further information about ACATS enhancements can be obtained from Robert Yodice at 212-855-8024 or ryodice@dtcc.com.

UNDERWRITING SYSTEM RE-ENGINEERING ANALYSIS AND DESIGN

Continue to improve the efficiency of the underwriting process.

DTCC will work with participants to identify opportunities to improve the efficiency of the end-to-end underwriting process, consistent with enabling straight-through processing. DTCC will document and provide a plan by October for industry review for a phased system redesign that leverages modern technologies and addresses the special challenges of new issues processing.

Additional information regarding underwriting system re-engineering analysis and design is available from Javette Laremont at 212-855-2414 or jlaremont@dtcc.com.

DTCC Deriv/SERV

Expand the scope for the newly introduced OTC derivatives trade confirmation and matching service.

In June 2003, DTCC introduced the first Deriv/SERV product – an automated confirmation and matching facility for credit default swaps. In 2004, efforts will focus on enhancing the core trade confirmation and matching platform, which may also be leveraged to support new types of transactions and instruments. New capabilities to automate other industry processes, such as the periodic reconciliation of cash flows, will also be developed.

The existing platform will be enhanced to improve further participants' operations and DTCC's management of the service. The web facility that presently allows users to upload new trade matching data using a spreadsheet format will be extended to support report downloads and input of additional transaction types, such as contract terminations in the first and second quarters. These features will provide participants with an automated way to submit and receive data from DTCC without the expense of developing a computer-to-computer interface. Web enhancements planned for 2004 include new audit reporting and continued refinement of search capabilities in the Q2. Additionally, new capabilities will be added to provide participants with more flexibility and granularity in the specification of entitlements to Deriv/SERV functions in Q3.

Capabilities will be added to the Deriv/SERV platform to accommodate assignments in Q2. An assignment occurs when one of the parties to an existing derivatives contract transfers its rights and obligations under the contract to a third party. All parties (the "transferor," the "transferee" and the "remaining party") must agree on the new arrangement. Also, assignments will include the automation of tri-party confirmation and matching.

The current service supports the trade confirmation and matching process for credit default swaps linked to single-name reference entities – corporate entities domiciled in North America and Europe. By Q2 2004, the core platform will be leveraged to accommodate Index Products, Sovereigns, and Asians – three new credit default swap instrument types.

In 2003, 12 dealers participated in a "proof of concept" test for payment reconciliation services on the standardized quarterly payments common to most credit default swaps. This "proof of concept" tested the use of the Deriv/SERV matching engine to reconcile these quarterly payments. During the "proof of concept," over 90% of payments cycled through the test were matched or listed as close matched, significantly reducing breaks and outstanding payment reconciliation time. In 2004, building upon the success of the "proof of concept" phase, the matching capabilities will be migrated into an automated production environment for the first quarter payment cycle. Additional enhancements to reporting will be introduced in subsequent cycles consistent with customer feedback.

For additional information on Deriv/SERV products, contact Macrina DiGregorio at 212-855-1668 or mdigregorio@dtcc.com.

Fixed Income Clearing Corporation

STRAIGHT THROUGH PROCESSING (STP) FOR INSTITUTIONAL SETTLEMENT *Consider new capabilities supporting netting of fixed income trades.*

FICC published a white paper addressing issues surrounding STP for institutional settlement in May 2003. It is available at www.dtcc.com under the “thought leadership” tab.

The paper delineates multiple complementary strategies for resolving institutional STP issues, as well as for maximizing netting of the dealer sides of institutional trades. Most significantly, the paper describes a new settlement model to facilitate STP of institutional trades by leveraging existing and proposed industry processing models.

In 2004, FICC will present the results of an analysis conducted on several critical processing flows to its Operations and Risk Management Advisory Groups and The Bond Market Association. Topics to be reviewed include risk management, settlement obligation workflow, correspondent clearing and fail reporting. FICC will continue analysis and definition of settlement related processes, interfaces with electronic trading entities, legal and regulatory issues. FICC plans to publish business requirements for this initiative by Q3.

It is unlikely that this initiative will require any development effort by customers before Q4 at the earliest.

For information regarding this effort, please contact Susan Tysk at 212-855-7612 or stysk@dtcc.com.

CENTRAL COUNTERPARTY (CCP) FOR MORTGAGE-BACKED SECURITIES (MBS) *Implement a CCP for MBS transactions.*

FICC published a white paper in June 2003 on the topic of establishing FICC as a CCP for mortgage-backed securities transactions. It is available at www.dtcc.com.

Implementing a CCP for MBS will provide customers with significant operational benefits including streamlined processing and enhanced netting and settlement, principally through the related re-engineering of the trade life cycle for MBS. In addition, by acting as a CCP for MBS, FICC can provide customers with common risk management across government and mortgage-backed securities, the opportunity for blind brokering for MBS transactions and maximized balance sheet offset.

In 2004, FICC will continue the analysis and definition of business requirements for the MBS CCP and the related reengineering, and will define the infrastructure requirements necessary to support CCP processing for the MBS products in addition to existing support for government securities products. FICC will also devise a phased-in implementation plan to reduce the impact and risk involved in an initiative of this magnitude. The first phase to be fully analyzed and vetted with participants and the FICC Operations and Risk Management Working Groups will be the design of a combined Clearing Fund, which integrates both GSD and MBS activity. Additionally, requirements will be defined for a Pool Netting Service to provide reduced settlement costs.

It is unlikely that this initiative will require any development effort by customers until 2005.

For information regarding this effort, please contact Dennis Paganucci at 212-855-7626 or dpaganucci@dtcc.com.

RTTM FOR CORPORATE AND MUNICIPAL DEBT SECURITIES AND UNIT INVESTMENT TRUSTS (CMU)

Implement RTTM for these transactions.

A principal focus in 2004 is to promote standardization and integration across all fixed income securities by completing the implementation of RTTM and interactive messaging for transactions in NSCC-eligible fixed income securities, specifically corporate and municipal bonds and unit investment trusts.

RTTM for CMU will be implemented in phases during Q2. RTTM will replace the current NSCC Fixed Income Transaction System (FITS) matching engine and the new RTTM Web screens will replace PC Web Direct for fixed income products. NSCC participant testing for submission of street side trades via RTTM Web and via interactive messaging is currently underway.

Testing of submission of customer trades will be available in April in conjunction with testing for price reporting (discussed further below).

Interactive messaging for both street side and customer trades is targeted to be in production in June.

Participants are strongly encouraged to review the RTTM documentation for CMU located on dtcc.com and to contact FICC Member Services to ensure connectivity and to coordinate testing requirements.

For information regarding this effort, please contact Sean Delap at 212-855-7627 or sdelap@dtcc.com.

RTTM-BASED PRICE TRANSPARENCY REPORTING

Support industry price transparency initiatives.

In conjunction with the implementation of RTTM for CMU, NSCC will offer a simplified solution to impending regulatory transaction reporting requirements in the fixed income markets. RTTM provides the ability for participants to submit a single message to serve as both a trade matching and trade regulatory reporting vehicle. Working closely with the Municipal Securities Rulemaking Board (MSRB), FICC has developed a straight-through solution to give participants the capability to meet the 15-minute price reporting requirements for both customer and street-side trades in municipal debt securities, becoming effective in January 2005.

FICC published an Interactive Messaging specification for CMU, available on www.dtcc.com. These specifications should be used in conjunction with the MSRB-defined specifications. NSCC participants can begin testing input and output with the MSRB, via the RTTM pipeline, in April.

In 2004, FICC will also work with the National Association of Securities Dealers, Inc. (NASD) to provide a similar real-time transmission mechanism to the NASD's Trade Reporting

and Compliance Engine (TRACE) system in support of corporate bond transaction reporting requirements. This interface, which will replace the existing batch interface, will likely be available for participant testing in the latter part of 2004.

For information regarding this effort, please contact Sean Delap at 212-855-7627 or sdelap@dtcc.com.

RTTM / NSCC INTERFACE – FITS ELIMINATION

Replace major internal interfaces and Machine Readable Output.

In Q2, in conjunction with the implementation of RTTM for CMU, as noted above, the current front-end multi-batch FITS matching system will be retired. Upon implementation, RTTM, as the new matching engine for CMU, will continue to support existing proprietary batch files until real-time price reporting is mandated by the regulators (anticipated in early 2005).

Additionally, RTTM will interface with the existing FITS back-end system, which will continue to provide machine-readable output (MRO) and feed internal systems such as risk, settlement and billing. A key focus during the year will be to replace the internal downstream FITS processing streams with real-time feeds directly from RTTM to those processes, including CNS and internal risk management systems.

This will promote STP efforts as well as allow RTTM for CMU to support the same-day settlement of cash trades and late matching transactions. Although the downstream FITS processing systems will be replaced in phases throughout this year and into 2005, the participant impact of these changes, if any, will be determined and publicized in mid-year.

For information regarding this effort, please contact Sean Delap at 212-855-7627 or sdelap@dtcc.com.

ROLLING NET SETTLEMENT

Enhance the Government Securities netting application to support automated re-netting of fails.

The current netting process for government securities does not include failed settlement obligations from previous days; rather it focuses on “new” trading activity. The exclusion of failed settlements can lead to participants having obligations with FICC on both the short and long side of the market. When this situation exists, FICC automatically pairs off any offsetting transactions where the CUSIP, par and settlement amounts are the same. This helps to reduce settlements on both sides of the market but it does not completely address the situation.

The exclusion of fails from the netting process causes more significant problems during periods of market turbulence in a particular security. As an example, in 2003 FICC processed unparalleled volumes of fails in one particular issue (the May 2013 ten-year Treasury note). In an effort to alleviate the unprecedented fail crisis, FICC conducted seven individual “re-nets” to net fails with new trades in this particular CUSIP, eventually allowing the market to resolve settlement on the outstanding trades. These special “re-nets” were invoked on an “as needed” basis when market conditions (fail volume) warranted such action by FICC.

This fail crisis in the May 2013 ten-year note highlighted the need for FICC to provide a solution addressing the handling of fails.

In 2004, FICC will define the business and functional requirements necessary to implement a process to re-net failed obligations, on an automated basis, for all Government Securities Division netting members. FICC will also introduce a new input message type so that members may re-submit fails where applicable. FICC will also work with industry groups to facilitate receipt and processing of information to identify “round robin” situations.

All participants will be required to make coding changes in order to be able to process the new FICC netting output on an automated basis. FICC is targeting Q3 to deliver a test system to all participants.

For information regarding this effort, please contact Dave Cosgrove at 212-855-7688 or dcosgrove@dtcc.com.

REAL-TIME TRADE SUBMISSION

Develop incentives for participants to submit MBS trades via interactive messaging.

FICC implemented RTTM for government securities and mortgage-backed securities in 2000 and 2002, respectively. To fully realize the risk mitigation benefits of real-time trade matching, trades must be submitted to FICC in a timely manner. In order to provide a smooth implementation, FICC has provided participants with the option to submit trades via interactive messages, terminal entry or the existing batch formats.

Currently, the government securities RTTM system receives approximately 97% of trade input in real time, whereas the mortgage-backed securities RTTM system, implemented more recently, receives less than half its volume in real time.

FICC will aggressively continue its work with participants to implement real-time interfaces with the RTTM systems. Additionally, FICC will review current processing fee structures to encourage participants to eliminate batch interfaces.

Participants are strongly encouraged to contact FICC Member Services in order to implement interactive messaging for RTTM.

RISK MANAGEMENT ENHANCEMENT

Improve existing cross-margining arrangement to capitalize on changes in the futures industry

FICC's Government Securities Division has an active cross-margining arrangement in place with the Chicago Mercantile Exchange (CME) that provides for the cross-margining of Treasury and Agency buy-sell and repo activity against (1) Treasury and Agency futures and options on futures executed on the Chicago Board of Trade and (2) eurodollar futures and options on futures executed on the CME. Cross-margining allows participants of different clearing corporations to be margined as if they had one single combined portfolio.

Changes in the futures clearing landscape create an opportunity for the expansion of existing cross-margining benefits for our members. These benefits will be offered to customers of FICC, who are also members of a participating futures clearing organization.

No development effort will be required by participants.

Further information regarding risk management enhancement is available from Susan Tysk at 212-855-7612 or stysk@dtcc.com.

Asset Services

In 2004 DTCC's Asset Services group will be focusing its resources on significant enhancements to the industry's procedures for announcing and handling corporate actions, with the continued goal to streamline cost and reduce risk for the financial service community and its interfaces with investors. Additionally, DTCC will be continuing its efforts to further the dematerialization of securities and reduce the paperwork burden in certificate processing.

GLOBAL CORPORATE ACTION (GCA) SERVICES

Enhance the functionality of GCA services to meet the needs of additional customers

In 2003 DTCC brought live two major service offerings – the GCA Validation Service and GCA Messaging Services – that facilitate STP for corporate actions; in 2004 DTCC will implement enhancements to these evolving services based upon customer feedback.

The GCA Validation Service streamlines the initial capture and data reconciliation of corporate action announcements, resulting in the provision of high quality, comprehensive and timely data to its clients. Implemented in the second quarter of 2003, DTCC is expecting a significant expansion of industry utilization of the service this year. By Q3, DTCC will enhance the service to provide functionality that is attractive to additional tiers of potential clients (e.g., customers seeking a browser-based corporate action "look-up" service for a smaller number of instruments worldwide). DTCC will also be exploring delivering the service through alternative channel providers, with the first of these agreements expected by Q3. Continuing an ongoing drive to improve data quality, while continuing to reduce costs, plans regarding new service centers in Asia and/or other low cost offshore venues will be announced by Q4.

The GCA Messaging Service is a real-time corporate action announcement and delivery network that electronically connects the notifying and electing parties responding to a corporate action notification, standardizing their interactions and helping to reduce risk in their processing. The service aggregates all customer announcements for a particular event and provides the means to instruct at the individual account level, by custodian or globally across all custodian and all accounts. Using ISO 15022 industry-standard messaging, the service is easy to deploy and provides customers with a full range of benefits, capable of supporting all global voluntary and mandatory corporate actions. For certain time-sensitive activities, the system generates e-mail reminder alerts to all parties as the event expiration deadline nears. This service has been long sought after by custodians and investment managers to address the complex labor-intensive and paper-based interactions that exist in today's corporate action notification process.

The GCA Messaging Service system development was completed at the end of 2003 with production deployment in late December. Support for pilot testing will continue throughout Q2 as new users are brought on board. DTCC expects to be in a full "production-mode" by Q3. Materials promoting the service are available as of January and a marketing brochure will be available in February. By yearend, plans are to have numerous custodians and investment managers using the service. In the future, the GCA Validation and Messaging Services will be refined and integrated to provide even greater levels of STP for the parties involved.

For information about these two services, contact your relationship manager, or Warren Eastman at 212-855-5663 or weastman@dtcc.com.

DTCC'S CORPORATE ACTION SYSTEMS REENGINEERING

Modify services consistent with the strategic goals of risk mitigation, cost reduction, streamlined processing and improved customer disclosure.

DTCC outlined eight key initiatives in its 2003 position paper *Transforming Corporate Action Processing: Providing a New Level of Risk Management and Achieving Straight-Through Processing* available at www.dtcc.com. This paper outlined a series of objectives aimed at lowering risk, reducing cost, streamlining processing and improving customer disclosure in the corporate action process.

A critical part of the foundation for achieving these objectives will be a complete reengineering of DTCC's systems that presently support the handling and processing of corporate action events (reorganization, redemption, and periodic income/dividend payments). The objective of this multi-year reengineering initiative is to achieve absolute processing efficiencies by integrating existing subsystems into a single platform designed to accommodate global corporate action event announcements, eliminate the use of contra-CUSIPs, accommodate payment in multiple currencies, handle all forms of security identifiers, adopt industry standard formats and implement fully streamlined processing methods. During 2003 DTCC launched this effort, with a full-scale analysis and definition of the necessary business requirements expected to be completed by year-end 2004. DTCC is anticipating that this initial phase of the reengineering effort will uncover opportunities to eliminate certain systems redundancies and inefficiencies that are projected to yield both near-term and ongoing savings in systems utilization and reduced capacity requirements.

An overview of the long-term plan will be complete by Q4 and DTCC will publish additional information to participants on its plans at that time. The new system is targeted to become operational by the second half of the decade.

Further information concerning the reengineering initiative is available from Christopher Wyle at 212-855-1298 or cwyle@dtcc.com.

PROCESSING STANDARDIZATION

Support evolving industry standards and implement best practices.

During 2004 DTCC will be continuing its role in supporting the adoption of standards in corporate actions processing, with representatives positioned within the ISITC-IOA, International Securities Market Practice Groups, and the SIA Dividends and Corporate Actions Divisions. In particular, DTCC is continuing its support of the "at source" standardization initiative -- defining a standard set of key requirements and data values for the corporate action event, ensuring full and descriptive disclosure of this information to interested parties in a standard format, and ultimately, an electronic flow of standard information in a standard format from the originator of the corporate action to the ultimate investor (along with the intermediaries that affect this process). DTCC will continue to actively support the leadership efforts of the Securities Industry Association's Corporate Actions Division to obtain industry agreement on and a mandate for "at source" dissemination of corporate action information using a standard set of data elements in a standard format. As another key component of this initiative, DTCC will introduce the Corporate Action Repository, a centralized information repository that links table-driven key data elements associated with the corporate action to its accompanying documentation for online retrieval and review. This combination of automated and imaging system support for corporate action data retrieval will clearly benefit participants from this ready access to source data, and will also

provide for “out of region” backup and recovery of this data under DTCC’s Business Continuity initiatives (discussed above). The first release of the repository will be made available in Q4.

Further information on these processing standardization initiatives can be obtained from Lorraine Morrison at 212-855-5310 or lmorrison@dtcc.com.

AGENT ANNOUNCEMENT PROCESSING

Streamline maturity, redemption and income processing.

The rapid growth of structured securities (collateralized mortgage obligations and other types of asset-backed issues) and record levels of early redemptions of these and other fixed income securities, driven by the low interest rates over the past several years, have increased the volume of related principal and income payment processing at DTCC, and led to processing problems as a result. In particular, the high volumes of late notifications on paydowns and the resulting “post-payable” adjustments have adversely affected the depository and its members. In 2002, a task force of issuers, paying agents, servicers, underwriters and broker dealers – spearheaded by DTCC, The Bond Market Association, and with the support of the SEC – was formed to outline a series of recommendations and best practices to address these problems.

Based upon the findings of the task force, as well as DTCC’s own internal analysis, during 2003 DTCC instituted a series of processing initiatives targeted to strengthen and streamline its interactions with agents and its own operations. For example, to replace paper- and fax-based notifications, DTCC developed electronic interfaces with the ten largest paying agents of structured securities to standardize information regarding income payments and paydowns. In 2004, DTCC will be continuing to promote use of these standards by agents. By Q4, to help increase the transparency to participants of procedures used in deriving rates on these issues, DTCC will expand its file interfaces with paying agents of structured securities to include “non-core” factor information (e.g., accrual periods, shortfalls, and coupon rate).

Similarly, by leveraging existing technology, DTCC has developed electronic interfaces permitting paying and redemption agents for other fixed income securities to post redemption notifications directly to DTCC’s announcement system. To further automate processes and reduce manual intervention, DTCC is working with the largest redemption agents throughout this year to encourage participation in this program.

Several internal initiatives are focused on enhancing DTCC’s utilization of data indicators on the security masterfile and announcement databases to forecast upcoming payment events, focusing on unique payment features on securities, such as floating payable dates. Increased use of this data will allow DTCC to anticipate these payment events with greater precision, and to proactively pursue critical information prior to or on the payment date by reaching out directly to agents.

In 2003, securities custodied in the depository’s Fast Automated Security Transfer (FAST) program were converted to a “paperless” redemption process. In 2004, this effort is being expanded to the redemption process for non-FAST issues (that is, securities the depository custodies in its own vault) by eliminating the physical presentation of certificates and the accompanying documentation. The goal is to completely eliminate the presentation of any physical documents for redemption processing.

Information about these initiatives are available from Ginger Holton at 212-855-5319 or vholt@dtcc.com.

RESTRICTED SECURITIES

Expand the Networking for Equities (NFE) program.

The largest hurdle facing dematerialization efforts is the use of physical certificates for restricted securities positions. Despite the challenges presented by this securities class for many years, significant progress, in terms of market awareness, was achieved during 2003. Collaborative efforts with issuers, their agents, participants, regulators and exchanges helped encourage the elimination of physical certificates.

During 2003 DTCC implemented the Networking for Equity (NFE) system. NFE allows transfer agents, on behalf of the issuer, to maintain dematerialized security positions at the customer account level detail, with the control of the customer's asset remaining with the depositing participant. While DTC does not hold the security position, once the security certificate is dematerialized through NFE, the electronic links established between the transfer agent and the participant, through DTC, provide the mechanism for the depository to fully service the asset. Pilot operations through NFE in 2003 were very successful, proving the validity of the concept and setting the stage for expanding its use this year.

DTCC continues to make steady progress on this important industry initiative. We will be working with agents to expand its use for appropriate securities issues throughout the year. We anticipate making specific classes of restricted securities characterized by unique exception processing eligible for the NFE system by Q3. More information on this change will be made available to participants in Q2.

Further information on this initiative can be obtained from Joe Trezza at 212-855-4400 or jtrezza@dtcc.com.

Implement new services to streamline the lifting of restrictions on securities.

In late 2003, DTCC hosted focus groups with participants to discuss possible approaches to standardizing the information exchange involved in processing events permitting the release of restrictions on securities positions – the steps necessary and the specific requirements mandated by individualized issuers, their counsel, the SEC and the transfer agents to make a portion or all of a position in a restricted security freely transferable. Feedback from these groups support DTCC introducing improved processing services for restricted securities. The service may range from a simple screen based inquiry to a more sophisticated processing environment directly integrated with the Restricted Deposit Service and Custody Service. DTCC plans to finalize a business case regarding this initiative in Q1, and to publish its conclusions to the industry during Q2. Assuming the initiative goes forward, the first phases of deployment will occur by year-end.

Further information on this initiative can be obtained from Joe Trezza at 212-855-4400 or jtrezza@dtcc.com.

TRANSFERS REQUIRING LEGAL DOCUMENTS

Improve transfer-processing efficiencies.

DTCC is working with the SIA and the Securities Transfer Association (STA) to streamline the legal transfer process and to reduce costs for all industry members. These procedures are intended to reduce the burden of guarantors (such as depositing participants) in attaching specific legal documents, such as corporate resolutions or death certificates, to effect certain legal transfers. Due to the complexities involved, the program may be available only to

participants in certain signature guaranty medallion programs (such as the New York Stock Exchange's program).

Meetings are underway with the SIA, STA members and the depository to draft processing guidelines to begin a pilot during Q2. It is anticipated that participant members will be relieved of duplicating and mailing supporting documents for the transfer transactions involving the same customer. Pilot participants will also be relieved of dealing with processing differences caused by variations in individual transfer agent requirements, providing the potential added benefit of reducing rejects and their corresponding fees. Transfer agents will benefit from significant processing efficiencies in their operations, as well as reduced legal/paralegal and document retention costs. Investors will no longer be faced with lengthy, confusing and frustrating securities transaction requirements as currently imposed. With successful implementation of the pilot, DTCC will work with the STA and directly with other transfer agents to promote a wider adoption of these procedures. DTCC anticipates that it will be able to make more information about the program available to a wider group of participants by mid-year.

Further information on this initiative can be obtained from Joe Trezza at 212-855-4400 or jtrezza@dtcc.com.

DESTRUCTION OF NON-TRANSFERABLE CERTIFICATES

Implement initial phase of program to reduce vault holdings in defunct issues

Following an extensive discussion with the industry in 2003, DTC filed a proposed rule change with the Securities and Exchange Commission that would allow DTC to destroy certain non-transferable securities certificates representing positions in securities for which transfer agent services have not been available for six or more years. SEC approval is expected sometime late in Q1, at which time DTC will commence with this destruction program. The initial level of disincentive fees for participant positions in issues that have been non-transferable for more than six years (and therefore would be eligible for this program) became effective as previously announced on January 1, 2004.

Additional information is available from Joe Trezza at 212-855-4400 or jtrezza@dtcc.com.

Network Services/Technology

PARTICIPANT BROWSER SERVICES (PBS)

Continue implementation of browser-based services as the successor to green screen terminal interfaces.

PBS, the successor to all 3270 green screen applications, will be entering its third phase this year, during which DTCC expects to complete the transition of all remaining 3270 functionality to a browser-based interface. The current version of PBS, released in 2003, completed the transition of the most frequently used functionality, representing approximately 75% of the transaction volume. During this next phase we will systematically transition the remaining applications, so that for all functionality, customers can experience the benefits of improved navigation, drop down menus, the elimination of mnemonic codes and acronyms, and page-sensitive help – all focused on easing the training burden and reducing the learning curve for customers. PBS is available via DTCC's secure, private SMART (Securely Managed and Reliable Technology) network.

With these changes, DTCC will be in a position to “sunset” the use of 3270 PTS as early as 2005. Participants should focus on their plans to transition 3270 PTS users to PBS during this year.

To get started, contact your Relationship Manager or Michael Vellecca at 212-855-5678 or mvellecca@dtcc.com.

SMART/Search FOR ARCHIVED REPORTS

Provide online report archive information for depository and clearing corporation customers.

During 2003, DTCC launched SMART/Search for Archived Reports, providing firms with streamlined access to years of historical transactional reports from DTCC's repository, eliminating the need to make multiple PINS inquiries. Accessible over the Internet or through DTCC's secure private SMART network, users can log in to SMART/Search for Archived Reports to view past activity, positions and settlement information. Customers can have search results reported in multiple formats, including viewing directly online within the browser, via file download, email link or by email attachment.

Offering additional reports for access during Q1, version II will also provide (in Q2) the ability to load results to an Excel spreadsheet. The ability to offer document and certificate images to customers is also being reviewed for release later this year.

Any DTCC customer responsible for research and/or submitting inquiries should join SMART/Search. To obtain more information, or to join SMART/Search, contact your relationship manager.

MESSAGE DELIVERY SYSTEM REPLACEMENT

Upgrade message communication to customers.

DTCC currently sends up to 13 million messages each day to customers throughout the world via the Message Delivery System (MDS), which encompasses a series of custom applications that have evolved over the past 20 years. These have been targeted for a technology update to establish standardization and to control legacy application expenses.

This development will provide substantial benefits including reducing dependency on specialized skills for maintenance of legacy applications, providing a flexible multi-platform messaging capability, reducing future efforts needed to develop new messaging applications, supporting industry standard message formats/types (e.g., ISO 15022), and developing an alternative to current SNA ticket printing to allow for the eventual elimination of printed tickets in favor of a browser-based solution.

Customers will not be required to make modifications to their current interfaces with MDS. Development is expected to continue throughout 2004. The solution that will replace SNA ticket printing will pilot in early Q4.

Additional information is available from Michael Vellecca at 212-855-5678 or mvellecc@dtcc.com.

Risk Management

MONEY MARKET INSTRUMENTS (MMI)

Implement MMI system revisions to provide enhanced risk controls; expand the range of products processed to include new and hybrid MMIs.

At year-end 2003, modifications to the depository's MMI system were completed to create stronger alignment of maturity presentments (MPs) with issuances to provide Issuing/Paying Agent banks (IPAs) with better control over the financial exposures within the system throughout the day. Pending SEC approval, the target implementation date for these MMI revisions is February 20, 2004.

Planned for 2004 is a new capability to allow IPAs to manage the allocation of credits to issuers from their settlement accounts. The depository will also change the settlement cutoff time for reclamations of MMI issuances from 3:30 PM ET to 2:30 PM. When a reclaim transaction is matched to an issuance delivery order after the MMI reclaim cutoff, the reclaimed transaction will be treated like an unmatched transaction and be subject to all original transaction risk management processes including the Receiver Authorized Delivery control, cutoff, and reclaim processing procedures. This change will allow IPAs to have a "true" settlement balance prior to the IPA "notice of refusal to pay" cutoff of 3:00 PM ET.

DTCC is presently working with MMI participants to define industry requirements to enhance processing for new and hybrid products such as extendible commercial notes, renewables, prepayments, issues with puts and calls and additional variable rate products with targeted introduction by Q4. These enhancements are described more fully in Important Notices B#5311 and B#5335 issued on October 17, 2003.

Further information on these MMI system changes can be obtained from Javette Laremont at 212-855-2414 or jlaremont@dtcc.com.

STRESS TESTING AND BACK TESTING

Continue to innovate and refine risk management tools for the enterprise.

World-class business practices, national and international regulatory standards, and DTCC's own high standards for safety and soundness all require constant monitoring of the broad range of risks incurred by DTCC's subsidiaries and ongoing improvement of the effectiveness of DTCC's risk management practices and capabilities. Continuous testing of how DTCC's risk management programs respond to the risks presented by various scenarios is one key practice enabling us to improve our capabilities in this area. This testing involves both "back testing" – validating how effective risk management decisions made prior to a particular settlement day were in controlling the risks actually experienced on that day – and "stress testing" – assessing how effectively our risk management practices can control risks in extreme market scenarios. A thorough program for conducting these types of tests can provide the industry and DTCC with assurance that DTCC's controls deliver the type of effective centralized risk management the industry depends upon.

During the year DTCC plans to build a stress testing prototype that can be leveraged for the DTCC businesses as well as utilize back testing to continue to confirm that margin and clearing fund contributions are at the appropriate levels to protect the financial industry.

Further information on these testing efforts can be obtained from Jiping Guo at 212-855-5755 or jguo@dtcc.com and regarding implementation from Marie Rey at 212-855-5790 or mrey@dtcc.com.

VaR FOR FIXED INCOME & OTHER SECURITY TYPES

Expand the use of a consistent collateralization methodology across the clearing corporations.

The clearing corporations continue to work to leverage and customize accepted industry risk management models based on the “Value at Risk” methodology. Models based on the VaR methodology are expected to be rolled out sequentially for each clearing corporation. Although this change will not have any systemic impact on participants, the adoption of the new models will, of course, change the calculation of components of the required clearing fund deposit. More details on the implementation of these newer methodologies will be published as we take specific implementation steps during the year. Further information on these changes is available from Jiping Guo at 212-855-5755 or jguo@dtcc.com and regarding implementation from Marie Rey at 212-855-5790 or mrey@dtcc.com.

STP IN NSCC’S CLEARING FUND PROCESS

Push out NSCC daily clearing fund calls early in the day using an automated process.

The next planned improvements to the clearing fund calculation, notification and collection process are to distribute the excess/deficit notices for NSCC members electronically and earlier in the day. To accomplish this, legacy systems will be replaced, process steps will be automated and (as a result of the clearing corporation insourcing effort described on page 5) communications to our participants will be generated by DTCC’s systems. The design of this communications piece began at the beginning of the year and will incorporate member comments. Target completion is during Q3. Further information may be obtained from David Fosket at 212-855-3475 or dfosket@dtcc.com.

OPERATIONAL RISK PROGRAM

Using a centralized and formalized approach, continue to identify and mitigate DTCC’s operational risk.

DTCC is addressing operational risk – the risk of loss, including reputational harm, resulting from inadequate or failed processes, people and systems, or from external events – by applying tools across the organization and focusing company-wide attention on this effort. To identify, assess, monitor and manage operational risk, a Risk and Control Self Assessment (RCSA) process was piloted during 2003. The RCSA process will be completed for the depository’s high risk areas by year-end. The progress and results of this effort will be communicated on an ongoing basis to customers.

Further information regarding this initiative is available from Eileen Robbins at 212-855-5770 or erobbins@dtcc.com.

Distribution Services

MUTUAL FUND SERVICES

Address opportunities consistent with the needs of the mutual fund industry.

REGULATORY ISSUES

Support industry efforts to develop solutions to recently publicized regulatory problems.

During 2004, a major priority will be to develop solutions to address the issues of late trading, market timing and breakpoint calculations. Some of this year's mutual fund releases are likely to include system enhancements consistent with recent regulatory proposals, although in some cases the specifics cannot be determined until final regulatory decisions are made.

- **Mutual Funds Breakpoints.** DTCC representatives participated in the work of the NASD's Breakpoint Task Force in 2003, and certain of the Task Force's proposals will involve modifications to DTCC's systems. The Mutual Fund Profile Service II and Fund/SPEED will be enhanced during Q2 and Q3, respectively, to provide expanded information about mutual fund breakpoint schedules, Letters of Intent, Rights of Accumulation and Householding Linkage Rules needed for the proper determination of breakpoint discounts by broker/dealers. Fund/SERV and Networking services will be enhanced to include the applicable sales charges on an order and the appropriate account linkages. This will be implemented in phases during Q3 and Q4.
- **Late Trading.** DTCC is participating in industry efforts to prepare responses to the SEC's Q4 2003 release proposing steps to address the recently publicized instances of "late trading" abuses. While DTCC shares the view expressed by some industry members that certain proposed solutions to this problem appear to negatively impact mutual fund investors' flexibility in making investment decisions, DTCC is prepared to modify its Fund/SERV system to provide a centralized "time stamping" facility for order submissions. DTCC believes that providing such a capability in Fund/SERV – if it is mandated by the regulators – will permit a more flexible response to this problem, including the ability to "enrich" previously submitted (and time-stamped) orders after the close with information unavailable earlier in the day (such as the results of breakpoint calculations or orders involving exchanges from one fund to another). These modifications would also provide similar capabilities for orders from defined contribution accounts. DTCC will be providing comments on the SEC's recent release on this subject, and will publicize more detail about its plans as regulatory developments occur.

SEPARATELY MANAGED ACCOUNTS (SMA)

Provide increased efficiency to the messaging service for SMAs.

DTCC's SMA service will provide a central, standard messaging and processing capability that allows SMA sponsors and the investment managers participating in their programs to coordinate account opening, funding notification, activity and reconciliation processes.

The service is targeted for a Q1 launch, pending SEC approval. Upon its release, its functionality will include account setup, funding, authorization to trade, deposit, withdrawal, and account termination. In addition, enhancements are expected throughout the year for corporate actions, tax-advantaged trading, fee reporting, and other functionality.

Prospective users may contact Paul Bucaoto of the Distribution Services group at 212-855-5671 or pbucaoto@dtcc.com regarding participation requirements.

Fund/SPEED EXPANSION

Offer service providers the ability to interactively query on mutual fund client account information and process other activity that interfaces with NSCC's Mutual Fund Services.

Fund/SPEED, an XML-based service, provides interactive inquiry directly with the fund, transaction submission into Fund/SERV, and transaction inquiry. Development efforts during 2004 include modest enhancements to existing functionality to better support customer needs and additional functionality such as inquiries against select information on NSCC's mutual fund profile (targeted for Q3 implementation) and account setups through NSCC's networking service (implementation date to be determined once business requirements are finalized and industry interested is determined).

Service providers and mutual funds interested in learning more about the service may contact Paul Bucaoto at 212-855-5671 or pbucaoto@dtcc.com. Some systems development effort using XML and other web technology will be required.

GLOBAL MUTUAL FUNDS – GLOBAL Fund/SERV

Extend existing Fund/SERV capabilities for offshore funds and explore a new XML- based processing system for the global cross-border mutual funds market.

NSCC's Mutual Funds services today support the handling of certain transactions in "offshore" mutual funds (that is, funds registered outside the United States offered for sale to non-US investors) effected by Fund/SERV participants for their non-US clients. During 2004 we will be working to make this service available to a broader participant base to extend the benefits of Fund/SERV processing more broadly, allowing qualified non-US entities to process transactions in domestic and offshore mutual funds.

DTCC will also be investigating the possible development of enhanced capabilities that could be leveraged to support mutual funds processing both domestically and globally. These new capabilities would utilize a new XML-based system to standardize processing and messaging data between distributors and funds globally. Leveraging the domestic Fund/SERV knowledge base, ISO-compliant and standardized XML message layouts could provide a secure and automated process eliminating major costs and time-consuming manual paper procedures and reconciliation. An additional client benefit would be the ability to view and make business decisions utilizing a centralized participant repository of reference data and processing practices.

DTCC is in the planning and requirements gathering phases and at the conclusion of the process, a presentation and recommendations will be made to its Board of Directors later in the year.

For additional information on these efforts, distributors and funds can contact Peter Marshall at 212-855-5741 or petermarshall@dtcc.com or Linda Yee at 212-855-5612 or lyee@dtcc.com.

INSURANCE PROCESSING SERVICES (IPS)

Continue to implement a broad program to deliver new functions and value-added services for participants in processing insurance products.

InsurExpress

Provide participants access to an integrated workflow for processing multiple carrier insurance products.

Leveraging DTCC's infrastructure and established network of connectivity, *InsurExpress* integrates key insurance industry service providers to support communications between insurance companies and participant distributors of insurance products, providing all necessary functionality for life and annuity application processing. *InsurExpress* should serve as a valuable resource to broker/dealers and banks, offering standards-based solutions and enabling the insurance industry to become more efficient.

Building upon 2003 product development and the establishment of partner connectivity and user interfaces, DTCC anticipates launching a pilot of *InsurExpress* during Q1. Deliverables later in the year will focus on enhancing the integration between DTCC and its initial service providers, including features such as the movement of images along with messages and the completion of a "hub and spoke model" permitting additional service providers to be easily added in the future. Other development efforts will target creating more flexibility for participants to select services on an "a la carte" basis rather than the entire workflow process as currently offered. DTCC anticipates publishing more detail about these changes in mid-year based upon experience with initial pilot.

Distributors and carriers interested in learning more about *InsurExpress* may contact John Ziambras at 212-855-5651 or jziambras@dtcc.com, or Trish DeDolce at 212-855-5603 or patriciadedolce@dtcc.com.

LIFE INSURANCE APPLICATION

Develop functionality to offer the same service for life insurance applications that is offered through the existing annuity application service.

IPS supports the processing of annuity, life, and long-term care insurance products. During 2004 DTCC expects to enhance IPS to provide a new service, similar to the existing annuities application service, which would support the automated submission of life insurance applications to carriers. As with the current annuity application product, this service will offer participants the benefits of data aggregation, data validation and money settlement. DTCC will be completing the business case to support this development in Q1 and will proceed with development plans once it has been ratified with the industry.

Distributors or carriers interested in learning more about this service may contact Lana Macumber at 212-855-5718 or lmacumber@dtcc.com, or Randi Gordon at 212-855-5654 or rbgordon@dtcc.com.

IN-FORCE TRANSACTIONS – ACATS/IPS

Perform policy maintenance and transaction functions.

This new insurance processing solution will allow insurance carriers and distributors to perform policy maintenance and transaction functions. The first of three phases will automate the process of transferring customer positions by linking IPS with the ACATS system to include

annuities in the existing ACATS process. Broker/dealers and other insurance products distributors will be able to utilize ACATS to initiate the transfer of annuity assets. The inclusion of annuities in this process will help automate insurance broker/dealer changes. The process will handle broker/dealer changes, owner changes and broker identification number (BIN) changes. Phase I development will begin during Q2 and is targeted for pilot by year-end.

Phase II will enable the automation of non-financial maintenance transactions – such as address, telephone and service feature changes – on “in force” contracts. Phase III will enable the automation of financial transactions such as systematic withdrawals. Financial transactions will also utilize the NSCC money settlement system. Project analysis on these phases will begin in 2004, with rollout in 2005.

Distributors or carriers interested in learning more about this service may contact Lana Macumber at 212-855-5718 or lmacumber@dtcc.com, or Randi Gordon at 212-855-5654 or rbgordon@dtcc.com.

REPOSITORY ENHANCEMENTS

Assess industry demand for enhanced availability and retrieve ability for frequently needed archived data.

DTCC is evaluating an IPS repository solution – comparable to the Mutual Funds Profile service – to warehouse and make available annuity, life and long-term care product profile data, commission schedules, producer appointment information, a forms library, order entry processing rules, 1035/transfer status, pricing, and other data deemed valuable, if retrievable through a common source by distributors. This repository would store such data and offer real-time messaging opportunities for data upload and retrieval.

We are currently evaluating demand and priority for this service. After reviewing input during Q2, DTCC will identify the appropriate development and implementation plan by Q3.

Distributors or carriers interested in learning more about Repository Enhancements may contact Lana Macumber at 212-855-5718 or lmacumber@dtcc.com, or Randi Gordon at 212-855-5654 or rbgordon@dtcc.com.

APPLICATION (APP) IMPROVEMENT

Streamline the existing IPS initial application process.

APP Improvement will streamline the existing IPS initial application process and address the present inefficient use of just 30% of the current APP. The goal is to remove records, fields and codes that are not used or necessary for the application setup. The removal will help participants by reducing unnecessary analysis, coding and maintenance currently being conducted by firms. All participants using the APP process will need to make changes and the associated requirement documentation will be distributed by Important Notice during Q1.

The initial application process uses a batch system that receives feeds from participants with all of the information required for an insurance carrier to issue an annuity contract, including money settlement. After information is received and validated based on industry-established rules, the file is transmitted to the appropriate insurance carrier.

An APP Improvement working group has been developing recommendations since July 2003. The implementation of APP Improvement will occur as part of the regularly scheduled IPS “spring” maintenance release targeted for June implementation.

Distributors or carriers interested in learning more about this service may contact Lana Macumber at 212-855-5718 or lmacumber@dtcc.com, or Randi Gordon at 212-855-5654 or rbgordon@dtcc.com.