

Universal Trading Platform News 05

OCTOBER 2008

Content

- 1 EDITORIAL CALENDAR
- 2 NEWS OF THE MONTH
 - Focus on Wombat Exchange Platform

Calendar

NYSE Euronext Universal Trading Platform Derivatives Briefings.

Liffe will be holding a series of Universal Trading Platform Derivatives Customer Briefings in the first quarter of 2009. The briefings will be targeted at Liffe ISVs and ASPs, Member Developers and IT and Business Project Managers of Liffe Members.

The agenda will cover the following:

- Plans/Milestones for the roll-out of Universal Trading Platform to Derivatives customers
- New functionality and markets impacted
- Conformance approach
- Migration approach and timescales
- Connectivity options
- Legal agreement changes
- Interface options.

Invitations and further information on the briefings will be sent out to Liffe customers shortly.

Should you have any queries on the above please contact the Technology Partnerships team at Liffe at technologypartnerships@liffe.com

A second set of European Cash client roadshows will also be arranged in November. The objective is to provide clients with an update on the Universal Trading Platform Programme. Details will be provided very shortly.

Publishing editor: Anthony Attia
Managing editor: Caroline Guillaud, Marc Lefèvre
Editorial board: Caroline Block, Maria Brookes, Simon Chapman, Antoinette Darpy, Garry Jones, Patrick Lastennet, Margaret Nagle, Cees Vermaas, Kaila Yates.
Design & layout: NYSE Euronext
Published by: NYSE Euronext 39, rue Cambon 75039 Paris Cedex 01
Tel: +33 (0)1 49 27 10 00 - Fax: +33 (0)1 49 27 11 71
Paris Headquarters: Palais de la Bourse, 75002 Paris
www.nyseeuronext.com

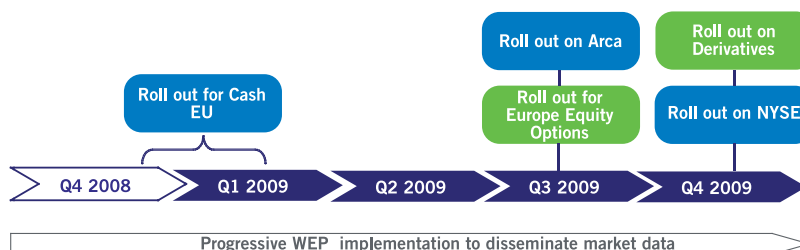
ID/SR/Oct-08/2000

Editorial

Dear Client,

Welcome to the fifth issue of Universal Trading Platform news. In this issue we will focus on the Wombat Exchange Platform (WEP) developed to disseminate our Market Data, as well as updating you on the agenda for a series of Derivatives Customer Briefings that Liffe is organising about the programme.

Firstly, we would like to update you on the Universal Trading Platform overall timeline. As you already know, we are applying a best-practice phased migration approach in order to ensure to our customers the smooth implementation of the new platform on our markets.



Working towards strict migration dates as we progress through the Programme, the above illustration provides a view of the commitment from the entire organisation to deliver the programme in its entirety.

Focusing first on the European cash markets, the implementation of the Universal Trading Platform will be phased as follows:

- The Wombat Exchange Platform (WEP) will be available at the latest at the beginning of the order books' migration in December 2008. It has already been made available for clients testing. A detailed description of WEP and its benefits is provided in the following page.
- On our European regulated cash markets, the migration of the order books to the Universal Trading Platform trading engine will start on 8 December 2008, with all bond order books. It will then be completed in Q1 2009 with the migration of the ETF and equities order books. The target date for this migration is 16 February 2009.
- The new access means to the new NYSE Euronext platform, via the CCG (Common Customer Gateway), will be progressively implemented, starting in December 2008 for UTP Direct protocol and in January 2009 for FIX 4.2.
- The SFTI[®] network will be progressively rolled out with the delivery of the new circuits. The decommissioning of legacy connectivity means is targeted for the end of Q1 2009. Existing MMBA and co-location customers will be able to benefit from the new access features (high throughput and low latency) using their existing connections.

This fifth newsletter also allows us to share the exciting news that a Universal Trading Platform support desk is now up and running, and has started to answer your questions about the programme. Should you have any questions relating to the programme for cash Europe, our new pan-European MTF and Market Data for cash Europe, the answer is now just a phone call or an email away.

The support desk will be able to provide you with support on the test environment and help you with questions relating to the below:

- Functional questions about new order types or collar logic
- Technical questions about the CCGs (Common Customer Gateways), Universal Trading Platform, Market Data feed, and protocols
- Programme specifications and documentation
- Universal Trading Platform migration and migration dates
- Connectivity.

It will also be able to provide follow-up on client conformance testing by:

- Ensuring that you have made the appropriate developments for the new Universal Trading Platform
- Scheduling appointments for conformance testing
- Providing real-time one-to-one conformance testing.

You can contact the Universal Trading Platform support desk at:

Tel: +33 (0)1 4927 5090

Email: utp@nyx.com

Anthony Attia, Executive Director - Head of Universal Trading Platform Programme

Focus on Wombat Exchange Platform (WEP)

Over the past number of weeks and months we have communicated with the market through a variety of channels and have received useful and positive feedback on customer specifications, the canned data and the External User Acceptance (EUA) test environment with market data from NSC dissemination through WEP. We have set aggressive but realistic milestones to deliver the Universal Trading Platform. This newsletter looks at the short-term milestones for the Wombat Exchange platform.

What is the latest news?

WEP coming from the Universal Trading Platform is now available for clients testing! The new market data feed has been available on the External User Acceptance test platform since mid October disseminating data from the Universal Trading Platform for NYSE Arca Europe, our new pan-European MTF and for European regulated cash market.

What is being delivered?

The major components of WEP delivered by NYSE Euronext Advanced Trading Solutions are the Market Data Server (MDS), the Retransmission Server (RTS) and the High Availability (HA) functionality.

Market Data Server (MDS)

The Market Data Server publishes the WEP Universal Trading Platform messages via dual multicast lines to the clients. A new advanced message routing functionality has recently been added which allows messages to be routed not just based on message type, but also on trading group. Messages can now also be routed to multiple multicast channels. This allows for greater flexibility for defining new service channels now and in the future.

Retransmission Server (RTS)

The RTS will provide a retransmission facility to service clients who have experienced gaps in the real-time Market Data feed. Each published message from the MDS is cached in memory for potential later retrieval by a client. It is possible, via configuration, to limit the number of retransmission requests serviced for each user per day and the size of each retransmission in packets/messages. These limits will be adjustable in real-time and configurable per user. The retransmission request will contain a password which is validated by the retransmission server. In the case of refusal the server will send an error message to the user detailing the reason why the request has not been fulfilled.

What are the main benefits?

A modular approach to design that helps ensure a smooth migration:

- The use of data handlers allows us to ensure that the end clients are not impacted by the Matching Engine migration.

Performance and functionality:

- The MDS will deliver the data with minimum latency (few microseconds) and the RTS will ensure we have a secure and reliable means of supporting customers who experience gaps.

The use of a data format specifically designed for the delivery of market data:

- It is designed specifically for resiliency and low latency:
 - Very small average message size (50-60 bytes)
 - Source and send timestamp in microseconds
 - Fixed body message length
 - Multi-messages per packet
 - Delivered over dual identical multicast feeds.
- It is designed specifically for the delivery of market data (all asset classes), e.g. rich content for equities includes:
 - Referential data
 - Trade information
 - Full Order book order by order
 - Order book aggregated by price limits
 - Quotes
 - Order book
 - Indices.
- It is designed to be portable across all NYX markets (and future adopters of NYSE Euronext trading platforms)
 - Technical messages and headers common to all markets and asset classes
 - Common recovery and refresh mechanisms.

Near future – WEP Go-live and additional features to be delivered

In accordance with the Universal Trading Platform overall roadmap, WEP is due to go into production in December 2008 disseminating data from the Universal Trading Platform for bond order books and from the NSC trading engine for remaining cash order books in parallel until the end of the migration.

Other exciting things to watch out for in the coming weeks will be value-added WEP functionalities and new services (e.g. slow/fast market, refresh server, etc).

Connectivity order forms for connection to SFTI® network

The one-to-one meetings scheduled with customers ended in mid-September. During these sessions, we provided clients with an update on the Programme and helped define their connectivity solutions. As you will be aware, it is very important that SFTI® orders are placed before mid November. Please do not delay in placing your order to ensure there is sufficient time to connect to SFTI® before decommissioning the current architecture.

For more information and additional clarification on the order form, please contact your local account manager.

For more details and information on the Universal Trading Platform Programme, please contact your local account manager.