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FIXPROTOCOL
INDUSTRY-DRIVEN MESSAGING STANDARDSM

FIX the Enabler Market-Side Adoption of FIX

PREPARED FOR: FIXGlobal Face2Face Forum – Shanghai

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Who currently uses FIX?

Today, it is estimated that there are in excess of 10,000 organisations using the FIX protocol.

- Virtually every major stock exchange ECN/MTF and dark pool
- Leading derivative exchanges
- Major investment banks
- The world's largest mutual funds, money managers and hedge funds
- Majority of ISVs, ASPs providing trading & risk management solutions
- Thousands of smaller investment firms

Interestingly, less than 5% of these organisations actually contribute towards the advancement and sponsorship of the FIX protocol.

Several stock exchanges are now following the LSE's lead and are looking to adopt FIX 5 as part of their access strategy.



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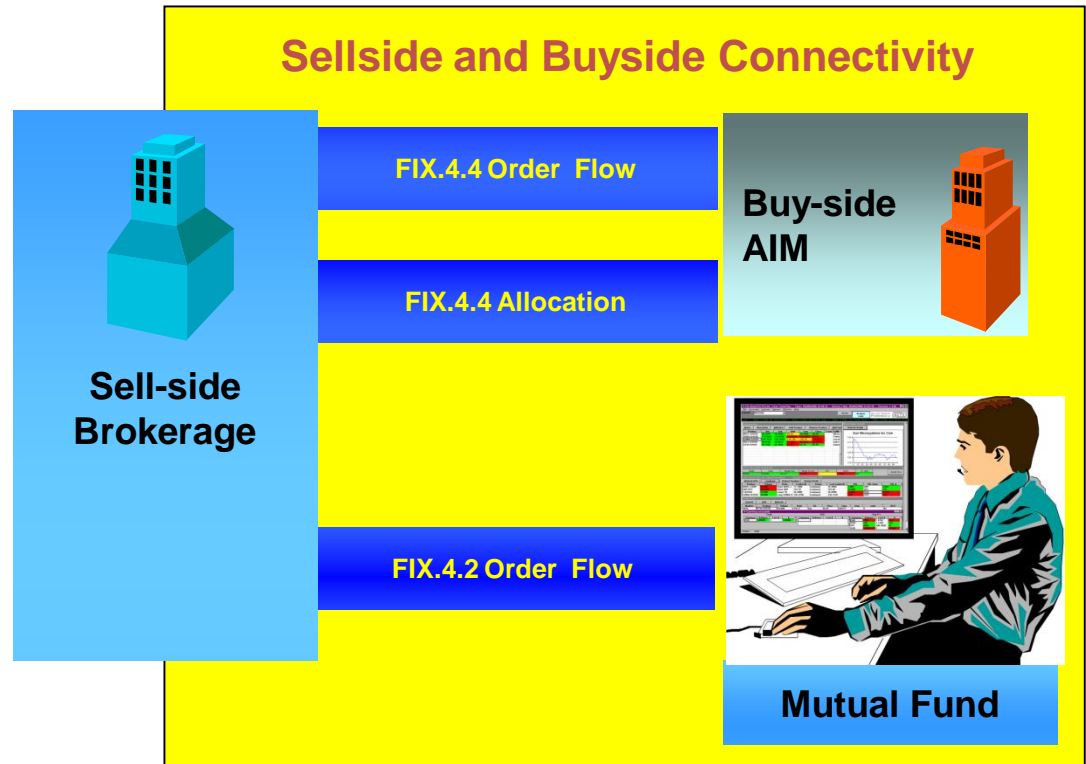
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Interoperability between Buy-side and Sell-side

Adoption of the FIX protocol has resulted in higher levels of interoperability for the financial services community, saving firms the cost of maintaining multiple syntaxes within the same area of the transaction lifecycle.





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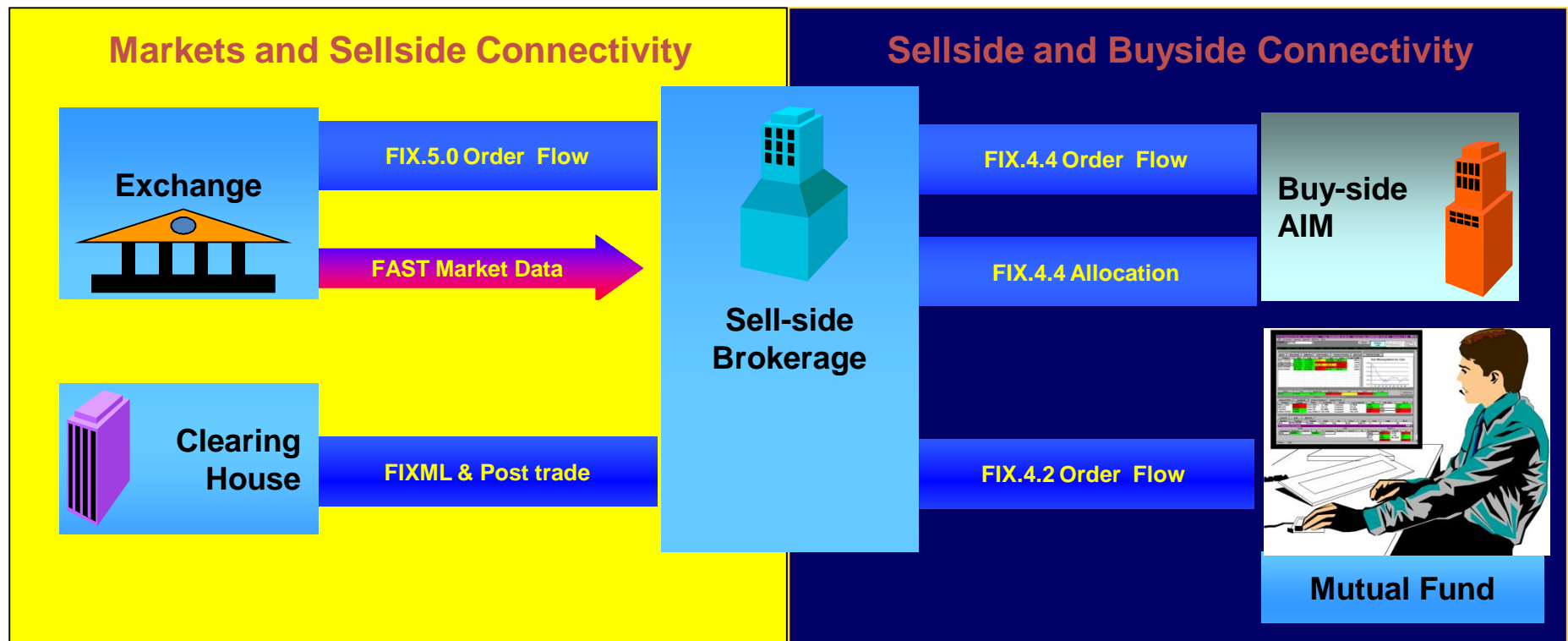
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Interoperability between Market and Sell-side

Adoption of the FIX 5 protocol should result in the same higher levels of interoperability for market side connectivity, sell side the cost of maintaining multiple syntaxes within the same area of the transaction lifecycle.





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Case Study

London Stock Exchange
FIX 5.0 SP2 Implementation

So Why Did the LSE Introduce FIX?

- The Native Protocol has changed little in 15+ years
- It has features which were appropriate to a protocol operating over 64k X.25 networks but now are an overhead
- The question was: substantially re-engineer the native protocol or support a new one
- A review of options around new protocols produced a list of one: FIX
- Potential customers were sometimes saying that they would hold off until LSE had FIX, or complained that developing a proprietary protocol cost them in time to LSE market
- The Exchange foresaw that there could be additional markets to migrate beyond Milan
 - ... and since then the LSE have signed up Oslo
- And, given the competition the Exchange are now seeing in London, an interface was needed which could support rapid changes in functionality in an evolving market space.

So Why Was FIX 5.0 Selected?

- The Exchange looked at which version of FIX was most appropriate
 - FIX 4.2 –wide support from customers, but only reasonable support for Exchange messaging requirements
 - FIX 4.4 –low support from customers, better match for functionality
 - FIX 5.0 –low support from customers, near perfect fit for functionality
- The Exchange also consulted customers
 - Many were excited about a FIX interface to the Exchange for cost reasons
 - Most said that they were not concerned about FIX 5.0 since they knew we're a while from launch and others were also looking at supporting FIX 5.0
 - Most said that it had to have at least the performance of our native interface and that it should be a very standard implementation
- The decision was between FIX 4.2 (making do, but having easy connectivity) and FIX 5.0 (fully standard implementation, but needing to support customers)

The Benefits So Far

- The primary benefit was moving to a standard interface
- Future new order types or instruments etc could already be supported by FIX, making implementation for LSE and customers more straightforward and cheaper
- Maintaining a proprietary interface is relatively expensive and re-issuing documentation, training customers etc is expensive
- A proprietary interface can be a barrier to new members
- Changes to proprietary fixed width protocol can substantially change the structure of the messages - successive releases make earlier ones more difficult to maintain and so customers are forced to keep up with the changes - FIX should allow customers to use the same interface, ignoring newer pieces which they do not need and taking only those that they do
- If LSE purchased other organisations or sold the trading system (software or service) to other organisations, then migrating their customers would be more straightforward (and palatable) than having to implement a proprietary interface
- Standard products are available for analysing customer communications and latency

What does it mean to the Industry?

- For the sell side, cutting over from an API model to a FIX gateway....?
- What are the savings for the Sell side?
 - a number of the sell side maintain dedicated LSE interface teams with specific skills in the LSE messaging. These teams could be combined into a more general FIX team
 - operations would be simplified since FIX logs and connectivity models are well understood - this was one of the reasons that the LSE wanted a very standard implementation of FIX
 - one or two of the sell-side said that it would take them hours to provision a new FIX session - compared to a much longer period for a new LSE proprietary connection
 - may be performance improvements if FIX is already used internally
- NOTE: the LSE did not provide an API in the style of a piece of software that could be installed. The LSE, rather like FIX, simply provides definitions of the messages which can be submitted, the responses which may be expected and guidance on how to use the messages



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Benefits for the End-Investor

Widespread adoption of the FIX Protocol could deliver the following benefits to the end-investor:

A reduction in explicit trading costs

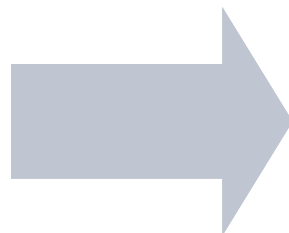
Investments in equities and other financial assets incur direct transaction costs. These costs are relatively transparent, and, from the end-investor's point of view, usually materialise in the form of a brokerage commission, which includes other costs, such as trading platform fees.

A reduction in implicit costs

Although often not directly visible to end-investors, implicit costs, such as the bid-ask spread, are effectively passed on in the form of a worse execution price, i.e. worse than might have been achieved if the bid-ask spreads were tighter

Effects of FIX on markets

- lower trading costs
- higher liquidity
- wider scope of services
- more investment opportunities



Higher net returns and more optimal asset allocation of end-investors

retail investors	hedge funds
pension funds	other investors
mutual funds	

Source: Oxera



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Benefits for Sell-side

Widespread adoption of the FIX Protocol could deliver the following benefits

- Increased flexibility for Exchanges
- Richer message set will enable the Exchange to grow their product offering to make it more cross asset - Forex, derivatives, fixed income.
- Quicker to roll out changes when FIX 5 is adopted
- FIX is an open standard, which has become the defacto way to trade equities electronically
- The use of FIX 5 in the markets space will help to lower the cost of entry, i.e. high price to entry is a barrier for new participants i.e. new MTFs
- Potential latency benefits if the Buyside happens to use a FIX 5 message then there will be some small benefits from not doing translations - lowers latency.



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Benefits of Implementing the FIX Protocol

The key advantages that can be achieved include:

- A reduction in the cost and complexity of integrating various internal processes to external APIs
 - A reduction in the cost and complexity of linking to new trading partners
 - A reduction in inputs (e.g. software and hardware) required to achieve automation, as a result of economies of scale or exploiting possibilities of infrastructure sharing
 - An increase in the quality of communication between participants, as potential errors generated by manually re-keying information or those generated by using a translation engine are reduced
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Standards are Important for the Financial Industry

- If all Exchanges were to implement FIX 5.0 SP1 & 2, they would be rewarded with:
 - Backward compatibility with FIX 4.0, 4.1, 4.2, 4.3 and 4.4 versions,
 - Additional flexibility to create new products
 - Have a competitive advantage similar to the likes of the London Stock Exchange, Deutsche Bourse and Chicago Mercantile Exchange (CME)
 - Additional volumes in the longer term as more and more Brokers and Buy-side organisations adopt FIX
 - The industry would also benefit from lower costs which standards bring about as has been seen in other industries.
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Summarising the value of Market-side FIX Connectivity

The widespread adoption of FIX 5 will:

- Make markets side interaction more dynamic
- Reduce costs to market participants and the prices charges (commissions / fees) of firms in the trading value chain
- Improve the overall efficiency of capital markets
- Lower connectivity costs
- Reduce barriers to entry and Increase competition which should reduce brokerage execution commissions and trading platform fees
- Increase the scope and quality of services provided, therefore impacting the level of activity, and liquidity in secondary markets, reduce the indirect trading costs facing investors
- Make cross-border implementation a simpler and more economical option

All of the above ultimately lowering the overall cost of investing and increasing the scope of services available to the end-investor!



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Thank you

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