To: FIX User Community

From:	Christopher Morstatt
	Salomon Brothers Inc
	cmorstatt@sbi.com

Date: January 13, 1996

Subject: FIX Protocol 4.0 Release Notes

A draft of the FIX Protocol specification, Version 4.0, is now available. This version addresses changes requested since the publication of Version 3.0 on September 27, 1995. The document, and these release notes, are available on the FIX WWW Page at http://world.std.com/~fix.

Major changes in FIX 4.0 include an overhaul of the session layer, expanded allocation functionality, quoting, forex trading and the inclusion of data elements related to cross-border trading.

Changes in the 4.0 draft release include:

- 1. A major overhaul of the session layer has been reflected in this release. The changes include:
 - a. All messages now increment sequence number
 - b. Some administrative messages are not resent, they are replaced by the Sequence Reset Gap Fill message
 - c. The sequences of Logon and Logout have been formalized
 - d. The use of the Reject message has been clarified. Reject messages should be used only when properly formed and validated (i.e. valid CheckSum and BodyLength) messages have invalid or missing required fields which make it impossible to pass through to the application level for an application reject. RefSeqNo is now a required field.
- All time and date fields have been modified. The year portion of the date field has been expanded to four characters, YYYYMMDD, and the time field now includes an imbedded date, YYYYMMDD-HH:MM:SS. Defined new data types *date* and *time*.
- 3. A new field has been added to the header, OrigSendTime(122). This field is conditionally required for resent messages.
- Four new fields have been added to the header, OnBehalfOfCompID(115), OnBehalfOfSubID(116), DeliverToCompID (128) and DeliverToSubID(129) to be used when delivering messages via third parties.
- 5. Additional enumerations have been added to the EncryptMethod(98) field.
- 6. The range of user defined field tags (MsgType) has been increased to include 5000-9999.
- 7. A new field, LocateReqd(114) has been added to the order messages as conditionally required for short sell orders.
- 8. The list of valid currency codes in Appendix A has been removed and replaced with a reference to the ISO secretariat responsible for maintaining the current list.
- 9. A new message, Don't Know Trade (DK) has been added to the protocol. This message is used to reject an execution message.
- 10. The field definitions of ClOrdID(11), OrderID(37), ListID(66) and ExecID(17) have been clarified to emphasize uniqueness.

- 11. Two new messages Quote Request and Quote have been defined to provide for quoting functionality. The messages address both securities and forex quotes. In conjunction with the quote, a new OrdType, Previously Quoted, has been defined in the order message.
- 12. The following changes were made to support multi-day orders: a. Added new enumeration, GTD, to TimeInForce(59) b. Added new field, ExpireTime(126), to the New Order, Execution and Cancel/Replace Request messages. c. Added new enumeration, Expired, to OrdStatus(39).
- 13. Added new enumeration, Plan Sponsor, to ProcessCode(81).
- 14. Added new field, CxlType(125), to Cancel Request message to streamline partial cancellation (reduce) requests. This field has been added as an accommodation to systems which are designed around the CMS methodology. The FIX Committee continues to recommend the use of the Cancel/Replace message for reducing share quantities.
- 15. Allocations a number of significant changes have been introduced to the Allocation and Allocation ACK messages. These include:
 - a. Added an Executions section to the allocation message to support third party ticketing. The fields included in this section are:

NoExecs(124) ExecID(17) Shares(53) Price(44) LastMkt(30)

- b. To support cross-border trading, three new fields have been added to the allocation message, NetMoney(118), SettlCurrAmount(119) and SettlCurrency(120).
- c. Added Currency(15) to the Allocation message to describe the denomination of AvgPx.
- d. Modified TradeDate(75) to required field in the Allocation message.
- e. Modified OrderID(37) in repeating group to conditionally required to allow allocation of nonelectronically delivered orders.
- f. Added Commission(12) to repeating allocations section.
- g. Added FutSettlDate(64) to the Allocation message.
- h. Added TradeDate(75) to Allocation ACK message to allow acknowledgment of prior day's allocations.
- i. Added a new enumeration to AllocStatus, received, to support two-stage acknowledgment of allocation instructions.
- j. Added verbiage to the allocation message description to detail the use the AllocTransType(71) field.
- k. Added enumeration to AllocTransType(71), confirm, to aid in two-way use of the allocation message via third parties.
- 1. Added Miscellaneous Fees section to detail non-principal charges
- 16. Added Miscellaneous Fees section to the execution message detail non-principal charges.
- 17. Added a new OrdStatus, Calculated, for use when reporting the results of fees calculations.
- 18. Added a reference section of field name/tag indexes sorted by field name and tag number.
- 19. Added IOINaturalFlag(130) to IOI message to allow explicit identification of natural indications.
- 20. Added IOIid(23) and new OrdType, Previously Indicated to Order message to allow electronic order response to indications.
- 21. Increased valid sequence numbers to 999,999

- 22. Updated the preface to reflect the current status of the protocol.
- 23. Created new field, PrevClosePx(140), which can be used as an additional verification of security identification.
- 24. Removed fields from the Cancel Request message.
- 25. Included numerous typographical and grammatical and clarification modifications throughout the document.