MRX COMPLEX INTRODUCTION:
FREQUENTLY ASKED QUESTIONS

Q: What functionality is being introduced to Nasdaq MRX (MRX)?

Pending SEC approval, MRX will introduce complex order functionality identical to the complex order functionality available on Nasdaq ISE (ISE), which is detailed on the ISE Complex Order Landing Page. The functionality will include Standard Combo to Combo matching, Standard combo to Synthetic matching (legging), Stock combo to Stock combo matching and Complex Crosses and Auctions.

Q: When will MRX introduce Complex functionality?

Pending final SEC approval, Nasdaq will introduce complex order functionality to MRX on June 24, 2019. The NTF Test Environment is now available for participants to certify and gain access to production ports.

Q: What complex order types will MRX support?

MRX will support all complex order types available on ISE including:
- Complex Market Orders
- Complex Limit Orders
- Complex Preferenced Orders
- Complex AON IOC Orders
- Complex Opening Only Orders
- Complex Customer to Customer Cross
- Complex Qualified Contingent Cross
- Do Not Trade Through Orders
- Stock Combination Orders

Q: Will MRX support implied orders?

Yes, MRX will support implied orders leveraging the same methodology available on ISE.

Q: What complex auctions and crosses will MRX support?

MRX will support all complex auctions available on ISE including:
- Complex Exposure Auctions
- Complex Price Improvement Auctions
- Complex Solicitation Auctions
- Complex Facilitation Auctions
- Complex Qualified Contingent Cross orders
- Complex Customer to Customer Cross orders
Q: **How will MRX print stock pairs from stock combination matches?**

MRX stock combination matching and execution of the stock pair will behave in the same way that it does on ISE.

Q: **How will MRX print stock pairs from QCC with Stock transactions?**

MRX will send stock pairs from QCC with stock transactions to one of the partnering brokers (Libucki, Cheevers, FOG) on the Chicago Stock Exchange as instructed by the sending participant. MRX QCC with Stock handling of the stock pair will behave in the same way that is does on ISE.

Q: **How does Complex Preferencing work?**

In the same manner as it is offered on ISE, complex orders that are preferenced to a particular market maker will receive an enhanced allocation if the order legs into the simple market and the preferenced market maker is on the NBBO. In order for the market maker to receive the enhanced preferred allocation, all legs must trade at or better than the ABBO.

Note, preferencing is not available for complex to complex matching transactions, as complex quoting will not be offered.

Q: **What complex risk protections will MRX support?**

MRX will support all complex order risk protections available on ISE including:

- **Price Reasonability**: Complex Orders with a Net Price that crosses the Synthetic MRX BBO by more than a configured percentage (1%) and a configurable dollar amount ($1.00) on the opposite side of the market will be rejected.
- **Minimum Net Price Check**: Complex orders with all legs to buy and a net price less than the sum of (ratios x $0.01) for all legs will be rejected.
- **Vertical Spread Price Protection**: Vertical spread orders will be rejected when entered with a negative net price or a net price greater than the absolute difference of the strikes plus the lesser of configurable dollar amount ($1.00) or percentage (5%) of the absolute difference of the strikes. Vertical spreads entered as market orders to sell are prevented from legging at a negative net price; vertical spreads entered as market orders to buy are prevented from executing at a net price that is greater than the absolute difference of the strikes plus the protection value. This protection does not apply to complex crossing orders.
- **Calendar Spread Price Protection**: Calendar spreads entered with a net price lower than $0.02 below zero will be rejected. Calendar spreads to sell with a MKT price will be restricted from executing outside of this protection range. This protection does not apply to complex crossing orders.
- **Butterfly Spread Protection**: Butterfly spreads entered with a net price greater than the intrinsic value (plus/minus configurable buffers) of the spread will be rejected.
- **Box Spread Protection**: Box spreads entered with a net price greater than the intrinsic value (plus/minus configurable buffers) of the spread will be rejected.
- **Three Tick Rule**: Incoming complex orders will be limited to trading more than five subsequent prices on the complex order book with a reference price based on the initial execution upon entry.
- **Market Wide Risk Protection**: Protection for Standard Combination and Stock Combination orders to be applied at default values detailed below if the firm or market participant does not provide custom settings.
Note, in line with ISE, MRX will not offer self-trade protection on complex transactions

Q: How can I trade complex orders on MRX?

1. Request NTF test ports from the Nasdaq Subscriber Team
2. Request MPID Authorization for MRX from the Nasdaq Membership Team (only if stock combination trading is required)
   - Participants may leverage existing MPIDs that are used on ISE, however they will still need to be registered as MPIDs on MRX via the form above
3. Certify for complex order functionality with the Nasdaq Market Operations Testing Team (Conformance Script is available)
   - Participants that have certified for complex trading on ISE will be automatically granted conformance for complex trading on MRX
4. Request Production ports from the Nasdaq Subscriber Team

Q: When will IP addresses become available?

Port Request forms are available for FIX, SQF and OTTO Ports. IP addresses and port details will be communicated as port requests are received and processed by the Nasdaq Subscriber services team.

A separate DTN has been published to provide production connectivity information on the MRX Spread feed.

Q: What changes can I expect on my reports relating to complex order functionality?

MRX report will continue to be available over Report HQ. Below are a summary of minor changes to existing reports to support the introduction of complex order functionality on MRX:

- The Charge Details Report will contain charges for complex order executions along with the new charge codes and descriptions.
- The Trade Details Report will contain complex leg executions along with additional complex order values in fields currently available on the report. Below are the new values the fields will contain:
The Open Order Combo Report will contain any open GTC or GTD complex order that will be entered into the system on the next trading day along with the corresponding order details. In the report, a complex order can be identified by a value of eight in the field “recordtype”. Additionally, each leg of a complex order will have a leg number provided in the “legs” field.

Q: **What Protocols will support complex trading on MRX?**

FIX will support complex order, cross and auction entry leveraging the same messages and message formats as are used on ISE.

OTTO will support complex instrument creation, complex order entry, complex cross entry, and complex auction entry leveraging the same messages and message format that are used on ISE. Additionally, OTTO will support Complex auction responses.

SQF will support complex order instrument creation, complex sweeping and complex auction responses leveraging the same messages and message formats that are used on ISE.

Q: **What complex data products will be available on MRX?**

NASDAQ will offer the **Nasdaq MRX Spread Feed** – comprised of four components that include Top Quote, Depth of Market, Order, and Trade information for Complex instruments only. It will commence on the same day Complex order functionality is introduced on Nasdaq MRX.

The Nasdaq MRX Spread feed will share the same specifications as the Nasdaq ISE Spread feed and can be found on the **Market Data Specifications – Data Feeds page** on the Nasdaq Trader website. For customer convenience, the specifications for each of the four components (Top Quote, Depth of Market, Order, and Trade) that make up the Spread Feed will be consolidated into one specification document.

To order the MRX Spread Feed product, please see the details below:

To order the product, firms must submit the following forms and agreements to receive the data:

- **Data Feed Request Form** - Required for all firms.
- **Nasdaq Global Data Agreement** - Required for all firms prior to initiation of the first Nasdaq data service only.
- **System Application** - Required for firms only if the data will be displayed or used in a system that is not yet approved by Nasdaq.

For the complete list of Nasdaq agreements and forms, please refer to the **Nasdaq Global Data Products Administration page** on the Nasdaq Trader website.

If you need assistance with the application process, please contact your **Nasdaq Sales Representative**.

Q: **Will the MRX Spread feed be available in the NTF environment?**

Yes, the MRX Spread feed is currently available in the NTF environment. Participants that want to gain access the MRX spread feed in NTF should note the request in the ‘Additional Comments’ section of the **Port Request forms**.

NTF IP and port details for the MRX Spread feed for complex market data are available in the **NTF Guide**.