## Nasdaq

## Nasdaq Web Trader

User Guide


## Table of Contents

1 Introduction to Nasdaq Web Trader ..... 3
1.1 Logging On to Nasdaq Web Trader ..... 3
1.2 Logging Out .....  4
1.3 Changing Your Password .....  4
2 Nasdaq Web Trader Workspaces ..... 5
2.1 Nasdaq Web Trader Main menu ..... 5
2.2 Menu button and Views menu ..... 5
2.3 Settings view ..... 6
2.4 Workspaces tab ..... 6
2.4.1 Saving Workspaces ..... 7
2.4.2 Opening saved workspaces ..... 7
2.4.3 Publishing saved workspaces .....  .7
2.4.4 Deleting saved workspaces ..... 7
2.5 Colors tab ..... 7
2.6 Confirmations tab ..... 8
2.7 Creating a Workspace with Views ..... 9
3 Working with Nasdaq Web Trader Views ..... 9
3.1 Handling Columns .....  9
3.1.1 Change the sorting order ..... 9
3.1.2 Adding columns to a view ..... 10
3.1.3 Removing columns from a view ..... 10
3.1.4 Moving columns in a view ..... 10
3.2 Using Filters ..... 10
3.2.1 Generic Filters ..... 10
3.3 Mandatory Input Fields ..... 11
3.4 Export Data to CSV button ..... 11
3.5 Menu button in a view ..... 11
3.6 Using Controls ..... 11
4 Views available in Nasdaq Web Trader ..... 12
4.1 Market Data Views ..... 12
4.1.1 Market View ..... 12
4.1.2 Securities view ..... 14
4.1.3 Order Depth ..... 14
4.1.4 Price Depth ..... 15
4.1.5 Market Trades ..... 16
4.1.6 Trading Schedule ..... 16
4.1.7 News. ..... 17
4.2 Order Management Views ..... 18
4.2.1 Order Entry ..... 18
4.2.2 Order Import ..... 20
4.2.3 My Orders ..... 21
4.2.4 Order History ..... 23
4.2.5 My Trades ..... 24
4.2.6 Trades \& Orders Reports ..... 25
4.2.7 Results ..... 26
5 Mapping of Common Terms ..... 27

## 1 Introduction to Nasdaq Web Trader

Nasdaq Web Trader provides an order management and market information interface to Traders, Firm Managers and Firm Viewers. It is deployed as a web server application and users access the application through a web browser.

Nasdaq Web Trader consists of a number of different views which allow:

- Ordermanagement
- Market information viewing.

The Nasdaq Web Trader features allow the user to:

- Easily see which fields are mandatory to fill in in any given view. Such fields are indicated by an asterisk (*).
- View confirmations and verify transactions before submission
- Customize views by:
- Filtering data on all columns in any given view
- Saving personal settings per view, workspace, and user.


### 1.1 Logging on Nasdaq Web Trader

Using a supported web browser, go to the web address https://trading.opcom.ro/ and enter your username and password.

Nasdaq Web Trader requires a web browser that supports HTML5 and Web Sockets. The following browsers are supported:

- Internet Explorer 11 (earlier versions do not support Web Sockets)
- Chrome (only the latest version with auto-update version feature enabled).

Figure 1 - Log In view


If you want your previous workspace settings to be restored when you log in, check the Restore Workspace checkbox. If this checkbox is not checked, the previous workspace will be replaced with the Views menu. For more information, refer to section 2.2 Menu button and Views menu.

Figure 2 - Nasdaq Web Trader workspace example


### 1.2 Logging Out

To log out and close Nasdaq Web Trader, click on the Logout button. Confirm the log out by clicking the $\mathbf{O k}$ button that appears at the bottom right corner of the screen. Click on Cancel to not log off.

When a user logs off, the workspace is automatically saved, and any changes will be reloaded when you $\log$ in again if the Restore Workspace checkbox is checked on the Log ln view.
(i) Note: Closing the web browser window will log you out without confirmation.

### 1.3 Changing Your Password

Password strength is calculated on the weights of the password characters. Password strength is passed if its total score equals or exceeds a pre-determined threshold. In Nasdaq ME, the threshold is a database parameter and the default value is $60 \%$. For the password strength algorithm, please refer to http://www.passwordmeter.com

To change your password:

1. Open the Settings view by clicking the Settings button $\$$ on the main menu and click the Change Password tab.

Figure 3-Change Password Tab

2. Type in the new password in the New Password and Confirm New Password fields.
3. Click Change. The new password will become active immediately.

## 2 <br> Nasdaq Web Trader Workspaces

This section shows how to work with workspaces, such as using the main menu buttons, adding views, saving and publishing workspaces.
(i) Note: Any alterations you make to a workspace are immediately saved and cannot be undone.

### 2.1 Nasdaq Web Trader Main menu

At the top right-hand side of the Nasdaq Web Trader is the Main menu. It has three buttons:

- Menu button 目 which opens the Views menu
- Settings button which opens the Settings view
- Logout button to logoff.

Figure 4 - Nasdaq Web Trader Main menu


The time displayed to the left of the Main menu is the time on the Trading Engine.
The Workspace option to the left of the Main menu allows you to quickly change between saved workspaces by selecting a workspace from the Workspace dropdown list.

### 2.2 Menu button and Views menu

The Views menu can be opened from the Menu button目 from the Main menu. This displays all the views that can be selected to be displayed in a workspace. For more information about the individual views, refer to section 4 Views available in Nasdaq Web Trader. To add multiple views to a workspace, refer to section 2.7 Creating a Workspace with Views.

Figure 5 - Views menu options

| MARKET DATA | ORDER MANAGEMENT |
| :---: | :---: |
| Market View <br> Securities <br> Order Depth <br> Price Depth <br> Market Trades <br> Trading Schedule <br> News | Order Entry <br> Order Import <br> My Orders <br> My Trades <br> Trades \& Orders Reports <br> Results |

Click on a view, for example, Securities, to open this view in the workspace.

Figure 6-Securities view

| Securities | Board PC | PCCB-NC* $\times$ |  |  |  |  |  | Details |  | Favorites | Favorites 2 |  | $\underline{\text { y }}$ ¢ $\times$ |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| SECURITY | BOARD | SESSION | STATE | PRODUCT | REF PRICE | BID QTY | BID | OFFER | OFFER QTY | LAST PRICE | OPEN | HIGH | Low | TRADE ${ }^{\text {A }}$ |
| FWB-A-2021 | PCCB-NC | Continuous | Active | FWB-A |  |  |  |  |  |  |  |  |  |  |
| FWB-A-2022 | PCCB-NC | Continuous | Active | FWB-A |  |  |  |  |  |  |  |  |  |  |
| FWB-L-Aug-20 | PCCB-NC | Continuous | Active | FWB-L |  |  |  |  |  |  |  |  |  |  |
| FWB-L-Jul-20 | PCCB-NC | Continuous | Active | FWB-L |  |  |  |  |  |  |  |  |  |  |
| FWB-L-Nov-20 | PCCB-NC | Continuous | Active | FWB-L |  |  |  |  |  |  |  |  |  |  |
| FWB-L-Oct-20 | PCCB-NC | Continuous | Active | FWB-L |  |  |  |  |  |  |  |  |  |  |

Views can be added to the workspace by clicking and dragging an outside border of the workspace window to show the Views menu options and choose a new view.

Figure 7 - Views menu options used to add a view


### 2.3 Settings view

The user's Settings view is opened by clicking the Settings button from the Main menu.
The Settings view contains four tabs:

- Workspaces - refer to section 2.4 Workspaces tab
- Colors - refer to section 2.5 Colors tab
- Confirmations - refer to section 2.6 Confirmations tab
- Change Password - refer to section 1.3 Changing Your Password.


### 2.4 Workspaces tab

Use this tab to save, delete, open and publish saved workspaces. When you modify a workspace, it is saved between sessions as a temporary workspace and will open when you log in again, provided that the Restore workspace check box is selected. If you wish to name it and create a permanent snapshot of the workspace that can be opened later or published to other users, save the current workspace using the Workspaces tab in the Settings view.

### 2.4.1 Saving Workspaces

Open the Settings view by clicking the Settings button and then click the Workspaces tab.
Figure 8 - Settings View Workspaces Tab


Under this tab, enter a name of your choice in the Set current workspace as field and click Save. Confirm the save by clicking on the ok button.

### 2.4.2 Opening saved workspaces

To alternate between workspaces to view, saved workspaces can be reopened by clicking the Settings button $\boldsymbol{\$}$ and clicking the Workspaces tab. Select a saved workspace and click the Open button. Confirm the open by clicking on the OK button.
(i) Note: The original default workspace can be opened from the Workspaces tab, if required, or by selecting 'Default' from the Workspace dropdown list on the Main menu.

### 2.4.3 Publishing saved workspaces

A saved workspace can be published to make it available to other users within the same firm. To publish a save workspace, click the Settings button and click the Workspaces tab. Select a saved workspace and click the Publish button. Confirm the publication by clicking on the OK button.

### 2.4.4 Deleting saved workspaces

To delete a saved workspace, click the Settings button and click the Workspaces tab. Select a saved workspace and click the Delete button. Confirm the deletion by clicking on the OK button.

### 2.5 Colors tab

The Colors tab displays the color themes available, e.g. Dark for a dark workspace background or Light for a white workspace background.

1. Open the Settings view by clicking the Settings button and click the Colors tab.
2. Click on the Theme name to change the colors.

Figure 9 - Colors Tab example


Selecting Dark will change the workspace to the color scheme shown below.
Figure 10 - Colors Tab - Dark Color Theme example


### 2.6 Confirmations tab

The Confirmations tab allows confirmations to be turned on or off for selected actions, such as withdrawing orders or deleting workspaces. If the checkbox is selected, a confirmation will be needed before the action takes place, e.g. by clicking $\mathbf{O k}$ to proceed with the action or Cancel to cancel the action.

Figure 11 - Confirmations tab


### 2.7 Creating a Workspace with Views

Nasdaq Web Trader consists of a number of menu categories, which contain one or several menu items. Each menu item opens an individual view. Some views also have subviews, which are views that provide a detailed presentation of the contents of one row. Alternatively, these subviews allow you to take action.
(i) Note: The changes you make to the workspace will be immediately saved and cannot be undone.

To customize a workspace:

1. Open a view of your choice from one of the View menu categories. Use the Menu button目 to see the views available.
(i) Note: Views can be added to the workspace by clicking and dragging an outside border of the workspace window to show the Views menu options and choose a new view.
2. Move the cursor to the very edge of the window (the gray frame becomes twice as thick when you are at the spot where it becomes possible to alter it in size) and resize the window by dragging the frames of the window.
3. In the free area that appears, open another view and resize this window as needed.
4. Repeat step 3 until you have built a workspace to your liking.

Your settings will be saved and when you log on with the same user next time, the application will open to this workspace, provided that the Restore workspace check box is selected, which is the default setting.
5. If you remove a view from your workspace, the view closest to it will resize in order to fill in the void.
(i) Note: You are also able to resize the entire workspace.

If you want to make sure your changes to a view or workspace are not overwritten, save the workspace. Refer to section 2.4.1 Saving Workspaces. This will be a snapshot of the workspace at the time you save it and it can be reopened or published.

## 3 Working with Nasdaq Web Trader Views

Views in Nasdaq Web Trader can be table (or grid) views, detail views (available if there is a Details button on the view) or dialog boxes, such as Order Entry.

### 3.1 Handling Columns

Views have a default setting for the way in which the columns in that view appear, but you also have the option to customize the order in which the columns appear.

### 3.1.1 Change the sorting order

To change the sorting order of the columns from ascending to descending order and vice versa, click on the column header. A small arrow will appear to the right of the column title, signaling the current sorting order of that column.

To sort on any column, click on the column header. To toggle between ascending and descending sorting order, click several times consecutively on a column header.

You can sort on two columns concurrently, that is, first on column A and then on column B. To do this, first click on the header for column A, then press the Shift key and click on the header for column B. To undo the double sorting, click any column.

Figure 12 - Column sorting

| My Orders |  | ALL |  | IN PROGRESS |  | COMPLETED |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | Details | Withdraw | $v$ Hi | story | $\underline{\square}$ |
| TIME | ORDERID |  | ID\# | SIDE | STATu | vecontr | BOARD | PRICE | QUANTITY |

### 3.1.2 Adding columns to a view

To add columns that are hidden by default, click the Column Settings button in the view and select any columns of your choice in the list that appears. Views with tabs, such as Market View and My Orders view, do not have this button.

Figure 13 - Column Settings example


### 3.1.3 Removing columns from a view

To remove columns that are enabled by default, click the Column Settings button $\boldsymbol{\beta}$ in the view and clear any columns of your choice in the list that appears.

### 3.1.4 Moving columns in a view

Re-arrange the order of columns in views without tabs by clicking on a column and dragging it to a new position in a view.

### 3.2 Using Filters

Filters can be applied in some views in Nasdaq Web Trader.

### 3.2.1 Generic Filters

The generic filter appears in the title bar of a view. This filter allows you to filter on any column in the view (including filtering on hidden columns).

Figure 14 - Generic Filter example

## Securities

You can type in a value or wildcard (* or ?) to search for values. Values can be case insensitive text, number, date or time.

When you start to type into the generic filter control, a list with matching items from which you can select an item on which to filter will appear.

Figure 15 - Generic Filter matching items


As soon as you have selected an item in the generic filter field, a field will be created to the left of this field that will be populated with the selected filter item.

Figure 16-Generic Filter created

```
Securities Security ST*}\times\mathrm{ State A*}
```

To remove any part of user-defined, generic, filter criteria, click the Exit button ( X ) next to the filter field.

### 3.3 Mandatory Input Fields

In views that contain input fields and drop-down list boxes, all fields that must be filled out in order for you to be able to carry out the action performed in the view are indicated with an asterisk (*) to the right of the field in question.

### 3.4 Export Data to CSV button

The Export Data to CSV button $\stackrel{\text { 禺 }}{ }$ appears on the upper right-hand side of a view.
Click this button to export data from the contents displayed in the view to a .csv file.

### 3.5 Menu button in a view

The Menu button appears on the upper right-hand side of a view.

Click this button to close the current view and instead display all available views.
(i) Note: Using the Menu button from an open view will close that view and open any selected view instead. The Menu button from main menu will open the View menu only.

### 3.6 Using Controls <br> In Nasdaq Web Trader, use different controls to add, delete, and modify data.

The following control types are available:

- Autocomplete
- Check Boxes
- A pop-up Calendar is available to select dates
- Spin buttons
- Text boxes - If you have entered an invalid value in a field, the background color of this field will change to red to signal an incorrect value. Once you enter a valid value, the red background will disappear.


## 4 Views available in Nasdaq Web Trader

The following view categories are available from the Menu button:

- Market Data
- Order Management.

Each of these categories contains related views.

### 4.1 Market Data Views

### 4.1.1 Market View

The Market View contains a list of securities giving a summary of market information for the securities, for example:

- Best current buy/sell price
- High/low/last prices.

The Market View has All, Active, Favorites and Favorites 2 tabs which differentiates it from the Securities view. Market View will not save Filter values like the Securities view.

Figure 17-Market View example

| Market View | ALL | Active | FAVOR | RItes | FAVORITES |  |  |  |  |  |  |  | $\equiv \times$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| bas | Details |  | Favorites | Favorites 2 步 |  |  |  |  |  |  |  |  |  |
| SECURITY | BOARD | SESSION | STATE | Product | REF Price | BID QTY | BID | OFFER | OFFER QTY | LAST PRICE | OPEN | HIGH | Low * |
| FWB-S-29-20 | PCCB-NC | Close | Active | FWB-S |  |  |  |  |  |  |  |  |  |
| FWB-SEM-1-21 | PCCB-NC | Close | Active | FWB-SEM |  |  |  |  |  |  |  |  |  |
| FWB-SEM-2-20 | PCCB-NC | Close | Active | FWB-SEM |  |  |  |  |  |  |  |  |  |
| FWB-SEM-2-21 | PCCB-NC | Close | Active | FWB-SEM |  |  |  |  |  |  |  |  |  |
| FWB-TR-1-21 | PCCB-NC | Close | Active | FWB-TR |  | 1 | 130.00 |  |  |  |  |  |  |
| FWB-TR-2-21 | PCCB-NC | Close | Active | FWB-TR |  |  |  |  |  |  |  |  |  |
| FWB-TR-3-20 | PCCB-NC | Close | Active | FWB-TR |  |  |  |  |  |  |  |  |  |
| FWB-TR-3-21 | PCCB-NC | Close | Active | FWB-TR |  |  |  |  |  |  |  |  |  |
| FWB-TR-4-20 | PCCB-NC | Close | Active | FWB-TR |  |  |  |  |  |  |  |  |  |
| FWB-Z-20-Jun-20 | PCCB-NC | Close | Active | FWB-Z |  |  |  |  |  |  |  |  |  |
| $<$ |  |  |  |  |  |  |  |  |  |  |  |  | > - |

Click on the All tab to see all the securities. Click on the Active tab to show all active securities.
The following columns are available in the Market View and Securities view.

SECURITY The security symbol (also called the sec code), which is an unique code used to identify the security

| BOARD | The Board the security is traded on |
| :---: | :---: |
| SESSION | The name of the trading session the security is in. The trading session can be, for example, Pre-Trade or Continous. Trading session affects what activities are allowable on the security. |
| STATE | The current trading status for the security on a Board. The trading state may be either: <br> 'Active'. When a security on a Board is active, the security is available to be traded on that Board, or <br> 'Suspended'. If the security on a Board is suspended, that security on that Board will be unavailable for trading. |
| PRODUCT | Unique identifying code for the Product (Instrument) that the security is associated with |
| REF PRICE | The reference price of the security. It is the previous settlement price of the security by default. |
| BID QTY | Bid quantity at the best price in the order book |
| BID | Current best bid price of an order or trade in the currency of the security Board |
| OFFER | Current best offer price of an order or trade in the currency of the security Board |
| OFFER QTY | Offer quantity at the best price in the order book |
| LAST PRICE | The Last Traded Price for this security |
| OPEN | The price for the security when the market opened today |
| HIGH | The highest price at which the security was traded today |
| LOW | The lowest price at which the security was traded today |
| TRADES | The number of trades that occurred for the security |
| VOLUME | The total volume traded on the day |
| TOP | Theoretical Order Price. Indicative price when set. |
| TOV | Theoretical Order Volume. Indicative volume of trades. |
| LISTING DATE | The listing date and time of the security |
| DELISTING DATE | The delisting date and time of the security. |

Commonly used securities can be easily added to the FAVORITES and FAVORITES2 tabs. Select a security and click on either the Favorites or Favorites $\mathbf{2}$ button.

Figure 18 - Market View - FAVORITES 2 tab example

| Market View | ALL | ACTIVE | FAVORITES FAVORITES 2 |  |  |  |  |  |  |  |  |  | $\equiv \times$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Board pccb-nc $\times$ |  |  | Details |  | Favorites | Favorites 2 |  | 早 |  |  |  |  |  |
| SECURITY ${ }^{\text {- }}$ | BOARD | SESSION | STATE | PRODUCT | REF PRICE | BID QTY | BID | OFFER | OFFER QTY | LAST PRICE | OPEN | HIGH | Low ${ }^{\text {- }}$ |
| FWB-A-2021 | PCCB-NC | Close | Active | FWB-A |  |  |  |  |  |  |  |  |  |
| FWB-A-2022 | PCCB-NC | Close | Active | FWB-A |  |  |  |  |  |  |  |  |  |

Click on Remove to remove a security from the FAVORITES tab. Select a security and click Up or Down to move the row up or down. Select a security and click on Details to see the Security Details view.

Figure 19-Security Details view example

| Security | Details |
| :--- | :--- | :--- |
| Security | FWB-A-2021 |
| Board | PCCB-NC |
| Session | Close |
| Product | FWB-A |
| Bid |  |
| offer |  |
| Volume | 0 |
| Bid Qty |  |
| Offer Qty |  |
| Last Price |  |
| TOP |  |
| Ref Price |  |
| Tov |  |
| Open |  |
| High |  |
| Low |  |
| Listing Date | $2018-12-2400: 00: 00$ |
| Delisting Date |  |
| State | 2020-12-24 23:59:59 |

### 4.1.2 Securities view

The Securities view contains a list of securities giving a summary of market information for the securities, for example:

- Best current buy/sell price
- High/low/last prices.

The Securities view has the same columns as the Market View but has no tabs. Refer to 4.1.1 Market View for more information.

The Securities view can be filtered using Generic filters. Refer to 3.2.1 Generic Filters for more information.

Figure 20 - Securities view example


Commonly used securities can be added to the FAVORITES and FAVORITES2 tabs in the Market View. Select a security in the Securities view and click on either the Favorites or Favorites $\mathbf{2}$ button.

Select a security and click on Details to see the Security Details view.

### 4.1.3 Order Depth

The Order Depth view refers to the security selected from the Market View or Securities view. To see details of a different Orderbook, click on the security desired from any of these views.

The Order Depth view allows you to view the bids (buy orders) and offers (sell orders) for a selected security, sorted by price/time. The buys are displayed in the left side of the view and the sells are shown in the right side for the selected security.

A Trader's own orders are highlighted.
Select an order and click on Details to see the Order Details view.
Figure 21 - Order Depth view example

| Order Depth - FWB-A-2021 \| PCCB-NC |  |  |  |  |  |  |  | 8 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| ID\# |  | FIRM | QTY | BID | OFFER | QTY | FIRM | ID\# |
| 5 | * | NC_PART1 | 30 | 41.00 | 41.50 | 65 | NC_PART1 | 3 |
| 2 |  | NC_PART1 | 50 | 40.00 | 42.00 | 65 | NC_PART1 | 4 |

The following columns are available in the Order Depth view:

| ID\# | Unique order number of the bid order assigned by the system |
| :---: | :---: |
| * | An asterisk (*) in this column indicates that the Bid (buy) order is a WON (Whole or None) order |
| FIRM | The Firm of the trader who placed the bid order |
| QTY | The quantity of the order on the bid side |
| BID | The bid (buy) price of the order |
| OFFER | The offer (sell) price of the order |
| QTY | The quantity of the order on the offer side |
| FIRM | The Firm of the trader who placed the offer order |
| * | An asterisk (*) in this column indicates that the Offer (sell) order is a WON (Whole or None) order. |
| ID\# | Unique order number of the offer order assigned by the system |

### 4.1.4 Price Depth

The Price Depth view refers to the security selected from the Market View or Securities view. To see details of a different Orderbook, click on the security desired from any of these views.

The Price Depth view allows you to view the aggregate of bids (buy orders) and offers (sell orders) for a selected security, grouped and ordered by price. The buys are displayed in the left side of the view and the sells are shown in the right side for the selected security.

Figure 22 - Price Depth view example

```
Price Depth - FWB-A-2022 | PCCB-NC % # >
QTY BID OFFER QTY
```



```
    30 99.00
```

The following columns are available in the Price Depth view:
QTY Total visible quantity of all bid orders at this price
BID The bid (buy) price
OFFER The offer (sell) price
QTY Total visible quantity of all offer orders at this price.

### 4.1.5 Market Trades

The Market Trades view lists all the trades performed in the Trading System for the day. Certain trade attribute information that is not available to the public, such as Buy Trader ID, Sell Trader ID, Trading Account numbers, Buy and Sell Order numbers etc., is not displayed in this table.

Figure 23 - Market Trades view example

| Market Trades |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| time | SECURITY | board | PRICE | QUANTITY | value | Status |
| 2020-06-16 11:57:47 | FWB-A-2021 | PCCB-NC | 50.00 | 65 | 28470000.00 | Matched |
| 2020-06-16 11:57:47 | FWB-A-2021 | PCCB-NC | 50.00 | 15 | 6570000.00 | Matched |

The following columns are available in the Market Trades view:
TIME The time when the trade occurred
SECURITY The security code of the security that was traded
BOARD The Board on which the trade occurred
PRICE The price that the trade traded at
QUANTITY The quantity that the trade traded
VALUE The total value of the trade
STATUS The status of the trade, e.g. Matched.

### 4.1.6 Trading Schedule

The Trading Schedule view shows a list of trade events that have triggered and are scheduled.
Figure 24 - Trading Schedule view

| Trading Schedule |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TIME - | STATUS | TRANSITION | BOARD | PRODUCT | SECURITY | - |
| 2020-06-16 12:30:00 | Scheduled | CLOSE | PCCB-NC |  |  |  |
| 2020-06-16 13:00:00 | Scheduled | CONTINOUS_EM | PCGN-LN |  |  |  |
| 2020-06-16 13:00:00 | Scheduled | CALL_AUCT | PZU-GN |  |  |  |
| 2020-06-16 13:00:00 | Scheduled | EXPIRY | PI |  |  |  |
| 2020-06-16 13:00:00 | Scheduled | EXPIRY | Pl_GN |  |  |  |
| 2020-06-16 14:00:00 | Scheduled | EXPIRY | PI |  |  |  |

The following columns are available in the Trading Schedule view:
TIME The time that the trading event is scheduled to commence. If no time is specified, then the event will begin as soon as it is set.

STATUS The current status of the trading event:
'Triggered' - Indicates the trading event has occurred
'Pending' - Indicates the trading event has not yet occurred.

TRANSITION

BOARD

PRODUCT

SECURITY The unique identifier of the Security on which this trade event is scheduled to occur.

### 4.1.7 News

The News view shows a list of News items disseminated by the Exchange.
Figure 25 - News view example


The following columns are available in the News view:
TIME The time the news was sent out
TITLE A descriptive title for the News item
SECURITY The security code of the security that is the subject of this News item
ISSUER The Issuer responsible for this security
REFERENCE A news reference number.

Click Details to see the whole selected news item in the News Details view.

Figure 26 - News Details view example
Time
Time

### 4.2 Order Management Views

### 4.2.1 Order Entry

Buy or sell orders can be entered using the Order Entry view. Click the More down arrow to expand the view or the More up arrow to truncate the view. The fields available will change according to the type of security selected, e.g. some securities will have Trigger options, and the current trading session.

Figure 27-Order Entry view example - expanded


The following fields are available in the Order Entry view:
Security The short name for the security for this order
Board The Board on which the order is to be placed
Account The Trading Account that the order is being entered for
Quantity The unit quantity of this order
Price $\quad$ The limit price for this order
Type The type of order, i.e. the option selected here will determine whether the price for the order is the best market price (Market) or a price limit (Limit) that is set in the Price field.

Reference Free form field for reference text

- More

Fill Type
The type of fill for the order, for example:
None - No contingencies, just normal limit order
WON - Whole or None. A WON order is an order that trades the entire quantity in a single trade or remains in the order book.

FOK - Fill Or Kill. The order must execute as a complete order as soon as it


Figure 28 - Confirm Submit order

## Confirm Submit Order

## Confirm Bid Cancel

If the order is accepted, the following message will be displayed.
Figure 29 - Order Entry success message
$\times$ action successful

If the order is rejected, an error message will be displayed.
Figure 30-Order Entry error message
X (1486): Unknown account

### 4.2.2 Order Import

Orders can be imported from a CSV file using the Order Import view.
Figure 31 - Order Import view example

| Order Import |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| SECURITY | BOARD | SIDE | ACCOUNT |  |  | TYPE | PRICE | status |

The CSV file needs to contain the correct column headings. The column heading names map to those used in the Order Entry view as shown in the example below.

Figure 32-Order Import - Example CSV file

```
\ Order Import-20191204_try - Copy.csv - Notepad
File Edit Format View Help
Instrument,Piata,Sens,Cont,Referinta,Cantitate,Tip,Pret,Status,Timp de actiune,Data Expirarii,Timpul de Expirare,Tip completare,Declansator,Pretul de Declansare,Directia de
Declansare,Tipul Pretului de Declansare
FWB-A-2021,PCCB-NC,Vanzare,TA-NC_Part1,ordin 1, "10,1",Limit,150, ,Good Till Date, 2020-01-25|, ,None, , ,,,
FWB-A-2021,PCCB-NC,Vanzare,TA-NC_Part1,ordin 2,15,Market,160,,Day, ,,None, ,,
FWB-A-2022,PCCB-NC,Vanzare,TA-NC_Part1,ordin 3,15,Limit,162,,Good Till Cancel,, ,woN,,,
FWB-L-Feb-20,PCCB-NC,Vanzare,TA-NC_Part1, ordin 5,16,Limit,"172,01",,Immediate,,,FOK,,,,
FWB-L-Feb-20,PCCB-NC,Vanzare,TA-NC_Part1,ordin 6,16,Limit,172,,Immediate,,,FOK,,,,
FWB-L-Mar-20,PCCB-NC,Vanzare,TA-NC_Part1, ordin 7, 20,Limit,180,,Immediate,,,FAK,,,
FWB-L-Mar-20,PCCB-NC,Vanzare,TA-NC_Part1,ordin 8,19,Limit,180,,Immediate,,,,FAK,,,,,
```

Click on the Import button. A Windows Open dialog box will open and the CSV file containing the orders data can be selected for import.

Figure 33-Order Import view - imported orders example

| Order Import |  |  |  | Import | Submit |  | Clear | \% |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| SECURITY | BOARD | SIDE | ACCOUNT | REFERENCE | QUANTITY | TYPE | PRICE | STATUS | - 4 |
| INT_FIN-24-22Jan18 | PI | Sell | F01T01 |  | 1000.0000 | Limit | 11.0000 | Imported |  |
| INT_FIN-24-22Jan18 | PI | Sell | F01T01 |  | 1000.0000 | Limit | 12.0000 | Imported |  |
| INT_FIN-24-22Jan18 | PI | Sell | F01T01 |  | 1000.0000 | Limit | 13.0000 | Imported |  |
| FWB_A_2019 | PCCB-NC | Buy | F01T01 |  | 1000.0000 | Limit | 10.0000 | Imported |  |
| FWB_A_2019 | PCCB-NC | Buy | F01T01 |  | 1000.0000 | Limit | 9.0000 | Imported |  |
| $\times 0$ rows failed, 12 rows successfully imported. |  |  |  |  |  |  |  |  |  |

If there are errors, the cells containing the erroneous, or missing, data will be colored red.
To remove all the orders, click Clear.
To submit the orders, select the orders to be submitted and click Submit.
Figure 34 - Order Import - Submit orders example

| Order Import |  |  |  | Import | Submit |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| SECURITY | BOARD | SIDE | ACCOUNT | REFERENCE | Quantity | TYPE | PRICE | status - |
| FWB_A_2019 | PCCB-NC | Buy | F01T01 |  | 1000.0000 | Limit | 9.0000 | Submitted |
| FWB_A_2019 | PCCB-NC | Buy | F01T01 |  | 1000.0000 | Limit | 8.0000 | Submitted |
| FWB_A_2019 | PCCB-NC | Sell | F01T01 |  | 1000.0000 | Limit | 11.0000 | Submitted |
| FWB_A_2019 | PCCB-NC | Sell | F01T01 |  | 1000.0000 | Limit | 12.0000 | Submitted |
| FWB_A_2019 | PCCB-NC | Sell | F01T01 |  | 1000.0000 | Limit | 13.0000 | Submitted |
| $\times$ action successful |  |  |  |  |  |  |  |  |

If the orders are successfully submitted, the Status will change to Submitted. The submitted orders will appear in the My Orders view with a Status of 'New'.

### 4.2.3 My Orders

The My Orders view lists the traders buy orders and sell orders. The list of orders is displayed in a view with each order represented by a single row. Final orders that have a Status of 'Matched' or 'Cancelled' are displayed as gray text.

Click on the In Progress tab to view all your orders that are not Final, e.g. with a Status of 'Open' or 'Partially Filled', as well as Trigger and Unplaced orders. Click on the Completed tab to see your Final orders, i.e. Matched or Cancelled orders.

Figure 35 - My Orders view example


The following columns are available in the My Orders view:
TIME The time the order was placed

ORDER ID

ID\#
SIDE
STATUS

BOARD
PRICE

QUANTITY
BALANCE

MATCHED QTY

MATCHED VALUE
ACCOUNT
REFERENCE
TYPE
FILL TYPE

DURATION

TRIGGER
TRIGGER PRICE
TRIGGER DIRECTION

TRIGGER PRICE TYPE

EXPIRY DATE

EXPIRE TIME

TRADER
LAST AMENDED BY

The unique identifier of the Board where the Security is listed The bid or offer price for the Security, i.e. the price that the order was entered at.

The order quantity entered
The quantity of this order that is open for further matching. In case an order is no longer active, then the balance will be zero.

The quantity of the order that has so far been matched with opposing orders

The value of the order that has so far been matched with opposing orders
The Trading Account ID of the Firm that the order is placed for
Reference text entered with the order
The type of order, e.g. Limit or Market
The type of order fill, e.g. None, WON (Whole or None), FOK (Fill Or Kill), FAK (Fill And Kill)

The lifetime (duration) of the order in the system:
'Day' - The order is withdrawn at the end of the day
'Good Till Cancel' - The order is good until it is cancelled
'Good Till Date' - The order is good until the date specified in the Expiry Date column
'Good Till Time' - The order is good until the time specified in the Expiry Time column
'Immediate' - The order will be withdrawn if it does not immediately match.

Session - The order will be withdrawn if it is not matched in the session in which it is entered

If a tick $\checkmark$ appears in this column, the order is a Trigger order
This is the price that triggers the order activation for stop orders
Specifies the direction of price movement for the trigger order to be activated (Up or Down)

Specifies the type of price movement for the trigger order to be activated, e.g. 'B' (Bid), 'O' (Offer) or ' L' (Last traded price)

In the case of a 'Good Till Date' order specifies the date at which the order will expire

In the case of a 'Good Till Time' order, specifies the time at which the order will expire

The User who placed the order
The User who last amended the order.

Open orders can be withdrawn by selecting the order and clicking Withdraw. Confirm the withdrawal by clicking the Ok button.

A selected open order can be amended by clicking Details. The Order Details view will be displayed.

Figure 36-Order Details example


To amend an order, alter the details and click Amend.
To amend the quantity, only Balance field could be modified.
Orders can also be withdrawn by clicking Withdraw.
Click on History to open the Order History view for the selected order.

### 4.2.4 Order History

The Order History view lists the order histories of all modifications and status changes applied to an order since it was created. To open the Order History view for the selected order, click on History in the My Orders table. Click Details to see the Order History Details view.

Figure 37-Order History view

| Order History |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| tIme | ORDERID | 1D\# | SIDE | status | SECURITY | board | PRICE | QUANTIT | balance | MATCHED QTY | matched value | Account | REFERENCE | TYPE | FILL TYPE | DU |
| 2020-06-16 11:40:54 | 202006160000000004 | 4 | Sell | Amended | FWB-A-2021 | PCCB-NC | 42.00 | 65 | 65 | 0 |  | TA_NC_PART1 |  | Limit | None | Da |
| 2020-06-16 11:57:47 | 202006160000000004 | 4 | Sell | Partially Filled | FWB-A-2021 | PCCB-NC | 42.00 | 65 | 50 | 15 | 6570000.00 | TA_NC_PART1 |  | Limit | None | Da |
| $<$ |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | > |

Figure 38 - Order History Details view

| Order History |  |  |  |  |  |  |  |  |  |  |  |  |  | Details $\pm$ \% $\times$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| тме | ORDERID | ID* SIDE | status | securit | board | PRICE | quantiv | EALANCE | matched ati | matched value | Account | Referenc | Orde | Details |
| 2020.06-16-11:40:54 | 202006160000000004 | 4 Sell | Amended | FWB-A-2021 | pCcbenc | 42.00 | 65 | 65 | 0 |  | T__NC_PART1 |  |  |  |
| 2020.06-16 11.57.47 | 202006160000000004 | 4 Sell | Partialy Filled | FWB-A-2021 | PCCB-NC | 42.00 | 65 | 50 | 15 | 657000000 | TA_NC_PART1 |  | Time | 2020-06-16 11:57:47 |
|  |  |  |  |  |  |  |  |  |  |  |  |  | Order | 202006180000000004 |
|  |  |  |  |  |  |  |  |  |  |  |  |  | 10\# | 4 |
|  |  |  |  |  |  |  |  |  |  |  |  |  | Side | Sell |
|  |  |  |  |  |  |  |  |  |  |  |  |  | Satus | Patially Filled |
|  |  |  |  |  |  |  |  |  |  |  |  |  | Security | FWB.A.2021 |
|  |  |  |  |  |  |  |  |  |  |  |  |  | Board | PCCB-NC |
|  |  |  |  |  |  |  |  |  |  |  |  |  | Price | 4200 |
|  |  |  |  |  |  |  |  |  |  |  |  |  | Quantiy | 65 |
|  |  |  |  |  |  |  |  |  |  |  |  |  | Balance | 50 , |
| $\leqslant$ |  |  |  |  |  |  |  |  |  |  |  |  |  |  |

### 4.2.5 My Trades

The My Trades view lists all the trader's trades performed in the Trading System for the day.
Figure 39-My Trades view example

| My Trades |  |  |  |  |  | Details |  | $\underline{y}$ 幏 $\equiv$ x |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TIME | TRADE NO | ORDERID | SECURITY | BOARD | ACCOUNT | REFERENCE | SIDE | PRICE | QUANTITY |
| 2020-06-16 11:57:47 | 202006160000000001 | 202006160000000003 | FWB-A-2021 | PCCB-NC | TA_NC_PART1 |  | Sell | 50.00 | 65 |
| 2020-06-16 11:57:47 | 202006160000000002 | 202006160000000004 | FWB-A-2021 | PCCB-NC | TA_NC_PART1 |  | Sell | 50.00 | 15 |

The following columns are available in the My Trades view:

TIME
TRADE NO
ORDER ID
SECURITY
BOARD
ACCOUNT
REFERENCE

SIDE
PRICE

QUANTITY
MATCHED VALUE Traded or matched value of the trade

STATUS

USER
The time this trade was generated
System generated number assigned to the trade
The order number
Unique code of security

The Trading Account
Free form reference text
The side of the order - Buy or Sell
Traded or matched price
Traded or matched quantity

The status of the trade, e.g. Matched
The Trader who owns the order

The unique code identifier for the Board that the security was traded on

Select a side of the trade, e.g. the Sell or Buy side, and click on Details to see the details of one side of the trade.

Figure 40 - Trade Details view - Buy side example

| Trade Details |  |
| :--- | :--- |
| Time | 2020-06-16 11:57:47 |
| - Trade No | 202006160000000001 |
| Order ID | 202006160000000003 |
| Security | FWB-A-2021 |
| Board | PCCB-NC |
| Account | TA_NC_PART1 |
| Reference |  |
| Side | Sell |
| Price | 50.00 |
| Quantity | 65 |
| Matched Value | 28470000.00 |
| Status | Matched |
| User | NC_PART1_U1 |

### 4.2.6 Trades \& Orders Reports

The Trades \& Orders Reports view is used to download details about orders and/or trades entered into the Nasdaq ME system during a specified date range. The data is saved to a CSV (Comma Separated Values) file in the default Download folder of the web browser with the filename format of <FIRM_ID>_orders_<date>-<time>.csv or <FIRM_ID>_trades_<date>-<time>.csv. The filename format for date ranges includes <from date>-<to date> instead of <date>.

Figure 41 - Trades \& Orders Reports view example

```
Trades & Orders Reports
From Date
To Date
Download %
FLLE NAME DATE
NC_PART1_orders_20200611-151501.cov 2020-06-11 15.1501
NC_PART1_trades_20200611-151501.csv 2020-00-11 15.15.01
NC_PART1_orders_20200611-172959.csv 2020-06-11 1729.59
NC_PART1_trades_20200611-172959.csv 2020.00-11 1729.59
```

To download orders to a .csv file, select the From Date and the To Date from the popup Calendar, click on the corresponding filename, e.g. FIRM01_orders_<date>-<time>.csv, and click the Download button. The .csv file is generated and is available to open in the Downloads section at the bottom of the Trades \& Orders Reports view.

To download trades to a .csv file, select the From Date and the To Date from the popup Calendar, click on the corresponding filename, e.g. FIRM01_trades_<date>-<time>.csv, and click the Download button.

The .csv file is generated and is available to open in the Downloads section at the bottom of the Trades \& Orders Reports view.
4.2.7 Results

The Results view records all attempted and successful transactions that are performed for the trader's current logged in session.

Figure 42 - Results view example


The following columns are available in the Results view:

TIME The date and time the event took place
TRANSACTION Describes the action that took place
SUCCESS The result of the transaction. If the transaction was successfully applied, a tick $\checkmark$ appears in this column.

ERROR MESSAGE If the transaction was not successful, an error message will be displayed in this column.

## 5 Mapping of Common Terms

Different terminology is used in Nasdaq Packaged CCP and Nasdaq Matching Engine. The following table lists the terms used in each platform.

Figure 43-Terminology mapping

| Nasdaq Packaged CCP (Nasdaq PCCP) | Nasdaq Matching Engine (Nasdaq ME) |
| :---: | :---: |
| Amount | Value |
| Asset Class | Asset Class (also known as Security Class, SecClass) |
| Company Name | Participant Name |
| Contracts | Quantity (Order Quantity, Trade Quantity) |
| Country | Domicile or Country |
| Currency | Currency, Face Currency |
| Deal | Trade (also known as Matched trade) |
| Instrument Definition | Instrument (also known as Instrument Code, Instr Code, Product) |
| Instrument Series | Security (also known as SecCode, SecBoard, Order Book) |
| Market | Board |
| Market Place | Board Group (also known as Exchange) |
| Price | Price (Order Price, Trade Price) |
| Stakeholder | Participant (also known as Firm, Market Participant, Broker) |
| Trade | Not applicable |
| Trading Account | Trading Account (sometimes called just 'Account') |
| Not applicable | Order |
| Not applicable | Operational Limits |
| Not applicable | Firm Position / Green Holdings |
| Not applicable | Session, Trading Session. |

