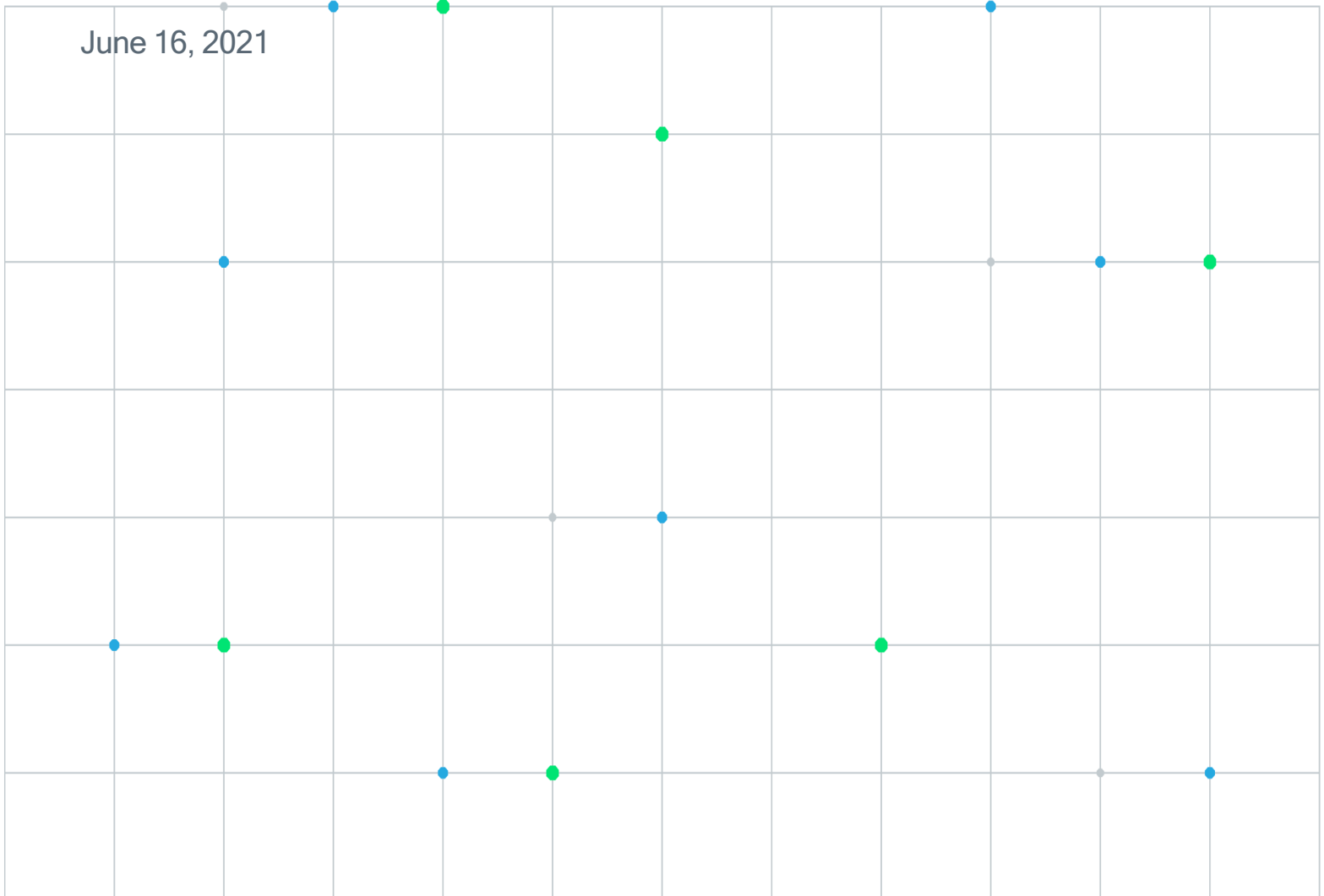


AutoCert+ EBS Spectrum Market Data (Conflated TCP) User Manual



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Getting Started

The AutoCert+ tool is an automated testing tool for validating application functionality. It provides an easy-to-use web interface for walking through CME Group certification scenarios.

To facilitate the process of connecting a customer application, CME Group provides a dedicated certification environment to allow customers to test their systems before they complete certification.

This Help system accompanies the AutoCert+ EBS Spectrum Market Data (Conflated TCP) test suite.

▶ **To run and navigate AutoCert+:**

1. [Log into](#) the automated certification tool.
2. Review general AutoCert+ test suite [navigation](#) and [general interview](#) information.
3. Navigate to the AutoCert+ EBS Spectrum Market Data (Conflated TCP) test suite.

The screenshot shows the 'Current Testing Configuration' form. It includes several dropdown menus for configuration: 'Company Name' (QA), 'Market' (EBS), 'Purpose' (Market Data Conflated TCP), 'Application System', and 'Test Suite' (EBS Spectrum Market Data). There is also a 'Sendercomp' dropdown and an 'ASSIGN' button. On the right side, there is a 'Test Suite Status' section with 'Pre-Certification Interview' marked as 'Complete' and 'Test Suite Status' marked as 'Not Tested'.

- a. Select a **Company Name**.
 - b. For **Market**, select EBS.
 - c. For **Purpose**, select Market Data Conflated TCP.
 - d. Select an **Application System**.
 - e. For **Test Suite**, select EBS Spectrum Market Data.
4. Select a **SenderComp** and select **ASSIGN**.
 5. Complete the [Interview](#) for this test suite.
 6. Complete applicable test cases.
 7. Complete the certification process from the [Post Certification](#) tab.

What's New

The list below illustrates the updates made to the AutoCert+ EBS Spectrum Market Data (Conflated TCP) Help system.

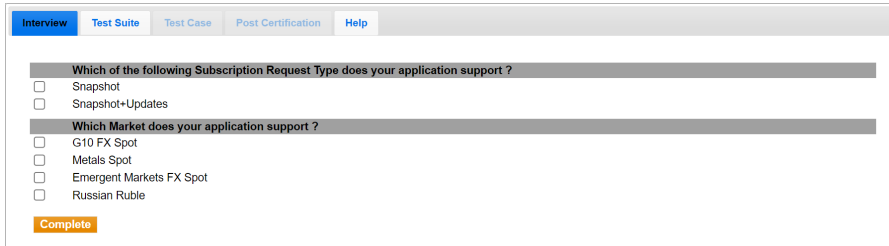
Date	Description
June 16, 2021	Initial release.

Interview

The interview consists of a series of questions about your trading application. Based on your responses, certain tests are required and others are optional. You must complete the pre-certification interview before running the test cases.

▶ **To complete the interview:**

Answer each question and select "Complete" when finished.



The screenshot shows a web interface for the interview. At the top, there is a navigation bar with tabs: "Interview" (selected), "Test Suite", "Test Case", "Post Certification", and "Help". Below the navigation bar, there are two questions, each with a grey header bar and a list of options with checkboxes:

- Which of the following Subscription Request Type does your application support ?**
 - Snapshot
 - Snapshot+Updates
- Which Market does your application support ?**
 - G10 FX Spot
 - Metals Spot
 - Emergent Markets FX Spot
 - Russian Ruble

At the bottom left of the form, there is an orange button labeled "Complete".

Volume Weighted Average Price (VWAP) and Time Weighted Average Price (TWAP)

The purpose of this test is to verify that the client system can receive and process Volume Weighted Average Price (VWAP) and Time Weighted Average Price (TWAP) market data.

Note: See the [EBS Spectrum Message Specification](#) for more information.

1. Select a **SenderComp** in the drop-down.
2. Select **Assign**.
3. From the **Contract** drop-down, choose the desired contract and click **Select**.

Interview Test Suite **Test Case** Post Certification Help

Steps of the test: Volume Weighted Average Price (VWAP) and Time Weighted Average Price (TWAP)

This test could take up to several minutes. Please do not close the window during the test. Closing window/stopping test requires to rerun the test from step1.

Purpose
The purpose of this test is to verify that the client system can receive and process Volume Weighted Average Price (VWAP) and Time Weighted Average Price (TWAP)

Selected Contract: GCUS1#_XAU/USD - 760 Unlock

Category	IP	Port
CME MDP Conflated TCP - Spectrum	10.210.245.177	9557

Category	Link
Templates File:	templates_FixBinary.xml
TCP Session Management SBE Schema:	templates_MdpSessionMgmt.xml

Note: Press the Start Test button to start or restart a Test. Please do not press the Start Test button again if you are currently running this test. START TEST

Description	Flag	Status
1 AutoCert to generate Volume Weighted Average Price (VWAP) and Time Weighted Average Price (TWAP). Please do not establish TCP MDP connectivity yet.	●	Not Tested
2 Establish a TCP MDP connection and then submit a Market Data Request message	●	Not Tested
3 Confirm Time Volume Weighted Average Price (VWAP) and Time Weighted Average Price (TWAP). Date/Time format should be entered as: YYYYMMDD hhmmss	●	Not Tested
4 Receive and process Volume Weighted Average Price (VWAP) and Time Weighted Average Price (TWAP). Date/Time format should be entered as: YYYYMMDD hhmmss	●	Not Tested

Key: ● not tested ● complete ● pending ● failed

REFRESH

Note: Step 4 is only required for systems receiving Snapshot+Updates.

▶ **To run a Volume Weighted Average Price (VWAP) and Time Weighted Average Price (TWAP) test:**

1. AutoCert+ generates a Volume Weighted Average Price (VWAP) and Time Weighted Average Price (TWAP).

Note: Please do not establish TCP MDP connectivity yet.

2. Establish a TCP MDP connection and then submit a Market Data Request (tag 35-MessageType=V) message.
3. Enter the following tag values to confirm that your application received and processed the Volume Weighted Average Price (VWAP) and Time Weighted Average Price (TWAP) market data. The Date/Time format should be entered as: YYYYMMdd hhmmss.
 - 270-VWAP MDEntryPx
 - 271-VWAP MDEntrySize
 - 273-VWAP MDEntryTime

- 270-VWAP MDEntryPx
- 271-VWAP MDEntrySize
- 273-VWAP MDEntryTime



Note: The following step is only required for systems receiving Snapshot+Updates.

4. Enter the following tag values to confirm that your application received and processed the Volume Weighted Average Price (VWAP) and Time Weighted Average Price (TWAP) market data. The Date/Time format should be entered as: YYYYMMdd hhmss.

- 270-VWAP MDEntryPx
- 271-VWAP MDEntrySize
- 273-VWAP MDEntryTime
- 270-VWAP MDEntryPx
- 271-VWAP MDEntrySize
- 273-VWAP MDEntryTime