### **S&P Capital IQ Real-Time Solutions**

# **QuantFEED® Developer's Notice**

## **BATS BXTR – Quotation Context Tags Update**

Reference n°: 21154 - 21155 - 20140616

Effective as of: 23 June 2014\*

Action required from users: Attention Required



This is the proposed day for the update of the standard version of the feed handler. For dedicated feed handlers, this date may differ. For the actual day when the changes to your custom feed handler take effect, please contact your QuantFEED\* project manager.

S&P Capital IQ Real-Time Solutions (QuantHouse\*) – QuantFEED\* QuantFEED\* Developer's Notice Reference 21154 – 21155 – 20140616 June 18, 2014

### **Corporate Headquarters**

S&P Capital IQ Real-Time Solutions (QuantHouse\*)
52 Rue de la Victoire
75009 Paris
France
Tel: +33 (0) 1 73 02 32 11

Tel: +33 (0) 1 73 02 32 11 Fax: +33 (0) 1 73 02 32 12

### **US Offices**

55 Water Street, 44th floor New York, NY 10041 United States of America Tel: +1-(212)-438-4346

**UK Office** 

20 Canada Square Canary Wharf London E14 5LH United Kingdom

Tel: +44 (0) 203 107 1676

-1

130 East Randolph One Prudential Plaza, Suite 2900 Chicago, IL 60601 United States of America Tel: +1-(312)-233-7129

**Singapore Office** 

12 Marina Boulevard #23-01 Marina Bay Financial Centre Tower 3 Singapore 018982 Tel: +65 6530 6546

www.quanthouse.com

### Disclaimer for Technical Documents

QuantHouse\* S.A.S. endeavors to include accurate and current information in its materials. However, QuantHouse\* does not warrant the accuracy or completeness of the information contained herein. QuantHouse\* may change such information at any time, but makes no commitment to update it.

References by QuantHouse\* to products offered by third-parties do not constitute an endorsement by QuantHouse\* of such products and should not be construed as an association with their owners.

YOUR USE OF THE INFORMATION HEREIN IS AT YOUR OWN RISK. SUCH INFORMATION IS PROVIDED ON AN "AS IS" BASIS. QUANTHOUSE" S.A.S. MAKES NO REPRESENTATION, UNDERTAKES NO OBLIGATION, AND PROVIDES NO WARRANTY OF ANY KIND WITH RESPECT TO THE INFORMATION CONTAINED HEREIN, WHETHER EXPRESS OR IMPLIED, INCLUDING WITHOUT LIMITATION WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE, AND NON-INFRINGEMENT. IF YOU CHOOSE TO USE SUCH INFORMATION, YOU ARE ACKNOWLEDGING THAT YOU HAVE READ THIS DISCLAIMER, UNDERSTAND IT, AGREE TO ABIDE BY, AND BE BOUND BY, ITS PROVISIONS.

### Use of the Information

The information constitutes proprietary material and is either owned by or licensed to QuantHouse\*. Further, it is protected by intellectual property rights. No information may be used, reproduced, stored in or introduced into a retrieval system, or transmitted in any form or by any means (electronic, mechanical, photocopying, recording, or otherwise) or for any purpose, except as licensed expressly by QuantHouse\* S.A.S.

#### Trademarks

QUANTHOUSE\*, the QuantHouse\* logo and product names are trademarks of QuantHouse\* S.A.S. and QuantHouse\* S.A.S. reserves all intellectual property rights with respect to the trademarks. All other trademarks are the trademarks of their respective owners.

### Copyright

© Copyright 2004-2014 QuantHouse\* S.A.S. All rights reserved.



To reflect the changes caused by the dissemination of new values on the BATS BXTR market data stream, S&P Capital IQ Real-Time Solutions has decided to enhance the content of QuantFEED\*.

This developer's notice contains late-breaking information about the implementation of this modification in your applications, which may not be included otherwise in the published documentation. The topics this notice covers include:

- 1. Update Summary
- 2. QuantFEED\* Technical Implementation
- 3. Finding the Latest Information.

## 1. Update Summary

Table 1 Current update summary

Notice Reference	21154 – 21155 – 20140616		
Exchanges	BATS BXTR		
Concerned MICs	BOTC		
Internal Source ID	40		
Effective Date	2014-06-23 <sup>*</sup>		
Impact	Update of the Quotation Context Tags		
Action required	Attention Required		

## 2. QuantFEED® Technical Implementation

Effective Monday, **June 23**\*, **2014**, S&P Capital IQ Real-Time Solutions enhances the content of the quotation context data to accommodate the new information disseminated on the BATS BXTR market data stream, as described below:

• 2.1. Changes to the Quotation Context Data.

<sup>\*</sup> This is the proposed day for the update of the standard version of the feed handler. For dedicated feed handlers, this date may differ. For the actual day when the changes to your custom feed handler take effect, please contact your QuantFEED\* project manager.

## 2.1. Changes to the Quotation Context Data

S&P Capital IQ Real-Time Solutions **introduces** the quotation context tags below to accommodate the information disseminated on the BATS BXTR market data stream:

Table 2 Quotation context tags added on the BATS BXTR market data stream

Tag Name	Numeric ID	Туре
OriginFOSMarketIdOf_LastPrice	9350	UInt16
OriginOf_LastPrice	9351	String
MMTFlagsV2	9901	String
MARKET_BATS_TradeReportFlags	16151	UInt16

### 2.1.1. OriginFOSMarketIdOf\_LastPrice

The values of the quotation tag **OriginFOSMarketIdOf\_LastPrice** conveyed on the BATS BXTR market data stream are disseminated via QuantFEED\* data stream in *Context* to identify the market from which the last price originates, if this market is recorded in the normalized inventory of S&P Capital IQ Real-Time Solutions:

- in the callback carrying the Level1 event notif\_TradeEventExt(), for C++
- in the event handler TradeEventExtEventHandler, for C#
- in the callback carrying the Levell event quotNotifTradeEventExt, for Java.

QuantFEED\* implementation of the tag OriginFOSMarketIdOf\_LastPrice is described in the table below:

Table 3 OriginFOSMarketIdOf LastPrice – technical implementation in QuantFEED®

Component	Value	Description	
Tag Name	OriginFOSMarketIdOf_LastPrice	QuantFEED® tag name.	
Numeric ID	9350	QuantFEED® unique ID disseminated on S&P Capital IQ Real-Time Solutions data stream. This is the numeric equivalent of the tag name.	
Туре	UInt16	UInt16 data type.	
Format / Possible Values	[Exchange Specific Value]	An exchange specific value, identifying the market from which the last price originates, if this market is recorded in the normalized inventory of S&P Capital IQ Real-Time Solutions.  NOTE: This tag disseminates values only when the tag OriginOf_LastPrice is not conveyed on the BATS BXTR market data stream.	

## 2.1.2. OriginOf\_LastPrice

The values of the quotation tag **OriginOf\_LastPrice** conveyed on the BATS BXTR market data stream are disseminated via QuantFEED\* data stream in *Context* to identify the market from which the last price originates, if this market is not recorded in the normalized inventory of S&P Capital IQ Real-Time Solutions:

- in the callback carrying the Level1 event notif\_TradeEventExt(), for C++
- in the event handler TradeEventExtEventHandler, for C#
- in the callback carrying the Levell event quotNotifTradeEventExt, for Java.

QuantFEED\* implementation of the tag OriginOf\_LastPrice is described in the table below:

Table 4 OriginOf\_LastPrice – technical implementation in QuantFEED®

Component	Value	Description	
Tag Name	OriginOf_LastPrice	QuantFEED® tag name.	
Numeric ID	9351	QuantFEED® unique ID disseminated on S&P Capital IQ Real-Time Solutions data stream. This is the numeric equivalent of the tag name.	
Туре	String	String data type.	
Format / Possible Values	[Exchange Specific Value]	An exchange specific value, identifying the market from which the last price originates, if this market is not recorded in the normalized inventory of S&P Capital IQ Real-Time Solutions.  NOTE: This tag disseminates values only when the tag OriginFOSMarketIdOf_LastPrice is not conveyed on the BATS BXTR market data stream.	

## 2.1.3. MMTFlagsV2

The values of the quotation tag **MMTFlagsV2** conveyed on the BATS BXTR market data stream are disseminated via QuantFEED\* data stream in *Context* to detail the Market Model Typology (version 2) applicable to the trade:

- in the callback carrying the Level1 event notif\_TradeEventExt(), for C++
- in the event handler TradeEventExtEventHandler, for C#
- in the callback carrying the Levell event quotNotifTradeEventExt, for Java.

QuantFEED\* implementation of the tag MMTF1agsv2 is described in the table below:

Table 5 MMTFlagsV2 – technical implementation in QuantFEED®

Component	Value	Description		
Tag Name	MMTFlagsV2	QuantFEED® tag name.		
Numeric ID	9901	QuantFEED® unique ID disseminated on S&P Capital IQ Real-Time Solutions data stream. This is the numeric equivalent of the tag name.		
Туре	String	String data type.		
Format	[Exchange Specific Value]	An <b>exchange specific value</b> , detailing the Market Model Typology (version 2) applicable to the trade.		
	MMT Level 1 - MARKET MECHANI	MMT Level 1 - MARKET MECHANISM		
	1	Central Limit Order Book		
	2	Quote Driven Market		
	3	Dark Order Book		
	4	Off Book		
Possible Values	MMT Level 2 - TRADING MODE			
	2	Continuous Trading		
	3	At Market Close Trading		
	4	Out of Main Session Trading		
	5	Trade Reporting (On Exchange)		
	6	Trade Reporting (Off Exchange)		

Table 5 MMTFlagsV2 – technical implementation in QuantFEED® (Continued)

Component	Value	Description		
	7	Trade Reporting (Systematic Internaliser)		
	0	Scheduled Opening Auction		
	К	Scheduled Closing Auction		
	I	Scheduled Intraday Auction		
	U	Unscheduled Auction		
	MMT Level 3 - TRANSACTION TYPE			
	TRANSACTION CATEGORY			
	Р	Plain-Vanilla Trade		
	D	Dark Trade		
	Т	Technical Trade		
	G	Give-up/Give-In Trade		
	F	Trade with Conditions		
	NEGOTIATED TRANSACTION INDI	CATOR		
	N	Negotiated Trade		
	-	No Negotiated Trade		
Possible Values	CROSSING TRADE INDICATOR			
	x	Crossing Trade		
	-	No Crossing Trade		
	MODIFICATION INDICATOR			
	С	Trade Cancellation		
	А	Trade Amendment		
	-	New Trade		
	BENCHMARK INDICATOR			
	В	Benchmark Trade		
	-	No Benchmark Trade		
	EX/CUM DIVIDEND INDICATOR			
	E	Ex/cum dividend Trade		
	-	No Ex/Cum Dividend Trade		
	MMT Level 4 - PUBLICATION MODE			
	-	Immediate Publication		
	1	Non Immediate Publication		

## 2.1.4. MARKET\_BATS\_TradeReportFlags

The values of the quotation tag MARKET\_BATS\_TradeReportFlags conveyed on the BATS BXTR market data stream are disseminated via QuantFEED\* data stream in *Context* to identify the trade timing indicator and BATS Transaction Sub-Category:

- in the callback carrying the Level1 event notif\_TradeEventExt(), for C++
- in the event handler TradeEventExtEventHandler, for C#
- in the callback carrying the Levell event quotNotifTradeEventExt, for Java.

QuantFEED\* implementation of the tag MARKET\_BATS\_TradeReportFlags is described in the table below:

Table 6 MARKET\_BATS\_TradeReportFlags - technical implementation in QuantFEED®

Component	Value	Description		
Tag Name	MARKET_BATS_TradeReportFlags	QuantFEED® tag name.		
Numeric ID	16151	QuantFEED® unique ID disseminated on S&P Capital IQ Real-Time Solutions data stream. This is the numeric equivalent of the tag name.		
Туре	UInt16	UInt16 data type.		
Format	[Exchange Specific Value]	BATS Trade Timing Indicator	BATS Transaction Sub- Category	An exchange specific value, indicating the trade timing indicator and BATS Transaction Sub-Category.
Possible Values	20529	1	Р	Traded reported as "late", preliminary NAV trade
	20017	1	N	Traded reported as "late", NAV trade
	11569	1	-	Traded reported as "late", otherwise
	20530	2	Р	Traded reported as "out of the Main Session", preliminary NAV trade
	20018	2	N	Traded reported as "out of the Main Session", NAV trade
	11570	2	-	Traded reported as "out of the Main Session", otherwise
	20525	-	Р	Otherwise, preliminary NAV trade
	20013	-	N	Otherwise, NAV trade
	11565	-	-	Otherwise, otherwise

Below is an example of the current implementation of the newly added (in green) quotation context tags:

```
2014-07-18 09:16:37:773.094 /ServerUTCTime: 2014-07-18 09:16:37:774
EV 199/751766
content: LastPrice LastTradeQty Context
      LastTradeQty = 2000
       LastPrice = 506.3
CONTEXT:
TradeID:
             19845724605193
       OriginOf_LastPrice: BLOX
       MMTFlagsv2: 32D-----
       MARKET_BATS_TradeReportFlags: uint16{11565}
***
EV 199/753082 2014-07-18 11:50:41:917.156 /ServerUTCTime: 2014-07-18 11:50:41:918
content: LastPrice LastTradeQty Context
      LastTradeQty = 3029
       LastPrice = 1875
CONTEXT:
TradeID:
              19845724649659
       OriginFOSMarketIdOf_LastPrice: LIQU
       MMTFlagsv2: 32D-----
       MARKET_BATS_TradeReportFlags: uint16{11565}
```

# 3. Finding the Latest Information

For the latest documentation and product updates, additional support and training, please contact our support services:

- E-mail: rts-support@spcapitaliq.com
- Web: http://support.quanthouse.com.