



**BORSA
İSTANBUL**

BISTECH FIX PROTOCOL

PHASE 2 – PHASE 2+ DIFFERENCES

2017, Version 1.0

INTRODUCTION

Borsa İstanbul is renovating its legacy systems and technology infrastructure within the scope of Nasdaq Strategic Partnership agreement signed in 20/01/2014. In the first phase of the project, Equity Market systems were successfully migrated to BISTECH Trading Platform on November 30, 2015. In the second phase of the project, Derivatives Market (VIOP) systems were successfully migrated to BISTECH in March 2017. The migration of Debt Securities Market and Precious Metals and Diamond Markets (Phase 2+) are planned to be completed in 2018.

Phase 2+ BISTECH Migration is requiring some updates on BISTECH FIX protocol. This document aims to show the differences between phase 2 and phase 2+ versions of BISTECH FIX protocol. It lists the additional fields to phase 2 BISTECH FIX protocol.

The fields related to phase 2+ will be implemented in phase 2, but they will become active with the launch of phase 2+.

Within the scope of the launch of phase 2+, a new BISTECH FIX protocol differences document will be shared for further additions and changes.

The companies who will not prefer to be certified for Phase 2+ will be fully responsible for testing the differences specified below in their own systems and make necessary changes on their software.

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SECTION 1: BISTECH FIX

REFERENCE DATA PHASE 2 – PHASE 2+

DIFFERENCES

Server Messages

| Server Messages | New Field / Value | Description |
|---------------------|--|---|
| Security Definition | New Field: Tag 38 OrderQty | New tag for Fixed-Income Market. Nominal value for Fixed-Income Instruments. |
| | New Field: Tag 159 AccruedInterestAmt | New tag for Fixed-Income Market. Accrued value for Fixed-Income Instruments. |
| | New Field: Tag 1948 CouponFrequencyPeriod | New tag for Fixed-Income Market. Coupon frequency period for Fixed-Income Instruments coupon payment. |
| | New Field: Tag 1949 CouponFrequencyUnit | New tag for Fixed-Income Market. Time unit of Coupon frequency period for Fixed-Income Instruments coupon payment. |
| | New Field: Tag 1950 CouponDayCount | New tag for Fixed-Income Market. The day count convention used in interest calculations for fixed income instruments. |
| | New Field: Tag 21055 OddFirstCoupon | New tag for Fixed-Income Market. Y if odd-first coupon is used, otherwise N. |
| | New Field: Tag 21056 OddLastCoupon | New tag for Fixed-Income Market. Y if odd-last coupon is used, otherwise N |
| | New Field: Tag 21057 PremiumUnit | New tag for Fixed-Income Market. Order entry price unit(clean price, dirty price, yield, rate) |
| | New Field: Tag 21058 FixedIncomeType | New tag for Fixed-Income Market. Type of fixed-income underlying. Valid values: 12 – Type 1 Discounted securities 13 – Type 2 Fixed rate bonds 14 – Type 3A Variable rate bonds next coupon is known 15 – Type 4 Index linked strips 16 – Type 5 Index linked bonds 17 – Type 6 Euro bonds USD 18 – Type 7 Euro bonds EUR 19 – Type 8A Irregular Clean price 20 – Type 3B Variable rate bonds next coupon is unknown 21 – Type 8B Irregular Dirty price |

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|---------------------|--|---|
| | New Field: Tag 21059 CouponInterest | New tag for Fixed-Income Market. The coupon interest for the underlying. (Only applicable for interest-related fixed-income instruments.) |
| | New Field: Tag 996 UnitOfMeasure | New tag for Precious Metal Market. Metal weight unit. The certified weight of the precious metal. Valid values: KG – kilogram GR – gram OZ – Troy ounce |
| | New Field: Tag 1147 UnitOfMeasureQty | New tag for Precious Metal Market. The certified weight of the precious metal |
| | New Component : Tag 2304 NoAssetAttributes : Component fields : -Tag 2305 AssetAttributeType -Tag 2306 AssetAttributeValue -Tag 2307 AssetAttributeLimit | New component for Precious Metal Market. Asset attributes of metal is defined. Component details are in FIX Reference Data specification document. |
| | New Field: Tag 1940 AssetType | New tag for Precious Metal Market. |
| | New Field: Tag 1938 AssetClass | New tag for Precious Metal Market. |
| | New Field: Tag 1939 AssetSubClass | New tag for Precious Metal Market. |
| | New Field: Tag 21060 Fineness | New tag for Precious Metal Market. The purity of the metal, accurate to 4 decimal places. |
| | New Field: Tag 21061 FinenessNotation | New tag for Precious Metal Market. The market convention for notation of the metal purity. |
| | New Field: Tag 21062 MetalWeightConversionFactor | New tag for Precious Metal Market. The conversion factor is used to normalize the order and trade price. |
| Security Definition | New Field: Tag 38 OrderQty | New tag for Fixed-Income Market. Nominal value for Fixed-Income Instruments. |

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| Update Report | New Field: Tag 159 AccruedInterestAmt | New tag for Fixed-Income Market. Accrued value for Fixed-Income Instruments. |
| | New Field: Tag 1948 CouponFrequencyPeriod | New tag for Fixed-Income Market. Coupon frequency period for Fixed-Income Instruments coupon payment. |
| | New Field: Tag 1949 CouponFrequencyUnit | New tag for Fixed-Income Market. Time unit of Coupon frequency period for Fixed-Income Instruments coupon payment. |
| | New Field: Tag 1950 CouponDayCount | New tag for Fixed-Income Market. The day count convention used in interest calculations for fixed income instruments. |
| | New Field: Tag 21055 OddFirstCoupon | New tag for Fixed-Income Market. Y if odd-first coupon is used, otherwise N. |
| | New Field: Tag 21056 OddLastCoupon | New tag for Fixed-Income Market. Y if odd-last coupon is used, otherwise N |
| | New Field: Tag 21057 PremiumUnit | New tag for Fixed-Income Market. Order entry price unit(clean price, dirty price, yield, rate) |
| | New Field: Tag 21058 FixedIncomeType | New tag for Fixed-Income Market. Type of fixed-income underlying. Valid values: 12 – Type 1 Discounted securities 13 – Type 2 Fixed rate bonds 14 – Type 3A Variable rate bonds next coupon is known 15 – Type 4 Index linked strips 16 – Type 5 Index linked bonds 17 – Type 6 Euro bonds USD 18 – Type 7 Euro bonds EUR 19 – Type 8A Irregular Clean price 20 – Type 3B Variable rate bonds next coupon is unknown 21 – Type 8B Irregular Dirty price |

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| New Field: Tag 21059 CouponInterest | New tag for Fixed-Income Market. The coupon interest for the underlying. (Only applicable for interest-related fixed-income instruments.) |
| New Field: Tag 996 UnitOfMeasure | New tag for Precious Metal Market. Metal weight unit. The certified weight of the precious metal. Valid values: KG – kilogram GR – gram OZ – Troy ounce |
| New Field: Tag 1147 UnitOfMeasureQty | New tag for Precious Metal Market. The certified weight of the precious metal |
| New Component : Tag 2304 NoAssetAttributes : Component fields : -Tag 2305 AssetAttributeType -Tag 2306 AssetAttributeValue -Tag 2307 AssetAttributeLimit | New component for Precious Metal Market. Asset attributes of metal is defined. Component details are in FIX Reference Data specification document. |
| New Field: Tag 1940 AssetType | New tag for Precious Metal Market. |
| New Field: Tag 1938 AssetClass | New tag for Precious Metal Market. |
| New Field: Tag 1939 AssetSubClass | New tag for Precious Metal Market. |
| New Field: Tag 21060 Fineness | New tag for Precious Metal Market. The purity of the metal, accurate to 4 decimal places. |
| New Field: Tag 21061 FinenessNotation | New tag for Precious Metal Market. The market convention for notation of the metal purity. |
| New Field: Tag 21062 MetalWeightConversionFactor | New tag for Precious Metal Market. The conversion factor is used to normalize the order and trade price. |

SECTION 2: BISTECH FIX ORDER ENTRY PHASE 2 – PHASE 2+ DIFFERENCES

Server Messages

| Server Messages | New Field / Value | Description |
|----------------------|--|--|
| Trade Capture Report | New Field: Tag 730 SettlementPrice | New tag for Fixed-Income Market. Calculated price for settlement. |
| | New Component: Tag 1703 NoCollateralAmounts Component field: - Tag 1704 CurrentCollateralAmount | New tag for Fixed-Income Market. NoCollateralAmounts : Number of collateral amount entries. CurrentCollateralAmount : Currency denomination of value |
| | New Field: Tag 20007 CorrespondingPrice | New tag for Fixed-Income Market. NASDAQ Extension: Corresponding Price/Yield for fixed income related trades. |
| | New Field: Tag 20008 SettlementValue | New tag for Fixed-Income Market. NASDAQ Extension: Consideration/Settlement Amount for fixed income related trades. |
| | New Field: Tag 20017 WithHoldingTax | New tag for Fixed-Income Market. If repo trade is subject to withholding tax value of tax amount. |
| | New Field: Tag 20018 RepoInterestAmt | New tag for Fixed-Income Market. Repo Trades interest amount. |