SECURITIES AND EXCHANGE COMMISSION
(Release No. 34-72834; File No. SR-CME-2014-28)

August 13, 2014

Self-Regulatory Organizations; Chicago Mercantile Exchange Inc.; Notice of Filing of Proposed
Rule Change Related to Enhancements to its Risk Model for Credit Default Swaps

Pursuant to Section 19(b)(1) of the Securities Exchange Act of 1934 ("Exchange Act" or

"Act"),[1] and Rule 19b-4 thereunder,[2] notice is hereby given that on August 8, 2014, Chicago

Mercantile Exchange Inc. ("CME") filed with the Securities and Exchange Commission

("Commission") the proposed rule change described in Items I, II and III below, which Items

have been prepared primarily by CME. The Commission is publishing this notice to solicit

comments on the proposed rule change for interested persons.

I.   Self-Regulatory Organization's Statement of the Terms of Substance of the Proposed
        Rule Change

The proposed change relating to the Risk Model for Credit Default Swaps ("CDS") (the

"CDS Risk Model") (such enhanced model, the "Proposed CDS Risk Model") will apply only to

broad-based index CDS products cleared by CME and will not apply to security-based swaps.

CME will file separate proposed rule changes with the Commission in the future to implement

any CDS risk model applicable to the clearing of security-based swaps.

CME is proposing to change its current CDS Margin Model as follows (such new model,

the "Proposed CDS Margin Model"):

- Replacing the current multiple market risk factors with a single market risk
  component calculated by reference to scenarios obtained within a statistical

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[1]   15 U.S.C. 78s(b)(1).

[2]   17 CFR 240.19b-4.

framework that addresses relevant market risk factors affecting a given CDS portfolio;

- Enhancing the Idiosyncratic Risk Component with a more systematic approach that avoids double counting of risk with other elements of the Proposed CDS Margin Model;

- Enhancing the Liquidity/Concentration Risk Component to incorporate reference entity or index series and maturity-specific liquidity features and to address liquidation risk for highly concentrated positions with a progressively increasing margin requirement;

- Adding a risk component for interest rate/discount curve risk; and

- Addressing foreign exchange ("F/X") related risk that may result from CDS portfolios that include CDS positions denominated in multiple currencies.

CME is additionally proposing to add a new CDS Guaranty Fund charge to CDS Clearing Members that clear CDS Products that reference themselves or their affiliates and delete the current threshold based approach.

Further, CME proposes to amend its CDS Stress Test Methodology to align with the Proposed CDS Margin Model framework. The CDS Guaranty Fund will continue to be sized so that CME's financial resources are sufficient to meet its financial obligations to its CDS Clearing Members notwithstanding a default by the two CDS Clearing Members creating the largest loss in extreme but plausible market conditions based upon the results of the new CDS Stress Test Methodology. In addition, CME proposes to add a new risk component to its CDS Stress Test Methodology to capture self-referencing risk arising from contracts that include component transactions for which the reference entity is a clearing member or one of its affiliates. In

addition, CME proposes to add a new stress exposure calculation to size the self-referencing risk discussed above.

The text of the proposed change is also available at the CME's website at

http://www.cmegroup.com, at the principal office of CME, and at the Commission's Public

Reference Room.

II.   Self-Regulatory Organization's Statement of the Purpose of, and Statutory Basis for, the Proposed Rule Change

In its filing with the Commission, CME included statements concerning the purpose and

basis for the proposed rule change and discussed any comments it received on the proposed rule

change. The text of these statements may be examined at the places specified in Item IV below.

CME has prepared summaries, set forth in sections A, B, and C below, of the most significant

aspects of such statements.

        A.   Self-Regulatory Organization's Statement of the Purpose of, and Statutory Basis for, the Proposed Rule Change

                a.   Purpose

        1.   Description of the Proposed Changes to the CDS Margin Model

CME is proposing to make changes to the existing CDS Margin Model by changing the

current Market Risk Factor, the Idiosyncratic Risk Factor and the Liquidity/Concentration Risk

Factor as well as adding a new Interest Rate Sensitivity Component, and a methodology for

addressing new F/X related risks for CDS portfolios denominated in multiple currencies. The

Proposed CDS Margin Model aims to holistically model the risk of a CDS portfolio comprised

of a variety of index and single-name CDS products using statistically derived scenarios.

1.1   Proposed Changes for Market Risk Component

To reflect the variations in market value of a CDS portfolio, which may be comprised of positions in different index and single-name CDS products with different maturities, CME is proposing to use a scenario-based approach which relies on a statistical model, for the Market Risk Component. The statistical model is designed to generate scenarios that aim to reproduce the salient characteristics of marginal and joint movement of credit spreads across different index series or reference entity and maturity combinations.

The scenarios used for the modeling of the Market Risk Component are based on the log changes in:

- Par-spreads for "run-rank" (on-the-run ("OTR"), OTR-1, OTR-2,…) index CDS at standard maturities (1, 3, 5, 7 and 10 years); and

- Par-spreads for single-name CDS at standard maturities (1, 3, 5, 7 and 10 years).

A joint probability distribution for the 5-day log changes in par spreads is estimated using historical data on daily log changes in par spreads, which are the driving risk factors of the Proposed CDS Margin Model. The distributional characteristics of these risk factors are represented through time-varying autocorrelations, volatilities and tail risk parameters.

The volatility of each risk factor is an exponentially weighted moving average floored at an equal-weighted long-run average. The dependence across risk factors is modeled by historical and stressed correlation matrices combined with a copula function to model tail-risk dependence. The new statistical model allows CME to generate extreme but plausible spread scenarios across different index series and/or reference entities and maturities. Both the volatility floor and stressed correlation matrices add counter-cyclical features to the Market Risk Component.

CME will employ a Monte Carlo simulation approach to generate spread scenarios for computing the Market Risk Component as further described below. The proposed Market Risk Component ("MR") is represented by the following formula:

$$MR = BMR + DR$$

where

- the Base Market Risk Component ("BMR") is determined as the Value-at-Risk ("VaR") at a 99% confidence level for the CDS portfolio's theoretical changes in value over 5 days. This corresponds to the 1% greatest negative change in the CDS portfolio value based on spread scenarios generated by Monte Carlo simulation by reference to historical correlation matrix estimate; and

- the Dependence Risk Component ("DR") is determined by computing the VaR at a 99% confidence level under stressed correlation scenarios for the CDS portfolio's theoretical changes in value over 5 days. A low and high correlation VaR is estimated through the 1% greatest negative change in the CDS portfolio value based on spread scenarios generated by Monte Carlo simulation by reference to stressed low and high correlation matrices, respectively. DR is computed as the excess of the greater of the low and high correlation VaR over BMR, multiplied by a risk-aversion coefficient.[3]

The proposed Market Risk Component aims to more accurately capture different sources of market risk through a holistic and theoretically coherent scenario-based approach that is driven by conservative statistical assumptions. CME notes that the current CDS Margin Model

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[3]   The risk-aversion coefficient was determined by back testing a collection of theoretical and production portfolios.

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relies on separate add-on factors which are modeled and calibrated in isolation and gives rise to the potential for double counting. Varying degrees of volatility and tail risks across par spreads of different index series or reference entities at different maturities are not represented in the current CDS Margin Model. Historical correlations, tail dependence and correlation risk are not explicitly and consistently accounted for within the current CDS Margin Model. In contrast, spread volatility and tail risks are modeled precisely and consistently in the Proposed CDS Margin Model. The effects of historical correlations, tail dependence and correlation risk on the co-movement of spreads of CDS products are explicitly addressed in the Proposed CDS Margin Model.

The risk factors of the current CDS Margin Model such as curve, sector and convergence/divergence are replaced by a scenario-based approach which incorporates historical correlation matrices into the market risk computation. The Market Risk Component also aims to capture correlation risk that might arise from relying exclusively on historically-estimated correlations which can change under extreme market conditions. The correlation risk is addressed by employing two extreme correlation scenarios (high correlations and low correlations) to compute DR which addresses the risk of long-short or diversified portfolios driven by correlation uncertainty.

Additionally, the proposed Market Risk Component incorporates counter-cyclical features for calibration and modeling of volatilities, autocorrelations and correlations.

In comparison to the existing model, the proposed change to the manner in which the market risk is assessed may, in isolation, result in a reduction in the margin requirement for market risk. CME believes that this margin reduction does not come at the expense of adding more risk to the CME Clearing House since the statistical model and its different components

were shown to appropriately cover the risk of a wide range of theoretical and production portfolios under extreme but plausible market conditions and in historical back testing, going back to 2008.

1.2 Proposed Idiosyncratic Risk Component

The Idiosyncratic Risk Component is intended to address CME's potential exposure to possible "jump-to-default" ("JTD") risk due to default of a reference entity as well as "jump to health" ("JTH") risk where a reference entity benefits from an extreme drop in credit spreads (due to an improvement in credit quality) (in each case, beyond what is covered by the Market Risk Component). JTD risk of a reference entity is driven by the exposure to a scenario which reduces the price of the reference entity to a stressed recovery rate. JTH risk of a reference entity is driven by the exposure to a scenario which is a drastic improvement in credit quality of the entity. In addition to the price differential under current market and idiosyncratic scenarios, both JTD and JTH margin requirements take into account the risk concentration to a reference entity through dependence on position size. Within the Proposed CDS Margin Model, only the marginal risk contribution of idiosyncratic events will be reflected in the risk component. This is accomplished by coherent modeling of the associated market and idiosyncratic risks. Both JTD and JTH margin requirements are estimated by the difference between the pure market risk of the portfolio and the sum of the idiosyncratic risk and the market risk of the portfolio, excluding positions in the reference entity which drives the Idiosyncratic Risk Component.

1.3 New Interest Rate Sensitivity Component

CME is proposing to introduce a new Interest Rate Sensitivity Component to capture the effect of changes in interest rates (relevant to the underlying discount curve) on the market value

of CDS portfolios. The calculation of the Interest Rate Sensitivity Component relies on applying parallel up and down shocks to the discount curve relevant to the index series or reference entity.

1.4 Proposed Change to the Liquidity/Concentration Risk Component

The Liquidity/Concentration Risk Component is designed to reflect CME's costs during the liquidation of a CDS portfolio following a CDS Clearing Member default, resulting from widening bid/ask spreads and/or increasing liquidation times due to the size of the CDS portfolio and/or event-driven liquidity squeezes. The proposed changes to the Liquidity/Concentration Risk Component are intended to add granularity to the modeling of liquidity/concentration risk by taking into account varying liquidity profiles across index series or reference entities and relevant maturities. The different liquidity characteristics of various index families/series and reference entities are modeled using trading volume data on the specific index series or reference entities. The dependence on trading volume data enables the model to more sensitively react to changes in trading activity. The modeling of relative liquidity of instruments at different maturities relies on an analysis of bid/ask spreads across maturities for both index and single-name CDS products. Concentration risk is addressed by a progressively increasing super-linear dependence on position size relative to the trading volume of the underlying reference entity or index series and relevant maturity.

The enhancements in the proposed Liquidity/Concentration Risk Component result in higher liquidity risk margin requirements for off-the-run indices, which are generally in line with the change in observed trading activity when a series becomes off-the-run. For single-name CDS, the proposed Liquidity/Concentration Risk Component results in higher liquidity risk margin requirements for reference entities with relatively low trading volume. Furthermore, the

proposed Liquidity/Concentration Risk Component generally yields higher liquidity risk margin requirements for short and long dated contracts.

An analysis of proposed Liquidity/Concentration Risk Component on an indicative set of CDS portfolios reveals that the proposed Liquidity/Concentration Risk Component responds as expected to concentration, diversification and hedging. The overall effect of the enhancements made to the Liquidity/Concentration Risk Component is to reduce risk to the CME Clearing House by conservatively increasing margin requirements for positions which are expected to be more difficult to close out.

1.5   New F/X Related Risk Component

CME is proposing to address F/X related risks associated with the inclusion of non-USD denominated CDS positions in CDS portfolios (each a "Non-USD CDS Positions"). As proposed above, CME will allow for correlation based risk offsets with respect to both Market Risk Components and Idiosyncratic Risk Components of the Proposed CDS Margin Model. The calculation of such risk offsets will require that the Market Risk Components and Idiosyncratic Risk Components be calculated in USD (or other such common/base currency as may be chosen from time to time). In order to calculate the USD requirements, profit and loss due to market and idiosyncratic factors ("P&L") will be converted into their USD equivalents based on conservative F/X rates. The USD equivalent requirements for the Market Risk Component and the Idiosyncratic Risk Component will then be apportioned into each currency specific sub-portfolio based on its Market Risk Component and Idiosyncratic Risk Component requirements.

With respect to the Interest Rate Sensitivity Component and the Liquidity Risk/Concentration Component of the Proposed CDS Margin Model, where CME does not

propose to offer risk or diversification offsets, only currency specific margin requirements are computed.

The overall risk requirement for each specific currency is then calculated as the sum of (a) the currency specific Liquidity/Concentration Risk Component requirement, (b) the currency specific Interest Rate Sensitivity Component requirement, and (c) the sum of the Market Risk Component and the Idiosyncratic Risk Component requirement (apportioned to each specific currency). Under the Proposed CDS Margin Model, CME will inform clearing members of their margin requirements with respect to their multi-currency CDS positions in amounts that are required to be posted for each denominated currency in their portfolios.

2. Description of the Proposed Changes to Stress Test Methodology

2.1 Proposed Changes to CDS Stress Test Methodology for Sizing and Allocation of CDS Financial Resources

CME currently utilizes a stressed extension of its margin model to size the CDS Guaranty Fund and CDS Assessments (as defined in the CME Rules). The "potential residual loss" used to size and allocate the CDS Guaranty Fund and CDS Assessments is determined as the excess of the stressed exposure for CDS products over the margin deposited for CDS products. CME is proposing changes to the CDS Stress Test Methodology in order to align it with the Proposed CDS Margin Model. The proposed CDS Stress Test Methodology will rely on more extreme and counter-cyclical scenarios for the calculation of the different risk components compared to the scenarios used in the Proposed CDS Margin Model.

2.2 New Self-Referencing Risk Component

Although CME does not permit a CDS Clearing Member or a customer to enter into or maintain a single-name CDS position referencing the clearing member or an affiliate, a self-

referencing CDS position may arise where the CDS Clearing Member or its affiliate is the Reference Entity in respect of a component transaction within the index referenced in a CDS position. For example, such a situation may arise in the context of index CDS contracts which reference CDS Clearing Members or their affiliates. In such cases, the CDS Clearing Member (a "CDS SR Clearing Member"), either through its own account or that of a customer, has exposure to a CDS Product that references itself or its affiliate (each an "SR Transaction"). CME proposes to address this potential exposure to self-referencing risk by allocating an additional JTD risk for each CDS SR Clearing Member under its Stress Test Methodology. CME considers a CDS Clearing Member default to be an extreme tail risk event which is subject to the CDS financial safeguards, including mutualization across all other CDS Clearing Members via the CDS Guaranty Fund.

Currently, CDS SR Clearing Members, clearing self-referencing indices for itself or its customers, are required to collateralize the self-referencing exposure in an amount specified in the CME Rules. CME is now proposing to adopt a risk based approach without reference to any preset threshold, to capture this self-referencing risk. The additional risk associated with CDS SR Clearing Members will be added to the stress scenarios used to size the CDS Guaranty Fund and CME will require each CDS SR Clearing Member to make an additional CDS Guaranty Fund Deposit to address this risk (such additional deposit, the "CDS SR Deposit"). The net theoretical self-referencing exposure of each CDS Clearing Member is computed as the additional theoretical self-referencing "potential residual loss" to CME in extreme but plausible market conditions using the stress testing methodology determined by the CDS Risk Committee. The aggregate amount of CDS SR Deposits will be sized to cover the sum of the net theoretical self-referencing exposures of two CDS SR Clearing Members which would create the two

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largest net theoretical self-referencing exposures.[4] The required CDS SR Deposit will then be

allocated to each CDS SR Clearing Member in proportion to each such CDS SR Clearing

Member's net self-referencing exposure.

A new CME Rule 8H06 (CDS SR Deposit) has been added to accurately reflect these

proposed changes to the CDS Guaranty Fund in the CME Rules, and CME Rule 8H802.B

(Satisfaction of Clearing House Obligations) has been amended to reflect the introduction of the

CDS SR Deposit. In addition, provisions in CME Rule 80104.A (Clearing Through Clearing

Member's House (or Proprietary) Account) and CME Rule 80104.B (Clearing Through Clearing

Members Customer Account) that relate to the requirement by clearing members that clear self-

referencing indices for themselves or their customers to collateralize the self-referencing

exposure in an amount specified in the CME Rules have been deleted.

A CDS Clearing Member default may result in contagion among financial institutions,

widening spreads and exposing portfolios consisting of index CDS that reference financial

entities to potential wrong-way risk. For example, the default of a CDS Clearing Member based

in the United States, which is not referenced in an index referencing European names, could lead

to overall widening of the credit spreads among financial institutions worldwide, leading to

widening of spreads in non-US indices. This may lead to variations in correlations between such

non-US indices and other North American indices, potentially adversely impacting certain

portfolios which are sensitive to such correlations. This increase in potential exposure caused by

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[4]   For purposes of determining the two largest potential residual losses, the self-referencing
        exposure of a CDS SR Clearing Member will be aggregated with that of any affiliated
        CDS SR Clearing Member.

contagion is addressed in the CME Proposed CDS Risk Model and Stress Test Methodology via incorporation of stressed correlation scenarios.

2.3   Portfolio Margining Implications

The Proposed CDS Margin Model relies on a statistical model to support a scenario-based approach in line with the joint probability distribution characteristics of par spreads of index series or reference entities across standard maturities. The Market Risk Component of the Proposed CDS Margin Model provides risk offsets between single-name CDS positions and index CDS positions. Such risk offsets are driven by the dependence structure across spread scenarios imposed by historical and counter-cyclical stressed correlations.

The Interest Rate Sensitivity Component for a portfolio containing index and single-name CDS products is designed as an aggregate risk component across index and single-name CDS positions.

Under the Proposed CDS Margin Model, the JTD component of the margin is computed by aggregating the exposure to the default of a reference entity in both single-name CDS positions and index CDS positions. CME relies on a decomposition model to compute the JTD component of the margin requirement for a CDS portfolio containing index and single-name CDS products.

The Liquidity/Concentration Risk Component of the Proposed CDS Margin Model is driven by an expected liquidation process in which the market risk exposure of the portfolio is first hedged with the most liquid CDS instrument and then the resulting basis (hedged) portfolio is liquidated. The margin requirements of the Liquidity/Concentration Risk Component that are driven by market risk hedging costs are calculated by aggregating the market risk exposure of the index and single-name CDS positions. Index and single-name CDS positions are handled

separately for the calculation of the basis risk margin requirement (due to unwinding of hedged positions) of the Liquidity/Concentration Risk Component and also for the modeling of the concentration margin requirement as a function of position size.

        b.   Statutory Basis

CME believes the proposed rule change is consistent with the requirements of the Exchange Act, including Section 17A of the Exchange Act,[5] and the applicable regulations thereunder. The proposed rule change is designed to promote the prompt and accurate clearance and settlement of securities transactions and, to the extent applicable, derivatives agreements, contracts, and transactions, to assure the safeguarding of securities and funds which are in the custody or control of the clearing agency or for which it is responsible, and, in general, to protect investors and the public interest consistent with Section 17A(b)(3)(F) of the Exchange Act.[6]

The proposed rule change accomplishes these objectives because it is intended to more accurately capture different sources of risk through a holistic and theoretically coherent scenario-based approach that is driven by conservative statistical assumptions, which in turn allows CME to appropriately cover the risk of a wide range of theoretical and production portfolios under extreme but plausible market conditions and in historical back testing, going back to 2008. In particular, the amendments will enhance CME's margin methodology by more accurately addressing F/X risk and self-referencing risk presented by clearing index CDS contracts.

CME will also promote the efficient use of margin for the clearinghouse and its Clearing Members and their customers by enabling CME to provide appropriate portfolio margining

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[5]   15 U.S.C. 78q-1.

[6]   15 U.S.C. 78q-1(b)(3)(F).

treatment between index and single-name CDS positions and as such contribute to the safeguarding of securities and funds in CME's custody or control or for which CME is responsible and the protection of investors.[7]

CME also believes the proposed rule change is consistent with the requirements of Rule 17Ad-22 of the Exchange Act.[8] In particular, in terms of financial resources, CME believes that the proposed rule change will continue to ensure sufficient margin to cover its credit exposure to its clearing members, consistent with the requirements of Rule 17Ad-22(b)(2)[9] and Rule 17Ad-22(d)(14)[10] and that the CDS Guaranty Fund contributions and required margin, both as modified by the proposed rule change, will provide sufficient financial resources to withstand a default by the two participant families to which it has the largest exposures in extreme but plausible market conditions consistent with the requirements of Rule 17Ad-22(b)(3).[11] In addition, CME believes that the proposed rule change is consistent with CME's requirement to limit its exposures to potential losses from defaults by its participants under normal market conditions pursuant to 17Ad-22(b)(1).[12] CME also believes that the proposed rule change will continue to allow for it to take timely action to contain losses and liquidity pressures and to continue meeting its

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[7]   Id.

[8]   17 CFR 240.19b-4.

[9]   17 CFR 240.17Ad-22(b)(2).

[10]   17 CFR 240.17Ad-22(d)(14).

[11]   17 CFR 240.17Ad-22(b)(3).

[12]   17 CFR 240.17Ad-22(b)(1).

obligations in the event of clearing member insolvencies or defaults, in accordance with Rule 17Ad-22(d)(11).[13]

B.   <u>Self-Regulatory Organization's Statement on Burden on Competition</u>

CME does not believe that the proposed rule change will have any impact, or impose any burden, on competition. The proposed rule change reflects enhancements to CME's CDS Risk Model. CME does not believe that any increase in margin or CDS Guaranty Fund contributions, would significantly affect the ability of Clearing Members or other market participants to continue to clear CDS, consistent with the risk management requirements of CME, or otherwise limit market participants' choices for selecting clearing services. For the foregoing reasons, the Proposed CDS Risk Model does not, in CME's view, impose any unnecessary or inappropriate burden on competition.

C.   <u>Self-Regulatory Organization's Statement on Comments on the Proposed Rule Change Received from Members, Participants, or Others</u>

Written comments relating to the Proposed CDS Risk Model have not been solicited or received. CME will notify the Commission of any written comments received by CME.

III.   <u>Date of Effectiveness of the Proposed Rule Change and Timing for Commission Action</u>

Within 45 days of the date of publication of this notice in the <u>Federal Register</u> or within such longer period up to 90 days (i) as the Commission may designate if it finds such longer period to be appropriate and publishes its reasons for so finding or (ii) as to which the self-regulatory organization consents, the Commission will:

(A) by order approve or disapprove such proposed rule change, or

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[13]   17 CFR 240.17Ad-22(d)(11).

(B) institute proceedings to determine whether the proposed rule change should be disapproved.

IV.   Solicitation of Comments

Interested persons are invited to submit written data, views and arguments concerning the foregoing, including whether the proposed rule change is consistent with the Act. Comments may be submitted by any of the following methods:

Electronic Comments:

- Use the Commission's Internet comment form (http://www.sec.gov/rules/sro.shtml), or

- Send an e-mail to rule-comments@sec.gov. Please include File No. SR-CME-2014-28 on the subject line.

Paper Comments:

- Send paper comments in triplicate to Secretary, Securities and Exchange Commission, 100 F Street, NE, Washington, DC, 20549-1090.

All submissions should refer to File Number SR-CME-2014-28. This file number should be included on the subject line if e-mail is used. To help the Commission process and review your comments more efficiently, please use only one method. The Commission will post all comments on the Commission's Internet website (http://www.sec.gov/rules/sro.shtml). Copies of the submission, all subsequent amendments, all written statements with respect to the proposed rule change that are filed with the Commission, and all written communications relating to the proposed rule change between the Commission and any person, other than those that may be withheld from the public in accordance with the provisions of 5 U.S.C. 552, will be available for website viewing and printing in the Commission's Public Reference Room, 100 F Street, NE, Washington, DC 20549, on official business days between the hours or 10:00 a.m.

and 3:00 p.m. Copies of such filing also will be available for inspection and copying at the principal office of CME and on CME's website at http://www.cmegroup.com/market-regulation/rule-filings.html.

All comments received will be posted without change; the Commission does not edit personal identifying information from submissions. You should submit only information that you wish to make available publicly.

All submissions should refer to File Number SR-CME-2014-28 and should be submitted on or before [insert date 21 days from publication in the Federal Register].

For the Commission, by the Division of Trading and Markets, pursuant to delegated authority.[14]

Kevin M. O'Neill
Deputy Secretary

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[14]   17 CFR 200.30-3(a)(12).