

SECURITIES AND EXCHANGE COMMISSION
(Release No. 34-72260; File No. SR-NSCC-2014-802)

May 27, 2014

Self-Regulatory Organizations; National Securities Clearing Corporation; Notice of Filing Amendment No. 1 and No Objection to Advance Notice, as Modified by Amendment No. 1, to Enhance NSCC's Existing Parametric Value-at-Risk Margining Model

I. Introduction

On March 28, 2014, National Securities Clearing Corporation ("NSCC") filed with the Securities and Exchange Commission ("Commission") advance notice SR-NSCC-2014-802 ("Advance Notice") pursuant to Section 806(e)(1) of the Payment, Clearing, and Settlement Supervision Act of 2010 ("Clearing Supervision Act")¹ and Rule 19b-4(n)(1)(i) of the Securities Exchange Act of 1934 ("Exchange Act").² The Advance Notice was published in the Federal Register on April 21, 2014.³ The Commission did not receive any comment letters to the Advance Notice. On May 6, 2014, NSCC filed Amendment No. 1 to the Advance Notice ("Amendment"). This publication serves as notice of filing of Amendment No. 1 and no objection to the Advance Notice, as amended ("Amended Advance Notice").

II. Description of the Amended Advance Notice

A. Background

NSCC maintains a Clearing Fund to have on deposit assets sufficient to satisfy losses that may otherwise be incurred by NSCC as the result of the default of an NSCC member ("Member") and the resulting closeout of that Member's unsettled positions under NSCC's trade

¹ 12 U.S.C. 5465(e)(1).

² 17 CFR 240.19b-4(n)(1)(i).

³ Release No. 34-71945 (Apr. 15, 2014), 79 FR 22174 (Apr. 21, 2014).

guaranty. Each Member is required to contribute to the Clearing Fund pursuant to a formula calculated daily. The Clearing Fund formula accounts for a variety of risk factors through the application of a number of components, including value-at-risk (“VaR”). The VaR component of the Clearing Fund calculation is a core component of the formula and is designed to calculate the amount of money that may be lost on a portfolio over a given period of time that is assumed necessary to liquidate the portfolio (e.g., three days), within a given level of confidence (e.g., 99%).

NSCC performs back testing to measure the performance of Members’ portfolios against the calculated VaR margin requirements for those portfolios. Over the past few years, the results of those tests have shown that while the NSCC’s VaR margin component has remained mostly above its 99 percent coverage target when tested over a longer time horizon (e.g., a 12-month rolling window), coverage fell below the 99 percent target in a few instances where the tests were conducted over a shorter time horizon (e.g., a 1-month window).

Historically, parametric VaR models have computed risk on the assumption that the distributional return of an equity portfolio is normal. However, the increased frequency of market volatility in recent years has stressed the performance of parametric VaR models and has called into question that assumption. In other words, certain risks, such as “fat-tail risk,” may not be properly addressed by parametric VaR models that are based solely on the assumption of a normal return distribution, as demonstrated by NSCC’s back testing results. As such, industry participants have begun to move away from the use of assuming normal distributions for asset returns in parametric VaR models and, instead, have begun to use other distributions, such as Student’s t-distributions, that better account for fat-tail risk events. Therefore, with this

Amended Advance Notice, NSCC will adjust its current VaR model to incorporate Student's t-distributions into the model in a manner specific to NSCC's needs, as described below.

B. Proposed Change

The proposed change contained in the Amended Advance Notice will enhance NSCC's existing parametric VaR model by supplementing the current assumption of a normal return distribution for equity portfolios with a factor that utilizes the degrees of freedom ("DOF") derived from a family of Student's t-distributions, which are more representative of the historically observed return distributions in the equities markets. NSCC will estimate periodically the DOF factor of the empirical t-distribution in the model by using daily return data from the S&P 500 over a historical window no shorter than 12-months. NSCC will then compute a multiplication factor that represents the magnitude of increase of t-distribution-based parametric VaR from the normal-based parametric VaR. This multiplication factor will be applied to Members' VaR margin requirement.

NSCC initially proposed in the Advance Notice to use its existing VaR model, with the normal distribution assumption, as a floor to the proposed model. However, under the Amendment, NSCC proposes not to use its current model as a floor but, instead, to set a floor on the DOF (i.e., set a lower bound on the DOF) in the proposed model that will serve the same function. By doing so, the Amended Advance Notice mimics the intent of the original proposal while ensuring that the amount of margin collected by NSCC during volatile market conditions is greater than the amount of margin computed under the existing and originally proposed methodologies.

The proposed change contained in the Amended Advance Notice is expected to improve NSCC's back-testing performance over shorter time horizons, particularly during more volatile

market environments, and it should enable NSCC's VaR model to better account for the higher degree of fat-tail risk observed in equities markets.

III. Commission Findings and Notice of No Objection

Although the Clearing Supervision Act does not specify a standard of review for advance notices, the Commission believes that the stated purpose of the Clearing Supervision Act is instructive.⁴ The stated purpose of the Clearing Supervision Act is to mitigate systemic risk in the financial system and promote financial stability by, among other things, promoting uniform risk management standards for designated systemically important financial market utilities ("SIFMU").⁵

Section 805(a)(2) of the Clearing Supervision Act authorizes the Commission to prescribe risk management standards for the payment, clearing, and settlement activities of designated clearing entities and financial institutions engaged in designated activities for which it is the supervisory agency or the appropriate financial regulator.⁶ Section 805(b) of the Clearing Supervision Act states that the objectives and principles for the risk management standards prescribed under Section 805(a) shall be to:

- promote robust risk management;
- promote safety and soundness;
- reduce systemic risks; and
- support the stability of the broader financial system.⁷

⁴ 12 U.S.C. 5461(b).

⁵ Id.

⁶ 12 U.S.C. 5464(a)(2).

⁷ 12 U.S.C. 5464(b).

The Commission adopted risk management standards under Section 805(a)(2) of the Clearing Supervision Act⁸ (“Clearing Agency Standards”),⁹ which the Commission recently proposed to amend, in part, to establish additional standards.¹⁰ The Clearing Agency Standards became effective on January 2, 2013 and require registered clearing agencies to establish, implement, maintain, and enforce written policies and procedures that are reasonably designed to meet certain minimum requirements for their operations and risk management practices on an ongoing basis.¹¹ As such, it is appropriate for the Commission to review advance notices against the objectives and principles for risk management standards as described in Section 805(b) of the Clearing Supervision Act,¹² as well as the applicable Clearing Agency Standards promulgated under Section 805(a) of the Clearing Supervision Act.¹³

The Amended Advance Notice’s proposed change, as described above, is designed to enhance the VaR model that NSCC uses to calculate Clearing Fund requirements for its

⁸ 12 U.S.C. 5464(a)(2).

⁹ Release No. 34-68080 (Oct. 22, 2012), 77 FR 66219 (Nov. 2, 2012).

¹⁰ See Release No. 34-71699 (Mar. 12, 2014), 79 FR 16865 (Mar. 26, 2014) proposing to amend Rule 17Ad-22 for covered clearing agencies.

¹¹ The Clearing Agency Standards are substantially similar to the risk management standards established by the Board of Governors of the Federal Reserve System (“Board of Governors”) governing the operations of SIFMUs that are not clearing entities and financial institutions engaged in designated activities for which the Commission or the Commodity Futures Trading Commission is the Supervisory Agency. See Financial Market Utilities, 77 FR 45907 (Aug. 2, 2012).

¹² 12 U.S.C. 5464(b).

¹³ 12 U.S.C. 5464(a).

Members. Consistent with Section 805(b) of the Clearing Supervision Act,¹⁴ the Commission believes that the Amended Advance Notice will help promote robust risk management and mitigate systemic risk by aligning more closely the assumptions utilized by NSCC’s VaR model regarding distribution returns on equity portfolios with observed returns, which, in turn, will enable the calculation for Members’ Clearing Fund margin requirements to better account for fat-tail risk events. This change should increase the financial resources available to NSCC at appropriate times and constitutes an improvement to its risk management practices.

Commission Rule 17Ad-22(b)(2), adopted as part of the Clearing Agency Standards,¹⁵ requires a registered clearing agency that is also a central counterparty (“CCP”) to “establish, implement, maintain and enforce written policies and procedures reasonably designed to ... [u]se margin requirements to limit its credit exposures to participants under normal market conditions and use risk-based models and parameters to set margin requirements and review such margin requirements and the related risk-based models and parameters at least monthly.”¹⁶ Furthermore, Commission Rule 17Ad-22(b)(3), also adopted as part of the Clearing Agency Standards,¹⁷ requires, a registered CCP to “establish, implement, maintain, and enforce written policies and procedures reasonably designed to ... [m]aintain sufficient financial resources to withstand, at a minimum, a default by the participant family to which it has the largest exposure in extreme but plausible market conditions....”¹⁸

¹⁴ See 12 U.S.C. 5464(b).

¹⁵ Release No. 34-68080 (Oct. 22, 2012), 77 FR 66219 (Nov. 2, 2012).

¹⁶ 17 CFR 240.17Ad-22(b)(2).

¹⁷ Release No. 34-68080 (Oct. 22, 2012), 77 FR 66219 (Nov. 2, 2012).

¹⁸ 17 CFR 240.17Ad-22(b)(3).

The proposed change contained in the Amended Advance Notice, as discussed above, furthers NSCC's compliance with Rules 17Ad-22(b)(2) and (b)(3) because the change will enable the assumptions used in NSCC's risk-based VaR model to better reflect fat-tailed event risk, thus leading to calculations of Members' Clearing Fund margin requirements that better reflect historically observed returns, increased deposits to NSCC's Clearing Fund at appropriate times, and increased resources available to NSCC in the event of a defaulting Member to which NSCC has the largest exposure in extreme market conditions.

For the reasons stated above, the Commission does not object to the Amended Advance Notice.

IV. Solicitation of Comments to Amendment No. 1

Interested persons are invited to submit written data, views, and arguments concerning the foregoing, including whether the Amendment No. 1 to the Advance Notice is consistent with the Clearing Supervision 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-NSCC-2014-802 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 No. SR-NSCC-2014-802. 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 Advance Notice that are filed with the Commission, and all written communications relating to the Advance Notice 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 of 10:00 a.m. and 3:00 p.m. Copies of the filing also will be available for inspection and copying at the principal office of NSCC and on NSCC's website (<http://dtcc.com/legal/sec-rule-filings.aspx>). 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 No. SR-NSCC-2014-802 and should be submitted on or before [insert date 21 days from publication in the Federal Register].

V. Conclusion

IT IS THEREFORE NOTICED, pursuant to Section 806(e)(1)(I) of the Clearing Supervision Act,¹⁹ that the Commission DOES NOT OBJECT to the proposed change described in advance notice SR-NSCC-2014-802, as modified by Amendment No. 1, and that NSCC be and hereby is AUTHORIZED to implement the proposed change as of the date of this notice.

By the Commission.

Kevin M. O'Neill
Deputy Secretary

¹⁹ 12 U.S.C. 5465(e)(1)(I).