

SECURITIES AND EXCHANGE COMMISSION
(Release No. 34-93388; File No. SR-ICC-2021-018)

October 20, 2021

Self-Regulatory Organizations; ICE Clear Credit LLC; Order Approving Proposed Rule Change Relating to the ICC Back-Testing Framework

I. Introduction

On August 24, 2021, ICE Clear Credit LLC (“ICC”) filed with the Securities and Exchange Commission (“Commission”), pursuant to Section 19(b)(1) of the Securities Exchange Act of 1934 (“Act”),¹ and Rule 19b-4 thereunder,² a proposed rule change (SR-ICC-2021-018) to revise the ICE CDS Clearing: Back-Testing Framework (“Back-Testing Framework”) to include additional description on the lookback period for back-testing and other clarifications.³ The proposed rule change was published in the Federal Register on September 14, 2021.⁴ The Commission did not receive comments on the proposed rule change. For the reasons discussed below, the Commission is approving the proposed rule change.

II. Description of the Proposed Rule Change

The Back-Testing Framework discusses ICC’s back-testing approach and analysis to verify that the number of actual losses is consistent with the number of projected

¹ 15 U.S.C. 78s(b)(1).

² 17 CFR 240.19b-4.

³ Capitalized terms used herein but not otherwise defined have the meaning set forth in the ICC Rules or the Back-Testing Framework.

⁴ Self-Regulatory Organizations; ICE Clear Credit LLC; Notice of Filing of Proposed Rule Change Relating to the ICC Back-Testing Framework, Exchange Act Release No. 92893 (Sept. 8, 2021); 86 Fed. Reg. 51204 (Sept. 14, 2021) (SR-ICC-2021-018) (“Notice”).

losses, and includes guidelines for remediating poor back-testing results. ICC proposes revising the Back-Testing Framework to include additional description on the lookback period for back-testing, which refers to the maximum back-testing sample size, and other clarifications. The proposed revisions to the Back-Testing Framework are described in detail as follows.⁵

ICC proposes a clarification change in Subsection 1.2 to specify that the ICC Risk Management Department (“ICC Risk”) may consider back-testing analysis based on alternative statistical tests to assess the performance of its models in terms of statistical reliability, in addition to its current consideration of clustering of exceedances, which refers to excessive losses.

ICC proposes new Subsection 2.1 (Lookback Period for Back-Testing of the Production Model with Clearing Participant Portfolios) to include additional description of the lookback period for back-testing, which refers to the maximum back-testing sample size. ICC represents that proposed Subsection 2.1 would not change its methodology.⁶ Specifically, proposed Subsection 2.1 defines back-testing as statistics-based hypothesis testing, and clarifies that the larger the sample size is, the more reliable the inference is from such testing. Proposed Subsection 2.1 describes the performance of production model back-testing analysis for Clearing Participant (“CP”) related portfolios reflecting all available observations over periods of various market conditions. The proposed language also describes the maximum back-testing sample size, or the lookback period, and the benefit of allowing for a greater sample size that would incorporate

⁵ The following description of the proposed rule change is substantially excerpted from the Notice.

⁶ See Notice at 51205.

observations from various market regimes to assess model performance and thus ensure more reliable inferences from back-testing. The proposed language also analyzes short lookback periods, which may exclude extreme stress market conditions, in combination with high risk quantile estimates (e.g., greater than 99%). ICC also proposes to introduce an alternative statistical test and describe how the model is considered to pass or fail such test. Proposed Figure 1 provides an illustration under the alternative statistical test across different sample sizes and risk quantiles. Following proposed Figure 1, ICC would explain its rationale for establishing the minimum back-testing window length for the initial margin risk horizon, or the Margin Period of Risk (“MPOR”) model analysis. Proposed Subsection 2.1 also references the performance of additional analyses, as described in Section 4 of the Back-Testing Framework which contain guidelines to remediate poor back-testing results. Proposed Subsection 2.1 includes language concerning the reporting of back-testing results for portfolios, including those with an insufficient number of observations. Given the proposed addition of new Subsection 2.1, ICC proposes to renumber the subsequent subsections of the Back-Testing Framework document.

ICC proposes additional clarifications to the Back-Testing Framework. The proposed amendments include a footnote in amended Subsection 2.6 (BTLs Exceedance Summaries) that references a relevant Commodity Futures Trading Commission (“CFTC”) regulation with respect to ICC’s performance of production model 99% back-testing analysis for all CP related portfolios. ICC also proposes amendments to Section 4 (Guidelines to Remediate Poor Back-Testing Results). Currently, poor back-testing results require a peer review of the risk models by the Risk Working Group (“RWG”),

which is comprised of risk representatives from ICC’s CPs, and remedial actions to improve model performance. Section 4 currently states that model performance analysis along with the model assumptions are presented to the RWG for review and discussions. In addition to the model assumptions, the proposed change would include the number of observations for the RWG’s review and discussions. Section 4 also currently states that a back-testing analysis without overlapping periods will be performed in order to confirm poor-backing results if the number of observed exceedances falls in the “red zone” of the so-called Basel Traffic Light System (BTLS) of the Basel Committee Supervisory Framework. The proposed rule change would amend such statement to include the RWG’s assessment of the sufficiency of the number of observations in performing the portfolio-level back-testing analysis, thus supplementing the current complementary back-testing analysis without overlapping periods. ICC also proposes to update Section 5, containing a list of references, to include a reference to the alternative statistical test described above in the proposed new Subsection 2.1.

III. Discussion and Commission Findings

Section 19(b)(2)(C) of the Act directs the Commission to approve a proposed rule change of a self-regulatory organization if it finds that such proposed rule change is consistent with the requirements of the Act and the rules and regulations thereunder applicable to such organization.⁷ For the reasons given below, the Commission finds that

⁷ 15 U.S.C. 78s(b)(2)(C).

the proposal is consistent with Section 17A(b)(3)(F) of the Act⁸ and Rules 17Ad-22(e)(2)(i) and (v), and 17Ad-22(e)(6)(vi) thereunder.⁹

A. Consistency with Section 17A(b)(3)(F) of the Act

Section 17A(b)(3)(F) of the Act requires, among other things, that the rules of ICC be designed to promote the prompt and accurate clearance and settlement of securities transactions and, to the extent applicable, derivative agreements, contracts, and transactions, as well as to assure the safeguarding of securities and funds which are in the custody or control of ICC or for which it is responsible.¹⁰

As discussed above, the proposed rule change would revise the Back-Testing Framework to include additional description of the lookback period for back-testing and other clarifications. For the specific reasons discussed below, the Commission believes that, in general, the proposed rule change would help ensure the sound operation of the Back-Testing Framework that should enhance the overall risk management and financial stability of ICC, and thereby promote ICC's prompt and accurate clearance and settlement of credit default swap ("CDS") transactions, and help assure the safeguarding of securities and funds which are in ICC's custody or control or for which ICC is responsible.

First, the Commission believes that the proposed clarification in Subsection 1.2, in specifying that ICC Risk may use alternative statistical tests to assess the performance of its risk models for statistical reliability, would strengthen its back-testing approach and

⁸ 15 U.S.C. 78q-1(b)(3)(F).

⁹ 17 CFR 240.17Ad-22(e)(2)(i) and (v), and (e)(6)(vi).

¹⁰ 15 U.S.C. 78q-1(b)(3)(F).

analysis by supplementing its consideration of the clustering of exceedances or excessive losses.

Second, as discussed above, the proposed rule change also would introduce a new Subsection 2.1 that provides additional detail and explanation regarding the lookback period for its back-testing analysis methodology. Specifically, the Commission believes that proposed Subsection 2.1, in clarifying that back-testing is statistics-based hypothesis testing and that a larger sample size enhances the reliability of the inferences from such testing, would establish a clear risk management rationale for ICC's methodology to assess the performance of production model back-testing analysis for CP related portfolios reflecting all available observations over periods of various market conditions. The Commission also believes that proposed Subsection 2.1, in analyzing short lookback periods and describing in detail an alternative statistical test by illustrating its application across different sample sizes and risk quantiles, would provide a transparent, risk-based explanation for setting the minimum back-testing window length for ICC's MPOR model analysis. The Commission also believes that proposed Subsection 2.1, in referencing additional analyses described in Section 4 (Guidelines to Remediate Poor Back-Testing Results), and describing the reporting of back-testing results for portfolios, including those with an insufficient number of observations, would enhance the clarity and transparency of ICC's back-testing procedures and contribute to the effective implementation of its overall back-testing approach. The Commission also believes that the proposed renumbering of sections that follow proposed new Subsection 2.1 will provide further clarity and enhance the readability of the Back-Testing Framework document.

Third, as discussed above, ICC proposes additional clarifications to the Back-Testing Framework that the Commission believes, taken together, will enhance the clarity of its back-testing approach, procedures, and guidelines for remediating poor back-testing results. Specifically, the proposed amendments to Subsection 2.6 (BTLs Exceedance Summaries), in clearly referencing a relevant CFTC regulation with respect to ICC's performance of production model 99% back-testing analysis for all CP related portfolios, would help assure continued compliance with such regulation. The proposed amendments to Section 4 (Guidelines to Remediate Poor Back-Testing Results), in specifying that the RWG will review and discuss the number of observations in conducting its risk model performance analysis, and also assess the sufficiency of the number of observations on the portfolio level back-testing analysis without overlapping periods, would strengthen the RWG's analysis and better inform remedial actions. Finally, the proposed amendment to Section 5, in including a clear reference to the alternative statistical test described above in the proposed new Subsection 2.1, would assure that the RWG and relevant ICC Risk personnel have access to further details in using such test.

By helping to assure the sound operation of the Back-Testing Framework, which ICC uses to manage the credit exposures associated with clearing CDS transactions, the Commission believes that the proposed rule change would help improve ICC's ability to avoid the losses that could result from the miscalculation of ICC's credit exposures and margin requirements for such transactions. Because such losses could disrupt ICC's ability to operate and thus clear and settle CDS transactions, the Commission finds the proposed rule change, by helping to enhance ICC's overall risk management and financial stability, would promote the prompt and accurate clearance and settlement of

securities and derivative transactions. Because such losses could also threaten access to securities and funds in ICC's control, the Commission finds the proposed rule change would help assure the safeguarding of securities and funds that are in the custody or control of ICC or for which it is responsible.

Therefore, the Commission finds that the proposed rule change would promote the prompt and accurate clearance and settlement of securities transactions and derivative agreements, contracts, and transactions, and assure the safeguarding of securities and funds in ICC's custody and control or for which ICC is responsible, consistent with Section 17A(b)(3)(F) of the Act.¹¹

B. Consistency with Rules 17Ad-22(e)(2)(i) and (v) under the Act

Rules 17Ad-22(e)(2)(i) and (v) require that ICC establish, implement, maintain, and enforce written policies and procedures reasonably designed to provide for governance arrangements that are clear and transparent and specify clear and direct lines of responsibility, respectively.¹² As discussed above, the Commission believes that the proposed rule change, in specifying that ICC Risk may use alternative statistical tests to assess the performance of its risk models for statistical reliability, would provide ICC Risk with procedural clarity in conducting its back-testing analysis of risk models. The Commission believes that the proposed amendments in Section 4, in specifying that the RWG will review and discuss the number of observations in conducting its risk model performance analysis, and also assess the sufficiency of the number of observations on the portfolio level back-testing analysis without overlapping periods, would clarify the

¹¹ 15 U.S.C. 78q-1(b)(3)(F).

¹² 17 CFR 240.17Ad-22(e)(2)(i) and (v).

scope of the RWG's responsibility in reviewing poor back-testing results and would help the RWG to take more fully informed remedial actions, such as making risk model enhancements or introducing ad-hoc parameter values to achieve an increased conservative bias of the risk models. Finally, the proposed amendment to Section 5, including a clear reference to the alternative statistical test described above in the proposed new Subsection 2.1, would assure that the RWG and relevant ICC Risk personnel have the correct source document to govern the ongoing use of such test for verifying the accuracy of risk management models.

The Commission believes that these aspects of proposed rule change would clearly assign and document the respective roles and responsibilities of ICC Risk and the RWG in implementing the Back-Testing Framework, and thereby improving the related governance arrangements for performing the appropriate scope of back-testing analysis and taking remedial actions if poor back-testing results warrant such action. The Commission therefore finds that the proposed rule change is consistent with Rules 17Ad-22(e)(2)(i) and (v).¹³

C. Consistency with Rule 17Ad-22(e)(6)(vi) under the Act

Rule 17Ad-22(e)(6)(vi) requires that ICC establish, implement, maintain and enforce written policies and procedures reasonably designed to cover its credit exposures to its participants by establishing a risk-based margin system that, at a minimum, is monitored by management on an ongoing basis and is regularly reviewed, tested, and verified by, among other things: (A) conducting backtests of its margin model at least once each day using standard predetermined parameters and assumptions; and (B)

¹³ 17 CFR 240.17Ad-22(e)(2)(i) and (v).

conducting a sensitivity analysis of its margin model and a review of its parameters and assumptions for backtesting on at least a monthly basis, and considering modifications to ensure the backtesting practices are appropriate for determining the adequacy of ICC's margin resources.¹⁴

Consistent with such back-testing requirements, the proposed rule change would not modify ICC Risk's current back-testing practices of performing daily, weekly, monthly, and quarterly portfolio-level back-testing analyses, performing monthly parameter reviews and parameter sensitivity analyses, and remediating poor back-testing results under the Back-Testing Framework.¹⁵ For the reasons discussed below, the Commission finds that the proposed rule change would enhance such back-testing practices to help ICC monitor its credit exposures to its clearing participants and maintain the ongoing effectiveness of its risk-based margin system and overall risk management framework. As described above, proposed new Subsection 2.1 (Lookback Period for Back-Testing of the Production Model with Clearing Participant Portfolios), in adding a detailed description of the maximum back-testing sample size, or lookback period, and an alternative statistical test for enhanced analysis and verification of the accuracy of risk model performance, would clarify and strengthen ICC's back-testing analysis for CP related portfolios. Proposed Subsection 2.1, in establishing the minimum back-testing window length for the Margin Period of Risk (MPOR) model analysis, subjecting the MPOR model to the performance of additional analyses for portfolios with an insufficient number of available observations, and clarifying the reporting of back-testing results for

¹⁴ 17 CFR 240.17Ad-22(e)(6)(vi).

¹⁵ See Notice at 51205.

such portfolios, would help ensure that the back-testing practices for MPOR models are appropriate for determining the accuracy of ICC's margin resources. If red-zone results appear from overlapping back-testing periods, Section 4, as amended, would require ICC Risk to assess the sufficiency of the number of observations on the portfolio-level back-testing analysis, which would supplement its complementary back-testing analysis without overlapping periods. The Commission therefore finds that these aspects of the proposed rule change, taken together, are consistent with Rule 17Ad-22(e)(6)(vi).¹⁶

IV. Conclusion

On the basis of the foregoing, the Commission finds that the proposal is consistent with the requirements of the Act, and in particular, with the requirements of Section 17A(b)(3)(F) of the Act¹⁷ and Rules 17Ad-22(e)(2)(i) and (v), and 17Ad-22(e)(6)(vi) thereunder.¹⁸

¹⁶ 17 CFR 240.17Ad-22(e)(6)(vi).

¹⁷ 15 U.S.C. 78q-1(b)(3)(F).

¹⁸ 17 CFR 240.17Ad-22(e)(2)(i) and (v), and (e)(6)(vi).

IT IS THEREFORE ORDERED pursuant to Section 19(b)(2) of the Act¹⁹ that the proposed rule change (SR-ICC-2021-018) be, and hereby is, approved.²⁰

For the Commission, by the Division of Trading and Markets, pursuant to delegated authority.²¹

J. Matthew DeLesDernier
Assistant Secretary

¹⁹ 15 U.S.C. 78s(b)(2).

²⁰ In approving the proposed rule change, the Commission considered the proposal's impact on efficiency, competition, and capital formation. 15 U.S.C. 78c(f).

²¹ 17 CFR 200.30-3(a)(12).