

Rule 5B: Margin Methodology

5.1B Initial and Minimum Required Margin Deposits.

5.1.1B Initial Margin Deposit. Upon commencing its participation in the Company, each Participant will deposit and maintain Margin Assets equal to the amount of its Initial Margin Deposit. The amount of a Participant's Initial Margin Deposit will be fixed by the Compliance and Risk Management Committee in connection with the Participant's admission and based on the following factors regarding the Participant: creditworthiness; anticipated or actual settlement obligations; trading strategy; and operational capabilities.

5.1.2B Minimum Required Margin Deposit. At all times, the Minimum Required Margin Deposit for a Participant will be ten thousand dollars (\$10,000); provided, however, that the Company, in consideration of the factors specified in Rule 5.1.1B, may require a higher Minimum Required Margin Deposit for any Participant. The Company will not accept new transactions for settlement for a Participant unless and until its Minimum Required Margin Deposit is met.

5.2B Computed Margin Requirement. The Company will calculate a Computed Margin Requirement for each Participant as described in Rule 5.4B.

5.3B Required Margin Amount. The greater of the Initial Margin Deposit, Minimum Required Margin Deposit and Computed Margin Requirement is referred to in these Rules as the Required Margin Amount. The Computed Margin Requirement will include Fails Charges and/or Excessive Fails Penalties as described in Rule 5.4B below. Each Participant must maintain sufficient Margin Assets to collateralize its Required Margin Amount.

5.4B Calculation of the Computed Margin Requirement. The aggregate amount required to collateralize the Unsettled Settlement Obligations of a Participant with each of its Counterparty Pairs will be its Computed Margin Requirement. A Participant's Unsettled Settlement Obligations due for settlement on a Settlement Date may be net or gross as described in Rule 4A. Each Participant's Computed Margin Requirement will be calculated, as described below, by (a) determining a Preliminary Computed Margin Requirement; (b) adjusting the Preliminary Computed Margin Requirement using the Credit Risk Rating as a modification factor to arrive at a Computed Margin Requirement; and (c) adding to the Computed Margin Requirement any Fails Charges and/or Excessive Fails Penalties.

5.4.1B Preliminary Computed Margin Requirement. Each Participant's Preliminary Computed Margin Requirement will be calculated using the following measures:

5.4.1.1B Dynamic Spot Price. For each Unsettled Settlement Obligation, the Dynamic Spot Price will equal the implied volatility of that position using a two (2)-day deviation to calculate a three (3) standard deviation move.

To calculate the Dynamic Spot Price for each Unsettled Settlement Obligation, the Company will:

(a) estimate the 30-Day Implied Volatility using the implied volatility of the midpoint between the closing bid and ask spread of the thirty (30)-day at-the-money standardized put and call option strike prices for the relevant underlying security;

(i) the “at-the-money” strike price will be the closing trade date price of the underlying security, rounding up or down as appropriate. (For example, for an Eligible Security with a closing trade date price of one hundred and four dollars and thirty cents (\$104.30), the applicable at-the-money strike would be one hundred and four dollars (\$104));

(ii) the “30-Day” option is defined as the next month’s expiration, unless that expiration occurs less than thirty (30) calendar days from trade date. (For example, for trade date June 6, the “30-Day” option would be the July expiry, given that the June expiry would be less than thirty (30) days from trade date);

(b) calculate the Two-Day Standard Deviation, using the 30-Day Implied Volatility; and

(c) determine a three (3) standard deviation price move, to a 99.7% confidence level using the Two-Day Standard Deviation.

In the event that an Unsettled Settlement Obligation: (i) is with respect to an Eligible Security that has no corresponding equity option chain available or (ii) has a corresponding equity option chain available but the equity option is illiquid, then the Company will determine the volatility of the Unsettled Settlement Obligation by averaging the actual volatility of the Eligible Security over the past twenty (20) trading days in order to calculate the Two-Day Standard Deviation referenced in this section. For purposes of this requirement, an equity option chain will be deemed illiquid if there are less than two thousand (2,000) option contracts traded on trade date in the applicable standardized equity option class.

5.4.1.2B Prices Used in Dynamic Spot Price Regarding Enhanced Netting.

Regarding Enhanced Netting, pursuant to Rule 4A, the value of the Eligible Securities and the Operating Cash being exchanged for settlement purposes may not be of equal value due to the netting process. As a result, the prices used by the Company to calculate the Dynamic Spot Price will depend, as described below, on (i) the market value of the Operating Cash and Eligible Securities being delivered and (ii) whether the Participant is obligated to deliver Operating Cash or shares of an Eligible Security.

(a) If the value of the Operating Cash to be delivered exceeds the market value of the Eligible Securities to be delivered, the following applies:

(i) For both Participants, the price used to calculate the Dynamic Spot Price will be the price determined by the Company to be the market price for the shares of the Eligible Security to be delivered and received. If the calculation is done by the Company after the close of trading in the Eligible Security, then the price will be the closing price for the Eligible Security as determined by the Company. If the calculation is done by the Company during trading hours in the relevant markets for the Eligible Security, then the price will be the current market price as determined by the Company.

(ii) In addition, the Participant obligated to deliver Operating Cash in connection with a Settlement Obligation will also post as collateral an additional three percent (3%) on any amount in excess of the market value of the shares being received.

For example, if Participant A is obligated to deliver \$100,000 in connection with a Settlement Obligation by which it will receive ten thousand (10,000) shares currently priced at nine dollars (\$9), for a total of ninety thousand dollars (\$90,000) in value, Participant A will be required to post an additional three percent (3%) of the excess (on the ten thousand dollar (\$10,000) difference), which would equal an additional three hundred dollars (\$300).

(b) If the market value of the Eligible Securities to be delivered exceeds the value of the Operating Cash to be delivered, the following applies:

(i) If the Participant is obligated to deliver Operating Cash in connection with a Settlement Obligation, the price used to calculate the Dynamic Spot Price is the average price of the shares of the Eligible Security to be delivered and received.

For example, in a circumstance in which a Participant is obligated to deliver one thousand dollars (\$1,000) in Operating Cash to receive one hundred (100) shares of the relevant Eligible Security the Dynamic Spot Price will be calculated using a price of ten dollars (\$10) ($\$1,000 / 100$ shares of the Eligible Security) *regardless* of the current market price of the relevant Eligible Security shares.

(ii) If a Participant is obligated to deliver shares of an Eligible Security in connection with a Settlement Obligation, the price used to calculate the Dynamic Spot Price is the current market price of the Eligible Security shares to be delivered.

For example, a seller is delivering one hundred (100) shares, currently priced in the market at fifteen dollars (\$15). The Dynamic Spot Price will be calculated using a price of fifteen dollars (\$15).

5.4.1.3B Liquidity Exposure Requirement. An Unsettled Settlement Obligation will be subject to an additional Liquidity Exposure Requirement of five percent (5%) if the Participant's total Unsettled Settlement Obligation in the Eligible Security to all of its Counterparty Pairs exceeds the average trading volume in the Eligible Security over the past thirty (30) trading days, as determined by the Company. If the Unsettled Settlement Obligation exceeds the average trading volume in the Eligible Security over the past thirty (30) trading days, as determined by the Company, by a multiple (*e.g.*, two (2), three (3) or more times the relevant volume), then the Liquidity Exposure Requirement will increase in corresponding increments (*e.g.*, if the Unsettled Settlement Obligation is three (3) times the relevant volume, the Liquidity Exposure Requirement will be fifteen percent (15%)).

5.4.1.4B Low-Priced Securities Requirement. A Participant with an Unsettled Settlement Obligation to receive an Eligible Security that has a closing price equal to or less than one dollar (\$1.00) will be required to post Margin Assets equal to one hundred percent (100%) of the value of the Unsettled Settlement Obligation. A Participant with an Unsettled Settlement Obligation to deliver an Eligible Security that has a closing price equal to or less than two dollars and fifty cents (\$2.50) will be required to post Margin Assets equal to two hundred and fifty percent (250%) of the value of the Unsettled Settlement Obligation.

5.4.1.5B Market Capitalization Requirement. A Participant with an Unsettled Settlement Obligation in an Eligible Security with a market capitalization equal to or less than two hundred and fifty million dollars (\$250,000,000) will be required to post Margin Assets equal to one hundred percent (100%) of the value of the Unsettled Settlement Obligation.

5.4.1.6B Percentage of Outstanding Shares Requirement. A Participant with a total Unsettled Settlement Obligation to all of its Counterparty Pairs to receive shares in an Eligible Security that exceeds five percent (5%) of the total shares outstanding for that Eligible Security will be required to post Margin Assets equal to one hundred percent (100%) of the value of the Unsettled Settlement Obligation. A Participant that has a total Unsettled Settlement Obligation to its

Counterparty Pairs to deliver shares in an Eligible Security that exceeds five percent (5%) of the total shares outstanding for that Eligible Security will be required to post Margin Assets equal to two hundred and fifty percent (250%) of the Unsettled Settlement Obligation.

5.4.1.7B Potential Adjustment to the Preliminary Computed Margin Requirement. The Preliminary Computed Margin Requirement will be adjusted by the Company using the Credit Risk Rating as a modification factor described below.

5.4.2B Credit Risk Rating as a Modification Factor. Once the Preliminary Computed Margin Requirement is calculated, the Company will apply to it a Credit Risk Rating as a modification factor to determine whether a reduction or increase will be made. Once the Company determines whether a reduction or increase will be made, the result, even if there is no reduction or increase, will be the Computed Margin Requirement. The Credit Risk Rating will be based on the Company's Credit Risk Rating Matrix, which evaluates the credit risks posed by Participants to each other.

5.4.2.1B Credit Risk Rating. The Company will assign to each Participant and Settling Bank (as described in Rule 13) a Credit Risk Rating based on certain quantitative, and when available, publicly accessible, credit factors. The Credit Risk Ratings assigned are based on a five (5) point credit rating system, with tier one (Tier 1) being the strongest and tier seven (Tier 7) being the weakest. A Credit Risk Rating for a Participant will be reassessed as provided in this Rule 5B and Rule 2B. A Credit Risk Rating for a Settling Bank will be reassessed as provided in this Rule 5B and Rule 13.

5.4.2.2B Factors Used in Determination of the Credit Risk Rating. When determining a Credit Risk Rating for a Participant or a Settling Bank, the Company will take into account the following as they apply to the Participant or Settling Bank:

- (a) the availability of actively traded five (5) year credit default swaps applicable to the Participant;
- (b) credit ratings from any publicly available credit rating services;
- (c) capital, assets, earnings and liquidity; and
- (d) the Participant's creditworthiness and operational capabilities.

5.4.2.3B Procedures Related to Credit Risk Rating.

- (a) Board Approval of Credit Risk Ratings; Participant Appeal Rights. Upon admission to the Company as a Participant, the Company will assign to the Participant a Credit Risk Rating. All Credit Risk Ratings

will be reviewed and approved by the Board prior to admission of the Participant. Should a Participant seek a reduction to its Credit Risk Rating, it may appeal the Credit Risk Rating determination to the Board, pursuant to Rule 10.

(b) Access to Potential Counterparty Pairs Credit Risk Rating. Prior to commencing its participation in the Company, each Participant must elect pursuant to Rule 2D the other Participants with which it agrees to settle Settlement Obligations on the Paxos Settlement Service. In order to evaluate Participants as potential Counterparty Pairs, any admitted Participant may request access to another Participant's Credit Risk Rating and agrees to provide its own Credit Risk Rating to that Participant. The Company, only upon written approval by such other Participant, will release the Credit Risk Rating of that Participant to the requesting Participant.

For example, assume Participant E is newly admitted as a Participant. Participant E requests the Credit Risk Ratings of Participants A, B, C and D. Participants A, B and C provide written approval to the Company to release their Credit Risk Ratings to Participant E and, in exchange, they will receive from the Company Participant E's Credit Risk Rating. Participant D declines the request and therefore the Credit Risk Rating for Participant D is not provided to Participant E.

(c) Request for Increased Credit Risk Rating. Upon written request from a Participant, the Company will increase its Credit Risk Rating (e.g., from Tier 1 to Tier 2, Tier 1 to Tier 3, etc.).

(d) Annual Participant Advisory Committee Review of Credit Risk Rating Factors. No less than annually, the Participant Advisory Committee will review and make recommendations to the Board regarding the factors used to determine a Credit Risk Rating, as described in Rule 5.4.2.2B, and the tiers and accompanying modifications, as described in Rule 5.4.2.4B below. No less than annually, the Board of the Company will review and approve those same Credit Risk Rating factors and the tiers and modifications.

(e) Annual Board of Directors Review of Participants' Credit Risk Ratings. Not less than annually, and taking into account any recommendations made by the Participant Advisory Committee as described in (d) immediately above, the Board will review the factors used to determine a Credit Risk Rating, as described in Rule 5.4.2.2B and the tiers and accompanying modifications, as described in Rule 5.4.2.4B, and the Board will also review and approve all Participants' Credit Risk Ratings.

5.4.2.4B Impact of Credit Risk Rating on Preliminary Computed Margin Requirement. A Participant's Credit Risk Rating will modify its Preliminary Computed Margin Requirement as follows:

Tiers	Modification to Preliminary Computed Margin Requirement
Tier 1	Reduction by fifty percent (50%)
Tier 2	Reduction by forty percent (40%)
Tier 3	Reduction by thirty percent (30%)
Tier 4	Reduction by twenty percent (20%)
Tier 5	No modification
Tier 6	Increase by ten percent (10%)
Tier 7	Increase by twenty percent (20%)

5.4.2.5B Market Conditions. Upon the occurrence of certain market conditions, as described below, the Company will modify each Participant's Credit Risk Rating.

The following market conditions will trigger Rule 5.4.2.5B:

- (a) if the VIX[®] volatility index of Cboe Exchange, Inc., or any successor interest to the VIX[®], is greater than forty (40), or if the U.S. equities markets are closed and the Company reasonably determines that, if the U.S. equities markets were open, the VIX[®] would be greater than forty (40), each Participant's Credit Risk Rating will go up one (1) tier (*e.g.*, a Tier 1 Participant would move to Tier 2);
- (b) if the VIX[®] is greater than fifty (50), or if U.S. equities markets are closed and the Company reasonably determines that, if the U.S. equities markets were open, the VIX[®] would be greater than fifty (50), each Participant's Credit Risk Rating will go up two (2) tiers (*e.g.*, a Tier 2 Participant would move to Tier 4); or
- (c) if the Compliance and Risk Management Committee determines in its reasonable discretion that, for the stability of the financial markets it is appropriate, with prior notice to the SEC, that each Participant's Credit Risk Rating should increase to reflect volatile market conditions.

5.4.3B Fails Charges. In the event that a Participant has a Fail to deliver either Operating Cash or Eligible Securities on the Settlement Date for a Settlement Obligation, the Participant will be charged an additional twenty percent (20%) of the portion of its Computed Margin Requirement that is attributable to the Settlement Obligation(s) for which there is a Fail. This charge is referred to in the Rules as a Fails Charge. For example, if the portion of the Computed Margin Requirement that is attributable to a Settlement Obligation for which there is a Fail is one hundred dollars (\$100) then the additional Fails Charge would be twenty dollars (\$20). A Fails Charge will be required to

collateralize the Fail for as long as the Fail persists. The amount of the Computed Margin Requirement plus any Fails Charges is also referred to in the Rules as the Computed Margin Requirement, as the context requires.

5.4.4B Penalties for Excessive Fails. A Participant will be subject to penalties for excessive Fails, as described below, and such penalties are referred to in the Rules as Excessive Fails Penalties. The amount of the Computed Margin Requirement plus any Excessive Fails Penalties is also referred to in the Rules as the Computed Margin Requirement for a Participant, as the context requires.

(a) In the event that the total market value of a Participant's Fails exceeds twenty percent (20%) of that Participant's total Unsettled Settlement Obligations to all of its Counterparty Pairs, that Participant automatically will be required to post Margin Assets equal to fifty percent (50%) of the market value of its total Unsettled Settlement Obligations.

(b) In the event that the total market value of a Participant's Fails exceeds thirty percent (30%) of that Participant's total Unsettled Settlement Obligations to all of its Counterparty Pairs, that Participant automatically will be required to post Margin Assets equal to one hundred percent (100%) of the market value of its total Unsettled Settlement Obligations.

(c) In the event that the total market value of a Participant's Fails exceeds fifty percent (50%) of that Participant's total Unsettled Settlement Obligations to all of its Counterparty Pairs, that Participant automatically will be subject to Rule 7.2, and the Company may cease to act on its behalf.

5.5B Intraday Computed Margin Requirement. The Company will calculate each Participant's Computed Margin Requirement at the end of each Business Day, pursuant to Rule 5C. In addition, on a continuous basis throughout the course of the next Business Day, the Company will recalculate the applicable Computed Margin Requirement and the results are referred to as Intraday Computed Margin Requirements. The difference between an Intraday Computed Margin Requirement and the Computed Margin Requirement is referred to as the Intraday Additional Computed Margin Requirement. If at any time during a Business Day, a Participant's Intraday Computed Margin Requirement exceeds the last calculated Computed Margin Requirement by twenty-five percent (25%) and the amount of the Intraday Additional Margin Requirement exceeds ten thousand dollars (\$10,000), then the Participant must post Margin Assets equal in value to the Intraday Additional Computed Margin Requirement. An Intraday Computed Margin Requirement that results in this obligation to post such Margin Assets equal to the Intraday Additional Margin Requirement will be substituted as the Computed Margin Requirement for the Participant. If the resulting Computed Margin Requirement is greater than the Initial Margin Deposit and Minimum Required Margin Deposit for the Participant then such Computed Margin Requirement will be the Required Margin Amount for the Participant, as specified in Rule 5.3B.

5.6B Backtesting. At least once each Business Day, the Company will conduct a backtest of the margin methodology described in this Rule 5B using predetermined parameters and assumptions. For purposes of this Rule 5B, the term “backtest” means an ex-post comparison of actual outcomes with expected outcomes derived from the Company’s use of the margin model.

5.7B Sensitivity Analysis. At least monthly, the Company will conduct a sensitivity analysis of the margin methodology described in this Rule 5B and a review of its parameters and assumptions for backtesting. The Company will conduct such a sensitivity analysis more frequently than monthly during periods when the Company, in consultation with the Compliance and Risk Management Committee, determines that the Eligible Securities that it clears and settles or the markets that it serves display high volatility (for example if the VIX[®] volatility index of Cboe Exchange, Inc., or any successor interest to the VIX[®], is greater than forty (40), or if the U.S. equities markets are closed and the Company reasonably determines that, if the U.S. equities markets were open, the VIX[®] would be greater than forty (40)) or become less liquid or when the size or concentration of Settlement Obligations of Participants increases or decreases significantly. Based on the sensitivity analysis, the Company will consider modifications to ensure its backtesting practices are appropriate for determining the adequacy of the Margin Assets required under the margin methodology. For purposes of this Rule 5B, the term “sensitivity analysis” means an analysis that involves analyzing the sensitivity of the margin methodology to its assumptions, parameters, and inputs.

5.8B Model Validation. At least annually, the Company will perform a model validation of the margin methodology described in this Rule 5B. For purposes of this Rule 5B, the term “model validation” means an evaluation of the performance of the margin methodology described in this Rule 5B (including the related parameters and assumptions) that is performed by a qualified person who is free from influence from the persons responsible for the development or operation of the margin methodology and any related rules, policies or procedures that are associated with the margin methodology.