

January 29, 2018

## **VIA COMMISSION PORTAL**

Christopher J. Kirkpatrick Secretary, Commodity Futures Trading Commission Three Lafayette Centre 1155 21st Street, N.W. Washington, D.C. 20581

Re: Commission Regulation 40.2(a) – Certification of USDBTC Day-Ahead Options LedgerX LLC Submission No. 18-03

Dear Mr. Kirkpatrick:

LedgerX LLC ("<u>LedgerX</u>") hereby notifies the Commodity Futures Trading Commission (the "Commission"), pursuant to Commission Regulation 40.2(a), that it is certifying the USDBTC day-ahead options (the "Exchange Contract") for trading on LedgerX's swap execution facility ("SEF").

LedgerX will list the Exchange Contract no earlier than February 12, 2018.

This certification includes the following:

- The submission cover sheet, which shall be generated through the Commission's submission portal at the time of filing.
- A concise explanation and analysis of the Exchange Contract, attached as Exhibit A.
- A copy of the Exchange Contract's rules, which will be published as contract specifications on LedgerX's website, attached as <u>Exhibit B</u>.
- A concise explanation and analysis of the Exchange Contract's compliance with applicable provisions of the Commodity Exchange Act (the "CEA"), including the Core Principles, and the Commission's Regulations thereunder, attached as <a href="Exhibit C">Exhibit C</a>.

LedgerX certifies that the Exchange Contract complies with the CEA and Commission Regulations thereunder. LedgerX additionally certifies that it has concurrently posted a copy of this submission letter and the attachments hereto on LedgerX's website at <a href="https://ledgerx.com/">https://ledgerx.com/</a>.

\* \* \* \*



Please contact the undersigned at (917) 935-6727 or <u>alex@ledgerx.com</u> if you have any questions or you would otherwise like to discuss this further.

Sincerely,

Alex C. Levine

Chief Compliance Officer

alex C. Levine

LedgerX LLC





#### Exhibit A

Below is a concise explanation of the Exchange Contract:

The Exchange Contract is a fully-collateralized USD-priced option on bitcoin. The Exchange Contract will provide a purchaser, in exchange for a premium, the right (but not the obligation) to purchase, in the case of a call option, or sell, in the case of a put option, bitcoin at the price specified in the applicable Exchange Contract at the expiration of such Exchange Contract. Participants who choose to write call options and/or put options will have the obligation to sell, in the case of a call option, or purchase, in the case of a put option, bitcoin at the price specified in the applicable Exchange Contract at the expiration of such Exchange Contract, in each case to the extent that the corresponding long holders of such options elect to exercise.

A Participant must post with LedgerX the maximum potential loss on a bitcoin option position prior to executing an Exchange Contract. In the case of a Participant who is selling a call, the Participant must deliver to LedgerX the full quantity of deliverable bitcoin underlying the call option prior to entering the order. If the call is exercised, the Participant's bitcoin collateral is used to satisfy delivery. In the case of a Participant who is selling a put, the Participant must deliver to LedgerX the full USD strike price underlying the put option prior to entering the order. If the put is exercised, the Participant's USD collateral is used to satisfy delivery.

For more information, the Exchange Contract's contract specifications are attached as Exhibit B.



#### Exhibit B

## Rule 12.4 Day-Ahead USD/BTC Options

- A. Contract Description. Generally speaking, an option is an agreement that grants the option purchaser, in exchange for a premium, the right, but not the obligation, to purchase from (in the case of a call option) or to sell to (in the case of a put option) the option writer, at a specified exercise or "strike" price, and at specified time(s) or within a specified period, a specified underlying interest. Participants may enter into USDBTC Day-Ahead Options as buyers or sellers of calls and/or puts. This Rule 12.4 pertains to options on bitcoin (as described further herein) and contains general Contract terms and conditions.
- **B. Bitcoin**. Bitcoin is a computer network and protocol that allows digital currency to be stored and transferred in a distributed manner without the need for a central intermediary. The Bitcoin network is a form of blockchain, which allows consensus to be built and maintained on a distributed, decentralized basis by parties with no inherent reason to trust one another. Each individual bitcoin transaction is validated by the network of decentralized parties, or nodes, over a period of time and then added to a "block", which is then cryptographically linked to the immediately preceding block (over time, creating a chain, or a "blockchain").
- C. Trading Hours. The Trading Hours of the Exchange's Swap Execution Facility that are applicable to the USDBTC Day-Ahead Option described in this Rule 12.4 will be 24 hours a day, seven days a week; provided, that, with respect to a USBTC Day-Ahead Option with any given tenor and/or strike, the Exchange may establish different Trading Hours by providing notice to participants on its Website and by Participant Notice.
- **D. Currency**. The currency applicable to USDBTC Day-Ahead Options will be United States dollars, expressed as dollars and cents per bitcoin.



- **E. Underlying**. The USDBTC Day-Ahead Option underlying will be bitcoin (sometimes referred to as "BTC").
- F. Contract Size. Each USDBTC Day-Ahead Option will be one bitcoin.
- **G. Position Limits.** No person will own or control positions in excess of: 100,000 USDBTC Day-Ahead Options net long or net short; or
- **H. Collateral**. All Exchange Contracts will be fully collateralized. Each Participant must post the maximum potential loss on a USDBTC Day-Ahead Option prior to executing a USDBTC Day-Ahead Option.
- I. Option Conventions.
  - a. *Traded Price*. The traded price on the Trade Date.
  - b. *Strike Price*. As of any Trade Date, (i) a range of approximately 15% up and 15% down from the approximate prevailing spot market price as of such date, with increments of \$50.00, (ii) a smaller number of additional strikes in increments ranging from \$100.00 to \$1000.00 for prices between 20% and 300% of the approximate prevailing spot market price as of such date, and (iii) any previously-listed strikes with remaining open interest, in each case as may be determined and listed from time to time by the Exchange in its sole discretion.
  - c. Daily Settlement Price. None. Because all Exchange Contracts are fully collateralized and physically settled, it is not necessary for the Exchange to publish a settlement price. Each Participant determines whether the intrinsic value of the underlying is greater than the



relevant Strike Price as of the Last Trading Date and makes a corresponding decision as to exercise.

- d. Business Day Convention. Previous.
- e. Exercise Type. European.
- f. Last Trading Time. With respect to any USDBTC Day-Ahead Option, 4:00pm New York time (EDT/EST) on the Trade Date applicable thereto.
- g. *Settlement*. With respect to any USDBTC Day-Ahead Option, physical delivery will occur on the Final Payment Date applicable thereto.
- h. *Final Payment Date*. With respect to any USDBTC Day-Ahead Option, the Business Day next succeeding the Trade Date applicable thereto.

#### J. Exercise

On the Last Trading Date, Participants submit or update exercise instructions for any long USDBTC Day-Ahead Option positions. All exercise instructions are processed on the Last Trading Date not earlier than 5:00pm ET.

Because the Exchange does not publish a settlement price, there is no provision for automatic exercise of Exchange Contracts.



## Exhibit C

LedgerX has determined that the Exchange Contract certified herein relate to the following SEF Core Principles:

# SEF Core Principle 2 – Compliance with Rules

Trading in the Exchange Contract will be subject to the LedgerX Rulebook (the "Rules"), which prohibits abusive trading practices, including, but not limited to, the following: fraudulent trading (Rule 8.3.C); spoofing or any other conduct that constitutes a disruptive trading practice or is otherwise prohibited under CEA Section 4c(a)(5) or applicable CFTC Regulations (Rules 8.3.J, 8.3.N and 8.9); any manipulation proscribed under CEA Section 9(a)(2) or CFTC Regulations 180.1(a) or 180.2 (Rules 8.3.K and 8.9); making fictitious bids or offers (Rules 8.3.M and 8.9); or any other activity that tends to impair the welfare, reputation, integrity or good name of LedgerX (Rule 8.5).

As with all swaps and options listed for trading on LedgerX's SEF, trading activity in the Exchange Contract will be subject to monitoring and surveillance by LedgerX's Compliance Department. LedgerX has the authority to exercise its investigatory and enforcement power where potential Rule violations are identified. See Chapter 9 of the Rules.

## SEF Core Principle 3 – Swaps Not Readily Susceptible to Manipulation

LedgerX's market for bitcoin option contracts is inherently not susceptible to manipulation because LedgerX's DCO is based on a fully-collateralized model and is not tied to any specific settlement price.

LedgerX's fully-collateralized model limits the ability of Participants to manipulate the market through corners and squeezes. For example, if the price of bitcoin rises over a very short time period, an attempt to squeeze the market likely would be unsuccessful. A Participant selling a call would not need to cover the position by purchasing more bitcoin because the Participant will have already posted the bitcoin underlying the contract with LedgerX pursuant to the fully-collateralized model. As a result, the Participant will not experience a squeeze and an attempt to squeeze the LedgerX market likely would be unsuccessful. The fully-collateralized model makes an attempt to corner the market less likely to occur because such attempt would be more expensive. A Participant could buy and exercise call contracts and begin to store bitcoin, but only to the extent that the Participant has sufficient funds to fully-collateralize each call contract. Moreover, an attempt to corner the market would be further limited by LedgerX's imposition of position limits.

Because LedgerX does not publish or rely upon a settlement price, any attempt by a Participant to manipulate the price of the underlying in order to force or prevent exercise would have no effect. This reduces the effect of strategies such as capping and pegging, both of which could otherwise be problematic in a market where the underlying is thinly traded.



# SEF Core Principle 4 - Monitoring of Trading and Trade Processing

Rule 8.9 prohibits traders from attempting to manipulate, or manipulating the market, in any swap listed on LedgerX's SEF, including any manipulation or attempted manipulation of the swap's underlying. This prohibition would include manipulation and attempted manipulation of the Exchange Contract and the underlying for the Exchange Contract. This Rule is enforced by LedgerX in accordance with Chapter 9 of the Rules.

## SEF Core Principle 5 – Ability to Obtain Information

Pursuant to its Rules, LedgerX has the ability and authority to obtain sufficient information for the Exchange Contract to allow LedgerX to fully perform its operational, risk management, governance and regulatory functions and requirements under Part 37 of Commission Regulations.

#### **SEF Core Principle 6 – Position Limits or Accountability**

Rules 8.15 and 8.16 allow LedgerX to adopt position limits or position accountability levels for swaps listed on LedgerX's SEF. LedgerX has elected to set position limits as described above in Exhibit B in order to (i) add a further layer of protection for market participants by mitigating the risk of market manipulation and (ii) prevent excess speculation in the Underlying.

# **SEF Core Principle 7 – Financial Integrity of Transactions**

Rule 6.1.A describes the process by which LedgerX verifies sufficient funds and/or collateral prior to accepting an order in any swap, including an order in the Exchange Contract. Specifically, upon submission of an order, LedgerX will conduct a review of the relevant participant's collateral account to ensure that the participant can fully collateralize the order prior to entering into the Exchange Contract. If the relevant participant's collateral account does not have the necessary funds and/or collateral for the order, LedgerX will not accept the order. Once orders in the Exchange Contract have been successfully matched, LedgerX's derivatives clearing organization will immediately clear the Exchange Contract in accordance with Rule 6.1.B.

#### **SEF Core Principle 8 – Emergency Authority**

Pursuant to Rule 2.12, LedgerX may take necessary or appropriate actions in response to an emergency affecting trading or open positions in the Exchange Contract, including the following: (i) suspend or curtail trading in, or limit trading to liquidation, for the Exchange Contract; (ii) extend or shorten the last trading date for the Exchange Contract; (iii) provide alternative settlement mechanisms for the Exchange Contract (including by altering the settlement terms or conditions or fixing the settlement price) or suspend the transfer of the underlying; (iv) order the transfer or liquidation of open positions in the Exchange Contract under certain circumstances; (v) extend, shorten or change the trading hours or the expiration date of the Exchange Contract; (vi) require participants to meet special margin requirements; (vii) order the transfer of positions in the



Exchange Contract and the associated margin or alter the Exchange Contract's settlement terms or conditions; or (viii) impose or modify position limits, price limits, and intraday market restrictions.

# **SEF Core Principle 9 – Timely Publication of Trading Information**

In accordance with Rule 2.17, LedgerX will publish daily information on the Exchange Contract regarding settlement prices, volume, open interest, and opening and closing ranges.

LedgerX will submit electronic reports of all reportable swap data for each executed Exchange Contract to a registered swap data repository immediately following execution of the Exchange Contract. See Rule 6.17. All such reports will meet the standards set out in Parts 43 and 45 of Commission Regulations.

