MINUTES OF THE SEPTEMBER 28, 2022 MEETING OF THE U.S. COMMODITY FUTURES TRADING COMMISSION'S MARKET RISK ADVISORY COMMITTEE

The Market Risk Advisory Committee ("MRAC") convened for a public meeting on Wednesday, September 28, 2022, at 9:33 a.m., at the U.S. Commodity Futures Trading Commission's ("CFTC" or "Commission") Headquarters Conference Center, located at Three Lafayette Centre, 1155 21st Street, N.W., Washington, D.C. The meeting consisted of five panels. Panel I provided an overview on perspectives of the future of finance. Panel II discussed climate-related market risks. Panel III examined interest rate benchmark reform and the transition away from the London Inter-Bank Offered Rate ("LIBOR"). Panel IV discussed center counterparty ("CCP") risk and governance and the transition of CCP services to the cloud. Panel V addressed market structure.

MRAC Members in Attendance

Alicia Crighton, Chair of the Board of Directors, Futures Industry Association

Robert Allen, President and Global Head of Fenics Rates, FMX Futures Exchange, LP

James Andrus, Interim Managing Investment Director, California Public Employee's Retirement System

Ann Battle, Senior Counsel, Market Transitions & Head of Benchmark Reform, International Swaps and Derivatives Association

Stephen Berger, Managing Director, Global Head of Government & Regulatory Policy, Citadel LLC

Alessandro Cocco, Vice President and Head of Financial Markets Group, Federal Reserve Bank of Chicago

Biswarup Chatterjee, Managing Director and Head of Innovation for the Global Markets Division, Citigroup

Neil Constable, Head of Quantitative Research and Investments, Fidelity

Tim Cuddihy, Managing Director, Financial Risk Management, Depository Trust and Clearing Corporation

Ed Dasso, Senior Vice President-Market Regulation, National Futures Association

Graham Harper, Head of Policy and Market Structure at DRW, FIA Principal Traders Group

Lindsay Hopkins, Chief Corporate Counsel, MGEX Clearing, Minneapolis Grain Exchange, LLC

David Horner, Chief Risk Officer, LCH Ltd, London Stock Exchange Group

Annette Hunter, Senior Vice President and Director of Business Operations for Federal Home Loan Bank of Atlanta, Federal Home Loan Banks

Demetri Karousos, President and Chief Operating Officer, Nodal Exchange, LLC

Eileen Kiely, Managing Director, BlackRock

Elisabeth Kirby, Managing Director and Head of Market Structure, Tradeweb Markets

Derek Kleinbauer, President, Bloomberg SEF LLC

Ernie Kohnke, General Counsel Vitol, Commodity Market Council

Jonathan Levin, Co-Founder and Chief Strategy Officer, Chainalysis, Inc.

Chip Lowry, Board Member, Foreign Exchange Professionals Association

Purvi Maniar, Deputy General Counsel, FalconX Bravo Inc.

Craig Messinger, Vice Chairman, Virtu Financial, Inc.

Andrew Nash, Managing Director and Head of Regulatory Affairs, Morgan Stanley

Ashwini Panse, Head of Risk Oversight for ICE Clear Netherlands, and Chief Risk Officer for the North American Clearinghouses, Intercontinental Exchange, Inc.

Andrew Park, Senior Policy Analyst, Americans for Financial Reform

Christine Parker, Vice President, Deputy General Counsel, Coinbase

Todd Phillips, Director, Financial Regulation and Corporate Governance, Center for American Progress

Jessica Renier, Managing Director, Digital Finance, Institute of International Finance

Marnie Rosenberg, Managing Director, Global Head of Central Counterparty Credit Risk and Strategy, JPMorgan Chase & Co.

Tyson Slocum, Director, Public Citizen Energy Program, Public Citizen

Kristin Smith, Executive Director, Blockchain Association

Suzanne Sprague, Managing Director and Global Head of Clearing and Post-Trade Services, CME Group Inc.

Kevin Werbach, Wharton School, University of Pennsylvania (joined in part)

CFTC Commissioners and Staff in Attendance

Rostin Behnam, Chairman

Kristin N. Johnson, MRAC Sponsor and Commissioner

Christy Goldsmith Romero, Commissioner

Summer K. Mersinger, Commissioner

Caroline D. Pham, Commissioner

Bruce Fekrat, Chief Counsel to Commissioner Johnson and MRAC Designated Federal Officer ("DFO")

Marilee Dahlman, Special Counsel, Division of Market Oversight, MRAC Alternate Designated Federal Officer

Speakers in Attendance

Peter Zaman, Partner, Holman Fenwick Willan LLP Ryne Miller, General Counsel, FTX US

I. Opening Remarks

Mr. Fekrat, the DFO for the MRAC, called the meeting to order. Commissioner Johnson, the Sponsor of the MRAC, provided opening remarks. She welcomed all to the meeting and highlighted how the MRAC is critical to other regulators and to the development of the CFTC's regulations and policies, as well as industry best practice and standards. She emphasized that the MRAC is a critical forum in evaluating emerging developments in our financial markets and gave a preview of the morning's panels. She thanked and introduced the new MRAC Chair, Alicia Crighton, the other Commissioners, MRAC members and panelists in attendance, and CFTC staff who put together the meeting.

Next, Chairman Behnam gave opening remarks thanking Commissioner Johnson for her leadership and the CFTC staff for their hard work. Commissioner Goldsmith Romero echoed Chairman Behnam's remarks and also thanked the committee members for their contributions. She highlighted her main priority of finding specific ways to promote market resilience.

Specifically, she suggested the MRAC focus on a fulsome discussion of (1) market resilience related to climate-related risk, and (2) strengthening the resilience of clearinghouses.

Commissioners Mersinger and Pham gave pre-recorded opening remarks. Commissioner Mersinger highlighted the work of the MRAC generally and thanked Commissioner Johnson for her leadership and all the MRAC members for their knowledge and input. Commissioner Pham echoed Commissioner Mersinger and highlighted the important work of the MRAC, including its recent exploration of climate change issues and recommendations.

Following a rollcall of the MRAC, Commissioner Johnson provided an update on the status of the MRAC and its existing subcommittees, the CCP Risk and Governance Subcommittee, and the Interest Rate Benchmark Reform Subcommittee. Additionally, she provided a procedural roadmap for the meeting, including a vote on recommending that the Commission reestablish two former subcommittees: Climate-related Market Risk and Market Structure, and also establish a new subcommittee, the Future of Finance Subcommittee, which would provide advice and recommendations on risks in digital assets and markets that are dependent on financial technology innovations. Next, Ms. Crighton gave an overview of the five panels on the agenda.

II. Panel 1: The Future of Finance

Ms. Crighton introduced the panelists. Ms. Renier began the discussion by noting that the recent downturn in the digital assets markets has highlighted the need to understand the potential risks associated with these markets. She suggested these risks be examined with certain ideas in mind: (1) where the same risks exist, there should be the same regulatory outcome; (2) investor protection and market structure should be examined; (3) market risk should be examined from the perspective of market integrity and market stability; (4) care should be taken to ensure regulation should not punish the use of technology.

Ms. Smith discussed the ability of market economies to find better ways of doing things. She stated that the reasons "why" participants want to use DeFi are similar to "why" people want to use traditional finance. The difference is the "how," and as a result, the risks are fundamentally different because the intermediaries may not exist or they exist in a different type of form. She stated that DeFi is in its research and development phase and she looks forward to participating in the MRAC to delve further into how to address the risks of this new technology.

Mr. Levin focused on three key points in his discussion. First, he stated that one of the key challenges is the amount of different currencies and suggested the MRAC could examine if there are a set of reference currencies in digital markets that drive the overall trajectory of the market. Second, he stated that having a good grasp of the data that exists on and off the blockchain between market participants and counterparty risks can be essential in understanding market integrity and risks. He further emphasized that regulators should lean on the technology to determine where to place reporting requirements versus recordkeeping requirements. Finally, he suggested that the MRAC focus on the intersection of national security and financial markets, including cryptocurrencies and how to better collaborate.

Ms. Parker stated that giving the CFTC authority over spot markets in digital assets is critically important to import similar but differentiated core principles from designated contract markets and to provide those same protections to market participants that are trading in the spot markets.

Mr. Phillips stated that calling the subcommittee the Future of Finance implied that the blockchain is the future of finance and whether it is remains unknown. He suggested the subcommittee be renamed the blockchain subcommittee. He also stated the subcommittee needs to focus on issues that are within the CFTC's jurisdiction. This includes derivatives that are clearly within the scope of the anti-fraud and anti-manipulation authority that the CFTC has over spot markets.

Ms. Crighton opened the floor to questions and comments from the MRAC membership. Generally, the concerns and discussion raised in this session included: support for the subcommittee; how blockchain also provides a lot of operational benefits when it comes to resiliency, transparency, trade reporting; thinking about regulation on an incremental and an iterative basis; and the importance of understanding the risk from a more widespread implementation of decentralized ledger technology and explaining the purpose of digital currencies and cryptocurrencies within our economic system. There was then a motion that was seconded for the MRAC to vote on a recommendation to the Commission that the Commission create a Future of Finance subcommittee. Following further discussion, the MRAC voted on the motion which was unanimously approved.

III. Panel II: Climate-Related Market Risk

Next, Ms. Crighton introduced the speaker for the Climate-Related Market Risk panel. Mr. Zaman provided an overview of recent significant developments at the intersection of policy, regulation, and climate change. He started by talking about the Voluntary Carbon Markets Initiative ("VCMI") and the Integrity Council for Voluntary Carbon Markets ("ICVCM"), private sector initiatives to become standard setters for the voluntary carbon markets. He remarked that the ICVCM is focused on supply side issues and the VCMI is focused on demand side issues as part of a private, net-zero commitment to handle their Scope 3 emissions. It becomes a question of how much influence they have in reducing or persuading their suppliers to reduce their own carbon footprint and where to get quality carbon credits from. The ICVCM and VCMI have recognized that we need standardization in carbon credit creation to eventually have enough liquidity to create a strong market. Mr. Zaman also discussed the Climate Warehouse joint project (between the government of Singapore, the International Admissions Training Association, and the World Bank), which recognizes that in the world of the Paris Agreement, there is not a single overarching set of rules that everybody follows. He stated that the objective of the Climate Warehouse is to create a connecting infrastructure where registries that are not connected can still share their data on a common central data repository and thereby reduce double counting and improve compliance reporting. He also discussed the Ethereum Merge's main benefit of reducing the energy consumption related to blockchain. Finally, he discussed the nationalization risk when countries take command over the carbon abatement opportunities in their jurisdiction.

Ms. Crighton opened the floor to questions and comments from the MRAC membership. There was also a motion that was seconded for the MRAC to recommend to the Commission that the Commission re-establish the Climate-Related Market Risk subcommittee. Generally, the concerns and discussion raised in this session included: addressing climate-related risks within the derivative sector beyond the voluntary carbon markets; whether and what type of standards the CFTC should adopt; having a whole government approach for uniform regulation so there are less opportunities for arbitrage and misconduct; and increasing international collaboration. Following the discussion, Ms. Crighton called for a vote on the motion to re-establish the Climate-Related Market Risk subcommittee. The MRAC unanimously approved the motion.

[Recess.]

IV. Panel III: Interest Rate Benchmark Reform – Transition Away from LIBOR

Following the break, Mr. Fekrat called the meeting back to order, and Ms. Crighton introduced the next speaker. Ms. Battle stated she would discuss the transition way from LIBOR. She stated that the subcommittee should continue work until USD LIBOR no longer exists sometime next year. She went through the latest data for the adoption of SOFR, the alternative to US LIBOR. She remarked that SOFR has been making significant leaps on a month-to-month basis and is now well over 50 percent of the USD exposure. Ms. Battle also discussed the detailed legislation and protocols that would deal with the USD LIBOR exposure that existed prior to the move to SOFR and new transactions in the U.S. and in the U.K. and how they would be managed.

Ms. Crighton opened the floor to questions and comments from the MRAC membership and then the Commissioners. Commissioner Johnson stated these types of conversations are more necessary than ever as the diversity of voices around the table has increased.

V. Panel IV: CCP Risk and Governance and the Transition of CCP Services to the Cloud

Ms. Crighton introduced the panelists and made some initial remarks. She noted that the subcommittee has several workstreams related to CCP risk, in addition to governance, including margin, CCP capital, stress testing, and liquidity and transparency. Over many months the subcommittee came to consensus in two areas (margin and governance) and laid the groundwork identifying issues for public feedback in many other areas. With regards to governance, the subcommittee agreed to propose that (1) CCPs should be required to establish one or more risk forums to obtain views of a broad array of market participants in material risk decisions, and (2) the CFTC should codify the establishment and practice of risk management committees.

Ms. Kiely stated that BlackRock would be submitting a comment letter that provided their detailed views. Overall, she thought the proposal achieves many of the objectives sought by end investors with respect to DCO governance, specifically on representation. However, she also stated that representation does not fully balance the governance necessary for market safety and stability. She suggested additional consideration be given to requiring DCOs to actively solicit views from owner and participants.

Ms. Rosenberg echoed her support of the subcommittee's work in many areas and welcomed further discussion on requiring CCPs to formally consult with market participants to file any material rule changes with the CFTC; allowing risk committee members to consult with experts at their employer; the need for broad range measures to address margin pro-cyclicality and ensuring there are sufficient levels of margin; improved disclosures on margin and CCP capital; and transparency more generally.

Ms. Sprague then discussed the exponential growth of cloud computing in recent years and how it can help businesses scale quickly and more efficiently, while also providing best in class security and resiliency. She also stated the CME and Google Cloud have formed a 10-year strategic partnership under which CME will migrate its technology infrastructure to the cloud in a phased approach beginning with data and post-trade services, with later phases focusing on moving markets to the cloud. Through this partnership, CME will be able to provide market participants with enhanced risk management tools, increased access for more market participants, optimize IT infrastructure, and further automate non-trading operations.

Ms. Crighton then opened the floor to questions and comments from the MRAC membership. Generally, the concerns and discussion raised in this session included: support of the cloud approach to clearing; whether the CFTC has sufficient regulatory oversight of cloud service providers; how to ensure a smooth transition to the cloud; and whether there would be and conflicts with Google as the cloud service provider.

VI. Panel V: Market Structure

Ms. Crighton introduced the next panel. Mr. Chatterjee stated that as the market continues to evolve with changing economic conditions, industry must evolve and adopt, as well. He stated the discussion should revolve around three main pillars. The first pillar is safety and soundness, specifically the impact of various proposals on risk protection on a clearing system and the protection of assets. The second pillar to evaluate proposals are the quality and level of service that participants would get or expect to get from the clearing ecosystem including due diligence, know your customer "KYC", and anti-money laundering ("AML"). The final pillar to examine when evaluating proposals and market structure is the tradeoffs when it comes to complying with regulatory frameworks.

Ms. Kiely highlighted five key principles to consider in market structure proposals: (1) customer assets and positions must be protected; (2) incentive in the structure must be sufficiently aligned to protect investors; (3) credit risk in the system must be sufficiently managed; (4) losses given a default should be minimized; and (5) transparency and a legal framework must be in place to support the first four principles.

Ms. Sprague agreed with previous panelists and stated it is worthwhile considering hybrid models or evolving historical models to recreate layers of protection in financial resources, especially if there are no intermediaries similar to banks.

Mr. Miller generally agreed with what the other panelists said and suggested two points when considering market structure: (1) how to get a user into the ecosystem, and (2) how risk is assessed once the user is inside the ecosystem.

Ms. Crighton opened the floor to questions and comments from the MRAC membership. There was also a motion that was seconded for the MRAC to recommend to the Commission that the Commission re-establish the Market Structure subcommittee. Mr. Constable discussed the benefits of a hybrid proposal that incorporates the old and the new. Ms. Crighton then called for a vote on the motion to re-establish the Market Structure subcommittee. The MRAC unanimously approved the motion.

VII. Closing Remarks

In closing, Ms. Crighton and Commissioner Johnson expressed enthusiasm for the excellent discussion and stated they were looking forward to future discussions.

Mr. Fekrat adjourned the meeting at 12:28 p.m.

Alicia Crighton (

MRAC Chair