

Exhibit C.1

<u>Name</u>	Biographical Information
Jeffrey C. Sprecher	(a) Jeffrey C. Sprecher
•	(b) Director
Director	(c) Term commenced October 28, 2011. ICE Trade Vault Directors do not serve for a fixed term.
	(d) Mr. Sprecher has been a director of ICE Trade Vault for approximately nine years.
	(e-f) Jeff Sprecher is Founder, Chairman and CEO of Intercontinental Exchange, Inc. (NYSE: ICE) and Chairman of the New York Stock Exchange. Intercontinental Exchange is a Fortune 500 company. ICE was formed in 2000 and he has served as the Chief Executive Officer since May 2000 and as Chairman of the Board since November 2002.
	Sprecher acquired Continental Power Exchange (CPEX), the predecessor company to ICE, in 1997 to achieve his vision of an open, transparent electronic energy marketplace. Under his leadership, ICE has evolved from operating an energy market to a network of exchanges, including the New York Stock Exchange, clearing houses and information services customers rely upon to invest, trade and manage risk across global financial and commodity markets. ICE Data Services is a leader in serving the information and connectivity needs across financial markets. As the parent company of the New York Stock Exchange, the company helps raise more capital than any other exchange in the world, driving economic growth and transforming markets. ICE completed its initial public offering in 2005 on the NYSE and today has a market capitalization of over \$50 billion.
	Sprecher has led numerous strategic initiatives that have enabled ICE to expand from a single asset class - energy - into a broad range of asset classes today. These have included numerous acquisitions, including the International Petroleum Exchange of London (2001), the New York Board of Trade (2007), Creditex (2008), The Clearing Corporation (2009), the Climate Exchange (2010), NYSE Euronext (November 2013), Singapore Mercantile Exchange (2014), Interactive Data Corporation (2015), NGX (2017), BondPoint (2018), TMC (2018), Chicago Stock Exchange (2018) and MERSCORP Holdings, Inc. (2018). In addition to expanding through acquisitions, Sprecher has led numerous organic growth initiatives to



	modernize markets. ICE developed the first cleared OTC energy contracts (2002), built the first new major clearing house in the U.K. in over a
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	century (2008) and launched the world's leading clearing houses for credit derivatives (2009). ICE is also bringing transparency to the fixed income markets with data and execution through ICE Bonds as well as efficiency to the mortgage finance industry through ICE Mortgage Services. In 2018, ICE announced the formation of Bakkt, a regulated, global ecosystem for digital assets.
	Sprecher previously served as President of Western Power Group, Inc., a developer, owner and operator of large central-station power plants in California.
	Raised in Wisconsin, Sprecher earned a Bachelor of Science degree in Chemical Engineering from the University of Wisconsin at Madison and a Master of Business Administration from Pepperdine University in Malibu, California.
	(g) Business Affiliations:
	- BAKKT Holdings, LLC, Manager - BAKKT, LLC, Manager - Chicago Climate Futures Exchange, LLC, Director - ICE Clear Europe Limited, Director - ICE Clear Singapore Pte. Ltd., Director - ICE Data Management Group, LLC, Director - ICE Futures Europe, Director - ICE Futures Singapore Pte. Ltd., Director - ICE Futures U.S., Inc., Director - ICE Middle East Investments, LLC, Chief Executive Officer - ICE Mortgage Services, LLC, Director - ICE NGX U.S. Inc., Director - ICE Singapore Holdings Pte. Ltd., Director - ICE Trade Vault, LLC, Manager - Intercontinental Exchange Holdings, Inc., Chairman, Chief Executive Officer - Intercontinental Exchange Holdings, Inc., Director - Intercontinental Exchange, Inc., Chairman & CEO - Intercontinental Exchange, Inc., Chairman & Chief Executive Officer
	 New York Stock Exchange LLC, Chairman NYSE American LLC, Chairman NYSE Amex Options LLC, Chairman NYSE Arca, Inc., Chairman NYSE Chicago Holdings, Inc., Director NYSE Chicago, Inc., Director NYSE Group, Inc., Chairman
	- NYSE Holdings LLC, Manager



	- NYSE Market (DE), Inc., Chairman - NYSE National, Inc., Chairman - NYSE Technologies Canada Ltd., Director
	NYSE Technologies Connectivity, Inc., ChairmanSecurities Industry Automation Corporation, Director
<u>Name</u>	Biographical Information
	- Stock Clearing Corporation, Chairman
	(g) None.
Scott Hill	(a) Scott Hill
Director	(b) Director
	(c) Term commenced October 28, 2011. ICE Trade Vault Directors do not serve for a fixed term.
	(d) Mr. Hill has been a director of ICE Trade Vault for approximately nine years.
	(e) Scott Hill has served as Chief Financial Officer of Intercontinental Exchange, Inc. (NYSE: ICE) since May 2007. He is responsible for all aspects of ICE's finance and accounting functions, treasury, tax, audit and controls, business development, human resources and investor relations.
	Prior to joining ICE, Hill as Assistant Controller for Financial Forecasts and Measurements at IBM, where he oversaw worldwide financial performance and worked with all global business units and geographies. Hill began his career at IBM and held various accounting and financial positions in the U.S., Europe, and Japan, including Vice President and Controller of IBM Japan, and Assistant Controller, Financial Strategy and Budgets.
	He currently serves on the Board of Directors of VVC Exploration Corporation and serves on the Audit Committee. A native of Texas, Hill earned a Bachelor of Business Administration degree from the University of Texas and completed a Master of Business Administration at the Stern School of Business at New York University.
	(f) Business Affiliations:
	- 10531561 Canada Inc., Director - 10531561 Canada Inc., President - 5509794 Manitoba Inc., Director - Aether Ios Limited, Director - Aether Los Limited, Director



	- Alberta Watt Exchange Limited, Director
	- Alberta Watt Exchange Limited, Vice President
	- Archipelago Securities LLC, Secretary
	- Archipelago Trading Services Inc., Director
	- Archipelago Trading Services Inc., Secretary
	- Ballista Holdings LLC, Director
	- Ballista Holdings LLC, Vice President
<u>Name</u>	Biographical Information
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	- Brix Holding Company, LLC, Manager
	- Brix Holding Company, LLC, Vice President
	- Chatham Energy, LLC, Manager
	- Chatham Energy, LLC, Vice President
	- Chicago Climate Exchange, Inc., Assistant Treasurer
	- Chicago Climate Exchange, Inc., Director
	- Chicago Climate Futures Exchange, LLC, Assistant Treasurer
	- Chicago Climate Futures Exchange, LLC, Director
	- Chicago Exchange (Europe) Ltd, Director
	- Climate Exchange plc, Director
	- Credit Market Analysis USA, Inc., Director
	- Creditex Group Inc., Director
	- Creditex Group Inc., Vice President
	- Creditex Holdco Limited, Director
	- Creditex Holdco, LLC, Manager
	- Creditex Holdco, LLC, Vice President
	- Creditex LLC, Manager
	- CreditTrade Inc., Director
	- CreditTrade Inc., Vice President
	- Electric Railroad, LLC, Chief Financial Officer
	- Enterprises Aviation, LLC, Director
	- European Climate Exchange (London) Limited, Director
	- European Climate Exchange Limited, Director
	- Exchange Participations Limited, Director
	- Financial Data Exchange Limited, Director
	- Finexeo UK Limited, Director
	- FINRA/NYSE Trade Reporting Facility LLC, Chief Financial Officer
	- Glacier Lake Transmission Services Ltd., Chief Financial Officer
	- Glacier Lake Transmission Services Ltd., Director
	- Guaranty Clearing Corporation, Director
	- Highway Networks, LLC, Chief Financial Officer
	- ICE 4165, LLC, Manager
	- ICE 4165, LLC, President
	- ICE 5660, LLC, Director
	- ICE 5660, LLC, President
	- ICE Asia Holdings Limited, Director
	- ICE Atrium, Inc., Chief Financial Officer
	- ICE Atrium, Inc., Director
	- ICE Brazil Technology, LLC, Manager
	- IOE BIAZII TECHNOOY, EEC, Mahayet



	- ICE Brazil Technology, LLC, President
	- ICE Clear Canada, Inc., Director
	- ICE Clear Credit LLC, Manager
	- ICE Clear Europe Limited, Director
	- ICE Clear Netherlands B.V., Director
	- ICE Credit Hub, LLC, Managing Director
	- ICE Credit Hub, LLC, President
<u>Name</u>	Biographical Information
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_	- ICE Data Analytics, LLC, President
	- ICE Data Connectivity & Feeds, Inc., Director
	- ICE Data Connectivity & Feeds, Inc., Vice President
	- ICE Data Derivatives UK Limited, Director
	- ICE Data Derivatives, Inc., Director
	- ICE Data Derivatives, Inc., Vice President
	- ICE Data Holdings Limited, Director
	- ICE Data Indices, LLC, President
	- ICE Data Indices, ELC, 1 resident
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	- ICE Data Investment Group, LLC, President
	- ICE Data Management Group, LLC, Vice President
	- ICE Data Services Australia Pty Ltd, Director
	- ICE Data Services Europe Limited, Director
	- ICE Data Services Ireland Limited, Director
	- ICE Data Services Italy S.R.L., Director
	- ICE Data Services Limited, Director
	- ICE Data Services Singapore Pte. Ltd., Director
	- ICE Data Services Wireless LLC, Chief Financial Officer
	- ICE Data Services, Inc., Director
	- ICE Data Services, Inc., Vice President
	- ICE Education Limited, Director
	- ICE ETF Hub, LLC, Vice President
	- ICE Europe Parent Limited, Director
	- ICE Europe Partners LP, President and Treasurer
	- ICE Execution Services, LLC, Director
	- ICE Execution Services, LLC, President
	- ICE Futures Abu Dhabi Holdings Limited, Director
	- ICE Futures Canada, Inc., Director
	- ICE Futures Holdco No. 1 Limited, Director
	- ICE Futures Holdings Ltd, Director
	- ICE Markets Corporation, Director
	- ICE Markets Corporation, President
	- ICE Markets, Inc., Director
	- ICE Markets, Inc., President
	- ICE Middle East Investments, LLC, Vice President
	- ICE Mortgage Services, LLC, Vice President
	- ICE NGX Canada Inc., Vice President
	- ICE NGX U.S. Inc., Director
	- ICE NGX U.S. Inc., Vice President



	- ICE Overseas Limited, Director
	- ICE Processing, LLC, Manager
	- ICE Processing, LLC, Vice President
	- ICE Trade Vault Europe Limited, Director
	- ICE Trade Vault, LLC, Manager
	- ICE Trade Vault, LLC, Vice President
	- ICE U.S. OTC Commodity Markets, LLC, Director
<u>Name</u>	Biographical Information
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	- ICE U.S. OTC Commodity Markets, LLC, Vice President
	- ICE UK GP, LLC, Director
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	- ICE UK GP, LLC, President and Treasurer
	- ICE UK LP, LLC, Director
	- ICE UK LP, LLC, President and Treasurer
	- ICE US Holding Company GP LLC, Manager
	- ICE US Holding Company GP LLC, President
	- ICE US Holding Company LP, LLC, Director
	- ICE US Holding Company LP, LLC, President
	- IDCO Canada Holdings Inc., Director
	- IDCO Canada Holdings Inc., President
	- IDCO Overseas Capital Management Ltd., Director
	- IDCO Overseas Holdings Ltd., Director
	- IDCO Worldwide Holdings Ltd., Director
	- IDS International, Inc., Chief Financial Officer
	- IDS International, Inc., Director
	- Igloo Intermediate Corporation, Director
	- Igloo Intermediate Corporation, President
	- Imperium Centre Limited, Director
	- Insurance Futures Exchange Services Ltd, Director
	- Interactive Data Canada Inc., Director
	- Interactive Data Canada Inc., President
	- Interactive Data Holdings Corporation, Director
	- Interactive Data Holdings Corporation, President
	- Interactive Data Online Properties, Inc., Director
	- Interactive Data Online Properties Inc., President
	- Interactive Data Real-Time Group, Inc., Director
	- Interactive Data Real-Time Group, Inc., President
	- Intercontinental Exchange Holdings, Inc., Chief Financial Officer
	- Intercontinental Exchange Holdings, Inc., Director
	- Intercontinental Exchange Israel Ltd, Director
	- Intercontinental Exchange Property Protection, Inc., Chief Financial
	Officer
	- Intercontinental Exchange Property Protection, Inc., Director
	- Intercontinental Exchange, Inc., Chief Financial Officer
	- Intercontinental Exchange Holdings, Director
	- IntercontinentalExchange International, Inc., Director
	- IntercontinentalExchange International, Inc., President
	- Internet Services Telco, LLC, Chief Financial Officer



	- LIFFE (Holdings) Limited, Director
	- LIFFE Administration and Management, Director
	- LIFFE Services Limited, Director
	- MERSCORP Holdings, Inc., Senior Vice President
	- Mortgage Electronic Registration Systems, Inc., Vice President
	- New York Stock Exchange LLC, Senior Vice President & Chief Financial
	Officer
	- NSX Securities LLC, Vice President
	- NYSE (UK) Limited, Director
<u>Name</u>	Biographical Information
	- NYSE American LLC, Senior Vice President & Chief Financial Officer
	- NYSE Amex Options LLC, Senior Vice President & Chief Financial
	Officer
	- NYSE Arca, Inc., Senior Vice President & Chief Financial Officer
	- NYSE Arca, L.L.C., Senior Vice President & Chief Financial Officer
	- NYSE Chicago Holdings, Inc., Senior Vice President & Chief Financial
	Officer
	- NYSE Chicago, Inc., Senior Vice President & Chief Financial Officer
	- NYSE Group, Inc., SVP and Chief Financial Officer
	- NYSE Holdings LLC, SVP and Chief Financial Officer
	- NYSE Holdings UK Limited, Director
	- NYSE IP LLC, SVP and Chief Financial Officer
	- NYSE LIFFE Holdings, LLC, Director
	- NYSE LIFFE Holdings, LLC, President
	- NYSE LIFFE US LLC, Director
	- NYSE LIFFE US LLC, President
	- NYSE Market (DE), Inc., Senior Vice President & Chief Financial Officer
	- NYSE National, Inc., Senior Vice President & Chief Financial Officer
	- NYSE Technologies Connectivity, Inc., Chief Financial Officer
	- PDR Services LLC, Senior Vice President & Chief Financial Officer
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	- Pit Trader LLC, Manager
	- Pit Trader LLC, President
	- Quotevision Limited, Director
	- QW Holdings, LLC, Manager
	- QW Holdings, LLC, Vice President
	- Q-wixx B Sub, LLC, Manager
	- Q-wixx B Sub, LLC, Vice President
	- Radiate, Inc., Director
	- Radiate, Inc., President
	- Securities Evaluations, Inc., Director
	- Securities Evaluations, Inc., Vice President
	- Securities Industry Automation Corporation, Chief Financial Officer
	- Simplifile Holdings, Inc., Vice President
	- Simplifile LC, Vice President
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	- Stock Clearing Corporation, Chief Financial Officer
	- Strike Network Services, LLC, Chief Financial Officer
1	- StrikeNet, LLC, Chief Financial Officer



	- SuperDerivatives UK Limited, Director - Tap and Trade, Inc., Director - Tap and Trade, Inc., President - The Clearing Corporation, Director - The Clearing Corporation, Vice President - TradeCapture OTC Corp., Director - TradeCapture OTC Corp., President - TradeCapture OTC Holdings, Inc., Director
	TradeCapture OTC Holdings, Inc., PresidentTrebuchet Holdings LLC, DirectorTrebuchet Holdings LLC, President
<u>Name</u>	Biographical Information
	- Wireless Internetwork LLC, Chief Financial Officer - Wombat Technologies Development Limited, Director (g) None.
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Charlie Crisp	(a) Charlie Crisp
Independant Director	(b) Director (Independent Director)
	(c) Term commenced February 18, 2014. ICE Trade Vault Officers do not serve for a fixed term.
	(d) Mr. Crisp has been a director of ICE Trade Vault for approximately seven years.
	(e) Charles Crisp has been a director of Intercontinental Exchange, Inc. (NYSE: ICE) since 2002. He also serves as Chairman of ICE NGX and serves on the boards of ICE Futures U.S. and ICE Trade Vault, which are all subsidiaries of ICE.
	From 1999 until his retirement in 2000, Mr. Crisp served as President and Chief Executive Officer of Coral Energy, a Shell Oil affiliate responsible for wholesale natural gas and power marketing and trading services. He joined Coral Energy as president and Chief Operating Officer in 1998. From 1996 to 1997, Mr. Crisp was President of the power generation group of Houston Industries. He served as President and Chief Operating Officer of Tejas Gas Corporation from 1988 to 1996.
	Mr. Crisp currently serves as Director of EOG Resources, Inc., Targa Resources, Corp. as well as Targa Resources GP, LLC (a subsidiary of Targa Resources, Corp.) and Southern Company Gas, a subsidiary board of Southern Company. Prior to the acquisition of AGL Resources, Inc. by Southern Company, he served on the public company board of AGL Resources from 2003 to 2016.



	Mr. Crisp earned a Bachelor of Science degree in Chemical Engineering from Texas Tech University and completed the Program for Management Development at Harvard Graduate School of Business. (f) Business Affiliations: - ICE Futures U.S., Inc., Director - ICE NGX Canada Inc., Director - ICE Trade Vault, LLC, Director - Intercontinental Exchange, Inc., Audit Committee
	 Intercontinental Exchange, Inc., Compensation Committee Intercontinental Exchange, Inc., Director
Name	(g) None.
<u>Name</u>	Biographical Information
Trabue Bland	(a) Trabue Bland
President	(b) President
	(c) Term commenced June 1, 2016. ICE Trade Vault Officers do not serve for a fixed term.
	(d) Mr. Bland has been President of ICE Trade Vault for approximately four years.
	(e) Trabue Bland is President of ICE Futures U.S., a regulated futures exchange and a subsidiary of Intercontinental Exchange, Inc. (NYSE: ICE). He previously served as VP of Regulation where he managed ICE's regulatory efforts globally, with an emphasis on CFTC regulation.
	Prior to joining ICE in 2007, Bland was Legal Counsel to Acting Chairman Walter Lukken at the Commodity Futures Trading Commission. He was also a trial attorney in the Division of Enforcement and an attorney in the Division of Clearing and Intermediary Oversight.
	Before joining the Commission, Bland was in private practice at Balch and Bingham, LLP. He served on the staff of Senator Thad Cochran before attending law school. Bland is a graduate of Washington and Lee University and the University of Mississippi School of Law.
	(f) Business Affiliations:
	- ICE Clear U.S., Inc., Ex officio, President of ICE Futures US - ICE eConfirm, LLC, President - ICE Futures U.S., Inc., Director - ICE Futures U.S., Inc., President - ICE NGX Canada Inc., Director



Kara Dutta General Counsel	- ICE Trade Vault, LLC, President - Intercontinental Exchange Holdings, Inc., President, ICE Futures US - Intercontinental Exchange, Inc., President, ICE Futures US - NYSE Group, Inc., President, ICE Futures US (g) None. (a) Kara Dutta (b) General Counsel (c) Term commenced March 28, 2012. ICE Trade Vault Officers to not serve for a fixed term.
<u>Name</u>	Biographical Information
Molicea Patnala	 (d) Ms. Dutta has been General Counsel of the ICE Trade Vault for approximately eight years. (e) Ms. Dutta has been at ICE since 2012 where she has focused on regulatory and government affairs. She is also General Counsel of ICE Trade Vault, LLC. Prior to joining ICE, Ms. Dutta was Senior Counsel at Mirant/GenOn, the merchant utility formerly based in Atlanta. At Mirant, Ms. Dutta supported the energy trading business. Prior to joining Mirant, Ms. Dutta was a derivatives attorney at Lehman Brothers where she focused on supporting various entities in their derivatives trading business. Ms. Dutta holds a Juris Doctorate from the Benjamin Cardozo School of Law in New York and a Bachelor of Arts, cum laude, from the University of Florida where she was a member of the Phi Beta Kappa society. (f) None. (g) None.
Melissa Ratnala	(a) Melissa Ratnala
Chief Operating Officer	(b) Chief Operating Officer(c) Term commenced June 2, 2016. ICE Trade Vault Officers do not serve for a fixed term.(d) Ms. Ratnala has been Chief Operating Officer of ICE Trade Vault for approximately four years.



	 (e) Ms. Ratnala has been at ICE since 2013. Ms. Ratnala currently oversees the North American sales and operations of ICE's confirmation matching platform, ICE eConfirm and independent Swap Data Repository service, ICE Trade Vault. She has more than fifteen years of experience in the commodities industry with a focus on energy markets. Prior to joining ICE, Ms. Ratnala was Head of Power Settlements and Dealer Support for Macquarie Energy and spent over 10 years at Calpine Corporation, leading its Accounting, Settlements and ISO Operations teams. Ms. Ratnala holds a BS in Hospitality Management from the University of Houston and an MBA from Rice University. (f) None. (g) None.
<u>Name</u>	Biographical Information
Joseph Tramontana Chief Compliance Officer	 (a) Joseph Tramontana (b) Chief Compliance Officer (c) Term commenced May 22, 2018. ICE Trade Vault Officers do not serve for a fixed term. (d) Mr. Tramontana has been Chief Compliance Officer of ICE Trade Vault for approximately two years. (e) Ms. Tramontana joined ICE on October 19, 2015. Prior to joining ICE, he served as Executive Director of Post-Trade Technology at CME group where he spent over 15 years focusing on compliance, surveillance and swap data repository systems. Mr. Tramontana holds a Bachelor of Computer Science from Northern Illinois University. (f) None. (g) None.

