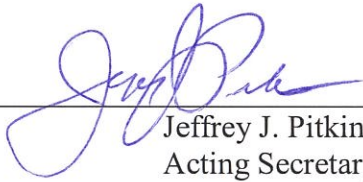


CERTIFICATE AS TO MINUTES

The undersigned, Secretary to the New York State Energy Research and Development Authority (“Authority”), hereby certifies that attached hereto is a complete and accurate copy of the minutes of the 245th Meeting of the Authority, duly held on January 28, 2020.

IN WITNESS WHEREOF, I have hereunto set my hand and the seal of the Authority this 21st day of February, 2020.



Jeffrey J. Pitkin
Acting Secretary

SEAL

NEW YORK STATE ENERGY RESEARCH AND DEVELOPMENT AUTHORITY

Minutes of the 245th Meeting

Held on January 28, 2020

Pursuant to a notice and agenda dated January 21, 2020 of the New York State Energy Research and Development Authority (“Authority”) a meeting was convened on January 28, 2020 at 1:30 p.m., at the office of the New York State Dormitory Authority (“DASNY”), One Penn Plaza, 52nd Floor, New York, New York, and in the Authority’s Albany Office at 17 Columbia Circle, Albany, New York. The two locations were connected by videoconference.

The following Members of the Authority were present:

Richard Kauffman, Chair

Sherburne Abbott

Charles Bell

Kate Fish

Jay Koh

John Rhodes

Basil Seggos (by videoconference in Albany)

Mark Willis

Members Kenneth Daly, Gil Quiniones, and Marie Therese Dominguez were unable to attend.

Also present were Alicia Barton, President and CEO; Janet Joseph, Senior Vice President for Strategy and Market Development; John Williams, Vice President for Policy and Regulatory Affairs; Jeffrey Pitkin, Treasurer; Peter Costello, Esq., General Counsel; Sara LeCain, Senior Counsel; Amber Sisson, New York Power Authority; Michael Bailey; Lynn Weiskopf, New York State Department of Transportation; and various other staff of the Authority.

Mr. Kauffman called the meeting to order and noted the presence of a quorum. The Notice and Agenda were forwarded to the Board members and the press on January 21, 2020.

Before turning to the formal Agenda, the Chair asked the Authority's President and CEO, Alicia Barton to provide the Members with an update on the Authority's recent activities.

Ms. Fish noted that it is important to recognize that changes in energy policy will result in job losses such as internal combustion engine repair shops and oil delivery trucks. She indicated that steps should be taken to ensure these losses do not result in a disrupted workforce. Ms. Barton agreed and indicated that new working groups will be developed to assist in these transitions.

Mr. Koh noted that 2019 was a banner year for the Authority. He also noted that it has been five years since the Paris Climate Change Agreement. He commended the New York State on its progress and the level of ambition as it is a positive note in an otherwise challenging environment.

Mr. Kauffman indicated that the first item on the Discussion Agenda was a report from Mark Willis, Chair of the Program Planning Committee ("PPC") on the items discussed by that Committee. Mr. Willis indicated that the PPC met just before the Board meeting and a quorum was present throughout.

Mr. Willis stated that first, the PPC received a report from Ms. Barton and Senior Vice President for Strategy and Market Development Janet Joseph on the Authority's strategic plan entitled *Toward A Clean Energy Future – A Strategic Outlook 2020-2023* ("Strategic Outlook"). The presentation summarized the Authority's plans and goals for the next three years.

Mr. Willis indicated that based upon the presentation and discussion, the PPC unanimously recommended that the full Board adopt the resolution approving the Strategic Outlook for the next three years.

Next, Mr. Willis explained that the PPC received a report from John Lochner, Vice President for Technology and Business Innovation. Mr. Lochner discussed the Authority's Innovation Portfolio and provided the PPC with his proposed plans for the next few years.

Lastly, Mr. Willis indicated the PPC received a report and recommendation from Treasurer Jeffrey Pitkin on the Authority's Fiscal Year 2020-2021 Budget, the details of which are in the Members' meeting package.

Mr. Willis stated that based upon the presentation and discussion, the PPC unanimously recommended that the full Board adopt the resolution regarding the Authority's Fiscal Year 2020-2021 Budget.

The Chair indicated that the next item on the Discussion Agenda was a report from Charles Bell, Chair of the Waste and Facilities Management Committee ("W&FMC") on the items considered by that Committee. Mr. Bell indicated that the W&FMC met earlier in the day and a quorum was present throughout.

Mr. Bell reported that the W&FMC received a presentation from Mr. Pitkin describing the significant Fiscal Year 2020-2021 Budget items that relate to the West Valley Site Management Program and to radioactive waste policy and nuclear coordination activities.

Mr. Bell indicated that based on Mr. Pitkin's report and the materials in the Board package, the W&FMC unanimously recommended that the Board approve the Budget for the West Valley Site Management Program ("West Valley") and radioactive waste policy and nuclear coordination activities.

Next, Mr. Bell explained that Alyse Peterson presented a brief report on the status of the nuclear coordination program, providing an update on Indian Point's decommissioning. She noted that Indian Point, a three-unit power plant in Westchester County, will be decommissioned after its remaining two operating reactors, Units 2 and 3, come offline in April of 2020 and 2021 respectively. Ms. Peterson reported that Entergy has filed license transfer paperwork with the

Nuclear Regulatory Commission and the New York State Public Service Commission (“PSC”) to sell the facility to a subsidiary of Holtec International for decommissioning. Holtec says it can decommission these facilities in under 15 years, compared to Entergy’s 60.

Mr. Bell added that the Authority and other state agencies support rapid decommissioning of Indian Point’s three units, but they have concerns for New York about Holtec’s limited liability structure. As such, Ms. Peterson noted that the Authority expects to participate in both the federal and PSC proceedings to express the State’s concerns.

Mr. Bell indicated that Mr. Bembia then provided a brief report on the status of West Valley, noting that recent federal legislation provided for an annual federal appropriation of up to \$75 million through 2026 at the West Valley Demonstration Project, a law which also requires the Government Accountability Office (“GAO”) to prepare a report for Congress on the West Valley wastes. Mr. Bembia noted that the GAO began its evaluation in mid-December 2019 and Authority staff met with the GAO on January 15, 2020 to provide a detailed briefing on the defense nature of the West Valley wastes.

Mr. Kauffman indicated that the next item on the Discussion Agenda was a report on the items considered by the Audit and Finance Committee (“A&FC”) by the Committee’s Chair, Jay Koh. Mr. Koh stated that the A&FC meeting was held earlier in the day and a quorum was present throughout.

Mr. Koh indicated that the A&FC received a presentation from Mr. Pitkin on the proposed issuance of Bonds to support the financing and re-financing of residential energy efficiency and solar loans issued through the Green Jobs – Green New York (“GJGNY”) program.

Mr. Koh explained that the structure of the Bonds is similar to the structure approved for the Series 2019A Bonds issued in March 2019 and the 2018A Bonds issued in March 2018. The Bonds will be secured by a pledge of program residential solar loan and energy efficiency loan repayments. Ramirez & Co., Inc., will once again serve as underwriters.

Mr. Koh noted that the Bonds will require the approval of the Public Authorities Control Board, and certain aspects of the transaction will require approval by the Office of the State Comptroller and the New York State Department of Taxation and Finance.

Mr. Koh stated that the A&FC unanimously recommended approval of the GJGNY Financing.

Next, Mr. Koh indicated that the A&FC received a report from the Director of Internal Audit, Mary Peck on her recent activities. Ms. Peck reported on recently completed audits and discussed her Audit Rotation Plan. The A&FC was able to ask questions and was satisfied with the discussion.

The Chair indicated that the last item on the Discussion Agenda was the proposed revisions to the Authority's Regional Greenhouse Gas Initiative ("RGGI") Operating Plan from the Authority's Vice President for Policy and Regulatory Affairs, John Williams. Mr. Williams presented the RGGI Operating Plan for the next three years, which included a balanced budget for each of the years over that time period. Additionally, Mr. Williams discussed the various program allocations.

Following Mr. Williams presentation, Mr. Koh commended staff on their ability to make projections and adjustments as the market changes.

Whereafter, upon motion duly made and seconded, and by voice vote of the Members present, the following resolution was adopted.

Resolution No. 1578

RESOLVED, that revisions to the "Operating Plan for Investments in New York Under the CO₂ Budget Trading Program and the CO₂ Allowance Auction Program" as presented to the Members for consideration at this meeting, with such non-substantive, editorial changes and supplementary schedules as the President and Chief Executive Officer, in her discretion, may deem necessary or appropriate, are recommended for adoption and approval by the Board;

AND BE IT FURTHER RESOLVED that the Members direct the President and Chief Executive Officer to develop a revised operating plan incorporating such revisions as soon as reasonably possible.

The Chair indicated that next the Members would consider the items on the Consent Agenda. Mr. Kauffman reminded the Members that at the October 8, 2019 Board meeting, the Members discussed moving some items to a Consent Agenda. The information on these items was included in the Members' meeting packet.

In response to an inquiry from Mr. Kauffman, Ms. LeCain stated that the first three items were considered by the Committees and were discussed earlier in the meeting. Ms. LeCain indicated that Resolution No. 1579 would approve the Authority's Fiscal Year 2020-2021 Budget, Resolution No. 1580 would approve the Strategic Outlook, and Resolution No. 1581 would approve the issuance of the GJGNY Bonds.

Mr. Kauffman stated that Resolution No. 1582 would approve revisions to the Authority's Conflict of Interest Policy for Board Members, Resolution No. 1583 would approve the appoint the Authority's General Counsel Peter J. Costello as Secretary to the Authority, and Resolution No. 1584 would approve the periodic contracts report. The Chair indicated that Counsel's Office had compared the list provided by Members of entities with which each Member is associated which he or she believes may enter into contracts with the Authority to the list of contracts in the periodic contracts report. Counsel's Office reports that there are no potential conflicts.

In response to an inquiry from Mr. Rhodes, Ms. Barton indicated that Mr. Costello had been formally named the Authority's General Counsel and this appointment would formalize his role as Secretary, a position that is traditionally held by the General Counsel. Mr. Koh added that Mr. Costello is a great addition to the senior management team.

Whereafter, upon motion duly made and seconded, and by voice vote of the Members present, the following resolutions were adopted.

Resolution No. 1579

RESOLVED, that the proposed fiscal year 2020-21 Budget and Financial Plan submitted to the Members for consideration at this meeting, with such non-material, editorial changes and supplementary schedules as the President and Chief Executive Officer, in her discretion, may deem necessary or appropriate, be and it hereby is recommended for approval by the Board for submission to the persons designated in Sections 1867(4) and 2801 of the Public Authorities Law.

Resolution No. 1580

RESOLVED, that the outlook for the Authority's energy, economic environmental program priorities and strategic vision entitled Toward a Clean Energy Future: A Strategic Outlook 2020-2023, submitted to the Members for consideration at this meeting with such non-substantive, editorial changes and supplementary schedules as the President, in her discretion, may deem necessary or appropriate, is recommended to be adopted and approved by the Board as the Authority's updated Strategic Outlook.

Resolution No. 1581

WHEREAS, pursuant to special act of the Legislature of the State of New York (Title 9 of Article 8 of the Public Authorities Law of New York, as from time to time amended and supplemented, herein called the "Act"), the New York State Energy Research and Development Authority (the "Authority") has been established as a body corporate and politic, constituting a public benefit corporation; and

WHEREAS, pursuant to the Act, the Authority is authorized to issue bonds and notes to provide sufficient moneys for achieving the Authority's corporate purposes, including the establishment of reserves to secure the bonds and notes and the payment of interest on bonds and notes; and

WHEREAS, pursuant to the Act, the Authority is also empowered to extend credit and make loans from bond proceeds to any person for the construction, acquisition, installation of, or for the reimbursement to any person for costs in connection with, any special energy project, including, but not limited to, any land, works, system, building, or other improvement, and all real and personal properties of any nature or any interest in any of them which are suitable for or related to the furnishing, generation, production, transmission, or distribution of energy or energy resources; and

WHEREAS, pursuant to special act of the Legislature of the State of New York (Title 9-A of Article 8 of the Public Authorities Law of New York, as from time to time amended and supplemented, herein called the "Green Jobs – Green

New York Program”), the Authority has been authorized to use innovative financing mechanisms to finance energy efficiency improvements and technologies eligible for net metering through energy cost savings; and

WHEREAS, the Authority will issue bonds in one or more series not later than January 29, 2021, in an aggregate principal amount not to exceed \$20,000,000 to be designated “Residential Solar and Energy Efficiency Financing Green Revenue Bonds, Series 2020A” (the “Bonds”) and with such additional or different designations as may be set forth in the Indenture (hereinafter defined) for the purpose of financing loans through the Green Jobs – Green New York Program for the installation of residential energy efficiency measures or photovoltaic (“PV”) systems (collectively “Loans”); and

WHEREAS, the Bonds are to be issued pursuant to an Indenture of Trust (the “Indenture”), between the Authority and The Bank of New York Mellon, as trustee (the “Trustee”), pursuant to which the Authority will pledge principal and interest payments on, and prepayments of, Loans as security for the Bonds and

WHEREAS, the Authority has entered into an agreement with Slipstream Group Incorporated d/b/a Energy Finance Solutions, a not-for-profit corporation, to serve as a loan originator under the Green Jobs – Green New York Program; and

WHEREAS, the Authority has entered into an agreement with Concord Servicing Corporation who will act as the loan servicer and will be the custodian of the original promissory notes for the Loans issued under the Green Jobs – Green New York Program; and

WHEREAS, the proceeds of the Bonds will be used to reimburse the Green Jobs-Green New York Program revolving loan fund for Loans heretofore originated and outstanding and to provide funding for new Loans originated and to be originated thereafter; and

WHEREAS, Ramircz & Co., Inc., acting as underwriter (the “Underwriter”), pursuant to the terms of a Bond Purchase Agreement among the Authority and the Underwriter (the “Purchase Contract”), propose to purchase the Bonds from the Authority and offer the Bonds to the public pursuant to the terms of such Purchase Contract; and

WHEREAS, it is expected that the Bonds will be offered by the Underwriter pursuant to a Preliminary Official Statement, as may be approved by an Authorized Representative (hereinafter referred to) of the Authority and an Official Statement to be approved by an Authorized Representative; and

NOW, THEREFORE, BE IT RESOLVED BY THE MEMBERS OF THE NEW YORK STATE ENERGY RESEARCH AND DEVELOPMENT AUTHORITY AS FOLLOWS:

Section 1. The offering, issuance, sale, and delivery of the Bonds upon the terms and conditions and for the purposes described in this resolution are hereby authorized. The Bonds shall be issued in one or more series in an aggregate principal amount not to exceed \$20,000,000 and shall bear interest at rates determined by the Chair, the Vice Chair, the President and CEO, the Chief Operating Officer, the Vice Presidents, the Treasurer, or the Secretary of the Authority (collectively, the "Authorized Representatives"). The Bonds shall bear interest at a weighted average fixed rate of interest not to exceed 7%. The Bonds shall mature no later than twenty years after the date of issuance. The Bonds shall be dated, have the final maturity, have the designation or designations, be subject to redemption, be payable as to principal, premium, if any, and interest, and have such other provisions all as set forth in the Indenture. The form of the Bonds and all other provisions with respect thereto shall be as set forth in the Indenture or determined in the manner set forth therein. No Bonds shall be issued pursuant to this resolution after January 29, 2021. Any bonds issued under this Resolution must have upon issuance a rating of A or higher, as assigned by a nationally recognized statistical rating organization.

Section 2. Subject to the limitations set forth in Section 1 hereof, the Authorized Representatives are each hereby authorized to determine on behalf of the Authority with respect to the Bonds: the aggregate principal amount, the interest rates the Bonds shall bear and the particular redemption and purchase provisions of the Bonds. Any such determination shall be conclusively evidenced by the execution and delivery by an Authorized Representative of an indenture or other document setting forth such determination.

Section 3. The Authorized Representatives are each hereby authorized to execute, acknowledge, and deliver the Indenture as such Authorized Representative shall approve. Execution of such documents by an Authorized Representative shall be conclusive evidence of any approval required by this Section. The Authorized Representatives are also authorized to secure a second party opinion that the Bonds meet the Green Bond Principals as set by International Capital Market Association and to execute any agreement required in order to secure such opinion. The Authorized Representatives are each further authorized to obtain bond insurance or other credit enhancement for the Bonds to the extent that such Authorized Representative determines that such credit enhancement would facilitate the sale of the bonds on a cost effective basis or lower the debt service on the Bonds and to enter into agreements with the providers of such credit enhancement.

Section 4. The Authority authorizes each Authorized Representative to enter into the Purchase Contract. The Authorized Representatives of the Authority are each hereby authorized to determine the purchase price of the Bonds and are

further authorized to execute, acknowledge, and deliver the Purchase Contract as may be approved by any such Authorized Representative. The execution of a Purchase Contract by any Authorized Representative shall be conclusive evidence of any determination or approval required or authorized by this Section. The purchase price to the Underwriters of the Bonds shall not be less than 97% of the principal thereof. In no event shall the compensation paid to the Underwriter in connection with the initial offering of the Bonds exceed 1% of the principal amount thereof whether such compensation is paid directly by the Authority or in the form of discount to the Underwriters. As an alternative to the execution of the Purchase Contract, the Authorized Representatives are authorized to execute a private placement agreement with a third party purchaser, with Ramirez & Co., Inc. acting as placement agent, should such a method of sale for the Bonds be determined by the Authorized Representatives to be a superior method of selling the Bonds.

Section 5. The Authority authorizes the Authorized Representatives to approve the Preliminary Official Statement and the Authority approves the use in accordance with the applicable legal requirements of one or more Preliminary Official Statements and Official Statements in connection with the offering and sale of the Bonds by the Underwriter, as may be approved by an Authorized Representative. Any Authorized Representative of the Authority is hereby authorized and directed to execute the final Official Statements in the name and on behalf of the Authority, and thereupon cause such final Official Statements to be delivered to the Underwriters. Any such approval shall be conclusively evidenced by such Authorized Representative's execution and delivery thereof. The Authorized Representatives are hereby authorized to provide any appropriate disclosure as part of the Preliminary Official Statements and Official Statements, including but not limited to the use of the Authority's financial statements. The foregoing approvals shall not be deemed to constitute an acknowledgment by the Authority of any responsibility for information contained therein which has been furnished by the Underwriters, The Depository Trust Company, or any other party. In the event that the Authorized Representatives determine that a sale of the Bonds through a private placement is a superior method of sale, the Authorized Representatives are hereby authorized to use a placement memorandum to facilitate such a sale, in accordance with the disclosure requirements outlined in this section for preliminary official statements and official statements.

Section 6. Wisconsin Energy Conservation Corporation d/b/a Energy Finance Solutions has been authorized to serve as loan originator for the pledged loans. Concord Servicing Corporation has been authorized to serve as loan servicer for the pledged loans and First Associates Loan Servicing, LLC is hereby authorized to serve as backup servicer. The Authorized Representative are hereby authorized to enter into any other agreements, documents, or amendments to existing agreements relating to the origination and servicing of the loans as necessary. The Authorized Representatives are hereby authorized to approve the appointment of a successor loan originator, loan servicer and backup loan servicer for the pledged loans as necessary.

Section 7. The Authorized Representatives are each hereby authorized to execute, acknowledge, and deliver any other agreements, documents, or certificates, including certificates confirming on behalf of the Authority the accuracy and completeness of information relating to the Bonds, the Authority, the Loans and the Green Jobs – Green New York Program, and to do and cause to be done any such other acts and things and to make such other changes, omissions, insertions, revisions, or amendments to the documents referred to in Sections 1 through 6 of this resolution as they may determine necessary or proper for carrying out, giving effect to, and consummating the transactions contemplated by this resolution. Execution of such documents by an Authorized Representative shall be conclusive evidence of any approval required by this Section. Any Authorized Representative, the Assistant Treasurer, and the Acting Secretary of the Authority are each hereby authorized to affix the seal of the Authority on such documents and attest the same.

Section 8. The Bonds shall not be general obligations of the Authority, and shall not constitute an indebtedness of or a charge against the general credit of the Authority. The Bonds will not constitute a debt of the State of New York and the State of New York will not be liable thereon. No owner of the Bonds will have any right to demand payment of the principal of and interest on the Bonds out of any funds to be raised by taxation. As shall be more particularly set forth in the Indenture and the Bonds, the liability of the Authority under the Bonds shall be enforceable only to the extent provided in the Indenture, and the Bonds shall be payable solely from the revenues and other funds pledged and available for the payment of the Bonds under the terms of the Indenture.

Resolution No. 1582

RESOLVED, that the revised Conflict of Interest Policy for Board Members as presented at this January 28th, 2020 meeting, is hereby approved by the Board.

Resolution No. 1583

RESOLVED, that pursuant to Section 1852(9) of the Public Authorities Law and Section 2 of Article III of the By-laws of the Authority, the Authority hereby appoints Peter J. Costello as Secretary to serve at the pleasure of the Authority and perform the duties of the Secretary as set forth in Section 6 of Article IV of the By-laws and such other duties as may be assigned by the Authority, the Chair, or the President and CEO; and

BE IT FURTHER RESOLVED that the Members of the Authority do hereby approve the salary of the General Counsel and Secretary, in the amount of \$175,980; and

BE IT FURTHER RESOLVED, that, with respect to such position, the Members do hereby approve the application of such rules for time, attendance, and compensation as are set forth in the Authority's Personnel Handbook and the Accounting Policies and Procedures Manual.

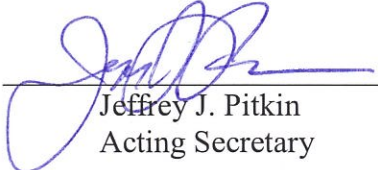
Resolution No. 1584

RESOLVED, that the Periodic Contracts Report, covering the period August 16, 2018 through December 15, 2018, as presented at this meeting, including but not limited to the contracts identified therein which have been, or are expected to be, executed and which do have, or are expected to have, a period of performance in excess of one year, is hereby approved in accordance with Public Authorities Law Section 2879.

The Chair stated that the last item on the agenda was other business.

The Chair indicated that in February 2020 each of the Members will receive the Annual Confidential Board Member Evaluation, as required by the Public Authorities Law. The Members were asked to complete the confidential form and return it by the due date. The responses will then be compiled and put into the annual report and any recommendations will be reviewed by the Governance Committee and the Members.

Thereafter, there being no other business, upon motion duly made and seconded, and by unanimous voice vote of the Members, the meeting was adjourned.


Jeffrey J. Pitkin
Acting Secretary