



CLEAN ENERGY

FINANCE AND INVESTMENT AUTHORITY

December 13, 2013

Dear Clean Energy Finance and Investment Authority Board of Directors:

Our next meeting of the Board of Directors will be on Friday, December 20, 2013 from 9:00 to 11:00 a.m. in the board room of Connecticut Innovations at 865 Brook Street, Rocky Hill, CT 06067. For those of you interested in the research Ken Gillingham of Yale University is doing on Solarize in Connecticut, members of the Board of Directors can attend this discussion beginning at 11:00 a.m.

We have a full agenda, including:

- **Residential Solar Investment Program** – we are continuing our great progress with “doing more, faster, and with less public resources” the deployment of residential rooftop solar PV in Connecticut. Through Step 3, we will have deployed over 15 MW of projects across the state, while creating over 1,000 jobs – more than 400 of which are direct. As the Board of Directors has already approved of a capacity target of 10 MW for Step 4, we are now proposing a reduction of incentives by approximately 20% from Step 3 to Step 4 and initiating a study to determine the timing for a phase-out of CEFIA subsidies in subsequent steps.
- **C-PACE** – we are bringing a number of C-PACE transactions for approval. Given that we expect the volume of C-PACE transactions and recommendations for approval to increase each month, we have designed a new short-form memo in lieu of the long-form memo we have provided you with in the past. If you have any concerns with that, please let Bert or I know. You should note that we have both the short-form and long-form on file as part of our due diligence and underwriting processes. However, to not inundate you with a lot of information, we are bringing to your attention the key details of the transaction (i.e. amount, term, interest rate, town, building type, measures, SIR, DSCR, LTV, energy savings and/or produced, objective function, SAM, etc.) in as succinct a manner as possible. Bert will also provide an update on the C-PACE sell down. No adjustments are anticipated to be made with regards to the sell down. However, if something does arise, then the team will be prepared to go into further detail with the Board of Directors.
- **Committee Updates** – we have several items to bring to your attention through the various committees, including:
 - o **Budget and Operations Committee** – recommendation for budget modifications for C-PACE and residential programs, as well as general administration. And the committee will bring forth the revised Sick Leave Bank Policy that was discussed by the Board of Directors in October.

- **Audit, Compliance, and Governance Committee** – recommendation for approval of the FY 2013 audited financial statements and federal single audit.
 - **Deployment Committee and Budget and Operations Committee** – recommendation for approval of the guidelines and procedures for CEFIA management of its Class I REC asset portfolio.
 - **2014 Meeting Schedule** – proposed meeting schedule for the Board of Directors and its Committees for 2014.
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- **Multifamily and Affordable Housing Programs** – we are currently developing several multifamily and affordable housing programs that we would like to discuss. As this is a new area of program development and a priority for CEFIA, we wanted to update you on the progress we have been making to develop programs to support this segment of the market.
 - **Solarize Connecticut and Yale University** – for those interested in staying after the adjournment of the meeting, we will have Assistant Professor of Economics at the Yale School of Forestry and Environmental Studies provide an update on the research he is doing on Solarize Connecticut. The Solarize Connecticut model has proven to not only lower installed costs of rooftop solar PV, but also in building demand by consumers for solar PV at exponential rates.

As we wrap-up 2013, I feel good about the progress we have made, but also realize that we have a lot more things to achieve with Connecticut's green bank.

If you have any questions, comments or concerns, please feel free to contact me at any time.

Have a great weekend. We look forward to seeing you next week.

Sincerely,



Bryan Garcia
President and CEO



CLEAN ENERGY

FINANCE AND INVESTMENT AUTHORITY

AGENDA

Board of Directors of the
Clean Energy Finance and Investment Authority
865 Brook Street, Rocky Hill, CT 06067

Friday, December 20, 2013
9:00-11:00 a.m.

Staff Invited: Andy Brydges, Mackey Dykes, Brian Farnen, Bryan Garcia, David Goldberg, Dale Hedman, Bert Hunter, Kerry O'Neill, Robert Schmitt, Genevieve Sherman, Kim Stevenson, and Bob Wall

1. Call to order
2. Public Comments – 5 minutes
3. Approval of meeting minutes for November 15, 2013 meeting* – 5 minutes
4. Update from the President – 5 minutes
5. Statutory and Infrastructure Sector Program Updates and Recommendations* – 15 minutes
 - a. Residential Solar Investment Program – Step 4 and Beyond*
6. Commercial and Industrial Sector Program Updates and Recommendations* – 15 minutes
 - a. 110 West Main Street (Meriden)
 - b. 99 Tuttle Road (Middletown)
 - c. 425 Hartford Turnpike (Vernon)
 - d. 255 Bank Street (Waterbury)
 - e. 1095 Dayhill Road (Windsor)
 - f. Update on C-PACE Sell Down Process
7. Committee Updates and Recommendations* – 60 minutes
 - a. Budget and Operations – 30 minutes
 - i. Budget Modifications*
 - ii. Sick Leave Bank*
 - b. Audit, Compliance and Governance Committee – FY 2013 Audit* – 15 minutes

- c. Deployment Committee and Budget and Operations Committee – 15 minutes
 - i. Class I REC Asset Portfolio*
- d. 2014 Board of Directors and Committee Meeting Schedule* – 1 minute
- 8. Residential Sector Program Updates and Recommendations – 15 minutes
 - a. Multifamily and Affordable Housing Programs
- 9. Other Business
- 10. Adjourn

<<< Optional presentation for the Board of Directors and Staff for an Update on the SEEDS Grant and Solarize Connecticut with Yale University >>>

- 11. Solarize Connecticut – Yale University Research – 90 minutes

*Denotes item requiring Board action

Join the meeting online at <https://www4.gotomeeting.com/join/603458703>

Dial +1 (805) 309-0013

Access Code: 603-458-703

***Next Regular Meeting: Friday, January 17, 2014 from 9:00-11:00 a.m.
Colonel Albert Pope Board Room at the
Clean Energy Finance and Investment Authority, 845 Brook Street, Rocky Hill, CT***



CLEAN ENERGY

FINANCE AND INVESTMENT AUTHORITY

RESOLUTIONS (Revised)

Board of Directors of the
Clean Energy Finance and Investment Authority
865 Brook Street, Rocky Hill, CT 06067

Friday, December 20, 2013
9:00-11:00 a.m.

Staff Invited: Andy Brydges, Mackey Dykes, Brian Farnen, Bryan Garcia, David Goldberg, Dale Hedman, Bert Hunter, Kerry O'Neill, Robert Schmitt, Genevieve Sherman, Kim Stevenson, and Bob Wall

1. Call to order
2. Public Comments
3. Approval of meeting minutes for November 15, 2013 meeting*

Resolution #1

Motion to approve the minutes of the Board of Directors meeting for November 15, 2013.
Second. Discussion. Vote.

4. Update from the President
5. Statutory and Infrastructure Sector Program Updates and Recommendations*
 - a. Residential Solar Investment Program – Step 4 and Beyond*

Resolution #2

WHEREAS, Section 106 of Public Act 11-80 “An Act Concerning the Establishment of the Department of Energy and Environmental Protection and Planning for Connecticut’s Energy Future” (the “Act”) requires the Clean Energy Finance and Investment Authority (“CEFIA”) to design and implement a Residential Solar Photovoltaic (“PV”) Investment Program (“Program Plan”) that results in a minimum of thirty (30) megawatts of new residential PV installation in Connecticut before December 31, 2022;

WHEREAS, as of November 29, 2013, the Program Plan has thus far resulted in approximately fifteen (15) megawatts of new residential PV installation application approvals in Connecticut;

WHEREAS, pursuant to Section 106 of the Act, CEFIA has prepared a Program Plan and a declining incentive block schedule (“Schedule”) that offer direct financial incentives, in the form of performance-based incentives (“PBI”) or expected performance-based buydowns (“Rebate”), for the purchase or lease of qualifying residential solar photovoltaic systems;

WHEREAS, the performance of the Rebate model in Step 3 is faster in deploying rooftop solar PV and requires less ratepayer subsidies than the PBI model therefore maximizing the amount of clean energy deployed per dollar of ratepayer funds at risk;

WHEREAS, on December 21, 2012, the CEFIA Board of Directors (“Board”) reviewed and approved the staff recommendations to establish a Step 4 “Race to the Solar Rooftop” capacity of 10 MW;

WHEREAS, the Deployment Committee recommends that the Board hereby approves the Schedule of Incentives for Step 4 outlined above to achieve 10.0 MW of solar PV deployment; and

WHEREAS, Solarize Connecticut is a program designed to encourage the adoption of residential solar PV by lowering customer acquisition costs through a coordinated education, marketing and outreach effort, combined with a tiered pricing structure that provides increased savings to homeowners as more people in a selected municipality go solar (“Solarize Communities”).

NOW, therefore be it:

RESOLVED, that the CEFIA Board of Directors approves the Schedule of Incentives for Step 4 outlined above to achieve 10.0 MW of solar PV deployment as follows:

5.0 MW of Rebates,
3.0 MW of PBI, and
2.0 MW of additional capacity for the models to compete for incentives;

RESOLVED, that the CEFIA Board of Directors direct staff that at the point where 5.0 MWs of committed capacity is reached during Step 4 of the Schedule, or earlier if staff deems it appropriate to release a report that makes a recommendation to the Deployment Committee on the Step 5 and beyond for capacity allocation and incentive levels;

RESOLVED, that by (a) the point of the Step 4 incentive where 7.5 MW of committed capacity is reached for either the PBI or the Rebate models or (b) January 1, 2015 whichever comes first, the Board will approve a Step 5 capacity allocation and incentive level to ensure the sustained and orderly deployment of the residential solar market in Connecticut;

RESOLVED, that the CEFIA Board of Directors approve Step 4 incentives be maintained for Solarize Communities down selected for Phase 4 of the Solarize

Connecticut program throughout the entirety of the campaign if Step 4 incentives are in place at the beginning of Phase 4; and

RESOLVED, that this Board action is consistent with Section 106 of the Act.

6. Commercial and Industrial Sector Program Updates and Recommendations*

a. 110 West Main Street (Meriden)

Resolution #3

WHEREAS, Pursuant to Section 157 of Public Act No. 12-2 of the June 12, 2012 Special Session of the Connecticut General Assembly and as amended (the "Act"), CEFIA is directed to, amongst other things, establish a commercial sustainable energy program for Connecticut, known as Commercial Property Assessed Clean Energy ("C-PACE");

WHEREAS, the CEFIA Board of Directors has approved a \$40,000,000 C-PACE construction and term loan program; and

WHEREAS, CEFIA seeks to provide a \$372,466 construction and (potentially) term loan under the C-PACE program to the Meriden Young Men's Christian Association, Inc., the property owner of 110 West Main Street, Meriden, CT (the "Loan"), to finance the construction of specified clean energy measures in line with the State's Comprehensive Energy Strategy and CEFIA's Strategic Plan.

NOW, therefore be it:

RESOLVED, that the President of CEFIA and any other duly authorized officer of CEFIA, is authorized to execute and deliver the Loan in an amount not to be greater than one hundred ten percent of the Loan amount with terms and conditions consistent with the memorandum submitted to the Board of Directors dated December 13, 2013, and as he or she shall deem to be in the interests of CEFIA and the ratepayers no later than 90 days from December 20, 2013;

RESOLVED, that before executing the Loan, the President of CEFIA and any other duly authorized officer of CEFIA shall receive confirmation that the C-PACE transaction meets the statutory obligations of the Act, including but not limited to the savings to investment ratio and lender consent requirements; and

RESOLVED, that the proper CEFIA officers are authorized and empowered to do all other acts and execute and deliver all other documents and instruments as they shall deem necessary and desirable to effect the above-mentioned legal instrument.

b. 99 Tuttle Road (Middletown)

Resolution #4

WHEREAS, Pursuant to Section 157 of Public Act No. 12-2 of the June 12, 2012 Special Session of the Connecticut General Assembly and as amended (the "Act"), CEFIA is

directed to, amongst other things, establish a commercial sustainable energy program for Connecticut, known as Commercial Property Assessed Clean Energy ("C-PACE");

WHEREAS, the CEFIA Board of Directors has approved a \$40,000,000 C-PACE construction and term loan program; and

WHEREAS, CEFIA seeks to provide a \$1,500,000 construction and (potentially) term loan under the C-PACE program to Bourdon Acres LLC, the property owner of 99 Tuttle Road, Middletown, CT (the "Loan"), to finance the construction of specified clean energy measures in line with the State's Comprehensive Energy Strategy and CEFIA's Strategic Plan.

NOW, therefore be it:

RESOLVED, that the President of CEFIA and any other duly authorized officer of CEFIA, is authorized to execute and deliver the Loan in an amount not to be greater than one hundred ten percent of the Loan amount with terms and conditions consistent with the memorandum submitted to the Board of Directors dated December 13, 2013, and as he or she shall deem to be in the interests of CEFIA and the ratepayers no later than 90 days from December 20, 2013;

RESOLVED, that before executing the Loan, the President of CEFIA and any other duly authorized officer of CEFIA shall receive confirmation that the C-PACE transaction meets the statutory obligations of the Act, including but not limited to the savings to investment ratio and lender consent requirements; and

RESOLVED, that the proper CEFIA officers are authorized and empowered to do all other acts and execute and deliver all other documents and instruments as they shall deem necessary and desirable to effect the above-mentioned legal instrument.

c. 425 Hartford Turnpike (Vernon)

Resolution #5

WHEREAS, Pursuant to Section 157 of Public Act No. 12-2 of the June 12, 2012 Special Session of the Connecticut General Assembly and as amended (the "Act"), CEFIA is directed to, amongst other things, establish a commercial sustainable energy program for Connecticut, known as Commercial Property Assessed Clean Energy ("C-PACE");

WHEREAS, the CEFIA Board of Directors has approved a \$40,000,000 C-PACE construction and term loan program; and

WHEREAS, CEFIA seeks to provide a \$850,000 construction and (potentially) term loan under the C-PACE program to Khima LLC, the property owner of 425 Hartford Turnpike, Vernon, CT (the "Loan"), to finance the construction of specified clean energy measures in line with the State's Comprehensive Energy Strategy and CEFIA's Strategic Plan.

NOW, therefore be it:

RESOLVED, that the President of CEFIA and any other duly authorized officer of CEFIA, is authorized to execute and deliver the Loan in an amount not to be greater

than one hundred ten percent of the Loan amount with terms and conditions consistent with the memorandum submitted to the Board of Directors dated December 13, 2013, and as he or she shall deem to be in the interests of CEFIA and the ratepayers no later than 90 days from December 20, 2013;

RESOLVED, that before executing the Loan, the President of CEFIA and any other duly authorized officer of CEFIA shall receive confirmation that the C-PACE transaction meets the statutory obligations of the Act, including but not limited to the savings to investment ratio and lender consent requirements; and

RESOLVED, that the proper CEFIA officers are authorized and empowered to do all other acts and execute and deliver all other documents and instruments as they shall deem necessary and desirable to effect the above-mentioned legal instrument.

d. 255 Bank Street (Waterbury)

Resolution #6

WHEREAS, Pursuant to Section 157 of Public Act No. 12-2 of the June 12, 2012 Special Session of the Connecticut General Assembly and as amended (the "Act"), CEFIA is directed to, amongst other things, establish a commercial sustainable energy program for Connecticut, known as Commercial Property Assessed Clean Energy ("C-PACE");

WHEREAS, the CEFIA Board of Directors has approved a \$40,000,000 C-PACE construction and term loan program; and

WHEREAS, CEFIA seeks to provide a \$524,941 construction and (potentially) term loan under the C-PACE program to Ellenville Associates, LLC, the property owner of 255 Bank Street, Waterbury, CT (the "Loan"), to finance the construction of specified clean energy measures in line with the State's Comprehensive Energy Strategy and CEFIA's Strategic Plan.

NOW, therefore be it:

RESOLVED, that the President of CEFIA and any other duly authorized officer of CEFIA, is authorized to execute and deliver the Loan in an amount not to be greater than one hundred ten percent of the Loan amount with terms and conditions consistent with the memorandum submitted to the Board of Directors dated December 13, 2013, and as he or she shall deem to be in the interests of CEFIA and the ratepayers no later than 120 days from December 20, 2013;

RESOLVED, that before executing the Loan, the President of CEFIA and any other duly authorized officer of CEFIA shall receive confirmation that the C-PACE transaction meets the statutory obligations of the Act, including but not limited to the savings to investment ratio and lender consent requirements; and

RESOLVED, that the proper CEFIA officers are authorized and empowered to do all other acts and execute and deliver all other documents and instruments as they shall deem necessary and desirable to effect the above-mentioned legal instrument.

e. 1095 Dayhill Road (Windsor)

Resolution #7

WHEREAS, Pursuant to Section 157 of Public Act No. 12-2 of the June 12, 2012 Special Session of the Connecticut General Assembly and as amended (the "Act"), CEFIA is directed to, amongst other things, establish a commercial sustainable energy program for Connecticut, known as Commercial Property Assessed Clean Energy ("C-PACE");

WHEREAS, the CEFIA Board of Directors has approved a \$40,000,000 C-PACE construction and term loan program; and

WHEREAS, CEFIA seeks to provide a \$829,399 construction and (potentially) term loan under the C-PACE program to Infinity VII, LLC, the property owner of 1095 Day Hill Road, Windsor, CT (the "Loan"), to finance the construction of specified clean energy measures in line with the State's Comprehensive Energy Strategy and CEFIA's Strategic Plan.

NOW, therefore be it:

RESOLVED, that the President of CEFIA and any other duly authorized officer of CEFIA, is authorized to execute and deliver the Loan in an amount not to be greater than one hundred ten percent of the Loan amount with terms and conditions consistent with the memorandum submitted to the Board of Directors dated December 13, 2013 and as he or she shall deem to be in the interests of CEFIA and the ratepayers no later than 90 days from December 20, 2013;

RESOLVED, that before executing the Loan, the President of CEFIA and any other duly authorized officer of CEFIA shall receive confirmation that the C-PACE transaction meets the statutory obligations of the Act, including but not limited to the savings to investment ratio and lender consent requirements; and

RESOLVED, that the proper CEFIA officers are authorized and empowered to do all other acts and execute and deliver all other documents and instruments as they shall deem necessary and desirable to effect the above-mentioned legal instrument.

f. 21 Mount Parnassus Drive (East Haddam)

Resolution #8

WHEREAS, Pursuant to Section 157 of Public Act No. 12-2 of the June 12, 2012 Special Session of the Connecticut General Assembly and as amended (the "Act"), CEFIA is directed to, amongst other things, establish a commercial sustainable energy program for Connecticut, known as Commercial Property Assessed Clean Energy ("C-PACE");

WHEREAS, the CEFIA Board of Directors has approved a \$40,000,000 C-PACE construction and term loan program; and

WHEREAS, CEFIA seeks to provide a \$478,000 construction and (potentially) term loan under the C-PACE program to Bud and Bobby Enterprises, LLC, the property owner of 21 Mt Parnassus Drive, East Haddam, CT (the "Loan"), to finance the construction of

specified clean energy measures in line with the State's Comprehensive Energy Strategy and CEFIA's Strategic Plan.

NOW, therefore be it:

RESOLVED, that the President of CEFIA and any other duly authorized officer of CEFIA, is authorized to execute and deliver the Loan in an amount not to be greater than one hundred ten percent of the Loan amount with terms and conditions consistent with the memorandum submitted to the Board of Directors dated December 19, 2013, and as he or she shall deem to be in the interests of CEFIA and the ratepayers no later than 90 days from December 20, 2013;

RESOLVED, that before executing the Loan, the President of CEFIA and any other duly authorized officer of CEFIA shall receive confirmation that the C-PACE transaction meets the statutory obligations of the Act, including but not limited to the savings to investment ratio and lender consent requirements; and

RESOLVED, that the proper CEFIA officers are authorized and empowered to do all other acts and execute and deliver all other documents and instruments as they shall deem necessary and desirable to effect the above-mentioned legal instrument.

- g. Update on C-PACE Sell Down Process
- 7. Committee Updates and Recommendations*
 - a. Budget and Operations
 - i. Budget Modifications*

Resolution #9

RESOLVED, that the Board of Directors approves of the Budget and Operations committee recommendation to approve the requested \$1,432,700 increase in the fiscal year 2014 budget outlined in Tables, 2, 3 and 4 of the memorandum presented to the Board dated December 4, 2013 (the Memorandum); and

RESOLVED, that the Board of Directors approves of the Budget and Operations committee recommendation to approve the updated staffing plan detailed in Attachment 2 of the Memorandum.

- ii. Sick Leave Bank*

Resolution #10

RESOLVED, that the Board of Directors approves of the Budget and Operations committee recommendation to revise the CEFIA Employee Handbook for the Sick Leave Bank policy marked in **bold**:

The CEFIA Sick Leave Bank is a pool of sick days that has been established by employees of CEFIA who have made a donation of their accumulated sick days. The Bank is available to members to draw up to ten (10) eight- hour sick days per year in the unfortunate event that they experience a qualified illness or injury.

Sick Leave Bank members will receive benefits in the form of paid sick leave if all of the following requirements are met:

- the member has a medical condition that prevents them from working that has been verified by a Medical Certificate OR a member's immediate family member has a medical condition that has been verified by a Medical Certificate and requires the Sick Leave Bank member's care;
- the member has been out on approved medical leave (paid or unpaid) as described above for at least two consecutive weeks;
- the member has exhausted all of their sick, ~~vacation~~, personal leave and compensatory time;
- **the member has exhausted all of their vacation time in excess of 30 days (or 240 hours)**
- the member has not been disciplined for an absence-related reason for the past 12 months; **provided however, a committee comprised of Senior Management and Human Resources may waive this requirement;**
- the member has completed a Sick Leave Bank Withdrawal Request Form and it has been approved by human resources

b. Audit, Compliance and Governance Committee – FY 2013 Audit*

Resolution #11

WHEREAS, Article V, Section 5.3.1(ii) of the Clean Energy Finance and Investment Authority (CEFIA) Operating Procedures requires the Audit, Compliance, and the Governance Committee (the "Committee") to meet with the auditors to review the annual audit and formulation of an appropriate report and recommendations to the Board with respect to the approval of the audit report;

WHEREAS, the Committee recommended to the Board of Directors of CEFIA for approval the Audited Financial Statements and the Federal Single Audit Report of the Clean Energy Finance and Investment Authority for the Fiscal Year Ending June 30, 2013.

NOW, therefore be it:

RESOLVED, that the CEFIA Board of Directors approves the Audited Financial Statements and the Federal Single Audit Report of the Clean Energy Finance and Investment Authority for the Fiscal Year Ending June 30, 2013 as presented on December 20, 2013.

RESOLVED, that the CEFIA Board of Directors directs CEFIA staff to investigate and provide a recommendation to the Board on the merits of utilizing a Comprehensive Annual Financial Report (CAFR) for the Fiscal Year 2014 annual audit.

c. Deployment Committee and Budget and Operations Committee

i. Class I REC Asset Portfolio*

Resolution #12

WHEREAS, Article V, section 5.3.2 of the Clean Energy Finance and Investment Authority (CEFIA) Bylaws requires the Budget and Operations Committee (the “B&O Committee”) to recommend and monitor compliance with prudent fiscal policies, procedures, and practices to assure that CEFIA has the financial resources and financial strategy necessary to carry out its statutory responsibilities and mission;

WHEREAS, Article V, section 5.3.3 of the CEFIA Bylaws requires the Deployment Committee to provide oversight of policies and practices relating to the evaluation and recommendation of initial investments, follow-on investments, investment modifications and restructurings, and the sale or other disposition of investments by the Authority’s professional investment staff, including implementation of investment exit strategies; and

WHEREAS, both the Deployment and B&O Committees recommend to the Board for approval the draft Guidelines and Procedures for CEFIA Management of Class I REC Asset Portfolio in substantially the form provided to the committees in the memorandum dated December 4, 2013 and which may be revised by CEFIA staff from time to time to incorporate the recommendations of independent third party consultants with REC market expertise.

NOW, therefore be it:

RESOLVED, that the CEFIA Board of Directors approve the Guidelines and Procedures for CEFIA Management of Class I REC Asset Portfolio in the form provided to the Board in the memorandum dated December 13, 2013 and which may be revised by CEFIA staff from time to time to incorporate the recommendations of independent third party consultants with REC market expertise.

d. 2014 Board of Directors and Committee Meeting Schedule*

Resolution #13

Motion to approve the regular meeting schedule of the Board of Directors, Audit, Compliance and Governance Committee, Budget and Operations Committee, and Deployment Committee for 2014 for the Clean Energy Finance and Investment Authority. Second, Discussion. Vote.

8. Residential Sector Program Updates and Recommendations
 - a. Multifamily and Affordable Housing Programs
9. Other Business
10. Adjourn

<<< Optional presentation for the Board of Directors and Staff for an Update on the SEEDS Grant and Solarize Connecticut with Yale University >>>

11. Solarize Connecticut – Yale University Research – 90 minutes

*Denotes item requiring Board action

Join the meeting online at <https://www4.gotomeeting.com/join/603458703>

Dial +1 (805) 309-0013

Access Code: 603-458-703

***Next Regular Meeting: Friday, January 17, 2014 from 9:00-11:00 a.m.
Colonel Albert Pope Board Room at the
Clean Energy Finance and Investment Authority, 845 Brook Street, Rocky Hill, CT***



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Board of Directors of the Clean Energy Finance and Investment Authority

Agenda Item #1

Call to Order

December 20, 2013



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Board of Directors of the Clean Energy Finance and Investment Authority

Agenda Item #2

Public Comments

December 20, 2013



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Board of Directors of the Clean Energy Finance and Investment Authority

Agenda Item #3

Approval of Meeting Minutes of November 15, 2013

December 20, 2013



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Board of Directors of the Clean Energy Finance and Investment Authority

Agenda Item #4

Update from the President

December 20, 2013



- ▶ **Jobs Analysis** – DECD’s Mike Lettieri validated the direct, indirect and induced job estimations for FY 2013. We now have a calculator and process for estimating the economic development benefits resulting from the clean energy being deployed as a result of CEFIA. We will work with DEEP to create a similar process and validation for environmental benefits.
- ▶ **SEEDS Grant** – Professor Ken Gillingham of Yale University will be here today to provide an update (optional for the BOD) on the SEEDS project. The project is looking at the effectiveness of Solarize Connecticut and attempting to understand what are the drivers of its success.



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Board of Directors of the Clean Energy Finance and Investment Authority

Agenda Item #5

Statutory and Infrastructure Sector Programs – RSIP Step 4

December 20, 2013

Residential Solar Investment Program

Section 106 of Public Act 11-80



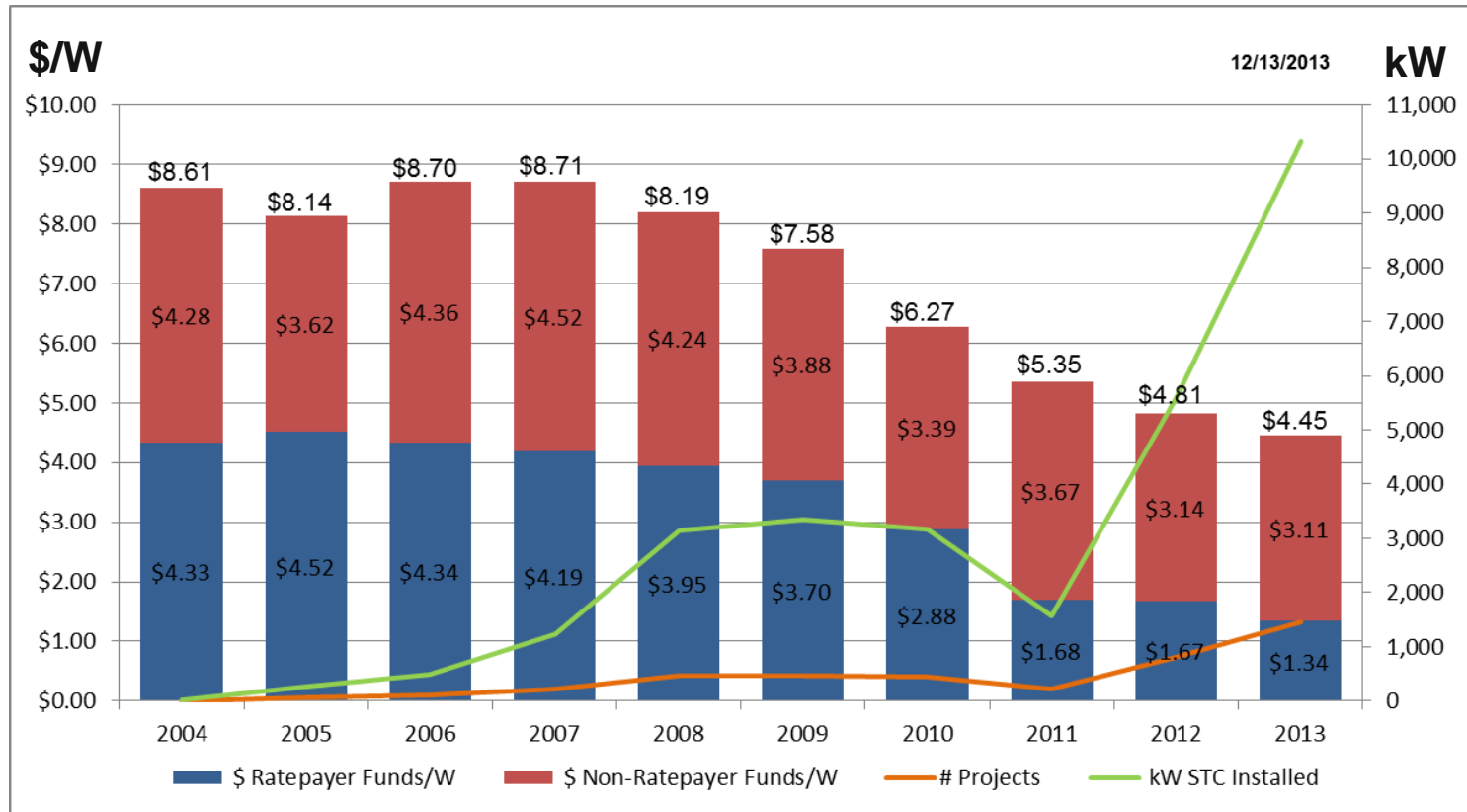
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The Clean Energy Finance and Investment Authority established pursuant to section 16-245n of the general statutes, as amended by this act, **shall structure and implement a residential solar investment program** established pursuant to this section, which **shall result in a minimum of thirty megawatts** of new residential solar photovoltaic installations located in this state **on or before December 31, 2022**, the annual procurement of which shall be determined by the authority and the cost of which shall not exceed one-third of the total surcharge collected annually pursuant to said section 16-245n.

REFERENCES

30 MW is equivalent to about 4,300 homes installing 7 kW systems.

Program Performance



Maximizing the amount of rooftop solar PV deployed per dollar of ratepayer funds at risk

Program Performance

Residential Solar Investment Program



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	Rebate	PBI	Total
# of Projects Approved	1,452	779	2,231
Installed Capacity (kW)	10,347	5,405	15,752
Installed Cost (\$/kW)	\$4.44	\$4.82	\$4.57
Total Incentives	\$14.3 MM	\$8.6 MM	\$22.9 MM
Total Installed Costs	\$45.9 MM	\$26.0 MM	\$71.9 MM
Direct Jobs Created	271	153	424
Indirect and Induced Jobs Created	436	247	683
GHG Emissions Reduced (TCO₂)	127,500	66,500	194,000
Equivalent Cars off the Road	850	445	1,295
Equivalent Trees Planted	1,700	890	2,590

Program Performance

RSIP vs. ZREC



		Through Step 3 of RSIP	Round 1 of ZREC Actual		
			<u>Small</u>	<u>Medium</u>	<u>Large</u>
NOMINAL VALUE	Clean Energy Produced (kWh)	270,520,000	240,080,000	257,405,000	346,640,000
	Ratepayer Funds Expended (\$)	\$23,519,915	\$38,631,256	\$37,619,799	\$36,130,332
	Objective Function (kWh/\$1 Expended)	11.35	6.21	6.84	9.59
	Objective Function (\$/1 kWh Produced)	\$0.088	\$0.161	\$0.146	\$0.104
PRESENT VALUE	Ratepayer Funds Expended (\$)	\$22,879,608	\$30,829,955	\$30,022,754	\$28,834,074
	Objective Function (kWh/\$1 Expended)	11.81	7.79	8.57	12.02
	Objective Function (\$/1 kWh Produced)	\$0.085	\$0.128	\$0.117	\$0.083
	Clean Energy Deployed (MW _{STC})	15.2	13.7	14.8	19.4

Doing more, faster, and with less!!!

Reference

Clean energy produced assumes degradation of 0.5% each year over 15 years.
Discount rate used is the rate of inflation or 3%.

Program Performance

Connecticut vs. Massachusetts



State	# of Projects	Capacity Installed (kW)	Average System Size (kW)	Comparison (W/Capita)	Installed Cost (\$/W)
Connecticut	2,096	14,756	7.04	4.1	\$4.57
Massachusetts	4,878	30,390	6.23	4.6	\$4.73

- ▶ Massachusetts installing 10% more than Connecticut on a watts per capita basis
- ▶ Connecticut is installing at a cost 3.5% less than Massachusetts on dollars per watt basis – installers doing business in both states are between 2-12% less in Connecticut than Massachusetts
- ▶ Massachusetts provides twice the level of incentive as Connecticut

Reference

March 5, 2012 through November 19, 2013
 Massachusetts population of 6.646 million and Connecticut population of 3.59 million
 Massachusetts incentive to the customer includes state tax credit (\$1,000), rebate of \$0.40/W up to 5 kW, and SREC at \$200/REC for 10 years
 Connecticut incentive to the customer includes either a rebate of \$1.25/W or a PBI of \$225/MWh for 6 years

Residential Solar Investment Program

Step 4 Incentive Proposal



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	Rebate (\$/W)		PBI (\$/kWh)
	≤5 kW	5 to 10 kW	≤10 kW
Step 1	\$2.450	\$1.250	\$0.300
Step 2	\$2.275	\$1.075	\$0.300
Step 3	\$1.750	\$0.550	\$0.225
Step 4 (proposed)	\$1.250	\$0.750	\$0.180
(Reduction)/Increase from Step 3	(\$0.500)	\$0.200	(\$0.045)
% (Reduction)/Increase from Step 3	(29%)	36%	(20%)

Residential Solar Investment Program

Step 4 Recommendation



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

- ▶ Race to the solar rooftop of 10 MW – 5 MW rebate, 3 MW PBI, and 2 MW competitive
- ▶ Incentive levels
 - ▶ Rebate – \$1.25/W \leq 5 kW; and \$0.75/W $5 < x \leq$ 10 kW
 - ▶ PBI – \$180/MWh
- ▶ CEFIA owns the REC and will sell to get RSIP incentive paid back
- ▶ Report to look at REC value recovery of RSIP incentive, transition from subsidies to financing in subsequent steps, etc. to be completed in April 2014 (Deployment Committee)
- ▶ Report to the BOD in the Fall of 2014 on any policy changes that should be recommended as a result of meeting the statutory goal early (Commissioner Esty) – add this to the resolution



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

Board of Directors of the Clean Energy Finance and Investment Authority

Agenda Item #6

Commercial and Industrial Sector Programs – C-PACE

December 20, 2013



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

Board of Directors of the Clean Energy Finance and Investment Authority

Agenda Item #6a

Commercial and Industrial Sector Programs – C-PACE

110 West Main Street (Meriden)

December 20, 2013

110 West Main Street (Meriden) Ratepayer Payback



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

- ▶ \$372,466 CHP and efficiency upgrade at Meriden YMCA
- ▶ Projected savings are **9,295 MMBtu** versus **\$372,466** of ratepayer funds at risk.

REDACTED

- ▶ Ratepayer funds will be paid back in one of the following ways
 - ▶ (a) through a take-out by a private capital provider at the end of construction (project completion);
 - ▶ (b) subsequently, when the loan is sold down to a private capital provider; or
 - ▶ (c) through receipt of funds from the City of Meriden as it collects the C-PACE benefit assessment from the property owner.

110 West Main Street (Meriden)

Terms and Conditions



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

- ▶ \$372,466 construction and term loan both set at a fixed 4.94% over the 19-year term (bought down via CEFIA CHP program support)
- ▶ \$372,466 loan against the property
 - ▶ Property valued at **REDACTED**
 - ▶ Loan-to-value ratio equals **REDACTED**
- ▶ DSCR > **REDACTED**



REDACTED

Anticipated CEFIA cash flow



CEFIA Pro Forma			
<i>Project Basics</i>		<i>Cash Flows</i>	
		<u>Date</u>	<u>CEFIA \$</u>
Amount Financed	\$372,466	Jan 2014	\$372,466
Construction Period (years)	0.25	Apr 2014	\$4,600
Term (years)	19	Jul 2014	\$30,446
Construction Financing Rate	4.94%	Jul 2015	\$30,446
Term Financing Rate	4.94%	Jul 2016	\$30,446
		Jul 2017	\$30,446
Construction Interest Payment (bullet)	\$4,600	Jul 2018	\$30,446
Yearly Debt Service Payments (made semi-annually)	\$30,446	Jul 2019	\$30,446
		Jul 2020	\$30,446
		Jul 2021	\$30,446
		Jul 2022	\$30,446
		Jul 2023	\$30,446
		Jul 2024	\$30,446
		Jul 2025	\$30,446
		Jul 2026	\$30,446
		Jul 2027	\$30,446
		Jul 2028	\$30,446
		Jul 2029	\$30,446
		Jul 2030	\$30,446
		Jul 2031	\$30,446
		Jul 2032	\$30,446
		Jul 2033	\$0



REDACTED

110 West Main Street (Meriden)

The Five W's



- ▶ **What?** Receive approval for a \$372,466 construction and (potentially) term loan under the C-PACE program to Meriden Young Men's Christian Association, Inc. to finance the construction of specified energy upgrade
- ▶ **When?** Project to commence early 2014.
- ▶ **Why?** Allow CEFIA to finance this C-PACE transaction, continue to build momentum in the market, and potentially provide term financing for this project until CEFIA sells it along with its other loan positions in C-PACE transactions.
- ▶ **Who?** The owners and members of the Meriden YMCA
- ▶ **Where?** 110 West Main Street, Meriden



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

Board of Directors of the Clean Energy Finance and Investment Authority

Agenda Item #6b

Commercial and Industrial Sector Programs – C-PACE

99 Tuttle Road (Middletown)

December 20, 2013

99 Tuttle Street (Middletown) Ratepayer Payback



- ▶ \$1,500,000 500kW solar installation at Bourdon Forge
- ▶ Projected savings are **8,955 MWh** versus **\$1,500,000** of ratepayer funds at risk.
- ▶ Ratepayer funds will be paid back in one of the following ways
 - ▶ (a) through a take-out by a private capital provider at the end of construction (project completion);
 - ▶ (b) subsequently, when the loan is sold down to a private capital provider; or
 - ▶ (c) through receipt of funds from the City of Middletown as it collects the C-PACE benefit assessment from the property owner.

REDACTED

99 Tuttle Street (Middletown)

Terms and Conditions



- ▶ \$1,500,000 construction loan with interest rate of 1.75% over the Prime Rate, or 5%, and the term loan will be set at a fixed 5.5% over the 20-year term
- ▶ \$1,500,000 loan against the property
 - ▶ Property valued at **REDACTED**
 - ▶ Loan-to-value ratio equals **REDACTED**
- ▶ DSCR > **REDACTED**



REDACTED

Anticipated CEFIA cash flow



CEFIA Pro Forma			
<i>Project Basics</i>		<i>Cash Flows</i>	
		<u>Date</u>	<u>CEFIA \$</u>
Amount Financed	\$1,500,000	Jan 2014	\$1,500,000
Construction Period (years)	0.25	Apr 2014	\$18,750
Term (years)	15	Jul 2014	\$148,153
Construction Financing Rate	5.00%	Jul 2015	\$148,153
Term Financing Rate	5.50%	Jul 2016	\$148,153
		Jul 2017	\$148,153
Construction Interest Payment (bullet)	\$18,750	Jul 2018	\$148,153
Yearly Debt Service Payments (made semi-annually)	\$148,153	Jul 2019	\$148,153
		Jul 2020	\$148,153
		Jul 2021	\$148,153
		Jul 2022	\$148,153
		Jul 2023	\$148,153
		Jul 2024	\$148,153
		Jul 2025	\$148,153
		Jul 2026	\$148,153
		Jul 2027	\$148,153
		Jul 2028	\$148,153
		Jul 2029	\$0
		Jul 2030	\$0
		Jul 2031	\$0
		Jul 2032	\$0
		Jul 2033	\$0



REDACTED

99 Tuttle Street (Middletown)

The Five W's



- ▶ **What?** Receive approval for a \$1,500,000 construction and (potentially) term loan under the C-PACE program to Bourdon Acres LLC to finance the construction of specified renewable energy upgrade
- ▶ **When?** Project to commence early 2014.
- ▶ **Why?** Allow CEFIA to finance this C-PACE transaction, continue to build momentum in the market, and potentially provide term financing for this project until CEFIA sells it along with its other loan positions in C-PACE transactions.
- ▶ **Who?** The end-users of the project - Bourdon Acres LLC
- ▶ **Where?** 99 Tuttle Street (Middletown)



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

Board of Directors of the Clean Energy Finance and Investment Authority

Agenda Item #6c

Commercial and Industrial Sector Programs – C-PACE

425 Hartford Turnpike (Vernon)

December 20, 2013

425 Hartford Turnpike (Vernon) Ratepayer Payback



- ▶ \$850,000 200 kW solar installation at the Quality Inn in Vernon
- ▶ Projected savings are **5,176 MWh** versus **\$850,000** of ratepayer funds at risk.

REDACTED

- ▶ Ratepayer funds will be paid back in one of the following ways
 - ▶ (a) through a take-out by a private capital provider at the end of construction (project completion);
 - ▶ (b) subsequently, when the loan is sold down to a private capital provider; or
 - ▶ (c) through receipt of funds from the City of Vernon as it collects the C-PACE benefit assessment from the property owner.

425 Hartford Turnpike (Vernon)

Terms and Conditions



- ▶ \$850,000 construction loan and the term loan will be set at a fixed 5.5% over the 20-year term
- ▶ \$850,000 loan against the property
 - ▶ Property valued at **REDACTED**
 - ▶ Loan-to-value ratio equals **REDACTED**
 - ▶ **REDACTED**
 - ▶ **REDACTED**
 - ▶ **REDACTED**
- ▶ DSCR > **REDACTED**



REDACTED

Anticipated CEFIA cash flow



CEFIA Pro Forma

Project Basics

Amount Financed	\$850,000
Construction Period (years)	0.25
Term (years)	20
Construction Financing Rate	5.50%
Term Financing Rate	5.50%
Construction Interest Payment (bullet)	\$11,688
Yearly Debt Service Payments (made semi-annually)	\$70,604

Cash Flows

<u>Date</u>	<u>CEFIA \$</u>
Jan 2014	\$850,000
Apr 2014	\$11,688
Jul 2014	\$70,604
Jul 2015	\$70,604
Jul 2016	\$70,604
Jul 2017	\$70,604
Jul 2018	\$70,604
Jul 2019	\$70,604
Jul 2020	\$70,604
Jul 2021	\$70,604
Jul 2022	\$70,604
Jul 2023	\$70,604
Jul 2024	\$70,604
Jul 2025	\$70,604
Jul 2026	\$70,604
Jul 2027	\$70,604
Jul 2028	\$70,604
Jul 2029	\$70,604
Jul 2030	\$70,604
Jul 2031	\$70,604
Jul 2032	\$70,604
Jul 2033	\$70,604



REDACTED

425 Hartford Turnpike (Vernon)

The Five W's



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

- ▶ **What?** Receive approval for a \$850,000 construction and (potentially) term loan under the C-PACE program to Khima LLC to finance the construction of specified renewable energy upgrade
- ▶ **When?** Project to commence early 2014.
- ▶ **Why?** Allow CEFIA to finance this C-PACE transaction, continue to build momentum in the market, and potentially provide term financing for this project until CEFIA sells it along with its other loan positions in C-PACE transactions.
- ▶ **Who?** The end-users of the project – Khima LLC and guests at the Quality Inn
- ▶ **Where?** 425 Hartford Turnpike (Vernon)



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

Board of Directors of the Clean Energy Finance and Investment Authority

Agenda Item #6d

Commercial and Industrial Sector Programs – C-PACE

255 Bank Street (Waterbury)

December 20, 2013

255 Bank Street (Waterbury) Ratepayer Payback



- ▶ \$524,591 comprehensive energy efficiency upgrade at 255 Bank Street
- ▶ Projected savings are **22,287 MMBtu** versus **\$524,591** of ratepayer funds at risk.

REDACTED

- ▶ Ratepayer funds will be paid back in one of the following ways
 - ▶ (a) through a take-out by a private capital provider at the end of construction (project completion);
 - ▶ (b) subsequently, when the loan is sold down to a private capital provider; or
 - ▶ (c) through receipt of funds from the City of Waterbury as it collects the C-PACE benefit assessment from the property owner.

255 Bank Street (Waterbury)

Terms and Conditions



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

- ▶ \$524,591 construction loan will be set at 5.5% and the term loan will be set at a 5.7% over the 17-year term.
- ▶ \$524,591 loan against the property
 - ▶ Property valued at REDACTED
 - ▶ Loan-to-value ratio equals REDACTED
 - ▶ REDACTED
 - ▶ DSCR > REDACTED



REDACTED

Anticipated CEFIA cash flow



CEFIA Pro Forma			
<i>Project Basics</i>		<i>Cash Flows</i>	
Amount Financed	\$524,591	<u>Date</u>	<u>CEFIA \$</u>
Construction Period (years)	0.42	Dec 2013	\$524,591
Term (years)	17	May 2014	\$12,022
		Jul 2014	\$48,592
Construction Financing Rate	5.50%	Jul 2015	\$48,592
Term Financing Rate	5.70%	Jul 2016	\$48,592
		Jul 2017	\$48,592
Construction Interest Payment (bullet)	\$12,022	Jul 2018	\$48,592
Yearly Debt Service Payments (made semi-annually)	\$48,592	Jul 2019	\$48,592
		Jul 2020	\$48,592
		Jul 2021	\$48,592
		Jul 2022	\$48,592
		Jul 2023	\$48,592
		Jul 2024	\$48,592
		Jul 2025	\$48,592
		Jul 2026	\$48,592
		Jul 2027	\$48,592
		Jul 2028	\$48,592
		Jul 2029	\$48,592
		Jul 2030	\$48,592
		Jul 2031	\$0
		Jul 2032	\$0
		Jul 2033	\$0



REDACTED

255 Bank Street (Waterbury)

The Five W's



- ▶ **What?** Receive approval for a \$524,591 construction and (potentially) term loan under the C-PACE program to Ellenville Associates, LLC to finance the construction of specified energy efficiency upgrade
- ▶ **When?** Project to commence early 2014.
- ▶ **Why?** Allow CEFIA to finance this C-PACE transaction, continue to build momentum in the market, and potentially provide term financing for this project until CEFIA sells it along with its other loan positions in C-PACE transactions.
- ▶ **Who?** The end-users of the project – Ellenville Associates, LLC and tenants of 255 Bank Street.
- ▶ **Where?** 255 Bank Street (Waterbury)



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

Board of Directors of the Clean Energy Finance and Investment Authority

Agenda Item #6e

Commercial and Industrial Sector Programs – C-PACE

1095 Dayhill Road (Windsor)

December 20, 2013

1095 Dayhill Road (Windsor) Ratepayer Payback



- ▶ \$829,399 comprehensive efficiency and solar upgrade at 1095 Dayhill Road
- ▶ Projected savings are **24,317 MMBtu** versus **\$829,399** of ratepayer funds at risk.
- ▶ Ratepayer funds will be paid back in one of the following ways
 - ▶ (a) through a take-out by a private capital provider at the end of construction (project completion);
 - ▶ (b) subsequently, when the loan is sold down to a private capital provider; or
 - ▶ (c) through receipt of funds from the City of Windsor as it collects the C-PACE benefit assessment from the property owner.

REDACTED

1095 Dayhill Road (Windsor)

Terms and Conditions



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

- ▶ \$829,399 construction loan will be set at 5.5% and the term loan will be set at a 6% over the 20-year term.
- ▶ \$829,399 loan against the property
 - ▶ Property valued at REDACTED
 - ▶ Loan-to-value ratio equals REDACTED
 - ▶ REDACTED
 - ▶ DSCR > REDACTED



REDACTED

Anticipated CEFIA cash flow



CEFIA Pro Forma			
<i>Project Basics</i>		<i>Cash Flows</i>	
		<u>Date</u>	<u>CEFIA \$</u>
Amount Financed	\$829,399	Dec 2013	\$829,399
Construction Period (years)	0.42	May 2014	\$19,007
Term (years)	20	Jul 2014	\$71,764
Construction Financing Rate	5.50%	Jul 2015	\$71,764
Term Financing Rate	6.00%	Jul 2016	\$71,764
		Jul 2017	\$71,764
Construction Interest Payment (bullet)	\$19,007	Jul 2018	\$71,764
Yearly Debt Service Payments (made semi-annually)	\$71,764	Jul 2019	\$71,764
		Jul 2020	\$71,764
		Jul 2021	\$71,764
		Jul 2022	\$71,764
		Jul 2023	\$71,764
		Jul 2024	\$71,764
		Jul 2025	\$71,764
		Jul 2026	\$71,764
		Jul 2027	\$71,764
		Jul 2028	\$71,764
		Jul 2029	\$71,764
		Jul 2030	\$71,764
		Jul 2031	\$71,764
		Jul 2032	\$71,764
		Jul 2033	\$71,764



REDACTED

1095 Dayhill Road (Windsor)

The Five W's



- ▶ **What?** Receive approval for a \$829,399 construction and (potentially) term loan under the C-PACE program to Infinity VII, LLC to finance the construction of specified efficiency and renewable energy upgrade
- ▶ **When?** Project to commence early 2014.
- ▶ **Why?** Allow CEFIA to finance this C-PACE transaction, continue to build momentum in the market, and potentially provide term financing for this project until CEFIA sells it along with its other loan positions in C-PACE transactions.
- ▶ **Who?** The end-users of the project – Infinity VII, LLC and tenants of 1095 Dayhill Road.
- ▶ **Where?** 1095 Dayhill Road (Windsor)



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

Board of Directors of the Clean Energy Finance and Investment Authority

Agenda Item #6f

Commercial and Industrial Sector Programs – C-PACE

21 Mount Parnassus Drive (East Haddam)

December 20, 2013

21 Mount Parnassus Drive (East Haddam) Ratepayer Payback



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

- ▶ \$478,000 157 kW solar installation at the Quality Inn in Vernon
- ▶ Projected savings are **1600 MWh** versus **\$478,000** of ratepayer funds at risk.
- ▶ Ratepayer funds will be paid back in one of the following ways
 - ▶ (a) through a take-out by a private capital provider at the end of construction (project completion);
 - ▶ (b) subsequently, when the loan is sold down to a private capital provider; or
 - ▶ (c) through receipt of funds from the City of East Haddam as it collects the C-PACE benefit assessment from the property owner.

REDACTED

21 Mount Parnassus Drive (East Haddam) Terms and Conditions



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

- ▶ \$478,000 construction loan and the term loan will be set at a fixed 5% over the 10-year term
- ▶ \$478,000 loan against the property
 - ▶ Property valued at \$ REDACTED
 - ▶ Loan-to-value ratio equals REDACTED
- ▶ DSCR > REDACTED



REDACTED

Anticipated CEFIA cash flow



CEFIA Pro Forma			
<i>Project Basics</i>		<i>Cash Flows</i>	
Amount Financed	\$478,000	<u>Date</u>	<u>CEFIA \$</u>
Construction Period (years)	0.42	Dec 2013	\$478,000
Term (years)	10	May 2014	\$9,958
		Jul 2014	\$61,325
Construction Financing Rate	5.00%	Jul 2015	\$61,325
Term Financing Rate	5.00%	Jul 2016	\$61,325
		Jul 2017	\$61,325
Construction Interest Payment (bullet)	\$9,958	Jul 2018	\$61,325
Yearly Debt Service Payments (made semi-annually)	\$61,325	Jul 2019	\$61,325
		Jul 2020	\$61,325
		Jul 2021	\$61,325
		Jul 2022	\$61,325
		Jul 2023	\$61,325
		Jul 2024	\$0
		Jul 2025	\$0
		Jul 2026	\$0
		Jul 2027	\$0
		Jul 2028	\$0
		Jul 2029	\$0
		Jul 2030	\$0
		Jul 2031	\$0
		Jul 2032	\$0
		Jul 2033	\$0



REDACTED

21 Mount Parnassus Drive (East Haddam)

The Five W's



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

- ▶ **What?** Receive approval for a \$478,000 construction and (potentially) term loan under the C-PACE program to Bud & Bobby Enterprises, LLC to finance the construction of specified renewable energy upgrade
- ▶ **When?** Project to commence early 2014.
- ▶ **Why?** Allow CEFIA to finance this C-PACE transaction, continue to build momentum in the market, and potentially provide term financing for this project until CEFIA sells it along with its other loan positions in C-PACE transactions.
- ▶ **Who?** The end-users of the project – Bud & Bobby Enterprises, LLC and Shagbark Lumber & Farm Supplies, Inc.
- ▶ **Where?** 21 Mount Parnassus Drive, East Haddam



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

Board of Directors of the Clean Energy Finance and Investment Authority

Agenda Item #6g

Commercial and Industrial Sector Programs – C-PACE

Sell Down Process

December 20, 2013



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

Board of Directors of the Clean Energy Finance and Investment Authority

Agenda Item #7

Committee Updates and Recommendations

December 20, 2013



CLEAN ENERGY

FINANCE AND INVESTMENT AUTHORITY

Board of Directors of the Clean Energy Finance and Investment Authority

Agenda Item #7a

Committee Updates and Recommendations

Budget and Operations Committee

December 20, 2013



- ▶ Budget Amendments
- ▶ Sick Leave Bank

FY2013 Budget Amendments

Overview



	Approved Budget	Revised Budget	Budget Increase (Decrease)
C-PACE	\$ 2,074.40	\$ 3,326.60	\$ 1,252.20
Residential Programs	\$ 2,566.30	\$ 2,656.30	\$ 90.00
General Operations	\$ 2,803.40	\$ 2,893.90	\$ 90.50
Total	\$ 7,444.10	\$ 8,876.80	\$ 1,432.70

- Increase in budget to account for program design and rapid C-PACE growth
- Staffing reallocation of previously approved position

FY2013 Budget Amendments

C-PACE



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

	Approved Budget	Revised Budget	Budget Increase (Decrease)
Salaries & Wages	\$ 666.9	\$ 716.9	\$ 50.0
Employee Benefits	\$ 496.1	\$ 533.3	\$ 37.2
Consulting fees	\$ 175.0	\$ 175.0	--
Technical administrator	\$ -	\$ 800.0	\$ 800.0
Municipal support	\$ -	\$ 80.0	\$ 80.0
Loan servicing fees	\$ -	\$ 100.0	\$ 100.0
Marketing/External relations	\$ 400.0	\$ 600.0	\$ 200.0
IT operations	\$ 30.0	\$ 15.0	\$ (15.0)
Unchanged Budget Items (full list in Attachment 1)	\$ 306.4	\$ 306.4	
Operating Expenses	\$ 2,074.4	\$ 3,326.6	\$ 1,252.2
Operating Income	\$ -	\$ (90.0)	\$ (90.0)
NET OPERATING EXPENSES	\$ 2,074.4	\$ 3,236.6	\$ 1,162.2



▶ Salaries and Wages

- ▶ Request \$87,200 (including benefits) for new Project Assistant.
- ▶ CEFIA expends a large portion of staff time managing projects. Another project assistant is necessary to ensure we do not become a bottleneck in processing applications.

FY2013 Budget Amendments

C-PACE



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

- ▶ Technical Administrator
 - ▶ Request a new budget line of \$800,000
 - ▶ Moving a significant portion away from marketing and consultant lines
 - ▶ Covers transactions for the rest of the fiscal year (50)
 - ▶ Technical review (TR) critical to meet statutory SIR>1 requirement and to receive mortgage lender consent.
 - ▶ TR costs have come down between %15 - % 40



- ▶ Municipal Support
 - ▶ Request a budget line of \$80,000
 - ▶ Municipalities serve as the collection agent for the C-PACE assessments. With 66 municipalities on board and approved transactions in 13 municipalities, we need to automate the collection process
 - ▶ Will cover software upgrades and maintenance fees to towns using main tax collection software in CT

FY2013 Budget Amendments

C-PACE



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

- ▶ Loan Servicing
 - ▶ Request new budget line of \$100,000
 - ▶ CEFIA has serviced the loans in-house to date; with 14 deals closed we need to automate the process
 - ▶ CEFIA issued an RFP for a Master Servicer and in November selected Cortland Capital Markets Services, LLC as the C-PACE master servicer.
 - ▶ CEFIA is still searching for an Underwriter



- ▶ Marketing & External Relations
 - ▶ Request budget increase from \$400,000 to \$600,000
 - ▶ Hands-on support to building owners is necessary to close deals, particularly in key sectors such as non-profits.
 - ▶ Working with Match Drive on marketing and outreach campaign materials as well as improvements to our website to drive traffic to C-PACE.com and capture the interest these campaigns create.

FY2013 Budget Amendments

C-PACE



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

- ▶ Consulting Fees
 - ▶ Remain at \$175,000
 - ▶ Remaining amount will cover consultants to provide advice on specific technologies that are new to the C-PACE program, such as waste-to-energy, microgrids, and small hydro and sector-specific research such as a multifamily pilot with CHFA

FY2013 Budget Amendments

C-PACE



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

- ▶ IT Operations
 - ▶ Reduce from \$30k from \$15k

- ▶ Operating Income
 - ▶ \$90,000 of estimated fee revenue from closing fees

FY2013 Budget Amendments

Residential Programs



	Approved Budget	Revised Budget	Budget Increase (Decrease)
Consulting fees	\$ 171.3	\$ 261.3	\$ 90.0

- Public Act 13-298 directs CEFIA, working with CEEF and the utilities, to develop a residential clean energy on-bill repayment (OBR) program
- Increase will cover consulting help in program design and implementation
 - Wisconsin Energy Conversation Corporation
 - A master servicer to manage the payment process between the utilities and lenders

FY2013 Budget Amendments

General Operations



	Approved Budget	Revised Budget	Budget Increase (Decrease)
Accounting & Audit	\$ 45.0	\$ 135.5	\$ 90.5

- CEFIA created several special purpose vehicles (SPVs) as part of the CT Solar Lease and CT Solar Loan financial structures
- CEFIA is requested an additional \$90,500 to cover audits of these SPVs as well as tax preparation services.
- Reassign open position to asset manager or loan portfolio manager

Sick Leave Bank Policy

Background and Current Status



- ▶ Established in 2009 by CI and the CCEF
- ▶ CEFIA adopted the Sick Leave Bank on December 16, 2011
- ▶ Allows participating employees to withdraw up to 10 days in the event of a qualifying illness or injury

Sick Leave Bank Today

Number of CI and CEFIA Employees	93
Number of Sick Leave Bank Participants	28
Number of Hours Donated into Sick Leave Bank	400
Value of Hours Donated into Sick Leave Bank	\$24,417.73
Value of a Sick Leave Bank Hour	\$61.04
Total Hours Used from Sick Bank Participants	0

Sick Leave Bank Policy Comparison



	State of Connecticut	CI/CEFIA (with proposed change)	CHFA	CRRA	CT Lottery
Have a sick leave bank?	Yes	Yes	No*	No	Yes – participates in state bank
Eligibility	Managers and above	All employees	All employees		Managers and above
Must Exhaust					
<ul style="list-style-type: none"> Sick Leave Personal Leave Comp Time Vacation Time 	<ul style="list-style-type: none"> Yes Yes Yes Excess of 60 days 	<ul style="list-style-type: none"> Yes Yes Yes Excess of 30 days 	<ul style="list-style-type: none"> Yes Yes Yes Yes 		<ul style="list-style-type: none"> Yes Yes Yes Excess of 60 days
Pay rate of bank	Half day	Full day	Full day		Half day
Withdrawal Limit	200 half days	10 days			200 half days

*CHFA allows donation of vacation and personal time to employees with qualifying illness. Chart indicates this policy

Sick Leave Bank Policy

Recommended Change

- ▶ Currently, participants must exhaust all their sick, personal, compensatory, and vacation leave before accessing the sick bank
- ▶ Change would allow participants to keep up to 30 vacation days while still requiring them to exhaust all personal, compensatory, and sick leave plus vacation excess of 30 days
- ▶ Allows employees to retain time for follow-up medical appointments and to supplement disability pay
- ▶ Currently, any participant that has been disciplined for absence-related reasons for the last 12 months cannot withdraw from the bank
- ▶ Change would allow a committee of Senior Management to waive this requirement for a withdrawal request



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

Board of Directors of the Clean Energy Finance and Investment Authority

Agenda Item #7b

Committee Updates and Recommendations

Audit, Compliance and Governance Committee

December 20, 2013

The Audit

- ▶ Unmodified Opinion on the Financial Statements
- ▶ Audit conducted under
 - ▶ Auditing Standards Generally Accepted in the United States of America
 - ▶ *Government Auditing Standards* issued by the Comptroller General of the United States
- ▶ Reporting on Internal Control Over Financial Reporting and on Compliance and Other Matters required under *Government Auditing Standards*
- ▶ Reporting on Internal Control and Internal Control Over Compliance required under the Federal OMB Circular A-133 (single audit)

Management Responsibilities



- ▶ Establishing and maintaining effective internal controls, including those over compliance;
- ▶ Selection and application of accounting principles;
- ▶ Making all financial records and related information available for the audit;
- ▶ Design and implementation of programs and controls to prevent and detect fraud; and
- ▶ Compliance with laws, regulations, contracts, agreements and grants as required by *Government Auditing Standards* and the federal single audit act (A-133)

- ▶ **Our responsibility to report on conducting the engagement:**
 - ▶ Significant sensitive accounting estimates including the valuation of investments
 - ▶ Significant audit adjustments and proposed but unrecorded adjustments – NONE
 - ▶ Disagreements with management about auditing, accounting or disclosure matters – NONE
 - ▶ Management’s consultations with other auditors – NONE



- ▶ Difficulties encountered relating to the performance of the audits – NONE
- ▶ Material errors or fraud or possible illegal acts – NONE
- ▶ Relationships between any of our representatives and CEFIA that in our professional judgment, may reasonably be thought to bear on independence – NONE
- ▶ Major issues discussed with management prior to retention – NONE
- ▶ Other items – NONE

2013 Fiscal Audit Resolution



- ▶ **RESOLVED**, that the CEFIA Board of Directors approves the Audited Financial Statements and the Federal Single Audit Report of the Clean Energy Finance and Investment Authority for the Fiscal Year Ending June 30, 2013 as presented on December 20, 2013.
- ▶ **RESOLVED**, that the CEFIA Board of Directors directs CEFIA staff to investigate and provide a recommendation to the Board on the merits of utilizing a Comprehensive Annual Financial Report (CAFR) for the Fiscal Year 2014 annual audit.



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

Board of Directors of the Clean Energy Finance and Investment Authority

Agenda Item #7c

Committee Updates and Recommendations

Deployment and Budget and Operations Committees

December 20, 2013

CEFIA Class I REC Asset Portfolio

Policy Goals



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- ▶ Policy designed to achieve the following objectives:
 - ▶ Minimize transaction costs
 - ▶ Benefit from expert advice
 - ▶ Lock in attractive pricing where possible
 - ▶ Limit downside exposure
 - ▶ Retain the opportunity for upside gains
 - ▶ Provide some level of revenue certainty for planning purposes, in terms of reinvestment of REC proceeds by recovering funds used for the RSIP

CEFIA Class I REC Asset Portfolio

Proposed 3-Step Policy



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- ▶ Step 1 → annual RSIP portfolio analysis
 - ▶ What is CEFIA's installed capacity and projected growth?
 - ▶ What does that portfolio's historical and projected REC production look like?
- ▶ Step 2 → semiannual market analysis
 - ▶ Evaluating both the spot and forward markets
 - ▶ Focusing on key elements of value and risk
- ▶ Step 3 → price transactions in the spot and/or forward markets to ensure highest and best return

CEFIA Class I REC Asset Portfolio

Focus on Step 3



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- ▶ Requirements:
 - ▶ Use qualified brokers and established industry sources to ensure full price discovery
 - ▶ Transact with investment-grade or otherwise qualified counterparties
 - ▶ Price all RECs to be sold at market rates (90% threshold)
 - ▶ Transact no more than 75% of projected REC production through a “non-contingent” future contract
 - ▶ Transact up to 100% of projected REC production through a “unit-contingent” future contract

CEFIA Class I REC Asset Portfolio

Expert Feedback on Draft Policy



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- ▶ REC brokers can provide immediate market intelligence but less insight into future policy risk that can affect pricing → need to regularly consult other market fundamentals analyses
- ▶ For non-investment grade counterparties, require appropriate financial safeguards when trading
- ▶ CEFIA should create process for seemingly “out of market” transactions undertaken due to unique perspective on market direction
- ▶ CEFIA should develop standard draft REC transaction contract to limit risk of failed closings



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

Board of Directors of the Clean Energy Finance and Investment Authority

Agenda Item #7d

2014 Board of Directors and Committee Meeting Schedule

December 20, 2013

2014 Schedule of Meetings

BOD and Committees



	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	2014 Total	2013 Total
BOD	x			x		x	x			x		x	6	12
ACG				x						x			2	2
B&O					x	x							2	6
DC		x	x		x				x		x		5	6
Total	1	1	1	2	2	2	1	0	1	2	1	1	15	26



CLEAN ENERGY
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Board of Directors of the Clean Energy Finance and Investment Authority

Agenda Item #8

Residential Sector Programs

Multifamily and Affordable Housing Programs

December 20, 2013

Multifamily and Affordable Housing Opportunity and Challenges



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Opportunity

- ▶ **Energy cost savings on the order of \$125,000,000 per year**
 - ▶ 250,000 multifamily units (18%)
 - ▶ Potential to save \$500+ per unit
 - ▶ Public and affordable housing less efficient than market rate -> 8X EUI
- ▶ **Buildings concentrated in CT's ring cities near gas lines**

Challenges

- ▶ **Capital to plan and finance**
- ▶ **Securing lender consent**
- ▶ **Split incentives**
- ▶ **Health and safety issues**
- ▶ **No performance data**
- ▶ **Confusion negotiating the improvement process**



Multifamily and Affordable Housing Initiatives to Build the Market



An Energize CT Program



clean energy solutions 

CDFI's



CHFA Partnership



the key to affordable housing

WINN-HUD OME





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FINANCE AND INVESTMENT AUTHORITY

Board of Directors of the Clean Energy Finance and Investment Authority

Agenda Item #9

Other Business

December 20, 2013



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FINANCE AND INVESTMENT AUTHORITY

Board of Directors of the Clean Energy Finance and Investment Authority

Agenda Item #10

Adjourn

December 20, 2013

Subject to changes and deletions

CLEAN ENERGY FINANCE AND INVESTMENT AUTHORITY
Board of Directors
Draft Minutes – Regular Meeting
Friday, November 15, 2013

A regular meeting of the Board of Directors of the **Clean Energy Finance and Investment Authority (the “CEFIA”)** was held on November 15, 2013 at the office of Connecticut Innovations, 865 Brook Street, Rocky Hill, CT.

1. **Call to Order:** Daniel Esty, Vice Chairperson of CEFIA, called the meeting to order at 9:32 a.m. Board members participating: Mun Choi (by phone); Daniel Esty, Vice Chairperson of CEFIA and Commissioner of the Department of Energy and Environmental Protection (“DEEP”); Bettina Ferguson, State Treasurer’s Office; Tom Flynn; Reed Hundt (by phone); and Matthew Ranelli (by phone).

Members Absent: Norma Glover; John Harrity; Catherine Smith, Chairperson of CEFIA and Commissioner of the Department of Economic and Community Development; and Patricia Wrice.

Staff Attending: George Bellas, Mackey Dykes, Brian Farnen, Bryan Garcia, Dale Hedman, Bert Hunter, Shelly Mondo, Kerry O’Neill, Cheryl Samuels, and Genevieve Sherman.

Others Attending: Jamie Howland, Environment Northeast; Henry Link, Enviro Energy Connections; Alex Kragie, DEEP; and Melissa Patterson.

2. **Public Comments**

There were no public comments.

3. **Approval of Minutes of Meeting of October 18, 2013**

Mr. Esty asked the Board to consider the minutes from the September 13, 2013 meeting.

Upon a motion made by Mr. Flynn, seconded by Mr. Hundt, the Board members voted unanimously in favor of adopting the minutes from the October 18, 2013 meeting.

There being no objection, the order of the agenda was changed.

4. **Commercial and Industrial Sector Program Updates and Recommendations:**

a. C-PACE Sell Down

Mr. Hunter discussed the C-PACE warehouse facility. He mentioned that in February 2013, the Board authorized an allocation of \$20,000,000, and in September 2013 increased the allocation to \$40,000,000 in support of the C-PACE Program. Mr. Hunter acknowledged the leadership of the Governor and support of the legislature and other stakeholders. He thanked the C-PACE, legal and finance teams for their efforts with putting together an excellent process for technical review, mortgage holder consent, underwriting procedures and credit guidelines, and documentation that helped to effectuate a successful program. Mr. Hunter stated that approximately 70 towns have received approval to participate in the program, and the technical review process and program documents have been standardized. He mentioned that the C-PACE program continues to meet the target that \$20,000,000 of the C-PACE warehouse facility will be committed by the end of the calendar year. He explained that staff issued an Initial Offering Notice to solicit bids from the program's capital providers through a "sealed bid" process to sell the C-PACE transactions. Mr. Hunter summarized that staff recommends authorization to sell the first eight closed C-PACE transactions and the next \$20,000,000 of eligible C-PACE benefit assessments to the Clean Fund. He discussed the rationale for selecting the Clean Fund. In response to a question, Mr. Hunter explained that the loans will be bundled and sold, and the funding from the sale can be used to make new loans. He spoke about the diversity of the transactions being sold. Mr. Hunter reviewed the process and terms and conditions of the private placement which will potentially be sold to the public market. He indicated that the Clean Fund is expected to make a good faith deposit to purchase the bonds in the next several days, and the closing should occur in December 2013.

Mr. Hunter highlighted that the transactions will be sold at a slight discount, which is well within the targets that were set, and he noted that this is particularly good because the initial rates to end users were discounted to stimulate activity in the C-PACE program. In response to a question, Mr. Hunter mentioned that the terms of additional tranches will be similar to these terms and indicated that the prices are based on a spread over LIBOR.

Upon a motion made by Mr. Ranelli, seconded by Ms. Ferguson, the Board members voted unanimously in favor of adopting the following resolution authorizing the sale of C-PACE transactions to the Clean Fund:

WHEREAS, Pursuant to Section 157 of Public Act No. 12-2 of the June 12, 2012 Special Session of the Connecticut General Assembly (the "Act"), CEFIA is directed to, amongst other things, to establish a commercial sustainable energy program for

Connecticut, known as Commercial Property Assessed Clean Energy (“C-PACE”) and CEFIA established the C-PACE program; and

WHEREAS, the Board of Directors previously passed resolutions authorizing the establishment of a \$40 million construction and term loan facility in support of the C-PACE program to fund C-PACE transactions approved at the requisite authorization level by staff, the Deployment Committee or the Board of Directors (the “C-PACE Warehouse Facility”); and

WHEREAS, CEFIA established the C-PACE Warehouse Facility and has closed over \$15 million in C-PACE projects; and

WHEREAS, CEFIA staff requests the Board of Directors approve the sale of the first 8 closed C-PACE transactions and the next \$20 million of C-PACE benefit assessments to Clean Fund through a financial conduit; and

WHEREAS, the Board of Directors directed staff to sell-down such funded C-PACE transactions to private capital providers in order to continually replenish funding capacity for the C-PACE program on an ongoing basis; and

WHEREAS, staff’s request is consistent with CEFIA’s comprehensive plan and budget for FY 2014 with respect to anticipated budget investments for the C-PACE program and other program requirements.

NOW, therefore be it:

RESOLVED, that CEFIA’s Board of Directors authorizes the sale of the first 8 closed C-PACE transactions and the next \$20 million of C-PACE benefit assessments to Clean Fund.

RESOLVED, that the President of CEFIA and any other duly authorized officer of CEFIA is authorized to execute and deliver any contract in furtherance of the sell-down transaction consistent with the Memorandum to the Board of Directors dated November 8, 2013, as updated for the Board of Directors on November 15, 2013.

RESOLVED, that the proper CEFIA officers are authorized and empowered to do all other acts and execute and deliver all other documents and instruments as they shall deem necessary and desirable to affect the above-mentioned legal instrument.

b. Sofia’s Plazas I and II, East Windsor, CT

Ms. Sherman discussed the request for C-PACE construction and term loan financing to fund the \$1,001,298 energy efficiency project at 2 North Road and 122 Prospect Hill Road, East Windsor, CT. She mentioned that the project consists of two different buildings on adjacent properties with the same owner. Ms. Sherman reviewed the cash flow projections, key financial metrics and terms and conditions of the loan. Ms.

Sherman mentioned that there is positive cash flow in year 1. Attorney Farnen mentioned that the financing agreements for the C-PACE transactions have been standardized and template forms of agreement have been prepared, and staff will highlight when there are any material deviations from the standard forms and processes or anything that requires attention or review. In future presentations, staff was asked to provide the change in cash flow anticipated.

Upon a motion made by Mr. Ranelli, seconded by Mr. Flynn, the Board members voted unanimously in favor of adopting the following resolution regarding the C-PACE transaction for Sofia's Plazas I and II, East Windsor, CT:

WHEREAS, Pursuant to Section 157 of Public Act No. 12-2 of the June 12, 2012 Special Session of the Connecticut General Assembly and as amended (the "Act"), CEFIA is directed to, amongst other things, establish a commercial sustainable energy program for Connecticut, known as Commercial Property Assessed Clean Energy ("C-PACE"); and

WHEREAS, the CEFIA Board of Directors has approved a \$40,000,000 C-PACE construction and term loan program; and

WHEREAS, CEFIA seeks to provide a \$1,001,298 construction and (potentially) term loan under the C-PACE program to Sofia's Plaza LLC, the property owner of 2 North Road and 122 Prospect Hill Road, East Windsor, CT to finance the construction of specified clean energy measures in line with the State's Draft Comprehensive Energy Strategy and CEFIA's Strategic Plan.

NOW, therefore be it:

RESOLVED, that the President of CEFIA and any other duly authorized officer of CEFIA, is authorized to execute and deliver Loan in an amount not to be greater than one hundred and ten percent of the Loan amount with terms and conditions consistent with the memorandum submitted to the Board of Directors on November 8, 2013, and as he or she shall deem to be in the interests of CEFIA and the ratepayers no later than 90 days from November 15, 2013.

RESOLVED, that before executing the Loan, the President of CEFIA and any other duly authorized officer of CEFIA shall receive confirmation that the C-PACE transaction meets the statutory obligations of the Act, including but not limited to the savings to investment ratio and lender consent requirements.

RESOLVED, that the proper CEFIA officers are authorized and empowered to do all other acts and execute and deliver all other documents and instruments as they shall deem necessary and desirable to effect the above-mentioned legal instrument.

5. Committee Updates and Recommendations:

a. Budget and Operations Committee

Consideration of the resolution regarding recommended changes to the CEFIA Employee Handbook was deferred until the December meeting.

b. 2014 Schedule of Board and Committee Meetings

Mr. Garcia explained that the proposed Board meeting schedule has been changed from quarterly to six times per year and will be held in the month following each quarter with two additional meetings. He noted that there will be an opportunity for transactions to be approved every month by either the Board and/or Deployment Committee, with the exception of August. Mr. Garcia mentioned that the April 2014 meeting will be held on April 25, 2014 due to the Good Friday holiday. Consideration of the meetings schedules was deferred until the December meeting.

6. Update from the President

Mr. Garcia mentioned that staff is in the process of developing several multifamily low-income housing programs. Staff is working with the Connecticut Housing Investment Fund ("CHIF") and the Connecticut Housing Finance Authority. Ms. O'Neill mentioned that a strategic initiative will be presented next month that will add capital to a multifamily rating pool with CHIF. An update on the multifamily programs in development will be sent to the Board in the next several weeks.

Mr. Garcia provided an update on the Green Bank model. He indicated that talking points were sent to the Board, and additional information is available, including a PowerPoint slide presentation. Mr. Garcia mentioned that a Green Bank academy will be held in February for other states considering or in the process of establishing a green bank and other stakeholders to collaborate and share information. He spoke about partnering with the Connecticut Bankers Association on two workshops to provide more information about residential products and commercial products. Mr. Garcia mentioned that staff continues to find ways to improve its involvement with the banking industry to seek further investments in clean energy.

Mr. Garcia spoke about the Efficient Connecticut workshop sponsored by representatives from CEFIA, DEEP, utilities and the U.S. Department of Energy that was held yesterday, November 14, to build relationships among the respective staffs, assess what is being done with policy implementation and to learn about national best practices. He noted that the workshop focused on data, including data access, labeling, benchmarking and measuring success.. He recognized and thanked Katie Dykes, Tracy Babbidge, and Diane Duva from DEEP for their support.

Mr. Garcia discussed the Matchmaking IV event that will be held in collaboration with the Renewable Energy and Efficiency Business Association and the Connecticut Energy Efficiency Fund on December 3 to match-make energy efficiency and renewable energy contractors with financing within the commercial and industrial and residential sectors. A pre-event workshop in partnership with DECD will be held to support the growth of small businesses in the energy sector through the Small Business Express Program.

7. Statutory and Infrastructure Sector Program Updates:

Mr. Healey provided an update on the Class I Renewable Energy Credit (“REC”) Asset Portfolio Renewable Portfolio Standard (“RPS”). He mentioned that Connecticut’s RPS requires a certain percentage of the state’s electric load come from renewable energy sources each year. The RPS fulfillment is measured in RECs. The 11 percent of load required for 2014 represents approximately 3,025,000 Class I RECs in the coming year. Mr. Healey stated that CEFIA owns the RECs from solar PV systems under the Residential Solar Investment Program (“RSIP”), and the average RSIP system produces about 8 RECs per year. He indicated that CEFIA has approved over 2,000 systems and has over 16,000 RECs to sell in the coming year. Mr. Hedman spoke about the partnership with Locus to monitor every system. It was noted, however, that some of the meters have not yet been loaded, and are not yet included.

Mr. Healey reviewed the maximum allowable selling price for the RECs in accordance with the Alternative Compliance Payment cap. Noting that the market is currently short RECs, it is anticipated that RECs traded in the near future will trade near the cap. Mr. Healey discussed the estimated net present value of CEFIA RECs with the different contract lengths. The Board talked about the changes to the supply and demand and potential impacts on the value. Mr. Healey mentioned that CEFIA issued a Request for Qualifications in the summer and currently has five qualified brokers ready to price a transaction for CEFIA when ready. Staff asked for guidance from the Board on how to proceed with managing the current REC asset portfolio and future contracts. There was general agreement from the Board to move forward with trading the existing portfolio of RECs created in 2013 but asked that this issue be discussed further with both the Deployment Committee and Budget and Operations Committee. The committees should also discuss and analyze how to proceed in the future and report back at the next Board meeting. Staff was asked to keep the Board apprised of REC prices.

8. Personnel Matter:

Mr. Esty mentioned that he and Ms. Smith completed a performance evaluation for Mr. Garcia. Details of the favorable results of the performance evaluation will be discussed during executive session. **Upon a motion made by Mr. Esty, the Board members present voted unanimously in favor of going into executive session at 10:20 a.m. to discuss this personnel matter.**

The executive session ended at 10:30 a.m., and the meeting was immediately reconvened.

9. **Adjournment**: Upon a motion made by Ms. Ferguson, seconded by Mr. Flynn, the Board members voted unanimously in favor of adjourning the November 15, 2013 meeting at 10:32 a.m.

Respectfully submitted,

Catherine Smith, Chairperson



Memo

To: Board of Directors of the Clean Energy Finance and Investment Authority

From: Bryan Garcia (President and CEO), Bert Hunter (EVP and CIO), Mackey Dykes (Chief of Staff)

Cc: Jessica Bailey (Director of Commercial and Industrial Programs), Andy Brydges (Director of Institutional Programs), Brian Farnen (General Counsel and Chief Legal Officer), Dale Hedman (Director of Statutory and Infrastructure Programs), and Kerry O’Neill (Director of Residential Programs)

Date: October 11, 2013

Re: Connecticut’s “Green Bank” at Work – FY 2013 Results

Overview

As part of our preparation for the FY 2014 budget, we assessed CEFIA’s performance in FY 2013 in accordance with the targets outlined in our two-year Comprehensive Plan. We established targets as an organization through calendar year 2014 across each of the four (4) programmatic sectors (i.e. statutory and infrastructure, residential, commercial and industrial, and institutional) and noted the results we achieved in FY 2013 – see Table 1.

Table 1. FY 2013 Results Compared to the Two-Year Comprehensive Plan Targets

	Comprehensive Plan Targets (through 2014)	Statutory and Infrastructure Sector	Residential Sector	Commercial and Industrial Sector	Institutional Sector	Total Achieved from Sectors (FY 2013)
CEFIA Capital at Risk	\$45,300,000	\$19,225,331	\$15,510,000	\$3,943,106	\$2,900,000	\$41,578,437
Private Capital Attracted	\$186,600,000	\$97,975,225	\$73,300,000	-	\$10,000,000	\$181,275,225
Clean Energy Deployed (MW)	51.1	26.7	-	0.1	-	26.8
Annual Energy Saves (kMMBtu)	180	-	-	9	-	9
# of Loans/Installs	5,283	1,155	-	5	-	1,160

These results were presented to and discussed with the CEFIA Board of Directors in June 2013. Of the \$181.3 million of private capital attracted towards clean energy deployment in Connecticut, CEFIA put \$41.6 million of its capital at risk – for a total of over \$220 million of capital being invested in clean energy in Connecticut as a result of FY 2013 activities. Of the \$41.6 million of CEFIA capital at risk, over 50% of those funds (i.e. \$21.5 million) were in the form of loans and leases not grants – see Table 2. This means that CEFIA expects these funds to be returned over time (i.e. ratepayer payback) as debt service payments are received.

Table 2. Total and Percentage of CEFIA Capital at Risk in Subsidies, Credit Enhancements, and Loans and Leases from FY 2013 Activities

Sector	Subsidies	Credit Enhancements	Loans and Leases	Total
Statutory and Infrastructure	\$13,425,331	\$0	\$5,800,000	\$19,225,331
Residential	\$0	\$6,410,000	\$9,100,000	\$15,510,000
Commercial and Industrial	\$250,000	\$0	\$3,693,106	\$3,943,106
Institutional	\$0	\$0	\$2,900,000	\$2,900,000
Total	\$13,675,331	\$6,410,000	\$21,493,106	\$41,578,437
Percent of Total	33%	15%	52%	

From a “big picture” perspective, the following are key financial metrics resulting from FY 2013 activities:

- **Private Capital Attracted** – attracted over \$180 million of private capital investment in clean energy in Connecticut;
- **CEFIA Funds at Risk** – of the over \$40 million of CEFIA funds at risk, over \$20 million is expected to be returned (i.e. ratepayer payback) over time in debt service payments;
- **Leverage Ratio** – every \$1.00 of CEFIA capital put at risk attracted between \$4.50 to \$9.00 of private capital depending upon debt service repayment performance;
- **Deployment** – nearly 30 MW of clean renewable energy was deployed and 9,000 MMBtu of energy will be saved per year; and
- **Benchmark** – in comparison, the CCEF attracted \$155 million of private capital investment in clean energy in Connecticut while putting over \$170 million of its capital at risk. Only \$15 million of the CCEF capital at risk was in the form of leases and is expected to be returned over time. Therefore, CCEF’s model yielded a \$1.00:\$1.00 leverage ratio while deploying 35 MW of clean energy in over a decade.

CEFIA’s results are impressive not only with respect to the financial targets CEFIA has established in its two-year Comprehensive Plan, but also in comparison to the results achieved by the CCEF over a decade. This means that CEFIA has demonstrated that the “green bank” model is working in Connecticut. It is doing more with less and faster!

In order to determine the societal benefits of economic development (i.e. jobs) and environmental protection (i.e. CO₂ emissions avoided) resulting from CEFIA’s FY 2013 activities, we felt it was important to estimate these benefits in order to better communicate the full “green bank” story beyond the financial results. The rest of this memo summarizes our estimates of the jobs created and the global warming emission reductions achieved as a result of FY 2013 activities.

Economic Development Benefits – Jobs

CEFIA’s enabling of over \$220 million of capital investments in clean energy deployment has significant economic development implications. Recognizing that some of this investment has occurred already (i.e. \$120 million), while some of it is yet to be invested (i.e. \$100 million), we have calculated both “Realized Job Gains” and “Future Job Gains” resulting from FY 2013 activities. In other words, just because funds may have been invested or attracted, it doesn’t

mean that they have been expended or deployed (i.e. many projects are still in pre- or early construction phases).

Realized Job Gains

“Realized Job Gains” result from capital that has been expended – projects that are either in construction or have been commissioned and are in service. There are several programs and projects that have realized job gains in Connecticut in FY 2013, including:

- **Residential Solar Investment Program** (RSIP) – \$36.9 million of capital has been invested in residential rooftop solar PV in Connecticut, leading to the deployment of 8.2 MW;
- **Combined Heat and Power** (CHP) – \$9.5 million of capital has been invested in CHP in Connecticut, leading to the deployment of 3.7 MW; and
- **Dominion Bridgeport Fuel Cell Park** (DBFCP) – over \$70.0 million has been invested in a utility-scale fuel cell park in Connecticut, leading to the deployment of 14.8 MW.

To determine the realized job gains from the RSIP and CHP programs, CEFIA staff used formulas for direct jobs and multipliers for indirect and induced jobs from a study conducted by Navigant Consulting¹ in conjunction with professional judgment² – see Table 3.

Table 3. Estimate of the Direct, Indirect, and Induced Jobs Realized from the RSIP and CHP Programs

Program	Direct Job Years per \$1MM Invested	Indirect-Induced Job Multiplier	Indirect-Induced Job Years per \$1MM Invested	Total Jobs Created per \$1MM Invested	Investment Amount (\$MM)	Direct Jobs	Indirect-Induced Jobs	Total Jobs
RSIP	5.9	1.6	9.5	15.4	\$36.9	218	351	568
CHP	6.2	1.6	9.9	16.1	\$9.5	59	94	153
Total					\$46.4	277	445	722

To determine the realized job gains from the DBFCP project, we used the estimates provided by Fuel Cell Energy for direct jobs by job type and the multiplier of 2.3 for indirect and induced jobs from the Navigant Study – see Table 4.

¹ These jobs estimates are based on multipliers determined as a result of work performed by Navigant Consulting for the *Connecticut Renewable Energy and Energy Efficiency Economy Baseline Study* completed in March 2009 and subsequently updated in 2010. This Navigant Study was an independent, third party analysis of Connecticut's clean energy economy. Data was acquired as a result of primary research. Navigant performed a census of over 300 companies, institutions, and organizations identified as active players in Connecticut's renewable energy and energy efficiency economy. Seventy four (74) key renewable energy and energy efficiency companies were interviewed; 95 additional key companies were researched in detail. All renewable companies in Connecticut were identified and analyzed. Key energy efficiency companies were identified and analyzed, with the overall market size estimated by extrapolation. Company interviews included questions about customers, supply chain, number of jobs, corresponding salaries, and revenue. Detailed interview questionnaires are available in the Methodology section of the Baseline Study, pages 58-81 - <http://www.ctcleanenergy.com/Portals/0/Phase%201%20Deliverable%20Final%20Full.pdf>.

² The estimate for CHP jobs created is a professional estimate, made by CEFIA staff, and based on the Navigant Study findings.

Table 4. Estimate of the Direct, Indirect, and Induced Jobs Realized from the DBFCP Project

Type of Job	Direct Jobs	Indirect-Induced Jobs	Total Jobs
Construction and Installation	14	31	45
Service and Operations	5	11	16
Manufacturing	94	216	310
Replacement Manufacturing	13	29	41
Interconnection	10	24	34
Total	135	311	446

Therefore, as a result of investing nearly \$120 million in the RSIP and CHP programs and the DBFC project, nearly 1,200 direct, indirect and induced jobs were created in FY 2013 – over 400 direct jobs and 750 indirect and induced jobs – see Table 5.

Table 5. Realized Jobs from the RSIP and CHP Programs and DBFC Project

Program or Project	Direct Jobs	Indirect and Induced Jobs	Total Jobs
Residential Solar Investment Program	218	351	568
Combined Heat and Power Program	59	94	153
Dominion Bridgeport Fuel Cell Park	135	311	446
Total	412	756	1,168

Future Job Gains

“Future Job Gains” are calculated based on capital that has been attracted to support clean energy in Connecticut, but has not yet been expended – programs or projects have been approved by the CEFIA Board of Directors, but are not yet in construction or commissioned and in-service. There are several programs and projects that will result in future job gains in Connecticut as a result of FY 2013 activities, including:

- **Solar Lease 2** – \$61.1 million of capital, including:
 - \$46.1 million to be invested in residential solar PV projects, leading to the deployment of an estimated 10.2 MW;
 - \$10.0 million to be invested in commercial solar PV projects, leading to the deployment of an estimated 3.8 MW; and
 - \$5.0 million to be invested in residential solar hot water system projects, leading to the saving of an estimated 4,600 MMBtu of energy.

- **Solar Loan** – \$1.5 million to be invested in residential solar PV projects, leading to the deployment of an estimated 330 kW; and

- **Smart-E Loan** – \$36.2 million of capital, including:
 - An estimate of \$18.1 million to be invested in residential solar PV, leading to the deployment of an estimated 4.0 MW; and
 - An estimate of \$18.1 million to be invested in residential energy efficiency, leading to the saving of energy, which has yet to be estimated.

To determine the future job gains from these financing programs, CEFIA staff used formulas for direct jobs and multipliers for indirect and induced jobs from the Navigant Consulting study – see Table 6.

Table 6. Estimate of the Direct, Indirect, and Induced Jobs Future Job Gains from the Solar Lease, Solar Loan, and Smart-E Loan Programs

Program	Direct Job Years per \$1MM Invested	Indirect-Induced Job Multiplier	Indirect-Induced Job Years per \$1MM Invested	Total Jobs Created per \$1MM Invested	Investment Amount (\$MM)	Direct Jobs	Indirect-Induced Jobs	Total Jobs
Solar Lease 2 – Residential Solar PV	5.9	1.6	9.5	15.4	\$46.1	272	438	710
Solar Lease 2 – Commercial Solar PV	3.4	1.6	5.4	8.8	\$10.0	34	54	88
Solar Lease 2 – Residential SHWS	7.6	1.6	12.2	19.8	\$5.0	38	61	99
Solar Loan – Residential Solar PV	5.9	1.6	9.5	15.4	\$1.5	9	14	23
Smart-E Loan – Residential Solar PV	5.9	1.6	9.5	15.4	\$18.1	107	172	279
Smart-E Loan – Residential EE	12.9	1.6	20.6	33.5	\$18.1	233	373	606
Total					\$98.8	693	1,112	1,805

As a result of the investments that are to be made in the future from about \$100 million of capital available through the Solar Lease 2, Solar Loan, and Smart-E Loan products, over 1,800 direct, indirect and induced jobs will be created.

Realized and Future Job Gains

As a result of FY 2013 activities, the following is a breakdown of the estimated realized and future job gains – see Table 7.

Table 7. Estimate of the Realized and Future Job Gains from FY 2013 Activities

Estimated Job Gains	Direct Jobs	Indirect and Induced Jobs	Total Jobs
Realized Job Gains	412	756	1,168
Future Job Gains	693	1,112	1,805
Total Job Gains	1,105	1,868	2,973

Of the \$220 million of CEFIA and private capital invested and to be invested as a result of FY 2013 activities, nearly 3,000 jobs will have been created – over 1,100 of which are direct. CEFIA expects that nearly 100 of those direct jobs are in manufacturing.

Environmental Protection Benefits – Lifetime CO2 Emission Reductions

The investment of over \$220 million of capital in clean energy deployment has significant environmental protection implications as well, in terms of avoided greenhouse gas emissions that would otherwise contribute to global climate change. Recognizing that some of this investment has already occurred in the many projects that have been deployed around the state, while some of it is yet to be invested, we calculated “Realized CO₂ Emission Reductions” and “Future CO₂ Emission Reductions” resulting from FY 2013 activities.

Realized CO₂ Emission Reductions

“Realized CO₂ Emission Reductions” are the result of capital that has been expended – projects are either in construction or have been commissioned and are in service. There are several programs and projects that have realized CO₂ emission reductions in Connecticut in FY 2013, including the Residential Solar Investment Program, Combined Heat and Power Program, and Dominion Bridgeport Fuel Cell Park that were discussed above.

To determine the realized CO₂ emission reductions from these programs and projects CEFIA staff used marginal emission rates from ISO New England in combination with the emissions of each clean energy technology being deployed – see Table 8.³

Table 8. Realized CO₂ Emission Reductions from the RSIP and CHP Programs and DBFC Project

Program or Project	MW Deployed (MW)	Lifetime Generation (MWh)	CO ₂ Emissions Avoided over Lifetime (TCO ₂)
Residential Solar Investment Program	8.2	194,844	101,027
Combined Heat and Power Program ⁴	3.7	410,000	68,000-96,000
Dominion Fuel Cell Park	14.8	1,182,600	85,739
Total	26.7	1,787,444	234,766-282,766

As a result of investing nearly \$120 million in the RSIP and CHP programs and the DBFC project, and deploying over 26 MW of clean energy generation, about 250,000 tons of CO₂ emissions will be avoided over the life of the projects as a result of FY 2013 activities. These in-state clean renewable energy projects will also provide local emission reductions of SO₂ and NO_x by displacing generating units operating on the margins.

Future CO₂ Emission Reductions

³ All emissions reductions from renewable energy projects are determined using ISO-New England information, because that is where the energy will be displaced. This produces results that may be significantly different from emissions savings based on a comparison to national averages. In addition, the generation characteristics of each technology have an impact on the emissions reduction that can be expected. Solar-powered systems will produce only during the daylight hours, which normally coincide with the peak demand period for the utilities. The generating fleet during this time may include peaking plants and reserve plants, which will have lower efficiencies than the “baseload” plants which run 24 hours per day. Consequently, emissions are higher, and the renewable energy systems look better by comparison. The calculations are based on the results of the 2007 New England Marginal Emission Rate Analysis (http://www.iso-ne.com/genrtion_resrcs/reports/emission/2007_mea_report.pdf). The appropriate marginal emissions rates for Connecticut are used to determine the net avoided emissions for each of the technologies evaluated.

- a. PV systems are analyzed using the average of the Marginal Emission Rates (in Lbs/MWh) for “On-Peak Ozone Season” and “On-Peak Non-Ozone Season”. The underlying assumptions are that PV systems will be operating primarily during the on-peak periods, and that their output in the five months of the “Ozone Season” (May – September) is about the same as in the seven months of the “Non-Ozone Season.”
- b. Fuel cells are also evaluated using the “Annual Average (all hours) Marginal Emission Rates”, because they are expected to produce power continually as “base load” generators. Fuel Cell emissions assume that 50% of the thermal output (“waste heat”) is used to displace natural gas used for heating. This is conservative, since 50% thermal utilization is the minimum standard for CCEF’s acceptance of a fuel cell project.

⁴ To determine the exact avoided CO₂ we need to know what the CHP system is displacing (i.e. boiler, grid, etc.), as well as the efficiencies, in order to determine the existing CO₂ emissions and then do the calculation to get the avoided emissions. For general purposes a typical 3.7 MW system operating on natural gas would generate about 13,000 tons of CO₂ annually and 195,000 Tons over its 15-year life. Typically avoiding 35-50% CO₂ overall from the existing infrastructure. Not factoring in the utility transmission and distribution losses.

“Future CO₂ Emission Reductions” are the result of capital that has been attracted to support clean energy in Connecticut, but has not yet been expended – programs or projects have been approved by the CEFIA Board of Directors, but that are not yet in construction or commissioned and in-service, including the Solar Lease 2, Solar Loan, and Smart-E Loan programs discussed previously.

To determine the future CO₂ emission reductions that will result from these financing programs, CEFIA staff used marginal emission rates from ISO New England in combination with the emissions of each clean energy technology – see Table 9.

Table 9. Estimate of Future CO₂ Emission Reductions from the Solar Lease 2, Solar Loan, and Smart-E Loan Programs

Program or Project	Estimated MW Deployed (MW)	Estimated Lifetime Generation (MWh)	Estimated Lifetime Energy Saved (MMBtu)	Estimated CO ₂ Emissions Avoided over Lifetime (TCO ₂)
Solar Lease 2	14.0	332,661	92,000 ⁵	186,609
Solar Loan	0.4	9,505	-	4,928
Smart-E Loan	4.0	95,046	- ⁶	49,281
Total	18.4	437,212	92,000	240,818

As result of investments that are to be made from about \$100 million through the Solar Lease 2, Solar Loan, and Smart-E Loan products, over 240,000 tons of CO₂ emissions will be reduced over the life of the projects.

Realized and Future CO₂ Emission Reductions

As a result of CEFIA’s FY 2013 activities, the following summarizes the estimated realized and future CO₂ emission reductions – see Table 10.

Table 10. Estimate of the Realized and Future CO₂ Emission Reductions from FY 2013 Activities

	CO ₂ Emission Reductions (TCO ₂)
Realized CO ₂ Emission Reductions	234,766-282,766
Future CO ₂ Emission Reductions	240,818
Total Realized and Future Emission Reductions	475,584-523,584

Of the \$220 million of CEFIA and private capital invested and to be invested from our FY 2013 activities, approximately 500,000 tons of CO₂ emissions will be avoided over the life of the projects.

Key Talking Points

Based on the results from FY 2013 activities, the following are key talking points that CEFIA will be using in the coming months:

⁵ Assumes 60% of SHWS displacing oil and 40% displacing electricity. SHWS displacing oil avoids 298 pounds of CO₂ emissions per MMBtu saved and 320 pounds of CO₂ emissions per MMBtu for displacing electricity.

⁶ Estimates for energy efficiency were not calculated. CEFIA is still determining average energy savings per project, which is data that is not readily available given the diversity of energy efficiency measures being taken up by Connecticut households.

1. **180-(40)-20 Rule** – in one year, CEFIA has attracted \$180 million of private capital investment while putting only \$40 million of CEFIA funds at risk – \$20 million of which will be returned to CEFIA because it is in the form of loans and leases, and not grants...yielding a 9:1 leverage ratio, deploying approximately 30 MW of clean energy, and putting \$220 million into the clean energy economy in Connecticut.
 2. **1,200 Up and 250,000 Down** – from the CEFIA projects that have been completed in the past year, about 1,200 jobs have already been realized and 250,000 tons of CO2 emissions will be avoided over the life of the already completed projects. When the rest of the capital is put to work and additional projects come on line, an additional 1,800 jobs will be created and 240,000 tons of CO2 emissions will be avoided over the life of those projects.
 3. **“Green Bank Model” Works** – the model of “doing more with less and at a faster pace” is working. The CCEF subsidy model, over the decade of the 2000s, attracted \$155 million of private capital investment while putting \$170 million of CCEF funds at risk, ultimately yielding a 1:1 leverage ratio because only \$15 million of the investment will be returned over time in the form of leases. The CEFIA “green bank model” has achieved a leverage ratio and rate of deployment almost an order of magnitude better than the CCEF subsidy model.
-



MEMO

To: Bryan Garcia, President and CEO, CEFIA

Cc: Ronald Angelo, Deputy Commissioner, DECD

From: Michael Lettieri, CD Director, DECD *ML*

Re: Request by the Clean Energy Finance and Investment Authority on October 19, 2013 to Assess Clean Energy Jobs Calculations for FY 2013

Date: December 16, 2013

Background

On October 18, 2013, Bryan Garcia (President and CEO) of the Clean Energy Finance and Investment Authority (CEFIA) presented to the Board of Directors the results of FY 2013 activity – including estimates for jobs created in the clean energy sector. Commissioner Catherine Smith of the DECD, is the Chair of the Board of Directors of CEFIA.

Commissioner Smith suggested that the memo entitled “Connecticut’s ‘Green Bank’ at Work – FY 2013 Results” be checked with DECD staff. To that end, CEFIA submitted the following materials to DECD for review:

- Memo (October 11, 2013);
- Calculator used to estimate direct, indirect and induced jobs created as a result of clean energy investments; and
- Report entitled “CT Renewable Energy / Energy Efficiency Economy Baseline Study” supported by several organizations including DECD (March 2009)

CEFIA requested that DECD review the memo of October 11, 2013 and calculator regarding its FY 2013 jobs performance. This memo from DECD will accompany the memo and be submitted to the CEFIA Board of Directors to substantiate the claims in the CEFIA memo. Specifically CEFIA requested that DECD review the data and multipliers used in the economic development benefit calculations and the resulting jobs estimates.

Review

CEFIA assesses its performance based on targets outlined in their two-year comprehensive plan, and calculates the economic development benefits in terms of jobs. They estimate “realized job gains” and “future job gains”. Realized job gains are based on capital that has been expended and clean energy deployed, and future job gains are based on capital that has not yet been expended nor clean energy deployed; both are estimates of direct and indirect jobs. CEFIA uses formulas for direct jobs and multipliers for indirect and induced jobs from a study conducted by Navigant Consulting



Department of Economic and
Community Development



to analyze Connecticut's clean energy economy (2009, updated in 2010).¹ Navigant uses primary data obtained from a survey of over 300 companies, institutions and organizations in the clean energy field in the state, as well as a REMI study performed by DECD to obtain these multipliers. Results from the DECD model were cross-checked against Navigant's primary research data for consistency.

Findings

DECD reviewed CEFA's memo, calculator and the original Navigant study. Our view is that the estimates are reasonable and the multipliers do not need to be updated at this time. Jobs multipliers in various sectors tend to stay consistent over time absent a significant structural shift in the industry or economy. I hope that you find this information helpful and please let me know if you have any questions.

¹ <http://www.ctcleanenergy.com/Portals/0/Phase%201%20Deliverable%20Final%20Full.pdf>



CLEAN ENERGY FINANCE AND INVESTMENT AUTHORITY

Residential Solar Investment Program

A Statutory Program

Due Diligence Package

December 13, 2013 (Updated)

Document Purpose: This document contains background information and due diligence on the Residential Solar Investment Program and the organizations involved. This information is provided to the Board of Directors for the purposes of reviewing and approving recommendations made by the staff of the Clean Energy Finance and Investment Authority.

In some cases, this package may contain among other things, trade secrets, and commercial or financial information given to the Clean Energy Finance and Investment Authority in confidence and should be excluded under C.G.S. §1-210(b) and §16-245n(D) from any public discourse under the Connecticut Freedom of Information Act. If such information is included in this package, it will be noted as confidential.

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Program Qualification Memo

To: Deployment Committee
From: Bryan Garcia, Dale Hedman, Ed Kranich, and Neil McCarthy
Date: December 13, 2013
Re: Residential Solar Investment Program –Step 4

Summary

The staff proposes the following incentive levels for Step 4 of the Residential Solar Investment Program:

1. **Race to the Solar Rooftop** – to increase the pace of rooftop solar PV deployment, the two separate tracks (i.e. rebate and PBI) for residential solar PV rooftop deployment will continue with an additional third track (i.e. race track). The total capacity target for step 4 is 10.0 MW – 5.0 MW for rebate, 3.0 MW for PBI, and 2.0 MW for the race track – by January 1, 2015. For the track that reaches their capacity first, they will then have access to the race track capacity and then the other’s capacity track.
2. **Incentive Level** – we propose approximately a 20% reduction of the Step 3 incentive levels to \$1.25/W for systems up to 5 kW and an additional incentive of \$0.75/W for systems 5-10 kW for the rebate and \$180/MWh for the PBI in Step 4. With these incentive levels, CEFIA will achieve a leverage ratio target of about 25%¹ (an improvement from 30%) for the Step 4 portfolio of projects. Per Section 106 of PA 11-80, CEFIA staff will seek DEEP’s approval of the schedule of incentives for Step 4.
3. **Incentive Cap** – we propose an incentive cap of 30% per project for Solarize projects only.

This incentive structure for Step 4 is designed to reward the model (i.e. rebate or PBI) that is more effective at “maximizing the amount of clean energy deployed per dollar of ratepayer funds at risk.” With the successful implementation of Step 4, CEFIA will continue to transition the residential solar PV market by reducing its reliance on subsidy-based incentives and continuing progress towards financing programs that delivers a payback to ratepayers. CEFIA’s financing programs for solar PV were launched in Q1 (July through September of 2013) and Q2 (October through December of 2013) of FY 2014 nearly six months later than had originally been anticipated.

¹ \$1 of ratepayer incentive to \$3 of non-ratepayer incentive as a portion of the overall installed costs of a project.

Program Description

On March 2, 2012, CEFIA launched the residential solar investment program (the Program). The Program, a statutory requirement underneath Section 106 of Public Act 11-80, supports the sustainable market development for residential solar PV deployment in Connecticut.

CEFIA Incentives

The Program offers rebates and performance-based incentives (PBI) to support homeowners who install solar photovoltaic systems. Through twenty-one months of the Program, CEFIA has approved over 2,150 projects that are installing approximately 15.2 MW of clean energy (see Table 1). Over 1,000 direct, indirect and induced jobs have been created as a result of Steps 1 through 3 of the RSIP.

Table 1. Program Data as of November 29, 2013

	Rebate	PBI	Total
# Projects Approved	1,420	743	2,163
Installed Capacity (kW)	10.1 MW	5.1 MW	15.2 MW
Total Incentive Amount	\$14.0 MM	\$8.2 MM	\$22.2 MM
Total Installed Cost	\$44.8 MM	\$24.7 MM	\$69.5 MM
Direct Jobs Created	265	145	410
Indirect and Induced Jobs Created	426	234	660
Total Jobs Created	690	380	1,070
Installed Cost (\$/W)	\$4.47	\$5.05	\$4.57
Incentive (\$/W)	\$1.38	\$1.60	\$1.46
Leverage Ratio	3.2:1.0	3.2:1.0	3.1:1.0
Equivalent ZREC Price (\$/REC)	\$76	\$87	

It should be noted that 270 projects, or 12% of the projects, are located in distressed communities as defined by the Connecticut Department of Economic and Community Development.²

Projects underneath the Program have thus far sought approximately \$22.2 million in incentives leveraged by an additional \$47.3 million of private investment – a leverage ratio of 1:2, an improvement above the CCEF’s historical performance of 1:1; meaning more installations and jobs per ratepayer dollar provided.

The data on program performance indicates the following:

- **PBI Competition** – we are now seeing more competition from PBI installers. It should be noted that Solar City, a PBI installer, is now the #1 residential solar PV installer in Connecticut – installing as many systems as the next four (4) installers combined. It should also be noted that

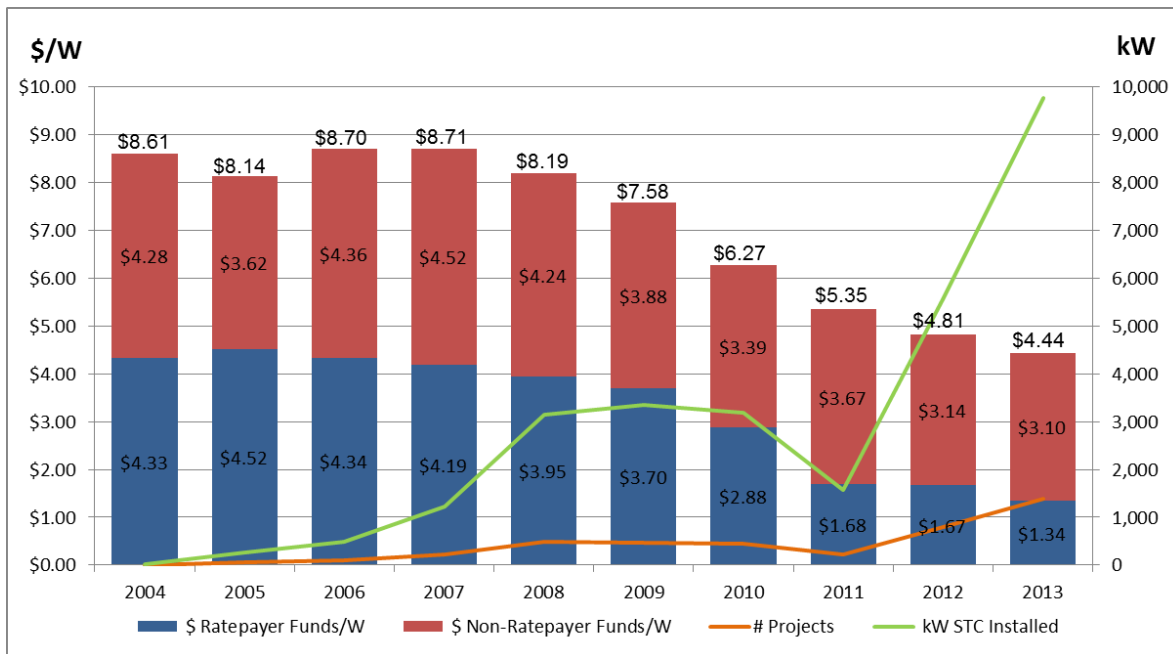
² According to C.G.S. Section 32-9p, a distressed municipality should be based on “high unemployment and poverty, aging housing stock and low or declining rates of growth in job creation, population, and per capita income.”
<http://www.ct.gov/ecd/cwp/view.asp?a=1105&q=251248>

the local rebate installers are deploying rooftop solar PV at a pace nearly twice as fast as the PBI installers.

- **Costs Declining** – as competition increases in the market, installed costs are decreasing by more than 15% from Step 1 (of \$5.32/W) to Step 3 (of \$4.51/W). Installed costs for rebate installers is currently less (i.e. \$4.30/W) than that of PBI installers (i.e. \$4.84/W) for Step 3. In 2014, CEFA expects average costs per watt installed to continue to decline to between \$4.00 to \$4.25/W as a result of further competition in the market and continuing efforts to reduce “soft costs”.
- **Customer Demand Increasing** – the demand for residential solar PV is increasing as indicated by the number of approved projects and the installed capacity resulting from those projects.
- **Ratepayer Subsidies Decreasing** – the percentage of incentives as a portion of the overall project costs are decreasing.

For a graphical picture of the Program’s performance through November 29, 2013 – see Figure 1. The CCEF-supported programs were from 2004 through 2011, with CEFA-supported programs beginning in 2012.

Figure 1. Comparison of Installed Costs, Incentives, Projects and Installed Capacity (2004 through November 29, 2013)



CEFA’s goal is to create a robust market for residential solar PV systems in Connecticut that achieves:

- **Sustainable Market Development** – avoids the stop-start nature of incentives that were experienced in the past while maximizing the amount of rooftop solar PV deployed per dollar of ratepayer funds at risk;

- **Leverage** – achieves a 3:1 (or between 25% to 30%) leverage ratio of non-ratepayer funds to ratepayer funds;
- **Costs** – support strategies that make solar PV more affordable and accessible – i.e. Solarize marketing campaign approaches have brought installed costs down by 20-30%;
- **Program Administrative Costs** – use lean manufacturing practices to improve the efficiency and effectiveness of program administration to be able to handle more volume without having to expand staff administration;
- **Energy Efficiency** – incorporates energy efficiency measures into solar PV projects; and
- **Financing** – shifts from subsidy-based incentives over time to low-cost and long-term financing to ensure that maximum residential rooftop solar PV deployment is occurring per dollar of ratepayer funds at risk.

With these goals in mind, we are proposing the following schedule of incentives for Step 4 – see Table 3:

Table 3. Proposed Schedule of Incentives for Step 4

	Rebate		PBI
	$x \leq 5$ kW	10 kW $\geq x > 5$ kW	$x \leq 10$ kW
Current Step 3	\$1.75/W	\$0.55/W	\$0.225/kWh
Proposed Step 4	\$1.25/W	\$0.75/W	\$0.180/kWh
Total (Reduction)/Increase	(\$0.50/W)	\$0.20/W	(\$0.045/kWh)
% (Reduction)/Increase	(29%)	36%	(20%)

Depending upon the size of the system installed, the reduction in the level of incentive for the rebate is approximately the same as it is for the PBI – see Table 4.

Table 4. Present Value of the Rebate versus the PBI for Different Sized Systems

	5 kW Installation	7 kW Installation	10 kW Installation
Value of the Rebate	\$6,250	\$7,750	\$10,000
Value of the PBI	\$5,486	\$7,680	\$10,971
Difference	\$764	\$70	(\$971)

Overall, Step 4 results in a reduction of approximately 20% for both the rebate and the PBI from Step 3.

Comparison of CEFA Incentives vs. Massachusetts

To provide some context as to how the residential market for solar PV in Connecticut is faring with respect to our neighboring state of Massachusetts, we have provided information on various aspects of our programs.

Massachusetts has installed more than two times the number of residential solar PV systems than Connecticut or 10% more on a per capita basis – see Table 5. However, the average installed costs in Massachusetts are 3.5% more than they are in Connecticut.

Table 5. Comparison of Residential Solar PV Markets in Connecticut vs. Massachusetts (March 5, 2012 to November 19, 2013)

State	# of Projects	Average System Size (kW)	Total Capacity Installed (kW)	Installation Comparative (W/Capita)	Installed Cost (\$/W)
Connecticut	2,096	7.04	14,756	4.1	\$4.57
Massachusetts	4,878	6.23	30,390	4.6	\$4.73

For installers that are doing business in both Connecticut and Massachusetts, and that have completed more than 20 projects in each state, the following is a breakdown of their installed costs – see Table 6. Average installed costs in Connecticut are lower than they are in Massachusetts for all installers on average and for those installers doing business in both states.

Table 6. Average Installed Cost (\$/W) of Projects for Contractors Doing Business in Connecticut and Massachusetts

Installer	Connecticut	Massachusetts	Installed Cost Variance
Astrum Solar	\$3.92	\$4.09	(\$0.17)
Real Goods Solar	\$4.22	\$4.50	(\$0.28)
Solar City	\$4.98	\$5.07	(\$0.09)
Sungevity	\$4.91	\$5.52	(\$0.61)
Sunlight Solar Energy	\$4.53	\$4.76	(\$0.23)

The incentives in Connecticut are different than those in Massachusetts – see Table 7. For a typical 7 kW system, about \$9,500 of incentives would be provided by Connecticut versus over \$18,500 by Massachusetts. Massachusetts’ incentives are nearly twice as much as Connecticut’s.

Table 7. Comparison of Current Residential Solar PV Incentives in Connecticut vs. Massachusetts

State	State Tax Credit	Rebate (\$/W) or PBI (\$/kWh)	REC Value to the Customer (\$/kWh)	Average Value of Incentives for a 7 kW System
Connecticut	\$0	\$1.25/W or \$0.225/kWh (6 years)	\$0	\$9,500 ³
Massachusetts	\$1,000	\$0.40/W ⁴	\$0.200/kWh (10 years)	\$18,500

³ For a rebate installation, the average incentive level per project is \$8,750 as opposed to a PBI project which is about \$10,600. Currently 60% of projects are rebate and 40% are PBI.

⁴ \$0.40/W for the first 5 kW from the Massachusetts Clean Energy Center.

Comparison of CEFIA Incentives vs. Zero Emissions Renewable Energy Credit (ZREC)

To provide some context as to how the residential market for solar PV in Connecticut is faring with respect to the commercial and industrial market for solar PV incentives in Connecticut through the ZREC, we have provided nominal and present value comparisons (see Tables 8 and 9) for small (i.e. ≤ 100 kW), medium (i.e. 100 kW < X ≤ 250 kW), and large (i.e. 250 kW < X ≤ 1,000 kW) ZREC projects.

Table 8. Comparison of RSIP Steps 1 through 3 vs. ZREC Round 1 – Nominal Analysis

	RSIP	Small	Medium	Large
Clean Energy Produced (kWh)	270,520,000	240,080,000	257,405,000	346,640,000
Ratepayer Funds Expended (\$)	23,519,915	\$38,631,256	\$37,619,799	\$36,130,332
Objective Function (kWh / \$1 Expended)	11.35	6.21	6.84	9.59
Objective Function (\$ / 1 kWh Produced)	\$0.088	\$0.161	\$0.146	\$0.104
Clean Energy Deployed (MW _{STC})	15.2	13.7	14.8	19.4

Table 9. Comparison of RSIP Steps 1 through 3 vs. ZREC Round 1 – Present Value Analysis at a 3% Discount Rate

	RSIP	Small	Medium	Large
Clean Energy Produced (kWh)	270,520,000	240,080,000	257,405,000	346,640,000
Ratepayer Funds Expended (\$)	\$22,879,608	\$30,829,955	\$30,022,754	\$28,834,074
Objective Function (kWh / \$1 Expended)	11.82	7.79	8.57	12.02
Objective Function (\$ / 1 kWh Produced)	\$0.085	\$0.128	\$0.117	\$0.083
Clean Energy Deployed (MW _{STC})	15.2	13.7	14.8	19.4

In comparison to the small and medium projects under the ZREC, the RSIP program is doing more deployment at a faster pace and with less ratepayer resources on both a nominal and present value basis.

Strategic Plan

Is the program proposed, consistent with the Board approved Comprehensive Plan and Budget for the fiscal year?

The Residential Solar Investment Program proposal is consistent with the Board approved Comprehensive Plan and Budget for FY 2014. This request of the portfolio of incentives for the Program is consistent with that plan and budget.

The Program is a statutory requirement pursuant to Section 106 of Public Act 11-80.

Ratepayer Payback

How much clean energy is being produced (i.e. kWh over the projects lifetime) from the program versus the dollars of ratepayer funds at risk?

The Program proposes a “Race to the Solar Rooftop” target of 10.0 MW for Step 4. At an average forecasted incentive of \$1.10/W (i.e. assumes a 7 kW system) for rebates and PBI, \$11.0 million of ratepayer capital will be used as incentives to support the deployment of 10.0 MW of solar PV which will produce over 13 million kWh of clean energy a year or over 260 GWh over a 20-year period as a result of Step 4.

The following is a breakdown of the objective function for the RSIP through Step 4 (see Table 10).

Table 10. Objective Functions of the Residential Solar Investment Program for Steps 1 through Step 4

	Step 1	Step 2	Step 3 (Current)	Step 4 (Estimated)
Installed Capacity (kW)	1,190	6,485	7,550	10,000
Clean Energy Produced ⁵ (kWh)	30,000,000	170,000,000	195,000,000	260,000,000
CEFIA Funds Expended	\$2,115,000	\$10,665,000	\$9,475,000	\$11,000,000
kWh Produced / 1\$ Expended	14.2	15.9	20.6	23.6
\$Expended / 1 kWh Produced	\$0.071	\$0.063	\$0.049	\$0.042

For providing the rebate and PBI in Step 4, CEFIA owns the renewable energy credits (RECs) produced by the systems – which is equivalent to about 13,000 RECs a year or \$260,000 of value a year assuming a \$20 REC price. Over a 20-year period, it is estimated that \$4.6 million in REC revenue will be generated from 10.0 MW of residential rooftop solar PV systems.

Between the rebate and RECs, it is estimated that at least \$4.6 million of the \$11.0 million of ratepayer capital will be paid back – see Table 11.

Table 11. Ratepayer Funds at Risk = Step 4 Rebates and PBI Provided less REC Revenue

Ratepayer Payback	(Expense)/Revenue	Period of Time
Step 4 Rebates and PBI	(\$11,000,000)	Paid out over 6 years
Renewable Energy Credit Revenue	\$4,600,000	Received over 20 years
Ratepayer Funds at Risk	(\$6,400,000)	

Terms and Conditions

What are the terms and conditions of ratepayer payback, if any?

The rebate and PBI of \$11.0 million offered under Step 4 are incentives that are paid out either upfront for the rebate or over a 6-year period for the PBI based on the performance of the system.

CEFIA owns all RECs associated with projects that receive a rebate or PBI. If CEFIA can achieve a REC price of at least \$20 on average over 20 years, then it can generate over \$4.6 million in revenues back to CEFIA.

Capital Expended

How much of the ratepayer and other capital that CEFIA manages is being expended on the program?

By statute, CEFIA shall apportion no more than one-third of the total surcharge collected annually.

Risk

What is the maximum risk exposure of ratepayer funds for the program?

⁵ Estimated over 20 years.

Despite the REC revenue that will be realized as a result of the program, staff expects that the maximum risk exposure for the program is \$11.0 million – the estimated value of the rebates and PBI provided through Step 4 of the program to achieve the “Race to the Solar Rooftop” target of 10.0 MW. Given the variability of REC pricing, it would be difficult to ascertain the true value that CEFIA would receive without a forward contract with a fixed price.

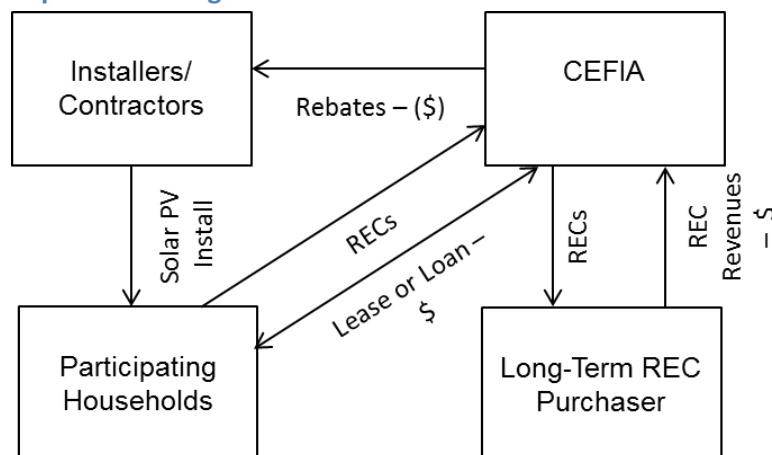
Financial Statements

How is the program investment accounted for on the balance sheet and profit and loss statements?

The funding support for the RSIP would be in the form of an upfront rebate or paid over time through a PBI. Once paid the rebate will be reflected on CEFIA’s balance sheet as a reduction to “cash” (current assets) with a corresponding entry on the profit and loss statement under “Operating Expenses” in the relevant ledger account under “Financial Incentives - Grants and Rebates,” which will have the effect of reducing unrestricted net assets. Once approved the PBI will be reflected on CEFIA’s financial statements as an “Open Commitment” which is recorded in the notes to the financial statements and when actually paid over six years, the PBI will be reflected on CEFIA’s balance sheet as a reduction to “cash” (current assets) with a corresponding entry on the profit and loss statement under “Operating Expenses” in the relevant ledger account under “Financial Incentives - Grants and Rebates,” which will have the effect of reducing unrestricted net assets.

Historically, the production of RECs has been accounted for as a reduction of Rebate Expense (to reflect the fact that CEFIA, by issuing the Rebate (or PBI) has – for a portion of that payment – acquired the RECs that the PV systems will produce) with a corresponding increase to the Non-Current Asset Account: “Investment-RECs.” At the time of a sale of RECs, the “Investments – RECs” account is reduced by the carrying value of the RECs sold and the Profit and loss statement will recognize, as necessary, a gain or loss to reflect any difference in value between the actual sale price of the RECs and the carrying value of the RECs sold.

Capital Flow Diagram



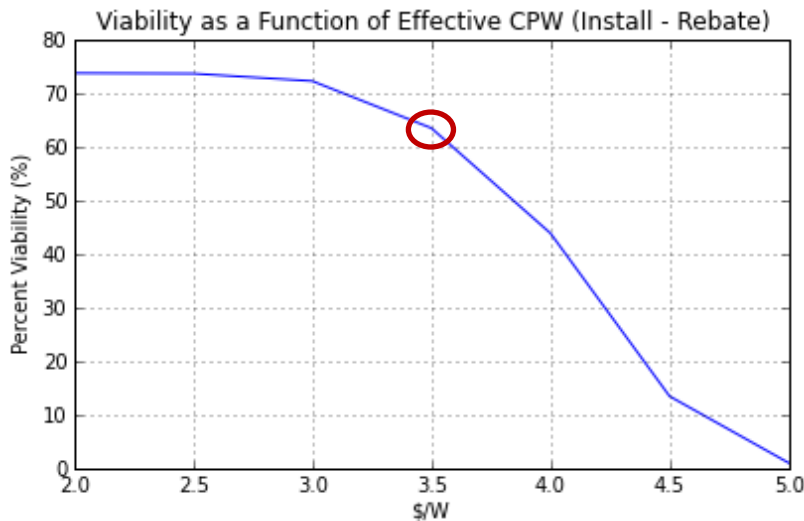
Target Market

Who are the end-users of the program?

Per Section 106 of Public Act 11-80, the end-users of the program are residential ratepayers. These ratepayers are interested in either owning solar PV systems or paying a reduced electricity rate as a result of a solar PV system installed on their home.

It should be noted that of the 2,160 currently approved or completed RSIP projects to date, 270 of them, or approximately 12% of the projects, are located in distressed communities as defined by the Connecticut Department of Economic and Community Development.

Looking towards the future, CEFIA – together with our partners at Geostellar – continues to finalize work on a “total addressable market” (or “TAM”) analysis, which will take us beyond the 30 MW capacity mandate the legislature set for the RSIP in Section 106 of PA 11-80. Towards that end, the chart below illustrates the percentage of Connecticut’s residential households who would achieve a full payback of their upfront costs within 25 years, depending on their “effective cost per watt” for a residential solar PV system (essentially, the installed cost of the system minus an RSIP rebate, assuming full monetization of the federal investment tax credit and electric prices escalating from a starting point of \$0.15 / kWh).



As the chart shows, given current installed costs below \$4.50 / W and a proposed Step 4 incentive that should average about \$1.10 / W, around 65% of Connecticut households will be “solar viable” within the 25-year payback range. Of course, it is important to note that as we look at more realistic homeowner payback requirements (i.e. 5 to 10 years) with Geostellar over the next month, this figure will come down; however, the identified TAM will still represent a significant, gigawatt-plus residential solar opportunity for Connecticut over the coming years.

CEFIA Role, Financial Assistance & Selection/Award Process

CEFIA’s role is to administer the statutory program. Financial assistance being offered through the program is based on general program guidelines developed by staff and a schedule of incentives approved by the Department of Energy and Environmental Protection.

Program Partners

The program partners are the more than 60 qualified solar contractors that support the installation of rooftop solar PV systems for residential ratepayers.⁶

Risks and Mitigation Strategies

Risk: Proposed incentives for Step 4 are too high and they generate more installations than we had anticipated in 2014 with a target of 10.0 MW by January 1, 2015.

Mitigation Strategy: Staff will closely monitor the applications submitted and approved to the program during Step 4. If applications significantly exceed what is expected, staff will propose an adjustment to the Step 4 incentives to the Board to decrease the incentive levels further prior to the end of the yearlong step.

Risk: Proposed incentives for Step 4 are too low and we get a “race to the bottom” policy effect where the residential solar PV market seeks to use the ZREC because they can get a greater incentive than CEFIA is offering through the declining RSIP.

Mitigation Strategy: Staff will inform DEEP of this concern so as to prevent the ZREC policy from adversely affecting the sustainable market development of the RSIP by continuing to transition the market reliance away from subsidies and towards low-cost and long-term financing.

Operating Procedures

The Residential Solar Investment Program follows the “Programmatic Selection and Award” aspects of CEFIA’s Operating Procedures for financial assistance in the form of grants, loans or loan guarantees, debt, or equity investments.

Resolutions

WHEREAS, Section 106 of Public Act 11-80 “An Act Concerning the Establishment of the Department of Energy and Environmental Protection and Planning for Connecticut’s Energy Future” (the “Act”) requires the Clean Energy Finance and Investment Authority (“CEFIA”) to design and implement a Residential Solar Photovoltaic (“PV”) Investment Program (“Program Plan”) that results in a minimum of thirty (30) megawatts of new residential PV installation in Connecticut before December 31, 2022;

WHEREAS, as of November 29, 2013, the Program Plan has thus far resulted in approximately fifteen (15) megawatts of new residential PV installation application approvals in Connecticut;

WHEREAS, pursuant to Section 106 of the Act, CEFIA has prepared a Program Plan and a declining incentive block schedule (“Schedule”) that offer direct financial incentives, in the form of performance-based incentives (“PBI”) or expected performance-based buydowns (“Rebate”), for the purchase or lease of qualifying residential solar photovoltaic systems;

⁶ <http://www.energizect.com/residents/programs/residential-solar-investment-program>

WHEREAS, the performance of the Rebate model in Step 3 is faster in deploying rooftop solar PV and requires less ratepayer subsidies than the PBI model therefore maximizing the amount of clean energy deployed per dollar of ratepayer funds at risk;

WHEREAS, on December 21, 2012, the CEFIA Board of Directors (“Board”) reviewed and approved the staff recommendations to establish a Step 4 “Race to the Solar Rooftop” capacity of 10 MW;

WHEREAS, the Deployment Committee recommends that the Board hereby approves the Schedule of Incentives for Step 4 outlined above to achieve 10.0 MW of solar PV deployment; and

WHEREAS, Solarize Connecticut is a program designed to encourage the adoption of residential solar PV by lowering customer acquisition costs through a coordinated education, marketing and outreach effort, combined with a tiered pricing structure that provides increased savings to homeowners as more people in a selected municipality go solar (“Solarize Communities”).

NOW, therefore be it:

RESOLVED, that the CEFIA Board of Directors approves the Schedule of Incentives for Step 4 outlined above to achieve 10.0 MW of solar PV deployment as follows:

5.0 MW of Rebates,
3.0 MW of PBI, and
2.0 MW of additional capacity for the models to compete for incentives;

RESOLVED, that the CEFIA Board of Directors direct staff that at the point where 5.0 MWs of committed capacity is reached during Step 4 of the Schedule, or earlier if staff deems it appropriate to release a report that makes a recommendation to the Deployment Committee on the Step 5 and beyond for capacity allocation and incentive levels;

RESOLVED, that by (a) the point of the Step 4 incentive where 7.5 MW of committed capacity is reached for either the PBI or the Rebate models or (b) January 1, 2015 whichever comes first, the Board will approve a Step 5 capacity allocation and incentive level to ensure the sustained and orderly deployment of the residential solar market in Connecticut;

RESOLVED, that the CEFIA Board of Directors approve Step 4 incentives be maintained for Solarize Communities down selected for Phase 4 of the Solarize Connecticut program throughout the entirety of the campaign if Step 4 incentives are in place at the beginning of Phase 4; and

RESOLVED, that this Board action is consistent with Section 106 of the Act.

Program Implementation Plan

Human Resources

Statutory and Infrastructure Programs – will lead in administering the program and collecting information on each project

Finance – will track leases and loans for each project to track ratepayer payback

Administration – will support the analysis of the data being collected to track the overall performance of the program

Financial Resources

1. Rebates up to 5.0 MW to households interested in owning a solar PV system; PBI up to 3.0 MW to households interested in leasing a solar PV system; and 2.0 MW of competitive capacity for Step 4;
2. Lease and Loan Programs – see separate due diligence packages

Metrics, Targets, Measurement, Verification & Reporting

Metrics:

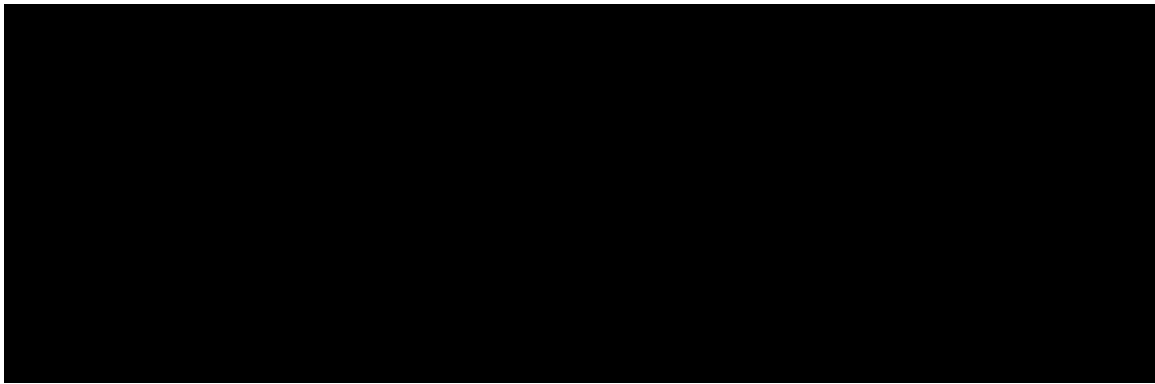
- Amount of clean energy produced per dollar of ratepayer funds at risk
- Ratio of private to public capital leveraged and ratio of grants versus financing programs
- Annual clean energy generation
- Total amount of investment

Targets:

- Attract nearly \$40 million of non-ratepayer capital through the achievement of a leverage ratio of 1:3
- Deploy approximately 7.8 MW of Class I renewable sources in Connecticut
- Produce 13,000 MW hours of Class I renewable sources per year for 20-years
- Reduce installed costs from Step 3 to Step 4 by at least 10%

CEFIA will collect data on the following (the Market Watch Report will continue to report the performance of the program on a weekly basis), but not be limited to:

- Installed capacity
- # of projects
- Installed costs
- Actual clean energy produced
- Benefits achieved including environmental (i.e. emissions avoided) and economic development (i.e. jobs created)



Meriden YMCA: A C-PACE Project in Meriden, CT

Address	110 West Main Street, Meriden, CT			
Owner	Meriden Young Men's Christian Association, Inc.			
Proposed Assessment	\$372,466			
Term (years)	19			
Term Remaining (months)	Pending construction completion			
Annual Interest Rate	4.94% (bought down via CEFIA CHP program support)			
Annual C-PACE Assessment	\$30,446			
Savings-to-Investment Ratio	1.12			
Average Debt-Service Coverage Ratio	[REDACTED]			
Loan-to-Value Ratio	[REDACTED]			
Proposed Energy Savings		EE (MMBtu)	RE	Total
	Per year	489.2	-	489.2
	Over term of loan	9,294.9	-	9,294.9
Estimated Cost Savings	Per year	\$34,450	-	\$34,450
	Life Cycle	\$688,991	-	\$688,991
Objective Function	25.0 kBtu / \$ of CEFIA capital at risk			
Location	City of Meriden			
Type of Building	Recreational Facility / Community Center			
Year of Build	1997			
Building Size (total sf)	40,000			
Year Acquired by Current Owner	1866			
As-Is Appraised Value	[REDACTED]			
Status of Mortgage Lender Consent	[REDACTED]			
Proposed Project Description	<ul style="list-style-type: none"> ▪ Combined Heat & Power System ▪ Lighting and occupancy controls 			
Est. Date of Construction Completion	Pending closing			
Current Status	Pending Board of Directors approval			
Energy Contractors	[REDACTED]			
Additional Comments				



Bourdon Forge: A C-PACE Project in Middletown, CT

Address	99 Tuttle Road, Middletown, CT			
Owner	Bourdon Acres LLC			
Proposed Assessment	\$1,500,000			
Term (years)	15			
Term Remaining (months)	Pending construction completion			
Annual Interest Rate	5.5%			
Annual C-PACE Assessment	\$148,153			
Savings-to-Investment Ratio	1.13 (conservatively assuming no REC income)			
Average Debt Service Coverage Ratio	██████████			
Loan-to-Value Ratio	██████████			
Proposed Energy Savings		EE	RE	Total
	Per year	-	597,000 kWh	597,000 kWh
	Over term of loan	-	8,955 MWh	8,955 MWh
Estimated Cost Savings	Per year	-	\$166,656	\$166,656
	Life Cycle	-	\$2,499,838	\$2,499,838
Objective Function	5.97 kWh / \$ of CEFIA capital at risk			
Location	City of Middletown			
Type of Building	Industrial			
Year of Build	1980			
Building Size (total sf)	65,000			
Year Acquired by Current Owner	1980			
As-Is Appraised Value	██████████			
Status of Mortgage Lender Consent	██			
Proposed Project Description	500 kW photovoltaic system			
Est. Date of Construction Completion	Pending closing			
Current Status	Pending Board of Directors approval			
Energy Contractors	██			
Additional Comments				

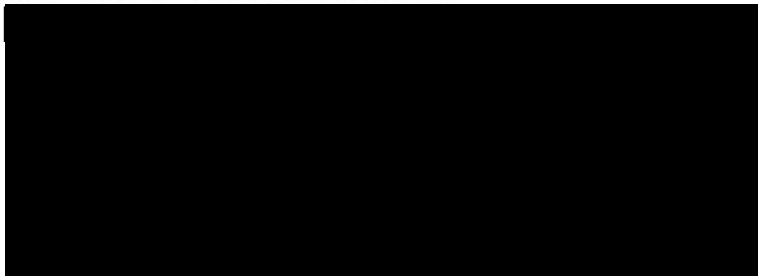


Quality Inn: A C-PACE Project in Vernon, CT

Address	425 Hartford Turnpike, Vernon, CT			
Owner	Khima LLC			
Proposed Assessment	\$850,000			
Term (years)	20			
Term Remaining (months)	Pending construction completion			
Annual Interest Rate	5.5%			
Annual C-PACE Assessment	\$70,604			
Savings-to-Investment Ratio	1.00			
Average Debt Service Coverage Ratio	[REDACTED]			
Loan-to-Value Ratio	[REDACTED]			
Proposed Energy Savings		EE	RE	Total
	Per year	-	258,786 kWh	258,786 kWh
Estimated Cost Savings	Over term of loan	-	5,176 MWh	5,176 MWh
	Per year	-	\$70,795	\$70,795
Objective Function	Life Cycle	-	\$1,415,896	\$1,415,896
	6.09 kWh / \$ of CEFIA capital at risk			
Location	Town of Vernon			
Type of Building	Hospitality			
Year of Build	1986			
Building Size (total sf)	30,000			
Year Acquired by Current Owner	2011			
As-Is Appraised Value	[REDACTED]			
Status of Mortgage Lender Consent	[REDACTED]			
Proposed Project Description	200 kW photovoltaic system			
Est. Date of Construction Completion	Pending closing			
Current Status	Pending Board of Directors approval			
Energy Contractors	[REDACTED]			
Additional Comments				



CLEAN ENERGY
 FINANCE AND INVESTMENT AUTHORITY

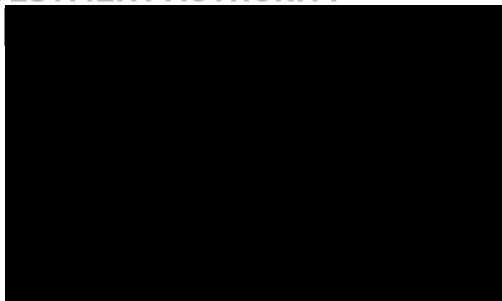


1095 Day Hill Road: A C-PACE Project in Windsor, CT

Address	1095 Day Hill Rd, Windsor, CT			
Owner	Infinity VII, LLC			
Proposed Assessment	\$829,399			
Term (years)	20			
Term Remaining (months)	Pending Construction Completion			
Annual Interest Rate	6.0%			
Annual C-PACE Assessment	\$71,764			
Savings-to-Investment Ratio	1.01			
Average Debt-Service Coverage Ratio	[REDACTED]			
Loan-to-Value Ratio	[REDACTED]			
Proposed Energy Savings		EE	RE	Total
	Per year (MMBtu)	833	374	1,207
Estimated Cost Savings	Over term of loan (MMBtu)	16,660	7,657	24,317
	Per year	\$13,203	\$60,055	\$73,357 (2)
Estimated Cost Savings	Life Cycle	\$177,060	\$1,345,693	\$1,522,753
	Location	Town of Windsor		
Type of Building	Office - Medium (10,000-50,000 SF)			
Year of Build	1989			
Building Size (total sf)	29,290			
Year Acquired by Current Owner	2006			
As-Is Appraised Value	[REDACTED]			
Status of Mortgage Lender Consent	[REDACTED]			
Proposed Project Description	Installation of 206 kW PV system, Lighting Retrofits and Occupancy Sensors, Air Sealing			
Est. Date of Construction Completion	Pending closing			
Current Status	Pending Board of Directors approval			
Energy Contractors	[REDACTED]			
Additional Comments	[REDACTED]			



CLEAN ENERGY
 FINANCE AND INVESTMENT AUTHORITY



Shagbark Lumber: A C-PACE Project in East Haddam, CT

Address	21 Mount Parnassus Drive, East Haddam, CT			
Owner	Bud & Bobby Enterprises, LLC			
Proposed Assessment	\$478,000			
Term (years)	10			
Term Remaining (months)	Pending Construction Completion			
Annual Interest Rate	5.0%			
Annual C-PACE Assessment	\$61,325			
Savings-to-Investment Ratio	1.11			
Average Debt-Service Coverage Ratio	█			
Loan-to-Value Ratio	█			
Proposed Energy Savings		EE	RE	Total
	Per year (MMBtu)	-	517	517
	Over term of loan (MMBtu)	-	5,170	5,170
Estimated Cost Savings	Per year	-	\$48,608	\$48,608
	Life Cycle	-	\$1,215,205	\$1,215,205
Location	Town of East Haddam			
Type of Building	Non-Refrigerated Warehouse			
Year of Build	1996			
Building Size (total sf)	35,950			
Year Acquired by Current Owner	2002			
As-Is Appraised Value	█			
Status of Mortgage Lender Consent	█			
Proposed Project Description	Installation of 157 kW PV system			
Est. Date of Construction Completion	Pending closing			
Current Status	Pending Board of Directors approval			
Energy Contractors	█			
Additional Comments				



Memo

To: Budget and Operations Committee, CEFIA

From: Mackey Dykes, Chief of Staff; Jessica Bailey, Director of Commercial and Industrial Programs; Kerry O’Neill, Director of Residential Programs

CC: Bryan Garcia, President and CEO; George Bellas, Vice President of Finance and Administration; Bert Hunter, Executive Vice President and Chief Investment Officer

Date: December 4, 2013

Re: FY2013 Budget Amendments

SUMMARY

As we near the mid-point of fiscal year 2013, staff is requesting an increase of \$1.433 million in the budgets for residential programs and C-PACE as well as general administration. The tables in this memo outline the requested changes and Attachment 1 contains the full operating budgets for each program.

Table 1. Budget Increase (figures in thousands)

	Approved Budget	Revised Budget	Budget Increase (Decrease)
C-PACE	\$ 2,074.40	\$ 3,326.60	\$ 1,252.20
Residential Programs	\$ 2,566.30	\$ 2,656.30	\$ 90.00
General Operations	\$ 2,803.40	\$ 2,893.90	\$ 90.50
Total	\$ 7,444.10	\$ 8,876.80	\$ 1,432.70

C-PACE

Development of the C-PACE program began in September 2012. The program launched in January 2013 and closed its first transaction in April 2013. With a larger pipeline and deal flow than initially budgeted for as well as almost a year of experience administering the program, the C-PACE team is requesting a \$1.252 million budget increase to build upon the early success of the program (table 2). This would increase the existing budget from \$2.074 million to \$3.327 million. \$90,000 of estimated fee revenue from closing fees CEFIA began charging for all applications after November 1 is expected to offset this budget increase.

Table 2. C-PACE Budget Request

	Approved Budget		Revised Budget		Budget Increase (Decrease)
Salaries & Wages	\$	666.9	\$	716.9	\$ 50.0
Employee Benefits	\$	496.1	\$	533.3	\$ 37.2
Consulting fees	\$	175.0	\$	175.0	\$ 0
Technical administrator	\$	-	\$	800.0	\$ 800.0
Municipal support	\$	-	\$	80.0	\$ 80.0
Loan servicing fees	\$	-	\$	100.0	\$ 100.0
Marketing/External relations	\$	400.0	\$	600.0	\$ 200.0
IT operations	\$	30.0	\$	15.0	\$ (15.0)
Unchanged Budget Items (full list in Attachment 1)	\$	306.4	\$	306.4	
Operating Expenses	\$	2,074.4	\$	3,326.6	\$ 1,252.2
Operating Income	\$	-	\$	(90.0)	\$ (90.0)
NET OPERATING EXPENSES	\$	2,074.4	\$	3,236.6	\$ 1,162.2

SALARIES & WAGES AND EMPLOYEE BENEFITS

As the administrator for all C-PACE projects, CEFIA expends a large portion of staff time managing projects, from their inception to closing. This requires a significant amount of administrative work as well as managing relationships with prospective borrowers. As our pipeline expands, C-PACE requires another project assistant to manage this work flow to ensure we do not become a bottleneck in processing applications. We request a new project assistant for C-PACE, at an estimated cost of \$87,200 (including benefits). An updated staffing plan is included as Attachment 2.

CONSULTING FEES

Consulting has been reduced to \$75,000. The majority of consulting expenditures has been moved to new line items for Technical Consultant and Marketing to better account for and categorize their function. The remaining amount will cover consultants to provide advice on specific technologies that are new to the C-PACE program, such as waste-to-energy, microgrids, and small hydro.

TECHNICAL ADMINISTRATOR

CEFIA staff request a new budget line for our **Technical Administrator** of \$800,000. To date, these expenses have been paid out of marketing and consultant lines. This will support our continued partnership with our technical administrator, Buonicore/Sustainable Real Estate Solutions. It will cover transactions for the rest of the fiscal year, anticipated to be around 50, inclusive of commissioning while allowing room in case additional transactions or a greater percentage of full assessment projects occur.

The enabling legislation for C-PACE named CEFIA as the statewide program administrator and put upon us the task of verifying that the Savings to Investment Ratio (SIR) of proposed projects is greater than 1. In other words, that the cost savings from the energy project over time is greater than the upfront investment. Rather than build out a staff of engineers, CEFIA engaged third-party technical administrator to review each project submitted for C-PACE financing and ensure the SIR requirement is met.

Technical review has been an important component for building owners to receive mortgage lender consent. Mortgage lenders are interested in the savings generated from these projects and, generally, seem to appreciate the robust technical review process. The improved cash-flow to the building, which is modeled in the technical review, has a direct impact on the capitalization rate of the building. Mortgage lenders who see their asset increase in value as a result of a C-PACE transaction are more likely to grant consent. Moreover, our comprehensive technical review was specifically cited by our capital providers as enhancing their confidence in the financings done by CEFIA from its funding warehouse; this facilitated the successful bidding recently undertaken for the initial \$6.8 million portfolio of transactions.

Additionally, because C-PACE financing is underwritten by *lifecycle energy savings* (the “S” in SIR covers all savings that occur during the term of the financing), project developers can do deeper energy retrofit projects than they otherwise would have done anticipating a ‘simple payback’ approach to energy savings. For example, if a project developer wanted to do solar on a building, a simple payback of seven years may not justify the investment. However when energy savings for 20 years are calculated, the owner now has additional ‘savings’ through which to offset the cost of additional improvements – for example new efficient windows. ***The data platform developed by the C-PACE technical administrator to house project data allows property owners to run multiple different projects scenarios and view the outcomes in terms of SIR, thus giving them the flexibility to design a project with the maximum value that still meets the statutory requirements for C-PACE approval.*** This is a positive development for C-PACE in that we are seeing more comprehensive projects that also require larger dollar amounts in financing.

The outcomes described above, while positive, incur substantial costs because the process requires significant back-and-forth between project applicants (typically contractors) the C-PACE technical review team and CEFIA staff. The cost of technical review for the first projects submitted was high. As contractors have become more familiar with the requirements for C-PACE approval, the costs come down significantly – this is a result of 4 training programs C-PACE has run with its technical administrator, as well as their hands-on support on a project by project basis. Total technical costs for the first five “full assessment” projects (meaning projects with more than one energy conservation measure) were just under \$19,000 and technical costs for the first 5 fast track assessment projects averaged \$11,235. These costs have come down to roughly \$16,000 or 15% for full assessment projects and \$6,600 or 40% for fast track projects. Using a new fee structure, the C-PACE technical administrator will now receive a base fee of \$5,000 for Fast Track projects and \$10,000 for Full Assessment projects. They will also receive a portion of newly instated closing fees, which CEFIA is now charging at closing on all projects (see below). The majority of the technical administrator’s costs will be covered through

closing fees and CEFIA will be charged a fee by the technical administrator if projects do not close after technical review – thus incentivizing both CEFIA and the technical administrator to screen projects early on that have low success of closing and to work efficiently on projects that have a high success of closing. We are continuing to also work with the technical administrator to reduce costs for technical review through increased automation for technology-specific applications (e.g. solar).

Finally, now that C-PACE projects are under construction, we are revisiting commissioning – (e.g. CEFIA’s potential role in inspecting the properties to make sure everything was installed and is operating correctly) as well as measurement and verification (M&V). Commissioning is a critical part of project construction and completion, without which the risk of non-performance of energy-savings increases significantly. We have decided that in the first year of the C-PACE program, particularly where rate-payer capital is at risk through construction, CEFIA must have a direct role in commissioning. We anticipate including this as part of the technical review process through our existing PSA with Buonicore Partners; the cost of which will be paid out of closing fees. M&V (the tracking of energy savings over time) is a requirement of the C-PACE program and an important exercise that involves tracking energy savings performance as a result of several independent variables. Since M&V can be costly, particularly over a 20-year period, it is the property owner’s prerogative how extensive M&V will be. Because we are still trying to understand the true energy saving impacts of C-PACE, the team would like to track this data for projects in the first year as a way of understanding energy savings performance trends across building type, technology and geography. For the time being, we anticipate this will be a program-related cost that is not passed on through project financing.

MUNICIPAL SUPPORT

The C-PACE program depends upon partnerships with municipalities, which serve as the collection agent for the C-PACE assessments. With 66 municipalities on board and approved transactions in 13 municipalities, we need to automate the collection process.

Quality Data Services (QDS) manages the tax collection software for 75% of Connecticut municipalities. Many of our C-PACE towns have requested that QDS upgrade their software to allow them to administer, track, and collect C-PACE assessments in the same way they do other municipal assessments. CEFIA is eager for this partnership, as it will help with our servicing of these loans.

We request a new budget line for Municipal Support of \$80,000. This will enable us to support 45 towns to perform the software upgrade and streamline the collection process for towns.

LOAN SERVICING FEES

In the first several months of administering the C-PACE program, CEFIA has serviced the loans in-house. This has given us important information on what needs to happen from the moment the loan closes until the payments begin showing up on the tax bills. However, as the volume has grown, CEFIA will not be able to continue in this role as servicer without either building out our internal team or engaging in an outside loan servicer. In August, CEFIA issued an RFP for a Master Servicer and in November selected Cortland Capital Markets Services, LLC as the C-PACE master servicer. Cortland is a leading independent

investment servicing company providing fund administration, commercial bank loan servicing, securitization services, and middle-office support to financial institutions. Cortland is also a full service fund administrator serving hedge funds, real estate funds, credit funds, and private equity funds across the globe. Cortland clients include many of the largest asset managers in the world. Cortland's loan servicing duties are generally to:

- Receive and process disbursement requests for loan advances from C-PACE borrowers
- Track interest accrued on loans during construction
- Calculate final financing amount for revised lien filing if necessary
- Monitor, administer, and reconcile payments from towns
- Administer secondary collection efforts (including calculation and collection of late fees)
- Monitor payments
- Maintain a comprehensive reporting system
- Provide CEFIA with notice of delinquency, shortfall, default, or prepayment.

We request a new budget line for Loan Servicing and Underwriting of \$100,000. This will cover our contract with Cortland for 12 months while leaving room for CEFIA to still put out an RFQ for a loan *underwriter*. Currently all financial underwriting for C-PACE transactions is done internally by the CEFIA finance team. An increase in C-PACE applications will be unsustainable for this team, which has other obligations to CEFIA staff across all programs within the organization.

MARKETING AND EXTERNAL RELATIONS

Hands-on support to owners and contractors is necessary to close deals, particularly in key sectors such as multi-family and non-profits. The C-PACE team has experimented with consultants who have been tasked with supporting building owners to develop projects and move through the C-PACE application process. The largest constraining factor to the growth of the C-PACE program is lack of human capacity to chase down every lead and to follow up with every interested owner. Having consultants to support project development is important for the growth of this program. While still in the early days, we are seeing some value from this model. In the first 3 months, two consultants have developed over 50 leads and been responsible for submitting 10 applications. Two of these are now actively in technical review. Additional time is needed to see whether having an 'owner's agent' that is pushing and supporting property owners to submit applications for C-PACE financing is cost-effective. After the end of this fiscal year, the C-PACE team will evaluate the cost-effectiveness of this approach and determine how to support consultants in this area through financing, as opposed to C-PACE program costs.

In addition to this on the ground marketing, sophisticated marketing campaigns for C-PACE are important to drive demand. Despite early success of the C-PACE program, we are only scratching the top of the surface of building ownership in Connecticut. There are currently 66 out of 169 towns participating in the C-PACE program, representing 75% of the total likely market for C-PACE (this number reflects the percentage of buildings over 10k square feet – smaller buildings are unlikely to apply for C-PACE financing). Viable applications in the C-PACE pipeline represent only 1% of this eligible market. In order to make sure that our application volume doesn't drop once the early adopters have closed financing, we need to be doing more targeted marketing to key sectors. With our marketing partner, Match Drive, we have developed a campaign that we believe will help continue the early momentum we have seen in the building sector. The campaign, entitled 'Pacesetters', will target our key audience, building owners

and managers. They are the decision makers that ultimately drive investment decisions in commercial buildings. The 'Pacesetters' campaign will target this audience by telling the story of property owners/managers that have *already* financed projects using C-PACE, thus featuring decision makers that were bold and insightful in recognizing C-PACE as a smart investment strategy for upgrading their buildings and lowering operating costs. Through featuring the success of their peers and emphasizing the core reasons C-PACE is a smart investment opportunity, this strategy will inspire more property owners and managers to act through instilling the following messages:

- C-PACE is a tried and tested financing opportunity – they are not incurring the risk of being a 'first mover'
- Owners need to take advantage of C-PACE in order to remain competitive in the market
- Using C-PACE is a smart decision that will earn owners accolades
- Beyond being a 'Pacesetter', C-PACE allows owners to lower their operating costs while improving the value and competitiveness of their buildings.

These messages will further target property owners and managers through focusing on specific real estate market sectors (commercial office, manufacturing, non-profit, etc.) and featuring Pacesetters within these sectors. The Pacesetters campaign will capture these stories in a variety of media (interview, video, still photography) and deploy them on the radio, strategic websites, C-PACE.com, C-PACE marketing material and live events. This will drive traffic to C-PACE.com, creating more leads that can be converted into C-PACE applications.

C-PACE.com has received over 60,000 clicks since its launch. While the website is an important source of information for multiple stakeholders, it is currently not equipped to leverage the traffic that a media campaign will create through converting leads into viable projects (for example, the website should help introduce property owners to the right energy services company that can help them develop an energy upgrade at their facility). Furthermore, CEFIA does not currently have direct control over posting content to C-PACE.com, limiting our ability to update stakeholders with the most current program-related information, announcements, etc. It is necessary to overhaul major portions of C-PACE.com in order to maximize on all the lead-generation Matchdrive and our 'owner's agents' are developing.

We request an increase from \$400 to \$600k in **Marketing**. This will support work by our marketing consultants to support building owners. Additionally, it will support their work in key sectors such as YMCAs and Boys and Girls Clubs. This increase will also support work by Match Drive for marketing and outreach campaign materials as well as improvements to our website to capture the interest these campaigns create.

IT OPERATIONS

We are requesting to reduce IT operations to \$15,000. Most of these IT costs will be paid from our requested town support budget.

OPERATING INCOME

The C-PACE and finance teams have been working closely to determine how to incorporate some of the costs of administering the program into the loans themselves to be paid by the Borrower over time. For all applications completed after November 1, 2013, CEFIA will be charging closing fees ranging from 1.2% to 3% for the borrower. This will go part of the way toward covering CEFIA’s program related costs. Based on an anticipated 50 projects for the remainder of the fiscal year, CEFIA could recover \$90,000 through closing fees. This cost recovery must be balanced with an increase in rates and fees which may quickly dampen interest in building owners.

The analysis used in this memo to estimate CEFIA’s potential revenue from next C-PACE 50 transactions represents an estimated \$22 million in total financing. This increased budget request would represent a 1:20 ratio of program budget costs to total financing leveraged not including fee revenue. We feel the C-PACE program can go much further toward lowering costs, particularly in our technical review. However we feel that at the current time, robust technical review and enhanced marketing are critical toward growing this program and penetrating a much larger share of the eligible market in Connecticut.

RESIDENTIAL PROGRAMS

Section 58 of Public Act 13-298 directs CEFIA, working with the Energy Conservation Management Board and utilities, to develop a residential clean energy on-bill repayment (OBR) program financed by third-party private capital. Because of the law’s timing, this program was not built into the FY14 budget. CEFIA began stakeholder outreach and program design in August and determined that an additional \$90,000 is needed in the residential budget (table 3). This increase will cover:

- Partnership with the Wisconsin Energy Conservation Corporation, a national leader in design and implementation of OBR programs.
- Master servicer who will manage the payment process between the utilities and lenders and in the coming months will assist in program design.

Table 3. Residential Programs Budget Request

	Approved Budget		Revised Budget		Budget Increase (Decrease)
Consulting fees	\$	171.3	\$	261.3	\$ 90.0

GENERAL OPERATIONS

CEFIA created several special purpose vehicles (SPVs) as part of the CT Solar Lease and CT Solar Loan financial structures. CEFIA is requested an additional \$90,500 to cover audits of these SPVs as well as tax preparation services.

Table 4. General Operations Budget Request

	Approved Budget		Revised Budget		Budget Increase (Decrease)
Accounting & Audit	\$	45.0	\$	135.5	\$ 90.5

Additionally, CEFIA requests to amend the staffing plan to reflect the hire of an asset manager or loan portfolio manager. Due to the increasing amount of loans in CEFIA's portfolio, there is a need for centralized management of loan and contractual requirements as well as compliance with all transactional requirements before and after closings. This new position would be responsible for creating CEFIA's protocols for management of these processes as well as implementation. We propose to reallocate an approved position, manager of finance, to cover this need. The change is reflected in the updated staffing plan included here as Attachment 2.

IMPACT

Attachment 3 outlines the effect of this request on CEFIA's FY2014 profit and loss statement and cash flow statement, respectively. Estimated unrestricted cash at the end of the year would be reduced to \$9.66 million from \$11.01 million.

RESOLUTION

RESOLVED, the Clean Energy Finance and Investment Authority's (CEFIA) Budget and Operations Committee (the Committee) recommends that the CEFIA Board of Directors approve the requested \$1,432,700 increase in the fiscal year 2014 budget outlined in Tables, 2, 3 and 4 of the memorandum presented to the Committee dated December 4, 2013 (the Memorandum); and

RESOLVED, the Committee recommends that the CEFIA Board of Directors approve the updated staffing plan detailed in Attachment 2 of the Memorandum.

Clean Energy Finance and Investment Authority

FY 14 General Operations Budget

Proposed Budget Revisions

(in thousands)

	Approved Budget		Revised Budget		Budget Increase (Decrease)	%	Note
<u>Operating Expenses</u>							
<i>Compensation</i>							
-Salaries & Wages - CEFIA Employees	\$ 598.6	\$	\$ 598.6	\$	-	0%	
-Salaries & Wages - CI Shared Services	\$ 430.3	\$	\$ 430.3	\$	-	0%	
-Employee Benefits - CEFIA Employees	\$ 445.3	\$	\$ 445.3	\$	-	0%	
-Employee Benefits - CI Shared Services	\$ 347.3	\$	\$ 347.3	\$	-	0%	
-Temporary employees	\$ 30.0	\$	\$ 30.0	\$	-	0%	
<i>Consulting and professional fees</i>							
- Legal	\$ 35.0	\$	\$ 35.0	\$	-	0%	
- Accounting & Audit	\$ 45.0	\$	\$ 135.5	\$	90.5	201%	1
- Consulting fees	\$ 20.0	\$	\$ 20.0	\$	-	0%	
<i>Marketing/External relations</i>	\$ 536.0	\$	\$ 536.0	\$	-	0%	
<i>Rent and location related expenses</i>							
-Rent/Utilities/Maintenance	\$ 48.8	\$	\$ 48.8	\$	-	0%	
-Telephone/Communications	\$ 11.6	\$	\$ 11.6	\$	-	0%	
-Depreciation FF&E	\$ 31.1	\$	\$ 31.1	\$	-	0%	
<i>Office, computer & other expenses</i>							
-Office expense	\$ 15.5	\$	\$ 15.5	\$	-	0%	
-IT operations	\$ 10.9	\$	\$ 10.9	\$	-	0%	
-Training/education/subscriptions	\$ 51.0	\$	\$ 51.0	\$	-	0%	
-Travel,meeting& related expenses	\$ 85.0	\$	\$ 85.0	\$	-	0%	
-Insurance	\$ 62.0	\$	\$ 62.0	\$	-	0%	
Total Operating Expenses	\$ 2,803.4	\$	\$ 2,893.9	\$	90.5	3%	

Notes

1. Revised budget increase reflects the Cohn Reznick proposal to provide audit,accounting and tax services to CEFIA Holdings LLC, CT Solar Loan LLC, CEFIA Solar Services, Inc and CT Solar Lease 2 LLC.

Clean Energy Finance and Investment Authority

FY 14 Operations Budget for CPACE

Proposed Budget Revisions

(in thousands)

	Approved Budget		Revised Budget		Budget Increase (Decrease)	%
<u>Operating Expenses</u>						
<i>Compensation</i>						
-Salaries & Wages - CEFIA Employees	\$ 666.9	\$	716.9	\$	50.0	7%
-Employee Benefits - CEFIA Employees	\$ 496.1	\$	533.3	\$	37.2	7%
-Temporary employees	\$ -	\$	-	\$	-	
<i>Consulting and professional fees</i>						
- Legal	\$ 95.0	\$	95.0	\$	-	0%
- Consulting fees	\$ 175.0	\$	175.0	\$	-	0%
- Technical administrator	\$ -	\$	800.0	\$	800.0	100%
- Municipal support	\$ -	\$	80.0	\$	80.0	100%
- Loan servicing fees	\$ -	\$	100.0	\$	100.0	100%
<i>Marketing/External relations</i>	\$ 400.0	\$	600.0	\$	200.0	33%
<i>EM&V</i>	\$ 50.0	\$	50.0	\$	-	0%
<i>Rent and location related expenses</i>						
-Rent/Utilities/Maintenance	\$ 54.4	\$	54.4	\$	-	0%
-Telephone/Communications	\$ 12.9	\$	12.9	\$	-	0%
-Depreciation FF&E	\$ 34.7	\$	34.7	\$	-	0%
<i>Office, computer & other expenses</i>						
-Office expense	\$ 17.2	\$	17.2	\$	-	0%
-IT operations - General Operations	\$ 12.2	\$	12.2	\$	-	0%
-IT operations - Program Specific	\$ 30.0	\$	15.0	\$	(15.0)	-100%
-Training/education/subscriptions	\$ 10.0	\$	10.0	\$	-	0%
-Travel,meeting& related expenses	\$ 20.0	\$	20.0	\$	-	0%
Total Operating Expenses	\$ 2,074.4	\$	3,326.6	\$	1,252.2	38%
Operating income	\$ -	\$	(90.0)	\$	(90.0)	
Net operating expenses	\$ 2,074.4	\$	3,236.6	\$	1,162.2	36%

Clean Energy Finance and Investment Authority
 FY 14 Operations Budget for Residential Programs
 Proposed Budget Revisions

(in thousands)

	Smart E/Cozy/EE Loans			CT Solar Lease 2 LLC			CT Solar Loan I LLC			All Residential Programs			
	Approved Budget	Revised Budget	Budget Increase (Decrease)	Approved Budget	Revised Budget	Budget Increase (Decrease)	Approved Budget	Revised Budget	Budget Increase (Decrease)	Approved Budget	Revised Budget	Budget Increase (Decrease)	%
Operating Expenses													
<u>Compensation</u>													
-Salaries & Wages - CEFIA Employees	\$ 388.9	\$ 388.9	\$ -	\$ 235.7	\$ 235.7	\$ -	\$ 87.0	\$ 87.0	\$ -	\$ 711.6	\$ 711.6	\$ -	0%
-Employee Benefits - CEFIA Employees	\$ 289.3	\$ 289.3	\$ -	\$ 175.3	\$ 175.3	\$ -	\$ 64.7	\$ 64.7	\$ -	\$ 529.3	\$ 529.3	\$ -	0%
-Temporary employees	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	
<u>Consulting and professional fees</u>													
- Legal	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 60.0	\$ 60.0	\$ -	\$ 60.0	\$ 60.0	\$ -	0%
- Consulting fees	\$ 151.3	\$ 241.3	\$ 90.0	\$ 20.0	\$ 20.0	\$ -	\$ -	\$ -	\$ -	\$ 171.3	\$ 261.3	\$ 90.0	53%
- Project Inspection Fees	\$ 38.1	\$ 38.1	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 38.1	\$ 38.1	\$ -	0%
<u>Marketing/External relations</u>													
	\$ 550.0	\$ 550.0	\$ -	\$ 165.0	\$ 165.0	\$ -	\$ -	\$ -	\$ -	\$ 715.0	\$ 715.0	\$ -	0%
<u>EM&V</u>													
	\$ 150.0	\$ 150.0	\$ -	\$ 25.0	\$ 25.0	\$ -	\$ -	\$ -	\$ -	\$ 175.0	\$ 175.0	\$ -	0%
<u>Rent and location related expenses</u>													
-Rent/Utilities/Maintenance	\$ 31.7	\$ 31.7	\$ -	\$ 19.2	\$ 19.2	\$ -	\$ 7.1	\$ 7.1	\$ -	\$ 58.0	\$ 58.0	\$ -	0%
-Telephone/Communications	\$ 7.5	\$ 7.5	\$ -	\$ 4.6	\$ 4.6	\$ -	\$ 1.7	\$ 1.7	\$ -	\$ 13.8	\$ 13.8	\$ -	0%
-Depreciation FF&E	\$ 20.2	\$ 20.2	\$ -	\$ 12.3	\$ 12.3	\$ -	\$ 4.5	\$ 4.5	\$ -	\$ 37.0	\$ 37.0	\$ -	0%
<u>Office, computer & other expenses</u>													
-Office expense	\$ 10.0	\$ 10.0	\$ -	\$ 6.1	\$ 6.1	\$ -	\$ 2.2	\$ 2.2	\$ -	\$ 18.3	\$ 18.3	\$ -	0%
-IT operations - General Operations	\$ 7.1	\$ 7.1	\$ -	\$ 4.3	\$ 4.3	\$ -	\$ 1.6	\$ 1.6	\$ -	\$ 13.0	\$ 13.0	\$ -	0%
-IT operations - Program Specific	\$ 115.0	\$ 115.0	\$ -	\$ 37.5	\$ 37.5	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	
-Training/education/subscriptions	\$ 8.0	\$ 8.0	\$ -	\$ 2.8	\$ 2.8	\$ -	\$ -	\$ -	\$ -	\$ 10.8	\$ 10.8	\$ -	0%
-Travel,meeting& related expenses	\$ 11.3	\$ 11.3	\$ -	\$ 3.8	\$ 3.8	\$ -	\$ -	\$ -	\$ -	\$ 15.1	\$ 15.1	\$ -	0%
Total Operating Expenses	\$ 1,778.4	\$ 1,868.4	\$ 90.0	\$ 711.6	\$ 711.6	\$ -	\$ 228.8	\$ 228.8	\$ -	\$ 2,566.3	\$ 2,656.3	\$ 90.0	4%

**Clean Energy Finance and Investment Authority
FY 2014 Operations and Program Budget
Staffing Plan**

<u>Position</u>		<u>Approved Staffing Plan</u>		<u>Revised Staffing Plan</u>	
<u>CEFIA Employees</u>					
President, CEFIA	Garcia,Bryan	X	2,080	X	2,080
Chief of Staff	Dykes,Mackey	X	2,080	X	2,080
Executive Vice President and Chief Investment Officer	Hunter,Bert	X	2,080	X	2,080
General Counsel	Farnen,Brian	X	2,080	X	2,080
Director,PACE	Bailey,Jessica	X	2,080	X	2,080
Director of Institutional Programs	Brydges,Andy	X	2,080	X	2,080
Director,Government and External Relations	Goldberg,David	X	2,080	X	2,080
Director of Statutory & Infrastructure Programs	Hedman,Dale	X	2,080	X	2,080
Director of Residential Programs	O'Neill,Kerry	X	2,080	X	2,080
Associate Director of Outreach	Wall,Bob	X	2,080	X	2,080
Associate Director of Technology Innovation	Stevenson,Kim	X	2,080	X	2,080
Senior Manager, Clean Energy Finance	Healey,Ben	X	2,080	X	2,080
Senior Manager of Marketing and Outreach	Murphy,Jon	X	2,080	X	2,080
Senior Manager of Marketing and Outreach	Rivera, Gladys	X	2,080	X	2,080
Senior Manager of Clean Energy Deployment	Ross,Rick	X	2,080	X	2,080
Manager of Evaluation Measurement and Verification	Charpentier,Lucy	X	2,080	X	2,080
Senior Manager, Clean Energy Finance	Lieberman,Ali	X	2,080	X	2,080
Manager, Technology Innovation	Price, Selya	X	2,080	X	2,080
Manager,CPACE	Sherman,Genevieve	X	2,080	X	2,080
Associate of Clean Energy Deployment	McCarthy,Neil	X	2,080	X	2,080
Associate of Marketing and Outreach	Schmitt,Robert	X	2,080	X	2,080
Project Assistant	Buonannata,Joe	X	2,080	X	2,080
Project Assistant	Kranich,Ed	X	2,080	X	2,080
Project Assistant	Lewis,Lynne	X	2,080	X	2,080
Project Assistant	Mancini,Andrea	X	2,080	X	2,080
Project Assistant	Stewart,Fiona	X	2,080	X	2,080
Project Assistant	Vigil,Marycruz	X	2,080	X	2,080
Paralegal	French,Loyola	X	2,080	X	2,080
Executive Assistant	Samuels,Cheryl	X	2,080	X	2,080
<u>New Hires</u>					
Senior Manager, (Residential Programs)	D'Agostino, John	X	2,080	X	2,080
<i>Program Manager/Loan Administrator, (CE Financing)</i>		X	2,080	X	2,080
Program Assistant, (CPACE)	McCalpin,William	X	2,080	X	2,080
<i>Project Assistant, (CPACE)</i>				X	1,040
Project Assistant, (Residential Programs)	Priest, Madeline	X	2,080	X	2,080
<u>CI Shared Employees</u>					
VP Finance and Administration	Bellas,George	X	1,560	X	1,560
Manager,Human Resources	Kaswan,Sue	X	1,040	X	1,040
Manager,Payroll	Basden,Chris	X	832	X	832
Director IT and Facilities	Casparino,Joe	X	624	X	624
IT Staff	Peretto, Kim	X	624	X	624
IT Staff		X	1,040	X	1,040
Senior Accountant (P/T)	Landry,Joe	X	998	X	998
Accounting Assistant	Turker,Irene	X	2,080	X	2,080
Accounting Assistant	Soares,Natalia	X	2,080	X	2,080
Reception/Switchboard	Perusse,Gina	X	624	X	624
			38.53		39.03

Clean Energy Finance and Investment Authority
FY 14 Operations and Program Budget
Statement of Income and General Operations and Program Expenses
(in thousands)

	Revised FY 2014 Budget			Approved FY 2014 Budget				
	General Operations	Total Programs	Total Operations & Program Budget	General Operations	Total Programs	Total Operations & Program	Inc(Dec)	% Inc.
Income								
Utility customer assessments	\$ 27,600.0	\$ -	\$ 27,600.0	\$ 27,600.0	\$ -	\$ 27,600.0	\$ -	0.0%
RGGI auction proceeds	\$ 5,900.0	\$ -	\$ 5,900.0	\$ 5,900.0	\$ -	\$ 5,900.0	\$ -	0.0%
RGGI proceeds additional sources	\$ 12,800.0	\$ -	\$ 12,800.0	\$ 12,800.0	\$ -	\$ 12,800.0	\$ -	0.0%
Interest on bank deposits	\$ 100.0	\$ -	\$ 100.0	\$ 100.0	\$ -	\$ 100.0	\$ -	0.0%
Interest Income - Solar Lease I Portfolio, net of fees	\$ 110.0	\$ -	\$ 110.0	\$ 110.0	\$ -	\$ 110.0	\$ -	0.0%
Grant income (Federal Programs)	\$ -	\$ 300.0	\$ 300.0	\$ -	\$ 300.0	\$ 300.0	\$ -	0.0%
Renewable Energy Credits, net of fees	\$ -	\$ 575.0	\$ 575.0	\$ -	\$ 575.0	\$ 575.0	\$ -	
Loan closing fees	\$ -	\$ 90.0	\$ 90.0	\$ -	\$ -	\$ -	\$ 90.0	
Other income	\$ 100.0	\$ -	\$ 100.0	\$ 100.0	\$ -	\$ 100.0	\$ -	0.0%
Total revenues:	\$ 46,610.0	\$ 965.0	\$ 47,575.0	\$ 46,610.0	\$ 875.0	\$ 47,485.0	\$ 90.0	0.2%
Expenses								
<u>Compensation</u>								
-Salaries & Wages - CEFIA Employees	\$ 598.6	\$ 2,739.5	\$ 3,338.1	\$ 598.6	\$ 2,689.5	\$ 3,288.1	\$ 50.00	1.5%
-Salaries & Wages - CI Shared Services	\$ 430.3	\$ -	\$ 430.3	\$ 430.3	\$ -	\$ 430.3	\$ -	0.0%
-Employee Benefits - CEFIA Employees	\$ 445.3	\$ 2,037.6	\$ 2,482.9	\$ 445.3	\$ 2,000.4	\$ 2,445.7	\$ 37.20	1.5%
-Employee Benefits - CI Shared Services	\$ 347.3	\$ -	\$ 347.3	\$ 347.3	\$ -	\$ 347.3	\$ -	0.0%
-Temporary employees	\$ 30.0	\$ 40.0	\$ 70.0	\$ 30.0	\$ 40.0	\$ 70.0	\$ -	0.0%
<u>Consulting and professional fees</u>								
- Legal	\$ 35.0	\$ 285.0	\$ 320.0	\$ 35.0	\$ 285.0	\$ 320.0	\$ -	0.0%
- Accounting & Audit	\$ 135.5	\$ -	\$ 135.5	\$ 45.0	\$ -	\$ 45.0	\$ 90.50	201.1%
- Consulting fees	\$ 20.0	\$ 1,199.2	\$ 1,219.2	\$ 20.0	\$ 1,109.2	\$ 1,129.2	\$ 90.00	8.0%
- Technical administrator	\$ -	\$ 800.0	\$ 800.0	\$ -	\$ -	\$ -	\$ 800.00	
- Municipal support	\$ -	\$ 80.0	\$ 80.0	\$ -	\$ -	\$ -	\$ 80.00	
- Loan serving fees	\$ -	\$ 100.0	\$ 100.0	\$ -	\$ -	\$ -	\$ 100.00	
- Project Inspection Fees	\$ -	\$ 306.4	\$ 306.4	\$ -	\$ 306.4	\$ 306.4	\$ -	0.0%
<u>Marketing/External relations</u>	\$ 536.0	\$ 1,722.5	\$ 2,258.5	\$ 536.0	\$ 1,522.5	\$ 2,058.5	\$ 200.00	9.7%
<u>EM&V</u>	\$ -	\$ 430.0	\$ 430.0	\$ -	\$ 430.0	\$ 430.0	\$ -	0.0%
<u>Rent and location related expenses</u>								
-Rent/Utilities/Maintenance	\$ 48.8	\$ 219.2	\$ 268.0	\$ 48.8	\$ 219.2	\$ 268.0	\$ -	0.0%
-Telephone/Communications	\$ 11.6	\$ 51.9	\$ 63.5	\$ 11.6	\$ 51.9	\$ 63.5	\$ -	0.0%
-Depreciation FF&E	\$ 31.1	\$ 139.9	\$ 171.0	\$ 31.1	\$ 139.9	\$ 171.0	\$ -	0.0%
<u>Office, computer & other expenses</u>								
-Office expense	\$ 15.5	\$ 69.5	\$ 85.0	\$ 15.5	\$ 69.5	\$ 85.0	\$ -	0.0%
-IT operations-general infrastructure	\$ 10.9	\$ 49.1	\$ 60.0	\$ 10.9	\$ 49.1	\$ 60.0	\$ -	0.0%
-IT operations-program specific	\$ -	\$ 317.5	\$ 317.5	\$ -	\$ 332.5	\$ 332.5	\$ (15.00)	-4.5%
-Training/education/subscriptions	\$ 51.0	\$ 70.8	\$ 121.8	\$ 51.0	\$ 70.8	\$ 121.8	\$ -	0.0%
-Travel,meeting& related expenses	\$ 85.0	\$ 127.6	\$ 212.6	\$ 85.0	\$ 127.6	\$ 212.6	\$ -	0.0%
-Insurance	\$ 62.0	\$ -	\$ 62.0	\$ 62.0	\$ -	\$ 62.0	\$ -	0.0%
Expenses before Financial Incentives:	\$ 2,893.9	\$ 10,785.7	\$ 13,679.6	\$ 2,803.4	\$ 9,443.5	\$ 12,246.9	\$ 1,432.7	11.7%
<u>Federal (N2N)Grant expenditures</u>	\$ -	\$ 300.0	\$ 300.0	\$ -	\$ 300.0	\$ 300.0	\$ -	
<u>Financial Incentives- Grants and Rebates</u>	\$ -	\$ 16,325.0	\$ 16,325.0	\$ -	\$ 16,325.0	\$ 16,325.0	\$ -	
<u>Financial Incentives -Purchase of RECs</u>	\$ -	\$ 525.0	\$ 525.0	\$ -	\$ 525.0	\$ 525.0	\$ -	
<u>Interest Rate Buydowns</u>	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	
<u>Provision for Loan Loss</u>	\$ -	\$ 3,432.7	\$ 3,432.7	\$ -	\$ 3,432.7	\$ 3,432.7	\$ -	
Financial Incentives:	\$ -	\$ 20,582.7	\$ 20,582.7	\$ -	\$ 20,582.7	\$ 20,582.7	\$ -	0.0%
Total Expenditures:	\$ 2,893.9	\$ 31,368.4	\$ 34,262.3	\$ 2,803.4	\$ 30,026.2	\$ 32,829.6	\$ 1,432.7	4.4%
Total Revenue over Expenditures:			\$ 13,312.7			\$ 14,655.4	\$ (1,342.7)	

Clean Energy Finance and Investment Authority

FY14 Statement of Cash Flows

Comparison of Approved and Revised Budget

(000's)

	Approved Budget		Revised Budget		Inc (Dec) Budget
Cash flows from operating activities					
CASH IN:					
Proceeds from utility customer assessments	\$ 27,600.0	\$	27,600.0	\$	-
Proceeds from RGGI auctions	\$ 5,900.0	\$	5,900.0	\$	-
Proceeds from RGGI additional sources	\$ 12,800.0	\$	12,800.0	\$	-
Proceeds from grants	\$ 300.0	\$	300.0	\$	-
Proceeds from RECs/other income	\$ 150.0	\$	240.0	\$	90.0
Proceeds from Interest on deposits, investments, solar lease notes	\$ 260.0	\$	260.0	\$	-
Proceeds from State Bonds	\$ -	\$	-	\$	-
CASH OUT:					
Expenditures General and Program Administration	\$ (10,500.0)	\$	(11,932.7)	\$	(1,432.7)
Expenditures third party grants (LBE,N2N,Sunrise)	\$ (300.0)	\$	(300.0)	\$	-
Expenditures grants and rebates approved prior to FY13	\$ (8,000.0)	\$	(8,000.0)	\$	-
Expenditures grants and rebates -other programs	\$ (5,100.0)	\$	(5,100.0)	\$	-
Expenditures residential solar lease PV program- rebates	\$ (4,750.0)	\$	(4,750.0)	\$	-
Expenditures residential solar loan program-rebates	\$ -	\$	-	\$	-
Expenditures-Credit Enhancement IRB	\$ -	\$	-	\$	-
Net cash used by operating activities	\$ 18,360.0	\$	17,017.3	\$	(1,342.7)
Cash flows from investing activities					
LOAN RECOVERY					
Return of principal on solar lease V1 promissory notes	\$ 720.0	\$	720.0	\$	-
Proceeds from residential solar loan program	\$ 75.0	\$	75.0	\$	-
Proceeds from WINN LISC program	\$ -	\$	-	\$	-
Proceeds from Campus Efficiency NOW program	\$ -	\$	-	\$	-
Proceeds from EEl oan programs	\$ -	\$	-	\$	-
	795.0		795.0		-
LOAN DISBURSEMENTS					
AD/CHP programs	\$ (2,500.0)	\$	(2,500.0)	\$	-
Alpha & Op Demo programs	\$ (1,335.0)	\$	(1,335.0)	\$	-
Campus Efficiency NOW programs	\$ (875.0)	\$	(875.0)	\$	-
Commercial solar lease (MUSH) program	\$ -	\$	-	\$	-
CPACE program	\$ (25,000.0)	\$	(25,000.0)	\$	-
Energy Efficiency Loan programs	\$ (5,000.0)	\$	(5,000.0)	\$	-
Grid tied program	\$ (3,500.0)	\$	(3,500.0)	\$	-
MicroGrid program	\$ (5,000.0)	\$	(5,000.0)	\$	-
Residential solar lease SHW program	\$ -	\$	-	\$	-
Residential solar lease PV program	\$ -	\$	-	\$	-
Residential solar loan program	\$ (2,803.9)	\$	(2,803.9)	\$	-
Solar PV Capital Competition	\$ (1,000.0)	\$	(1,000.0)	\$	-
WINN LISC program	\$ (1,875.0)	\$	(1,875.0)	\$	-
	(48,888.9)		(48,888.9)		-
EQUITY INVESTMENTS					
Commercial solar lease (MUSH) program	\$ (675.0)	\$	(675.0)	\$	-
Residential solar lease SHW program	\$ (225.0)	\$	(225.0)	\$	-
Residential solar lease PV program	\$ (3,600.0)	\$	(3,600.0)	\$	-
	(4,500.0)		(4,500.0)		-
Net cash used by investing activities	\$ (52,593.9)	\$	(52,593.9)	\$	-
Cash flows from capital activities					
Purchase of furniture, equipment & software	\$ (25.0)	\$	(25.0)	\$	-
Net cash used in operating, investing and capital activities	\$ (34,258.9)	\$	(35,601.6)	\$	(1,342.7)
State of Connecticut Cash Sweep	\$ (6,200.0)	\$	(6,200.0)	\$	-
Cash and cash equiv., Beginning of Period	\$ 62,840.3	\$	62,840.3	\$	-
Cash and cash equiv., End of Period	\$ 22,381.4	\$	21,038.7	\$	(1,342.7)
UNRESTRICTED CASH:	\$ 11,006.9	\$	9,664.2	\$	(1,342.7)
RESTRICTED CASH FEDERAL FUNDS FOR ARRA SEP:	\$ 11,374.5	\$	11,374.5	\$	-
	\$ 22,381.4	\$	21,038.7	\$	(1,342.7)



Memo

To: Budget and Operations Committee

From: Bryan Garcia, President and CEO, Mackey Dykes, Chief of Staff, and Suzanne Kaswan, Vice President, Human Resources at Connecticut Innovations

Date: October 30, 2013

Re: Sick Leave Bank Policy Revision

Background

Connecticut Innovations established a Sick Leave Bank in 2009 – see Appendix I. Employees donated sick time to this bank in order to allow employees with a documented qualified illness or injury to withdraw time from the Sick Leave Bank in order to be paid until our short term disability insurance becomes effective on the 31st day after the qualifying illness or injury. CEFIA adopted the Sick Leave Bank on December 16, 2011 as part of the Employee Handbook which was approved by the CEFIA Board of Directors. The Sick Leave Bank is now jointly administered for the benefit of employees at both CI and CEFIA. CEFIA is proposing an adjustment to the Sick Leave Bank Policy to not require that vacation days be used up first before accessing the Sick Leave Bank by participating staff.

Comparison of Sick Leave Bank Policies

At the time CI created the Sick Leave Bank in 2009, it was based on the Sick Leave Bank designed for classified managers in State Service – see the attached document entitled “An Important Fact Sheet for State of Connecticut Managers Regarding the Managerial Sick Leave Bank Background and Participation”. However, due to the fact that CI (and CCEF) only had about 50 employees at that time, we made it more restrictive. The State Manager’s Sick Leave Bank has over 1,600 managers who are eligible to enroll. Eligible managers can withdraw pay for ½ days to a maximum of 200 days. As CCEF and CI only had about 50 staff at that time and we wanted them to be able to withdraw a maximum of 10 calendar days per year, we made our requirements more stringent so that the bank would not be depleted too quickly in the unfortunate event that it was needed – see Table 1 for Sick Leave Bank Policy Comparison with CEFIA proposed revision.

Table 1. Comparison of Sick Leave Bank Policy between the State of Connecticut, CI, and Proposed CEFIA Revision

	State of Connecticut	Current CI/CEFIA Policy	CEFIA Proposed Revision
Enrollment Period	After eligible, they have 90 calendar days to accept or decline participation	Open one-time annual enrollment by September 20, 2013	Open one-time annual enrollment by September 20, 2013
Position Level Eligibility	Managers and above	All employees	All employees
Years of Service Eligibility	Two or more years of state service	After first 6-month review	After first 6-month review
Usage After Exhaust: <ul style="list-style-type: none"> • Sick Leave • Personal Leave • Comp Time • Vacation Time 	<ul style="list-style-type: none"> • Yes • Yes • Yes • No – only if accrued in excess of 60 days 	<ul style="list-style-type: none"> • Yes • Yes • Yes • Yes* 	<ul style="list-style-type: none"> • Yes • Yes • Yes • No – only if accrued in excess of 30 days
Initial Donation into Bank Required	One day of sick leave	One day of sick leave	One day of sick leave
Pay Rate of a Sick Leave Day	One-half day for each sick day	One day of sick leave	One day of sick leave
Number of Days Employee Can Use	Up to 200 of the one-half day for each sick day	Up to 10 days per calendar year	Up to 10 days per calendar year

*CI will propose a similar policy revision to the Sick Leave Bank Policy requiring that employees exhaust all of their sick, personal leave and compensatory time and all but 30 days (240 hours) of their vacation time.

CEFIA is proposing to adjust the usage requirements to not require that vacation time be used if an employee has less than 30 days accrued.

Sick Leave Bank Value and Cost Analysis

In 2009, out of the 50 employees eligible at CI and CCEF, 19 opted to participate in the Sick Leave Bank and there was a total of 192 hours donated to the Bank. Our bank was primarily designed to allow staff to donate in order to help staff be paid during the waiting period for our short term disability policy to become effective (31 calendar days after a qualified illness or injury). Since 2009, none of the 192 hours donated were used.

Now that the Sick Leave Bank is being operated jointly for the benefit of CI and CEFIA employees, there are 93 employees eligible to participate. We recently conducted an open enrollment and total participation rose to 28 employees and donations increased to 400 hours in the Sick Leave Bank – see Table 2 for Value of the Sick Leave Bank. Therefore, we believe that the organizations can be less conservative in our guidelines for withdrawal. A copy of Management Personnel Policy 97-1, which gives full background on the State’s Managerial Sick Leave Bank, is attached to this memorandum for your review.

Table 2. Value of the Sick Leave Bank

	CI and CEFIA Sick Leave Bank Today
Number of CI and CEFIA Employees	93
Number of Sick Leave Bank Participants	28
Number of Hours Donated into Sick Leave Bank	400
Value of Hours Donated into Sick Leave Bank ¹	\$24,417.73
Value of a Sick Leave Bank Hour	\$61.04
Total Hours Used from Sick Bank Participants	0

The average hourly rate of all CI and CEFIA employees is \$48.10 versus the hourly rate of Sick Leave Bank participants of \$61.04.

- 10 of the participating Sick Leave Bank participants make less than the \$48.10 average hourly rate of all CI and CEFIA employees;
- 6 of the participating Sick Leave Bank participants make less than the hourly rate of the Sick Leave Bank participants, but more than the average hourly rate of all CI and CEFIA employees; and
- 12 of the participating Sick Leave Bank participants make more than the average hourly rate of the Sick Leave Bank participants.

This means that about one-third of the Sick Leave Bank participating employees are lower level staff (i.e. below director level), while the remaining are director-level and above.

Given the current number of hours in the bank, current leave accruals of participants, and the existing rules, the maximum drawdown that could occur to the bank is 384 hours. As a result of the proposed change, the maximum drawdown possible would increase to the total number of hours in the bank, 400 hours. This increase of 16 hours yields a maximum cost of \$976.64.

Rationale for Sick Leave Bank Adjustment

Our benefits package has allowed us to recruit several incredibly high caliber candidates. The Sick Leave Bank is an important part of our recruitment and retention strategy because:

- CEFIA employees presently earn ten sick days per year – five less than employees at most State Agencies (due to the paid short and long-term disability insurance that employees receive);
- CEFIA has a growing talented workforce with many recent hires and employees who have not had the opportunity to build up a substantial sick leave balance;
- In addition, due to the new requirements of the Health Enhancement Plan established in 2011, employees who participate in this plan are required to take sick time to attend mandatory preventative wellness visits for themselves and enrolled family members. This also affects the ability to build up a balance of sick leave days for staff to take in the event of a medical emergency; and

¹ Based on actual data for the hourly wage of participating employees

- Unlike other businesses and organizations that value employee recruitment and retention, CEFIA has no paid maternity or paternity leave policy.

Recommendation

Currently, the Sick Leave Bank policy requires that employees exhaust all other time (vacation, personal leave and compensatory time) prior to accessing the sick leave bank. However, once short term disability insurance coverage begins (31 days after a qualified illness or injury), an employee is only paid about 70% of their pay. They can supplement this using their leave accruals (vacation, personal leave), but they can't supplement this with sick accruals. In addition, if an employee had to take all their vacation accruals prior to accessing the Sick Leave Bank, it would leave them with no accrued time. This makes it difficult in the event of a serious illness or injury to deal with follow up appointments or family issues relating to the birth of a child.

CEFIA staff recommend modifying the Sick Leave Bank Policy by removing the requirement that employees exhaust all of their vacation accruals. Employees would be required to exhaust their vacation accruals in excess of thirty (30) days. Employees would still be required to exhaust their personal leave, compensatory time and sick leave accruals before accessing the Sick Leave Bank. This is consistent with the state's managerial Sick Leave Bank policy. However, it is more stringent than that policy as we are requiring employees to exhaust all vacation time in excess of 30 days and the State's policy requires the exhaustion of vacation time in excess of 60 days. Removing the requirement to exhaust vacation accruals will allow employees to supplement their pay with vacation leave when short term disability kicks in. It also will not exhaust all their vacation leave balance. In addition, the State's Managerial Sick Leave policy requires that the manager has not been disciplined for sick leave abuse during the two (2) year period preceding application for this benefit; provided however, the committee may waive this requirement. We recommend modifying our current policy to allow a team composed of Sr. Management within CI/CEFIA and human resources to waive this requirement depending upon the circumstances of the employee.

Resolution

RESOLVED, that the Budget and Operation committee recommends that the Board of Directors approve the following CEFIA Handbook revisions marked in **bold**:

The CEFIA Sick Leave Bank is a pool of sick days that has been established by employees of CEFIA who have made a donation of their accumulated sick days. The Bank is available to members to draw up to ten (10) eight- hour sick days per year in the unfortunate event that they experience a qualified illness or injury.

Sick Leave Bank members will receive benefits in the form of paid sick leave if all of the following requirements are met:

- the member has a medical condition that prevents them from working that has been verified by a Medical Certificate OR a member's immediate family member has a medical condition that has been verified by a Medical Certificate and requires the Sick Leave Bank member's care;

- the member has been out on approved medical leave (paid or unpaid) as described above for at least two consecutive weeks;
- the member has exhausted all of their sick, ~~vacation~~, personal leave and compensatory time;
- **the member has exhausted all of their vacation time in excess of 30 days (or 240 hours)**
- the member has not been disciplined for an absence-related reason for the past 12 months; **provided however, a committee comprised of Senior Management and Human Resources may waive this requirement:**
- the member has completed a Sick Leave Bank Withdrawal Request Form and it has been approved by human resources

Submitted by: Bryan Garcia, President and CEO, Mackey Dykes, Chief of Staff, and Suzanne Kaswan, Vice President of Human Resources at Connecticut Innovations

APPENDIX I

Connecticut Innovations Sick Leave Bank Policy

What is the Sick Leave Bank?

The **Sick Leave Bank** is a pool of sick days that has been established by employees of Connecticut Innovations who have made a donation of their accumulated sick days. The Bank is available to members to draw up to ten (10) eight- hour (or for part-time employees, the number of hours that employee normally works in a day) sick days per year in the unfortunate event that they experience a qualified illness or injury. **(Maximum number of days available per calendar year for withdrawal related to H1N1 pandemic – 5 days).**

Enrollment

Employees may become members of the Sick Leave Bank by donating at least 8 hours of sick leave to the pool. Enrollment for membership in the Sick Leave Bank may occur under any of the following circumstances:

- At the inception of the bank on March 9, 2009 or within thirty (30) days thereafter
- New employees who have completed their introductory period (six months of service) may donate to the bank within 30 days of being eligible
- Employees (that have completed their introductory period) who have not previously chosen to participate may enroll during an open enrollment period.
- During an open enrollment period deemed necessary by management

Benefits

- Members may request to draw from the bank by submitting a Sick Leave Bank Withdrawal Request Form to human resources. Subject to the program terms, employees may draw up to ten (10) sick days per fiscal year in the unfortunate event that they experience a qualified illness or injury. **(Maximum number of days available per calendar year for withdrawal related to H1N1 pandemic – 5 days).**

Eligibility

Sick Leave Bank members will receive benefits in the form of paid sick leave if all of the following requirements are met:

- the member has a medical condition that prevents them from working that has been verified by a Medical Certificate OR a member's immediate family member has a medical condition that has been verified by a Medical Certificate and requires the Sick Leave Bank member's care. **WAIVED when usage related to H1N1 pandemic**
- the member has been out on approved medical leave (paid or unpaid) as described above for at least ten consecutive days. **WAIVED when usage related to H1N1 pandemic**
- the member has exhausted all of their sick, vacation, personal leave and compensatory time. **Vacation requirement WAIVED when usage related to H1N1 pandemic**

- the member has not been disciplined for an absence-related reason for the past 12 months
- the member has completed a Sick Leave Bank Withdrawal Request Form and it has been approved by human resources.
- **Maximum number of days available per calendar year for withdrawal related to H1N1 pandemic – 5 days**

For purposes of the Sick Leave Bank, immediate family is defined as an employee's spouse, parent, brother, sister, child, grandparent, grandchild, in-law, legal guardian or permanent resident of the employee's household (as defined in the CI Handbook).

Guidelines for Use

- Paid sick leave from the Bank shall be approved in units of eight (8) hour sick days for not more than ten (10) consecutive business days (five day maximum for usage related to H1N1 pandemic). In the case of a part-time employee (who works less than 8 hours per day), paid sick leave shall be in a unit equal to the number of hours the part-time employee works each day for not more than ten (10) consecutive business days. The maximum number of sick leave days any member may draw from the Sick Leave Bank in any fiscal year is ten (10).
- Elective surgery is not considered a qualified illness or injury. Members may not draw paid sick leave days from the Sick Leave Bank for elective surgery.
- If a member receives paid hours from the Sick Leave Bank and is later reimbursed for the same hours by an insurance company, workers compensation, Long-Term Disability benefits or any other source, the member must repay the Bank for the paid sick leave days for which they were reimbursed.
- If necessary to replenish the bank, CI management may, at any time, establish an open enrollment period during which employees will have an opportunity to donate their accumulated sick leave.
- Employees that choose to participate in the Sick Leave Bank must donate at least eight hours of sick leave to the pool, but can donate as many hours over and above the minimum requirement as they choose.
- Donations of sick leave to the Bank are nonrefundable and nontransferable, unless the Bank is dissolved by CI management.

CEFIA Sick Leave Bank Handbook Language

Sick Leave Bank

The CEFIA Sick Leave Bank is a pool of sick days that has been established by employees of CEFIA who have made a donation of their accumulated sick days. The Bank is available to members to draw up to ten (10) eight- hour sick days per year in the unfortunate event that they experience a qualified illness or injury.

Sick Leave Bank members will receive benefits in the form of paid sick leave if all of the following requirements are met:

- the member has a medical condition that prevents them from working that has been verified by a Medical Certificate OR a member's immediate family member has a medical condition that has been verified by a Medical Certificate and requires the Sick Leave Bank member's care.
- the member has been out on approved medical leave (paid or unpaid) as described above for at least two consecutive weeks.
- the member has exhausted all of their sick, vacation, personal leave and compensatory time
- the member has not been disciplined for an absence-related reason for the past 12 months
- the member has completed a Sick Leave Bank Withdrawal Request Form and it has been approved by human resources

All requests for utilization of the sick leave bank must be in accordance with the Sick Leave Bank Policy. Please contact Human Resources for a complete copy of the sick leave bank policy.

An Important Fact Sheet for State of Connecticut Managers Regarding the Managerial Sick Leave Bank Background and Participation



Pursuant to Management Personnel Policy 97-1, State of Connecticut managers (in accordance with Connecticut General Statutes, Sections 5-196 (cc) or 5-270 (g)) are eligible to participate in the Managerial Sick Leave Bank (MSLB). The MSLB consists of an accumulated number of sick leave hours that have been donated to the bank by participating managers. Any participating manager may apply for benefits under the MSLB in the event they suffer an illness or injury that exhausts their sick leave, personal leave, compensatory time, as well as any vacation they have accrued in excess of 60 days when workers' compensation benefits do not apply or have been exhausted.

Managers must have completed two or more years in state service to be eligible to participate in the MSLB. This includes employees with two or more years of state service who are promoted to a managerial class. After managers become eligible to join the MSLB, they have 90 calendar days to accept or decline participation. The original acceptance or declination form is available in your agency human resources office and is returned completed to your agency human resources office, which in turn forwards it to

the MSLB Committee at the Department of Administrative Services (DAS). A copy of the form is filed in the manager's personnel records. The MSLB Committee responds directly to your agency's human resources office with approval or denial.

If the MSLB Committee approves your application, you will be enrolled and an initial donation of the hourly equivalent of one day of sick leave will be deducted from your accumulated sick leave. If you decline, that decision cannot be changed at a later date.

Enrollment applications and any correspondence should be directed, by the agency human resources administrator only, to: Kristine Skoczylas, DAS Human Resources, 5th Floor, 165 Capitol Ave., Hartford, CT 06106. Agency human resources administrators can direct questions to the MSLB Committee members:

Peggy Zabawar (860-713-5246) MAC representative to the Committee or
Dr. Pamela Libby (860-713-5204) DAS representative to the Committee.

The Managerial Sick Leave Bank is a Limited Benefit

The Managerial Sick Leave Bank affords the eligible manager with a number of benefits although it has clear limitations. Know these limitations because if an emergency situation arises where you need to draw from the bank, you may have done well to have purchased salary replacement or other types of insurance and accrued a certain amount of personal savings beforehand to better care for yourself and your family.



Here is why:

- 1) You will need to be off the payroll for 15 days after exhaustion of sick, personal and compensatory time along with any annual vacation accrued beyond 60 days (that is, we don't require you to expend all of your vacation time which can be an important asset while you are on MSLB) because the 16th day after exhausting this time is when payments from the MSLB will begin. Therefore, at minimum, you should either have three weeks of salary saved in advance of this type of emergency OR salary replacement insurance that covers illness or injury-related loss of pay in order to weather this time for which you will not be receiving your regular salary;
- 2) The MSLB affords you pay at a rate of one-half day for each day of illness or injury and for no longer than 200 of these ½ days per fiscal year which will keep money coming in to your home but reduced by half;
- 3) You will not be accruing sick or vacation leave during this time and you must continue paying insurance and other premiums;
- 4) You will not be eligible for holiday or other paid leave benefits during this time;
- 5) You must not have been disciplined for sick leave abuse for the previous two years to qualify;
- 6) You must have an applicable medical certificate.

However, the MSLB is not about pay alone; even though you are not working and you cannot work and you have exhausted all but vacation leave, your position is retained for you for not less than 42 calendar days. If you remain on MSLB beyond this time, you are entitled to an equivalent position with equivalent pay if you return to work within 24 weeks of when you started using the MSLB pursuant to C.G.S. § 5-248a.

The MSLB is all about giving you some level of salary and job protection when you have exhausted almost all of the other benefits that the state affords you. It is possible to combine your MSLB and any available vacation leave you have left to elevate your salary beyond the one half day's pay. You may also elect to use any or all accrued vacation time before starting to use the MSLB, but vacation time cannot substitute for the 15-day pay gap.

If you are using the MSLB and begin to recover from your illness or injury, you may begin to return to work part-time up to an amount authorized by a medical certificate. When part time work begins, the maximum MSLB benefit will be two hours per day combined with six or fewer hours (as authorized) of paid work time. The two hours of MSLB that is combined with the part time work counts one-half against each day of the 200 days maximum of MSLB that can be used per fiscal year.

Because the MSLB is not a full salary replacement benefit, it cannot be overemphasized how important it is to preserve your own sick leave as it is accrued and to only use it when you are truly ill. Your accrued sick leave pays at 100% when you are out ill or injured and you accrue regular leave benefits when it is being used. The MSLB is meant for those circumstances "when all else fails" because you cannot work and you have nothing left protecting you and your job with the state that affords you any kind of pay. **Therefore, every manager should know the limitations of the Managers' Sick Leave Bank and plan accordingly!**

And as always, consult with your agency's human resources office when you have questions about the use of this benefit or any other state benefits.



Official Memoranda

HUMAN RESOURCES

TO: Agency Personnel Administrators
FROM: Alan J. Mazzola, Deputy Commissioner
RE: Management Personnel Policy 97-1, Sick Leave Bank
DATE: February 18, 1997

Below is a copy of Management Personnel Policy 97-1 relating to the new Sick Leave Bank for managers. The purpose of this Bank is to provide sick leave benefits to managers who have exhausted vacation time (in excess of 60 days) sick leave, personal leave and compensatory time have been exhausted due to serious illness/injury.

This fund will be established through contributions of hours from both the State and managers (who choose to participate). Enrollment information will be distributed shortly. Those electing to enroll will be required to contribute the hourly equivalent of one day toward the Bank. Any manager requesting the use of this benefit will make an application to the Management Committee. The Committee will approve/disapprove this benefit based on the enclosed criteria. The benefit period shall not exceed more than 200 ½ days in any one fiscal year.

Please make your managers aware of this policy.

If any personnel office has any questions, feel free to contact Peter Rozantes at 860.566.5570. All other employees are advised to contact their own personnel office.



Alan J. Mazzola, Deputy Commissioner

Department of Administrative Services

Encl.

97-06

MANAGEMENT PERSONNEL POLICY 97-1

Sick Leave Bank

Section One. Definition. There shall be an Emergency Sick Leave Bank to be used by full-time permanent managers. For purposes of this Management Personnel Policy, "manager" means an employee designated as a manager in accordance with Connecticut General Statutes, Sections 5-196 (cc) or 5-270 (g).

Section Two. Eligibility. A manager shall be eligible to use sick leave benefits from the bank when:

- (a)** The manager has been employed by the State for two (2) or more years.
- (b)** The manager has exhausted all sick leave, personal leave, and compensatory time.
- (c)** The manager has exhausted vacation leave in excess of sixty (60) days.
- (d)** The illness or injury is not covered by Workers' Compensation or

such compensation benefit has been exhausted.

(e) An acceptable medical certificate supporting the continued absence is on file.

(f) The manager has not been disciplined for sick leave abuse during the two (2) year period preceding application for the benefit; provided, however, the committee may waive this requirement.

(g) The manager has made a determination in writing on a form provided by the employer to participate in this sick leave bank plan and to allow the State to deduct such time as is specified in this Management Personnel Policy to administer the bank. This determination shall be made at the time of the establishment of this bank. For employees not designated as managers as of the effective date of this item, determination to participate in this sick leave bank plan shall be made after the employee has met the provisions of Section Two (a) above..

Section Three. Benefit Amount. Benefits under this Article shall be paid at the rate of one-half (1/2) day for each day of illness or injury. Payments shall begin on the sixteenth (16th) day after the exhaustion of leave or Workers' Compensation benefit, as provided in Section Two. No manager shall be eligible to draw from the bank more than once per fiscal year, nor more than two hundred (200) one-half (1/2) days per fiscal year of illness or injury, nor if the fund is depleted. Managers receiving benefits under this policy shall not accrue vacation or sick leave during the period of benefits or be eligible for holiday or other paid leave benefits during such period.

Section Four. Retention of Position. The Employer shall hold the position of any manager who has been placed on sick leave bank for a period of not less than forty-two (42) calendar days. If a manager remains on the sick leave bank for more than forty-two (42) calendar days, he/she, pursuant to the provisions of Connecticut General Statutes, Section 5-248a, shall be entitled to an equivalent position with equivalent pay in state service if he/she returns to work within twenty-four (24) weeks of his/her initial placement on the sick leave bank. This provision shall not preclude agencies from holding the position for longer periods up to and including the actual length of the leave.

Section Five. The Fund. The fund is established through contributions of hours from both the State and participating managers. Effective on the first day of the payroll period following approval of this management personnel policy, each participating full-time manager employed for two (2) or more years shall contribute the hourly equivalent of one day toward the sick leave bank. Said contribution shall be deducted from their individual sick leave balance on such date. Effective that same date, the Employer shall contribute 1,000 hours to the fund.

Any participating manager who becomes eligible to utilize the sick leave bank through completion of two (2) years of employment shall contribute the hourly equivalent of one day toward the sick leave bank at that time..

If at any time the fund should fall below 5,000 hours, the Committee referenced in Section Six shall recommend a modification in this Management Personnel Policy. Any adjustments that are made will be made through an amendment to this Management Personnel Policy.

Section Six. Administration of the Program. An eligible manager requesting use of emergency sick leave may make application on the prescribed form to a Management Committee established to administer the program. Said Committee shall be comprised of two (2) members; one (1) from the Employer and one (1) from the Management Advisory Council. Any determinations made by this Committee must be unanimous. The Committee shall have full authority to grant benefits and administer the program in accordance with the provisions of this policy. When a manager returns to work, or when sick leave bank benefits have been exhausted, the appointing agency will notify the Committee, in writing, with the total number of hours used by said manager. Time off without loss of pay or benefits shall be granted to Committee members to attend meetings as necessary to administer this program.

The actions or non-actions of the Committee shall in no way be subject to collateral attack or subject to any appeal process. The Committee shall not be considered a State agency, nor shall it be considered a board or other subdivision of the Employer. All actions shall be taken at the discretion of the Committee, and no request shall be construed as a contested case.

This Management Personnel Policy supersedes Connecticut General Statutes, Section 5-247 and Regulations 5-247-5 and 5-247-6.

This Management Personnel Policy is approved in accordance with Connecticut General Statutes, Section 5-200 (p).

This item is effective upon approval.

Approved by: Date:

Alan J. Mazzola, Deputy Commissioner of Administrative Services

Michael W. Kozlowski, Secretary, Office of Policy and Management

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Last Updated: Tuesday, January 05, 1999



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Memo

To: Audit, Compliance and Governance Committee

From: George Bellas, VP – Finance and Administration – Connecticut Innovations

CC: Bryan Garcia, President and CEO, Bert Hunter, EVP and Chief Investment Officer, Brian Farnen Chief Legal Officer and Mackey Dykes, Chief of Staff

Date: December 11, 2013

Re: Staff directives from the October 4, 2013 meeting

At its October 4, 2013 meeting the Audit, Compliance and Governance (ACG) Committee approved a resolution whereby it recommended that the Board of Directors of CEFIA approve the audited financial statements and federal single audit report of CEFIA for the fiscal year ended June 30, 2013 contingent upon Marcum LLP and CEFIA staff addressing certain open items. Pursuant to your request, we have addressed each item as follows:

Additional disclosures pertaining to Board commitments and resolutions

Note 8 – Commitments has been enhanced to include Board resolutions which authorize an additional \$33,842,000 in CEFIA resources in the near term to support programs for which specific commercial and residential projects have not yet been identified. This is in addition to \$24,486,560 in CEFIA resources that have been committed to support programs for specific commercial and residential programs.

The appropriate financial statement presentation of CT Solar Lease 2 LLC within CEFIA's financial statement framework

After consultation with the Government Accounting Standards Board (GASB) a determination was made to include CT Solar Lease 2 LLC as a discretely presented component unit of CEFIA within the Statement of Net Position, Statement of Revenues, Expenses and Changes in Net Position and Statement of Cash Flows. The rationale for this presentation is discussed in **Note 1 – Nature of Operations and Significant Accounting Policies** under the sub heading **Reporting Entity**.

Clarify the discussion of Custodial Risk in Note 3-Cash and Cash Equivalents

The discussion of custodial risk was revised to include language explaining that certain balances must be maintained in deposit accounts at financial institutions participating in the Solar Lease 2 Program as part of CT Solar Lease 2 LLC's contractual commitment under the Program.

Clarify the discussion of Portfolio Investments in Note 4

Note 4 has been revised to include the disclosure that CEFIA's investments in emerging technology companies and being managed by Connecticut Innovations under a memorandum of understanding.

As instructed pursuant to the approved ACG Committee resolution, we will present the revised audited financial statements and federal single audit report of CEFIA for the 2013 fiscal year at the upcoming CEFIA Board of Directors meeting scheduled for December 20, 2013.

DRAFT

**CLEAN ENERGY FINANCE AND
INVESTMENT AUTHORITY**
(A Component Unit of the State of Connecticut)

REPORTING PACKAGE

JUNE 30, 2013 AND 2012

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PRESIDENT'S LETTER



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

December 2013

TO OUR STAKEHOLDERS:

In July 2011, Connecticut took the bold step of establishing the Clean Energy Finance and Investment Authority (CEFIA) as the nation's first "green bank," that is, a quasi-public entity that leverages ratepayer funds to attract private investment in clean energy projects. CEFIA just completed its second official year as a green bank, and results show that the model is working. We are meeting the challenge set for us: deploying more clean energy, faster and with fewer public resources.

Attracting Private Capital

CEFIA has succeeded in leveraging its limited resources. This year, by putting approximately \$40 million of our funds to work, we attracted more than \$180 million in private capital investment. We've developed innovative approaches, partnering with capital providers such as local credit unions and community, state, regional and national banks to attract their investment in clean energy in order to provide customers and contractors with easy access to affordable capital.

With the resources we have attracted, we are deploying more clean energy in Connecticut's homes, businesses and institutions. Of the \$220 million assembled this year, \$120 million will be used to deploy nearly 30 megawatts (MW) of clean energy in FY 2013. The remaining \$100 million will be invested in 2014 and beyond to deploy at least another 20 MW of clean energy.

Delivering Strong Results

We are about to commission the largest fuel cell power plant in the country: the Dominion Bridgeport Fuel Cell Park a \$65 million, 15-MW fuel cell project located on a remediated brownfield and using technology that is manufactured in Connecticut. We have worked with the local solar photovoltaic industry to deploy more than 8 MW of residential rooftop installations. This is nearly double Connecticut's best year, and we are poised to double it again in 2014. We also collaborated with a tax equity investor and a syndicate of local debt providers to form the first public-private partnership to finance \$60 million of residential and commercial solar PV and solar thermal hot water system projects to offer consumers a cleaner and cheaper energy alternative. And we are beginning to realize the potential of Commercial Property Assessed Clean Energy (C-PACE) in helping commercial, industrial, multifamily and non-profit energy end-users install deeper energy efficiency measures, convert to natural gas, and deploy on-site renewable energy. As a result of the energy improvements being financed through C-PACE, end-use customers are saving money by avoiding energy costs.

Deploying clean energy faster is important, because the economy and the environment demand it. The 30 MW of clean energy deployed this year has created nearly 1,200 jobs – 400 direct and 800 indirect and induced – and the projects will eliminate approximately 250,000 tons of greenhouse gas emissions over their lifetimes. To create jobs and protect the environment more quickly, we have shifted our focus away from providing grants and supporting early stage technology. Instead, we are working with the clean energy industry to lower the installed costs of commercially available clean energy technologies. And we are partnering with capital providers to lower their cost of capital for clean energy by reducing risk. By working with contractors and capital providers to reduce the cost of clean energy, CEFIA is making clean energy more accessible and affordable to consumers.

Investing Public Resources

In addition to deploying more clean energy faster than ever, CEFIA is doing it with fewer public resources. We are using the limited ratepayer resources we receive to compete for federal grants for our state. To date, we have won more than \$5 million to support rooftop solar PV and multifamily affordable housing grants. Of the \$40 million of investment we made in FY 2013, about \$15 million was done in the conventional way that governments typically use to support clean energy market development: through grants, rebates and subsidies. However, the remaining \$25 million of investment utilized the new financial tools of credit enhancements (i.e., loan loss reserves) and loans that Governor Malloy and Connecticut General Assembly provided, which CEFIA expects will be returned over time for further reinvestment.

The result of our new approach is that we achieved a 10 to 1 leverage ratio of private to public funds this year, versus a past ratio of 1 to 1. This is an outstanding accomplishment for our state – doing more, faster and with less!

We continue to learn more every day about the challenges of implementing the new green bank model, and change inevitably brings challenges. But we are confident that we are taking a path that will stimulate the growth of clean energy in Connecticut and, in doing so, strengthen our economy and protect our environment.

Respectfully submitted,



Bryan T. Garcia
President and CEO

INDEPENDENT AUDITORS' REPORT

To the Board of Directors
Clean Energy Finance and Investment Authority

Report on the Financial Statements

We have audited the accompanying financial statements of the business-type activities and discretely presented component units of the Clean Energy Finance and Investment Authority (“CEFIA”) (a component unit of the State of Connecticut) as of and for the years ended June 30, 2013 and 2012, and the related notes to the financial statements, which collectively comprise CEFIA’s financial statements.

Management’s Responsibility for the Financial Statements

Management is responsible for the preparation and fair presentation of these financial statements in accordance with accounting principles generally accepted in the United States of America; this includes the design, implementation, and maintenance of internal control relevant to the preparation and fair presentation of financial statements that are free from material misstatement, whether due to fraud or error.

Auditors’ Responsibility

Our responsibility is to express opinions on these financial statements based on our audits. We conducted our audits in accordance with auditing standards generally accepted in the United States of America and the standards applicable to financial audits contained in *Government Auditing Standards*, issued by the Comptroller General of the United States. Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the financial statements are free from material misstatement.

An audit involves performing procedures to obtain audit evidence about the amounts and disclosures in the financial statements. The procedures selected depend on the auditor’s judgment, including the assessment of the risks of material misstatement of the financial statements whether due to fraud or error. In making those risk assessments, the auditor considers internal control relevant to the entity’s preparation and presentation of the financial statements in order to design audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the entity’s internal control. Accordingly, we express no such opinion. An audit also includes evaluating the appropriateness of accounting policies used and the reasonableness of significant accounting estimates made by management, as well as evaluating the overall presentation of the financial statements.

We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our audit opinions.

Opinions

In our opinion, the financial statements referred to above present fairly, in all material respects, the respective financial position of the business-type activities and the discretely presented component units of the Clean Energy Finance and Investment Authority as of June 30, 2013 and 2012, and the respective changes in financial position and cash flows for the years then ended in accordance with accounting principles generally accepted in the United States of America.

Other Matter – Required Supplementary Information

Accounting principles generally accepted in the United States of America require that the Management’s Discussion and Analysis as listed in the accompanying table of contents be presented to supplement the financial statements. Such information, although not a part of the financial statements, is required by the Governmental Accounting Standards Board who considers it to be an essential part of financial reporting for placing the financial statements in an appropriate operational, economic, or historical context. We have applied certain limited procedures to the required supplementary information in accordance with auditing standards generally accepted in the United States of America, which consisted of inquiries of management about the methods of preparing the information and comparing the information for consistency with management’s responses to our inquiries, the financial statements, and other knowledge we obtained during our audit of the financial statements. We do not express an opinion or provide any assurance on the information because the limited procedures do not provide us with sufficient evidence to express an opinion or provide assurance.

Other Reporting Required by Government Auditing Standards

In accordance with *Government Auditing Standards*, we have also issued our report dated December XX, 2013 on our consideration of the Clean Energy Finance and Investment Authority’s internal control over financial reporting and on our tests of its compliance with certain provisions of laws, regulations, contracts, and grant agreements and other matters. The purpose of that report is to describe the scope of our testing of internal control over financial reporting and financial reporting and compliance and the results of that testing, and not to provide an opinion on internal control over financial reporting or on compliance. That report is an integral part of an audit performed in accordance with *Government Auditing Standards* in considering the Clean Energy Finance and Investment Authority’s internal control over financial reporting and compliance.

Hartford, CT
December ____, 2013

MANAGEMENT'S DISCUSSION AND ANALYSIS

The following Management's Discussion and Analysis (MD&A) provides an overview of the financial performance of the Clean Energy Finance and Investment Authority (CEFIA) (a component unit of the State of Connecticut) for the fiscal years ended June 30, 2013, 2012, and 2011. The information contained in this MD&A should be considered in conjunction with the information contained in the financial statements and notes to the financial statements included in the "Financial Statements" section of this report.

FINANCIAL STATEMENTS PRESENTED IN THIS REPORT

CEFIA is a quasi-public agency of the State of Connecticut established on July 1, 2011 by Section 16-245n of the Connecticut General Statutes, created for the purposes of, but not limited to: (1) implementing the Comprehensive Plan developed by CEFIA pursuant to Section 16-245n(c) of the Connecticut General Statutes, as amended; (2) developing programs to finance and otherwise support clean energy investment in residential, municipal, small business and larger commercial projects, and such others as CEFIA may determine; (3) supporting financing or other expenditures that promote investment in clean energy sources to foster the growth, development and commercialization of clean energy resources and related enterprises; and (4) stimulating demand for clean energy and the deployment of clean energy sources within the state that serve end-use customers in the state. CEFIA constitutes the successor agency to Connecticut Innovations for the purposes of administering the clean energy fund in accordance with section 4-38d of the Connecticut General Statutes and therefore the net assets of such fund were transferred to the newly created CEFIA as of July 1, 2011.

The financial statements include: Statement of Net Position, Statement of Revenues, Expenses and Changes in Net Position, and the Statement of Cash Flows. The Statement of Net Position provides a measure of CEFIA's economic resources. The Statement of Revenues, Expenses and Changes in Net Position measures the transactions for the periods presented and the impact of those transactions on the resources of CEFIA. The Statement of Cash Flows reconciles the changes in cash and cash equivalents with the activities of CEFIA for the periods presented. The activities are classified as to operating, investing and noncapital financing.

Notes to the financial statements provide additional detailed information to supplement the basis for reporting and nature of key assets and liabilities.

FINANCIAL HIGHLIGHTS OF FISCAL 2013***NET POSITION***

Net position increased by \$17.0 million to \$98.2 million at June 30, 2013 and cash and cash equivalents increased by \$4.4 million in 2013 to \$77.6 million. Cash increased primarily as a result of greater than expected proceeds received from Regional Greenhouse Gas Initiative (RGGI) auctions and a reduction in grant activity and CEFIA's transition to a financing model as opposed to grant model to fund renewable energy and energy efficiency projects.

Other assets are composed primarily of utility customer assessment receivables and RGGI auction receivables. The promissory note portfolio of \$11.2 million as of June 30, 2013 and \$11.7 million as of July 1, 2012 funded a residential photovoltaic equipment lease program which ended during 2012.

As of June 30, 2013, the Board of Directors designated \$24.5 million in net position to fund contingent grant, loan and investment commitments as described in Note 8. These grants, loans and investments are expected to be paid or funded over the next one to six fiscal years. In addition to these commitments, an additional \$33.8 million has been designated by the Board to fund future program commitments.

The following table summarizes the net position at June 30, 2013 and 2012 (in thousands):

	2013	2012	Increase (Decrease)
Cash and cash equivalents	\$ 77,642	\$ 73,214	\$ 4,428
Investments	4,788	2,155	2,633
Promissory notes	11,240	11,736	(496)
Other assets	<u>6,320</u>	<u>5,071</u>	<u>1,249</u>
Total Assets	<u>99,990</u>	<u>92,176</u>	<u>7,814</u>
Current liabilities	1,816	2,625	(809)
Deferred revenue	<u>--</u>	<u>8,363</u>	<u>(8,363)</u>
Total Liabilities	<u>1,816</u>	<u>10,988</u>	<u>(9,172)</u>
Invested in capital assets	362	91	271
Restricted Net Position:			
Non-expendable	1	--	1
Restricted - energy programs	8,143	177	7,966
Unrestricted	<u>89,668</u>	<u>80,921</u>	<u>8,747</u>
Total Net Position	<u>\$ 98,174</u>	<u>\$ 81,189</u>	<u>\$ 16,985</u>

CHANGES IN NET POSITION

Revenue from interest on cash deposits and solar lease notes decreased \$42,000 to \$687,000 in 2013. Interest on short-term investments and cash deposits decreased due to the changes in interest rates. CEFIA received \$4.7 million from the State in RGGI auction proceeds during the year.

Total expenditures for grants and programs in 2013 were \$23.6 million, a decrease of \$7.5 million from the prior year. Grant and program expenditures fluctuate from year to year as they are based on the achievement of contract milestones by the grantee. In addition, CEFIA is transitioning to primarily a financing model as opposed to primarily issuing grants to fund renewable energy and energy efficiency projects.

General and administrative expenses increased by \$0.4 million from \$1.4 million to \$1.8 million. CEFIA also incurred \$1.2 million in start-up costs to develop its Solar Lease II program and organize the subsidiary that will administer the program, CT Solar Lease II, LLC.

The net loss of \$657,000 in investments represents write offs of investments previously reserved for and adjustments to the valuation of equity and debt investments currently held.

The following table summarizes the changes in net position between June 30, 2013 and 2012 (in thousands):

	2013	2012	Increase (Decrease)
Revenues	<u>\$ 43,343</u>	<u>\$ 39,754</u>	<u>\$ 3,589</u>
Operating Expenses			
Organizational expenses	1,180	--	1,180
Grants and programs	23,635	31,122	(7,487)
General and administrative expense	<u>1,811</u>	<u>1,388</u>	<u>423</u>
Total Operating Expenses	<u>26,626</u>	<u>32,510</u>	<u>(5,884)</u>
Operating Income	16,717	7,244	9,473
Interest earned	687	729	(42)
Net change in unrealized appreciation in fair value of investments	378	435	(57)
Net realized (loss) gain on investments	(1,035)	--	(1,035)
Capital contribution	<u>238</u>	<u>--</u>	<u>238</u>
Net Change	<u>\$ 16,985</u>	<u>\$ 8,408</u>	<u>\$ 8,577</u>

FINANCIAL HIGHLIGHTS OF FISCAL 2012

In our discussion of the 2012 financial highlights below, management has elected to utilize the 2011 financial results of the Connecticut Clean Energy Fund, the predecessor entity to Clean Energy Finance and Investment Authority, as a benchmark for comparing its 2012 activities.

NET ASSETS

From the base of \$72.8 transferred from the State of Connecticut, net assets increased by \$8.4 million to \$81.2 million at June 30, 2012 and cash and cash equivalents increased by \$13.3 million in 2012 to \$73.2 million. Cash increased primarily as a result of an increase in grant awards received during 2012.

As of June 30, 2012, the Board of Directors designated \$25.8 million in net assets to fund outstanding grant commitments as described in Note 10. These grants are expected to be paid over the next two fiscal years.

Other assets are composed primarily of utility customer assessments receivables and Regional Greenhouse Gas Initiative (RGGI) auction receivables. The promissory note portfolio of \$11.7 million as of June 30, 2012 and \$10.7 million as of July 1, 2011 funded a residential photovoltaic equipment lease program which ended during 2012.

The following table summarizes the net assets at June 30, 2012 and July 1, 2011 (in thousands):

	2012	2011	Increase (Decrease)
Cash, certificates of deposit	\$ 73,214	\$ 59,899	\$ 13,315
Investments	2,155	1,699	456
Promissory notes	11,736	10,663	1,073
Other assets	<u>5,071</u>	<u>4,735</u>	<u>336</u>
Total Assets	<u>92,176</u>	<u>76,996</u>	<u>15,180</u>
Current liabilities	2,625	4,216	(1,591)
Deferred revenue	<u>8,363</u>	<u>--</u>	<u>8,363</u>
Total Liabilities	<u>10,988</u>	<u>4,216</u>	<u>6,772</u>
Invested in capital assets	91	--	91
Restricted	177	234	(57)
Unrestricted	<u>80,921</u>	<u>72,546</u>	<u>8,375</u>
Total Net Position	<u>\$ 81,189</u>	<u>\$ 72,780</u>	<u>\$ 8,409</u>

CHANGES IN NET ASSETS

Revenues from utility customer assessments were \$27.0 million for 2012 compared to \$28.4 million in 2011.

Revenue from interest on cash deposits increased \$.03 million to \$.14 million in 2012. Interest on short-term investments and cash deposits decreased due to the increase in the average cash balance on hand and changes in interest rates. CEFIA received \$2.0 million from the state in RGGI auction proceeds during the year.

Total expenditures for grants and programs in 2012 were \$31.1 million, an increase of \$3 million from the prior year. Grant and program expenditures fluctuate from year to year as they are based on the achievement of contract milestones by the grantee. During 2012, CEFIA committed a total of \$30.4 million for new grants and programs.

General and administrative expenses decreased by \$48,000 from \$1.436 million to \$1.388 million.

Net gains in program investments increased by \$315,000 as a result in adjustments to the valuation of equity and debt investments.

The following table summarizes the changes in net assets between June 30, 2012 and 2011 (in thousands):

	2012	2011	Increase (Decrease)
Revenues	\$ 40,483	\$ 36,391	\$ 4,092
Operating Expenses			
Grants and programs	31,122	28,026	3,096
General and administrative expense	1,388	1,436	(48)
Total Operating Expenses	32,510	29,462	3,048
Operating Income	7,973	6,929	1,044
Net change in unrealized appreciation in fair value of investments	436	(58)	494
Net realized (loss) gain on investments	--	178	(178)
Net Change in Net Position	\$ 8,409	\$ 7,049	\$ 1,360

REQUESTS FOR INFORMATION

This financial report is designed to provide a general overview of CEFIA's finances. Questions concerning any of the information provided in this report or request for additional financial information should be addressed to the Office of Finance and Administration, 865 Brook Street, Rocky Hill, Connecticut 06067.

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FINANCIAL STATEMENTS

CLEAN ENERGY FINANCE AND INVESTMENT AUTHORITY

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STATEMENTS OF NET POSITION

JUNE 30, 2013 AND 2012

	Primary Government	Discretely Presented Component Units		Eliminations	Total Reporting Entity	2012
		CT Solar Lease 2 LLC	CEFIA Solar Services, Inc.			
Assets						
Current Assets						
Cash and cash equivalents	\$ 67,698,558	\$ 406,456	\$ --	\$ --	\$ 68,105,014	\$ 64,672,910
Accounts receivable	1,940,835	--	--	--	1,940,835	725,259
Utility customer assessments receivable	2,604,826	--	--	--	2,604,826	2,580,042
Other assets	194,056	--	--	--	194,056	350,302
Current portion of Solar Lease notes	704,032	--	--	--	704,032	670,645
Total Current Assets	<u>73,142,307</u>	<u>406,456</u>	<u>--</u>	<u>--</u>	<u>73,548,763</u>	<u>68,999,158</u>
Noncurrent Assets						
Portfolio investments	4,788,094	--	--	--	4,788,094	2,155,525
Solar Lease Notes, less current portion	10,536,136	--	--	--	10,536,136	11,064,879
Renewable Energy Credits	1,217,491	--	--	--	1,217,491	1,324,614
Investment in Component Units	100	--	100	(200)	--	--
Advance to primary government and component units	5,850,000	--	3,500,000	(9,350,000)	--	--
Capital assets, net of depreciation	362,505	--	--	--	362,505	91,329
Restricted assets:						
Cash and cash equivalents	5,036,656	4,500,000	--	--	9,536,656	8,540,684
Total Noncurrent Assets	<u>27,790,982</u>	<u>4,500,000</u>	<u>3,500,100</u>	<u>(9,350,200)</u>	<u>26,440,882</u>	<u>23,177,031</u>
Total Assets	<u>\$ 100,933,289</u>	<u>\$ 4,906,456</u>	<u>\$ 3,500,100</u>	<u>\$ (9,350,200)</u>	<u>\$ 99,989,645</u>	<u>\$ 92,176,189</u>

The accompanying notes are an integral part of these financial statements.

CLEAN ENERGY FINANCE AND INVESTMENT AUTHORITY

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STATEMENTS OF NET POSITION (CONTINUED)

JUNE 30, 2013 AND 2012

	Primary Government	Discretely Presented Component Units			Total Reporting Entity	2012
		CT Solar Lease 2 LLC	CEFIA Solar Services, Inc.	Eliminations		
Liabilities and Net Position						
Liabilities						
Accounts payable and accrued expenses	\$ 1,422,898	\$ --	\$ --	\$ --	\$ 1,422,898	\$ 2,624,861
Advances from primary government and component units	--	5,850,000	3,500,000	(9,350,000)	--	--
Deferred revenue	--	--	--	--	--	8,363,119
Custodial liability	<u>393,000</u>	<u>--</u>	<u>--</u>	<u>--</u>	<u>393,000</u>	<u>--</u>
Total Liabilities	<u>1,815,898</u>	<u>5,850,000</u>	<u>3,500,000</u>	<u>(9,350,000)</u>	<u>1,815,898</u>	<u>10,987,980</u>
Net Position						
Invested in capital assets	362,505	--	--	--	362,505	91,329
Restricted Net Position						
Non-expendable	1,000	100	100	(200)	1,000	--
Restricted - energy programs	8,143,655	--	--	--	8,143,655	176,974
Unrestricted (deficit)	<u>90,610,231</u>	<u>(943,644)</u>	<u>--</u>	<u>--</u>	<u>89,666,587</u>	<u>80,919,906</u>
Total Net Position	<u>99,117,391</u>	<u>(943,544)</u>	<u>100</u>	<u>(200)</u>	<u>98,173,747</u>	<u>81,188,209</u>
Total Liabilities and Net Position	<u>\$ 100,933,289</u>	<u>\$ 4,906,456</u>	<u>\$ 3,500,100</u>	<u>\$ (9,350,200)</u>	<u>\$ 99,989,645</u>	<u>\$ 92,176,189</u>

The accompanying notes are an integral part of these financial statements.

CLEAN ENERGY FINANCE AND INVESTMENT AUTHORITY

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STATEMENTS OF REVENUES, EXPENSES, AND CHANGES IN NET POSITION

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

	Discretely Presented Component Units				Total Reporting Entity	2012
	Primary Government	CT Solar Lease 2 LLC	CEFIA Solar Services, Inc.	Eliminations		
Operating Revenue						
Utility customer assessments	\$ 27,621,409	\$ --	\$ --	\$ --	\$ 27,621,409	\$ 27,025,088
Grant revenue	10,035,250	--	--	--	10,035,250	10,435,251
RGGI Auction income	4,744,657	--	--	--	4,744,657	2,052,748
Other income	941,777	--	--	--	941,777	240,597
Total Operating Revenue	<u>43,343,093</u>	<u>--</u>	<u>--</u>	<u>--</u>	<u>43,343,093</u>	<u>39,753,684</u>
Operating Expenses						
Grants and program expenditures	23,634,465	--	--	--	23,634,465	31,122,355
General and administrative expenses	1,811,227	--	--	--	1,811,227	1,387,854
Organizational expenses	176	1,180,238	--	--	1,180,414	--
Total Operating Expenses	<u>25,445,868</u>	<u>1,180,238</u>	<u>--</u>	<u>--</u>	<u>26,626,106</u>	<u>32,510,209</u>
Operating Income (Loss)	<u>17,897,225</u>	<u>(1,180,238)</u>	<u>--</u>	<u>--</u>	<u>16,716,987</u>	<u>7,243,475</u>
Nonoperating Income (Expenses)						
Interest on solar lease notes	583,575	--	--	--	583,575	589,007
Interest on short-term investments	103,928	--	--	--	103,928	140,786
Realized gain (loss) on investments	(1,034,605)	--	--	--	(1,034,605)	--
Unrealized gain (loss) on investments	378,059	--	--	--	378,059	434,702
Total Nonoperating Income (Expenses)	<u>30,957</u>	<u>--</u>	<u>--</u>	<u>--</u>	<u>30,957</u>	<u>1,164,495</u>
Income (Loss) Before Capital Contributions	<u>17,928,182</u>	<u>(1,180,238)</u>	<u>--</u>	<u>--</u>	<u>16,747,944</u>	<u>8,407,970</u>
Capital contributions	1,000	236,694	100	(200)	237,594	--
Change in Net Position Before Extraordinary Item	<u>17,929,182</u>	<u>(943,544)</u>	<u>100</u>	<u>(200)</u>	<u>16,985,538</u>	<u>8,407,970</u>
Extraordinary Item - Transfer In of Net Assets from the State of Connecticut Clean Energy Fund	<u>--</u>	<u>--</u>	<u>--</u>	<u>--</u>	<u>--</u>	<u>72,780,239</u>
Change in Net Position	<u>17,929,182</u>	<u>(943,544)</u>	<u>100</u>	<u>(200)</u>	<u>16,985,538</u>	<u>81,188,209</u>
Net Position - Beginning of Year	<u>81,188,209</u>	<u>--</u>	<u>--</u>	<u>--</u>	<u>81,188,209</u>	<u>--</u>
Net Position - End of Year	<u>\$ 99,117,391</u>	<u>\$ (943,544)</u>	<u>\$ 100</u>	<u>\$ (200)</u>	<u>\$ 98,173,747</u>	<u>\$ 81,188,209</u>

The accompanying notes are an integral part of these financial statements.

CLEAN ENERGY FINANCE AND INVESTMENT AUTHORITY

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STATEMENTS OF CASH FLOWS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

	Primary Government	Discretely Presented Component Units		Total Reporting Entity	2012
		CT Solar Lease 2 LLC	CEFIA Solar Services Inc.		
Cash Flows from Operating Activities					
Utility ratepayer assessments	\$ 27,597,453	\$ --	\$ --	\$ 27,597,453	\$ 27,128,191
Grants	2,015,677	--	--	2,015,677	16,892,363
RGGI auctions	3,529,080	--	--	3,529,080	1,657,321
Other income	440,533	--	--	440,533	288,354
Organizational expenses	--	(1,130,223)	--	(1,130,223)	--
Grant and program expenditures	(24,632,056)	--	--	(24,632,056)	(30,452,049)
General and administrative expenditures	(1,880,979)	(15)	--	(1,880,994)	(1,747,177)
Net Cash Provided by (Used in) Operating Activities	<u>7,069,708</u>	<u>(1,130,238)</u>	<u>--</u>	<u>5,939,470</u>	<u>13,767,003</u>
Cash Flows from Non-Capital Financing Activities					
Transfer from State of Connecticut Clean Energy Fund	--	--	--	--	59,899,036
Advances to/from primary government and component units	(5,800,000)	5,800,000	--	--	--
Net Cash Provided from Non-Capital Financing Activities	<u>(5,800,000)</u>	<u>5,800,000</u>	<u>--</u>	<u>--</u>	<u>59,899,036</u>
Cash Flows from Capital and Related Financing Activities					
Purchase of capital assets	(281,654)	--	--	(281,654)	(97,733)
Capital contributions	900	236,694	--	237,594	--
Net Cash (Used in) Provided by Capital and Related Financing Activities	<u>(280,754)</u>	<u>236,694</u>	<u>--</u>	<u>(44,060)</u>	<u>(97,733)</u>
Cash Flows from Investing Activities					
Purchase on solar lease notes	--	--	--	--	(1,710,659)
Interest on short-term investments and cash deposits	116,831	--	--	116,831	118,680
Interest on solar lease notes	583,942	--	--	583,942	634,070
Return of principal on investments	663,488	--	--	663,488	603,197
Program loan disbursements	(2,831,596)	--	--	(2,831,596)	--
Net Cash (Used in) Investing Activities	<u>(1,467,335)</u>	<u>--</u>	<u>--</u>	<u>(1,467,335)</u>	<u>(354,712)</u>
Net (Decrease) Increase in Cash and Cash Equivalents	(478,380)	4,906,456	--	4,428,076	73,213,594
Cash and Cash Equivalents - Beginning	<u>73,213,594</u>	<u>--</u>	<u>--</u>	<u>73,213,594</u>	<u>--</u>
Cash and Cash Equivalents - Ending	<u>\$ 72,735,214</u>	<u>\$ 4,906,456</u>	<u>\$ --</u>	<u>\$ 77,641,670</u>	<u>\$ 73,213,594</u>

The accompanying notes are an integral part of these financial statements.

CLEAN ENERGY FINANCE AND INVESTMENT AUTHORITY

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STATEMENT OF CASH FLOWS (CONTINUED)

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

	Primary Government	Discretely Presented Component Units		Total Reporting Entity	2012
		CT Solar Lease 2 LLC	CEFIA Solar Services Inc.		
Reconciliation of Operating Income to Net Cash Provided by Operating Activities					
Operating income (loss)	\$ 17,897,225	\$ (1,180,238)	\$ --	\$ 16,716,987	\$ 7,243,475
Adjustments to reconcile operating income to net cash provided by operating activities:					
Depreciation	79,364	--	--	79,364	6,404
Changes in operating assets and liabilities:					
Receivables, notes, renewable credits	(1,117,501)	--	--	(1,117,501)	(1,317,629)
Accounts payable, accrued expenses, deferred revenue and due to related parties	<u>(9,789,379)</u>	<u>50,000</u>	<u>--</u>	<u>(9,739,379)</u>	<u>7,834,753</u>
Net Cash Provided by (Used in) Operating Activities	<u>\$ 7,069,709</u>	<u>\$ (1,130,238)</u>	<u>\$ --</u>	<u>\$ 5,939,471</u>	<u>\$ 13,767,003</u>

The accompanying notes are an integral part of these financial statements.

NOTES TO FINANCIAL STATEMENTS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

NOTE 1 - NATURE OF OPERATIONS AND SIGNIFICANT ACCOUNTING POLICIES*NATURE OF OPERATIONS*

The Clean Energy Finance and Investment Authority (CEFIA) was established in July 2011 under Title 16, Sec. 16-245n of the General Statutes of the State of Connecticut as the successor entity of the Connecticut Clean Energy Fund. CEFIA, a component unit of the State of Connecticut, was created to promote energy efficiency and investment in renewable energy sources in accordance with a comprehensive plan developed by it to foster the growth, development and commercialization of renewable energy sources and related enterprises and stimulate demand for renewable energy and deployment of renewable energy sources which serve end-use customers in the State. CEFIA constitutes the successor agency to Connecticut Innovations Incorporated (CI), a quasi-public agency of the State of Connecticut, for the purposes of administering the Clean Energy Fund in accordance with section 4-38d of the Connecticut General Statutes and therefore the net assets of such fund were transferred to the newly created CEFIA as of July 1, 2011. Pursuant to Connecticut General Statute 4-38f, CEFIA is within (CI) for administrative purposes only.

PRINCIPLE REVENUE SOURCE

The Public Utility Regulatory Authority (PURA) assesses a charge per kilowatt-hour to each end-use customer of electric services in the state, which is paid to CEFIA and is the principal source of CEFIA's revenue. CEFIA may deploy the funds for grants, direct or equity investments, contracts or other actions that support energy efficiency projects and research, development, manufacture, commercialization, deployment and installation of renewable energy technologies.

REPORTING ENTITY

CEFIA, as the primary government, follows the reporting requirements of Governmental Accounting Standards Board (GASB) Statement No. 61 (*The Financial Reporting Entity Omnibus – an Amendment of GASB Statements No. 14 and No. 34*) (the Statement) regarding presentation of component units. The Statement modifies certain requirements for including component units in the reporting entity, either by blending (recording their amounts as part of the primary government), or discretely presenting them (showing their amounts separately in the reporting entity's financial statements). To qualify as a blended component unit, the unit must meet one of the following criteria: (1) have substantively the same governing body as that of the primary government, and either (A) a financial benefit or burden relationship exists between the unit and the primary government, or (B) management of the primary government (below the level of the governing body) has operational responsibility of the unit; (2) the unit provides services or benefits exclusively or almost exclusively to the primary government; or (3) the unit's total debt outstanding, including leases, is expected to

NOTES TO FINANCIAL STATEMENTS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

NOTE 1 - NATURE OF OPERATIONS AND SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

be repaid by resources of the primary government. A unit which fails to meet the substantively the same governing requirement may still be included as a discretely presented component unit, if the primary government has appointed the voting majority of the component unit's governance or met other criteria specified in the Statement such as whether or not it would be misleading were the entity to be excluded. Retroactive application of the Statement to 2012 was not necessary.

During 2013, CEFIA established four legally separate for-profit entities whose collective purpose, at the present time, is to administer the CEFIA's solar energy programs. For the year ended June 30, 2013, separate financial statements have not been issued by these entities. CEFIA believes to exclude any of the entities from these financial statements would be misleading. Each entity is listed below, along with whether it is included as a blended component unit (blended) or qualifies as a discretely presented component unit (discrete) within these financial statements based on the criteria described above.

CEFIA Holdings LLC (blended)

A Connecticut limited liability corporation (LLC), 99% owned by CEFIA (1% owned by CI), established to fund a portfolio of residential solar loans and, through its CT Solar Lease 2 program, to enable investment in solar photovoltaic and solar thermal equipment for the benefit of Connecticut homeowners, businesses, not-for-profits and municipalities (the "End Users"). CEFIA Holdings LLC acquires the initial title to the solar assets and contracts with independent solar installers to complete the installation of the solar assets and arrange for the leasing of the solar assets (or sale of energy under power purchase agreements) to the End Users. CEFIA Holdings LLC is also responsible for procuring insurance for the solar assets, operation and maintenance services as well as warranty management services for the ultimate owner of the solar assets, CT Solar Lease 2 LLC, to which CEFIA Holdings LLC sells the residential and commercial projects before the projects are placed in service. After acquiring the residential and commercial projects, CT Solar Lease 2 LLC administers the portfolio of projects with the assistance of AFC First Financial Corporation.

CEFIA Solar Loan I LLC (blended)

A limited-liability corporation, wholly-owned by CEFIA Holdings LLC, established to make loans to residential property owners for the purposes of installing solar photovoltaic equipment.

NOTES TO FINANCIAL STATEMENTS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

NOTE 1 - NATURE OF OPERATIONS AND SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)*CEFIA Solar Services, Inc. (discrete)*

A Connecticut corporation, 100% owned by CEFIA Holdings LLC, established to share in the ownership risks and benefits derived from the leasing of solar photovoltaic and solar thermal equipment and the sale of energy under power purchase agreements as managing member of CT Solar Lease 2 LLC. CEFIA Solar Services, Inc. has a one percent ownership interest in CT Solar Lease 2 LLC and is the managing member of the entity responsible for performing all management and operational functions pursuant to the Operating Agreement of CT Solar Lease 2 LLC.

CT Solar Lease 2 LLC (discrete)

A Connecticut limited-liability corporation that acquires title to the residential and commercial solar projects from the developer, CEFIA Holdings LLC, using capital from its members along with non-recourse funding from participating banks. Repayment to participating banks is predicated upon the property owners repayment to CT Solar Lease 2 LLC of the installation funds advance, as well as revenue earned from production-based incentives. CT Solar Lease 2 LLC is owned ninety-nine percent (99%) by Firststar Development, LLC, a Delaware limited liability company, as the investor member and one percent (1%) by CEFIA Solar Services Inc., as the managing member.

Advances between the primary government (CEFIA) and its component units, or between the component units themselves, involved establishment of funds to provide for loan loss reserves as well as pay certain organizational costs. Advances were eliminated in preparing the combining and reporting entity financial statements.

Condensed combining information for the primary government (CEFIA) and its two blended component units (CEFIA Holdings LLC and CEFIA Solar Loan I LLC) is presented as follows:

NOTES TO FINANCIAL STATEMENTS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

NOTE 1 - NATURE OF OPERATIONS AND SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

CONDENSED, COMBINING INFORMATION – STATEMENT OF NET POSITION

	CEFIA Solar Loan I LLC	CEFIA Holdings LLC	CEFIA	Eliminating Entries	Total Primary Government
Assets					
Current Assets					
Cash and cash equivalents	\$ 54,342	\$ 24,786	\$ 67,619,430	\$ --	\$ 67,698,558
Accounts receivable	--	--	1,940,835	--	1,940,835
Utility customer assessments receivable	--	--	2,604,826	--	2,604,826
Other assets	--	--	194,056	--	194,056
Current portion of Solar Lease notes	--	--	704,032	--	704,032
Total Current Assets	<u>54,342</u>	<u>24,786</u>	<u>73,063,179</u>	<u>--</u>	<u>73,142,307</u>
Noncurrent Assets					
Portfolio investments	20,596	--	4,767,498	--	4,788,094
Solar Lease Notes, less current portion	--	--	10,536,136	--	10,536,136
Renewable Energy Credits	--	--	1,217,491	--	1,217,491
Investment in component units	--	100	99,000	(99,000)	100
Advances to primary government and component units	--	5,875,000	5,850,000	(5,875,000)	5,850,000
Capital assets, net of depreciation	--	--	362,505	--	362,505
Restricted assets:					
Cash and cash equivalents	--	--	5,036,656	--	5,036,656
Total Noncurrent Assets	<u>20,596</u>	<u>5,875,100</u>	<u>27,869,286</u>	<u>(5,974,000)</u>	<u>27,790,982</u>
Total Assets	<u>\$ 74,938</u>	<u>\$ 5,899,886</u>	<u>\$ 100,932,465</u>	<u>\$ (5,974,000)</u>	<u>\$ 100,933,289</u>

NOTES TO FINANCIAL STATEMENTS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

NOTE 1 - NATURE OF OPERATIONS AND SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

CONDENSED, COMBINING INFORMATION – STATEMENT OF NET POSITION (CONTINUED)

	CEFIA Solar Loan I LLC	CEFIA Holdings LLC	CEFIA	Eliminating Entries	Total Primary Government
Liabilities and Net Position					
Liabilities					
Accounts payable and accrued expenses	\$ --	\$ --	\$ 1,422,898	\$ --	\$ 1,422,898
Advances from primary government and component units	75,000	5,800,000	--	(5,875,000)	--
Custodial liability	--	--	393,000	--	393,000
Total Liabilities	<u>75,000</u>	<u>5,800,000</u>	<u>1,815,898</u>	<u>(5,875,000)</u>	<u>1,815,898</u>
Net Position					
Invested in capital assets	--	--	362,505	--	362,505
Restricted Net Position					
Non-expendable	--	100,000	--	(99,000)	1,000
Restricted for energy programs	--	--	8,143,655	--	8,143,655
Unrestricted (deficit)	(62)	(114)	90,610,407	--	90,610,231
Total Net Position	<u>(62)</u>	<u>99,886</u>	<u>99,116,567</u>	<u>(99,000)</u>	<u>99,117,391</u>
Total Liabilities and Net Position	<u>\$ 74,938</u>	<u>\$ 5,899,886</u>	<u>\$ 100,932,465</u>	<u>\$ (5,974,000)</u>	<u>\$ 100,933,289</u>

CLEAN ENERGY FINANCE AND INVESTMENT AUTHORITY

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NOTES TO FINANCIAL STATEMENTS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

NOTE 1 - NATURE OF OPERATIONS AND SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

CONDENSED, COMBINING INFORMATION – STATEMENT OF REVENUES, EXPENSES AND CHANGES IN NET POSITION

	CEFIA Solar Loan I LLC	CEFIA Holdings LLC	CEFIA	Eliminating Entries	Total Primary Government
Operating Revenues					
Utility customer assessments	\$ --	\$ --	\$ 27,621,409	\$ --	\$ 27,621,409
Grant revenue	--	--	10,035,250	--	10,035,250
RGGI Auction income	--	--	4,744,657	--	4,744,657
Other income	--	--	941,777	--	941,777
Total Operating Revenues	<u>--</u>	<u>--</u>	<u>43,343,093</u>	<u>--</u>	<u>43,343,093</u>
Operating Expenses					
Grants and program expenditures	--	--	23,634,465	--	23,634,465
General and administrative expenses	--	--	1,811,227	--	1,811,227
Organizational expenses	62	114	--	--	176
Total Operating Expenses	<u>62</u>	<u>114</u>	<u>25,445,692</u>	<u>--</u>	<u>25,445,868</u>
Operating Income (Loss)	<u>(62)</u>	<u>(114)</u>	<u>17,897,401</u>	<u>--</u>	<u>17,897,225</u>
Nonoperating Income (Expenses)					
Interest on solar lease notes	--	--	583,575	--	583,575
Interest on short-term investments	--	--	103,928	--	103,928
Realized gain (loss) on investments	--	--	(1,034,605)	--	(1,034,605)
Unrealized gain (loss) on investments	--	--	378,059	--	378,059
Total Nonoperating Income (Expenses)	<u>--</u>	<u>--</u>	<u>30,957</u>	<u>--</u>	<u>30,957</u>
Income Before Capital Contributions	(62)	(114)	17,928,358	--	17,928,182
Capital contributions	--	100,000	--	(99,000)	1,000
Change in Net Position	(62)	99,886	17,928,358	(99,000)	17,929,182
Net Position - Beginning of Year	--	--	81,188,209	--	81,188,209
Net Position - End of Year	<u>\$ (62)</u>	<u>\$ 99,886</u>	<u>\$ 99,116,567</u>	<u>\$ (99,000)</u>	<u>\$ 99,117,391</u>

CLEAN ENERGY FINANCE AND INVESTMENT AUTHORITY

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NOTES TO FINANCIAL STATEMENTS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

NOTE 1 - NATURE OF OPERATIONS AND SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

CONDENSED, COMBINING INFORMATION – STATEMENT OF CASH FLOWS

	CEFIA Solar Loan I LLC	CEFIA Holdings LLC	CEFIA	Eliminating Entries	Total Primary Government
Cash Flows from Operating Activities					
Utility ratepayer assessments	\$ --	\$ --	\$ 27,597,453	\$ --	\$ 27,597,453
Grants	--	--	2,015,677	--	2,015,677
RGGI auction proceeds	--	--	3,529,080	--	3,529,080
Other income	--	--	440,533	--	440,533
Grant and program expenditures	--	--	(20,842,075)	--	(20,842,075)
General and administrative expenditures	(62)	(114)	(5,670,783)	--	(5,670,959)
Net Cash Provided by (Used in) Operating Activities	<u>(62)</u>	<u>(114)</u>	<u>7,069,885</u>	<u>--</u>	<u>7,069,709</u>
Cash Flows from Noncapital Financing Activities					
Advances to CEFIA component units	--	(5,875,000)	(5,800,000)	5,875,000	(5,800,000)
Advances from CEFIA and component units	75,000	5,800,000	--	(5,875,000)	--
Net Cash Provided by (Used in) Noncapital Financing Activities	<u>75,000</u>	<u>(75,000)</u>	<u>(5,800,000)</u>	<u>--</u>	<u>(5,800,000)</u>
Cash Flows from Capital and Related Financing Activities					
Purchase of capital assets	--	--	(281,654)	--	(281,654)
Capital contributions	--	99,900	(99,000)	--	900
Net Cash Provided by (Used in) Capital and Related Financing Activities	<u>--</u>	<u>99,900</u>	<u>(380,654)</u>	<u>--</u>	<u>(280,754)</u>
Cash Flows from Investing Activities					
Return of principal on investments	--	--	663,488	--	663,488
CPACE program loan disbursements	--	--	(86,000)	--	(86,000)
Grid Tied program loan disbursements	--	--	(2,625,000)	--	(2,625,000)

NOTES TO FINANCIAL STATEMENTS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

NOTE 1 - NATURE OF OPERATIONS AND SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

CONDENSED, COMBINING INFORMATION – STATEMENT OF CASH FLOWS (CONTINUED)

	CEFIA Solar Loan I LLC	CEFIA Holdings LLC	CEFIA	Eliminating Entries	Total Primary Government
Cash Flows from Investing Activities (Continued)					
Operational Demo program loan disbursements	\$ --	\$ --	\$ (100,000)	\$ --	\$ (100,000)
Interest on short-term investments and cash deposits	--	--	116,831	--	116,831
Interest on solar lease notes	--	--	583,942	--	583,942
Residential Solar Loan program disbursements	(20,596)	--	--	--	(20,596)
Net Cash Provided by (Used in) Investing Activities	<u>(20,596)</u>	<u>--</u>	<u>(1,446,739)</u>	<u>--</u>	<u>(1,467,335)</u>
Net Increase (Decrease) in Cash and Cash Equivalents	54,342	24,786	(557,507)	--	(478,380)
Cash and Cash Equivalents - Beginning of Year	<u>--</u>	<u>--</u>	<u>73,213,594</u>	<u>--</u>	<u>73,213,594</u>
Cash and Cash Equivalents - End of Year	<u>\$ 54,342</u>	<u>\$ 24,786</u>	<u>\$ 72,656,087</u>	<u>\$ --</u>	<u>\$ 72,735,214</u>
Reconciliation of Operating Loss to Net Cash Provided by (Used in) Operating Activities:					
Operating income (loss)	\$ (62)	\$ (114)	\$ 17,897,401	\$ --	\$ 17,897,225
Adjustments to reconcile operating loss to net cash provided by (used in) operating activities:					
Depreciation	--	--	79,364	--	79,364
Changes in operating assets and liabilities:					
Receivables, notes, renewable credits	--	--	(1,734,798)	--	(1,734,798)
Increase in liabilities:					
Accounts payable, accrued expenses, deferred revenue and due to related parties	--	--	(9,172,082)	--	(9,172,082)
Net Cash Provided by (Used in) Operating Activities	<u>\$ (62)</u>	<u>\$ (114)</u>	<u>\$ 7,069,885</u>	<u>\$ --</u>	<u>\$ 7,069,709</u>

NOTES TO FINANCIAL STATEMENTS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

NOTE 1 - NATURE OF OPERATIONS AND SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)*MEASUREMENT FOCUS, BASIS OF ACCOUNTING AND FINANCIAL STATEMENT PRESENTATION*

CEFIA is considered to be an enterprise fund. Enterprise funds are used to account for governmental activities that are similar to those found in the private sector in which the determination of net income is necessary or useful to sound financial administration.

In its accounting and financial reporting, CEFIA follows Governmental Accounting Standards Board (GASB) Statement No. 62, *GASB Codification of Accounting and Financial Reporting Guidance Contained in Pre-November 30, 1989 FASB and AICPA Pronouncements* which incorporates into GASB guidance pre-November 30, 1989 FASB Statements and Interpretations and Accounting Principles Board (APB) Opinions and Research Bulletins which do not conflict or contradict GASB statements.

BASIS OF PRESENTATION

CEFIA's financial statements are reported using the economic resources measurement focus and accrual basis of accounting. Revenues are recognized when earned, and expenses are recognized when the liability is incurred, regardless of the timing of the related cash flows.

OPERATING VS. NON-OPERATING REVENUE (EXPENSE)

CEFIA distinguishes operating revenues and expenses from non-operating items. Operating revenues consist of utility customer assessments, grants for operating activities, and other revenue generated in connection with investments in clean energy programs. Operating expenses consist of operating costs, including depreciation on capital assets and grants and programs. Non-operating revenue (expense) consists of investment earnings, gains, and losses.

USE OF ESTIMATES

Management uses estimates and assumptions in preparing these financial statements in accordance with accounting principles generally accepted in the United States of America. Those estimates and assumptions affect certain reported amounts and disclosures in the financial statements. The most significant estimates are the determination of the fair value of its investments. Actual results could vary from the estimates that were used.

USE OF RESTRICTED VS. NON-RESTRICTED RESOURCES

When both restricted and unrestricted amounts are available for use, it is CEFIA's policy to use unrestricted resources first and then restricted resources for their intended purposes.

NOTES TO FINANCIAL STATEMENTS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

NOTE 1 - NATURE OF BUSINESS AND SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)*RECLASSIFICATIONS*

Certain amounts in the 2012 financial statements have been reclassified to conform to the 2013 presentation.

CASH AND CASH EQUIVALENTS

Cash equivalents consist of cash and highly liquid short-term investments with an original term of 90 days when purchased and are recorded at cost, which approximates fair value.

CAPITAL ASSETS

Capital asset acquisitions exceeding \$500 are capitalized at cost. Maintenance and repair expenses are charged to operations when incurred. Depreciation is computed using straight-line methods over the estimated useful lives of the assets, which range from two to five years. Leasehold improvements are amortized over the shorter of their useful life or the lease term.

For capital assets sold or otherwise disposed of, the cost and related accumulated depreciation and amortization are removed from the accounts, and any related gain or loss is reflected in income for the period.

PORTFOLIO INVESTMENTS

CEFIA carries all investments at fair value. Fair value is defined as the price that would be received to sell an asset or paid to transfer liability by in an orderly transaction between market participants at the measurement date. As discussed in Note 4, CEFIA's portfolio investments are managed by CI. Fair value is determined by CI's independent valuation committee ("Committee") using United States Private Equity Valuation Guidelines promulgated by the Private Equity Investment Guidelines Group. In the absence of readily determinable market values, the Committee gives consideration to pertinent information about the companies comprising these investments, including, but not limited to, recent sales prices of the issuer's securities, sales growth, progress toward business goals and other operating data. CI has applied procedures in arriving at the estimate of the value of such securities that it believes are reasonable and appropriate. CEFIA management reserves the right to establish a reserve in addition to the reserve recommended by the Committee to further account for current market conditions and volatility. Due to the inherent uncertainty of valuation, those estimated values may differ significantly from the amounts ultimately realized from the investments, and the differences could be material. CEFIA reports gains as realized and unrealized consistent with the practice of venture capital firms. The calculation of realized gains and losses is independent of the calculation of the net change in investment value.

NOTES TO FINANCIAL STATEMENTS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

NOTE 1 - NATURE OF BUSINESS AND SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

All of CEFIA's portfolio investments are uninsured against loss and unregistered, and are held in the administrator's name.

NET POSITION

Net position of CEFIA is presented in the following three categories:

- *Net Position Invested in Capital Assets* represent capital assets, net of accumulated depreciation that are attributable to those particular assets.
- *Restricted Net Position* represent assets whose use is restricted through external restrictions imposed by creditors, grantors, contributors and the like, or through restrictions imposed by laws or through constitutional provisions or enabling legislature, and includes equity interest within CEFIA's component units.
- *Unrestricted Net Position* represents assets which do not meet the definition of the two preceding categories.

GRANTS AND PROGRAMS

Expenditures for grants and programs are recorded upon the submission of invoices and other supporting documentation and approval by management. Salaries, benefits and overhead expenses are allocated to program expenses based on job functions.

SUBSEQUENT EVENTS

CEFIA has performed a review of events subsequent to the statement of net position date through **December ____, 2013**, the date of the financial statements where available to be issued. No events requiring recording or disclosure in the financial statements were identified.

NOTE 2 - FAIR VALUE MEASUREMENTS

Fair value is defined as the price that would be received to sell an asset or paid to transfer a liability in an orderly transaction between market participants. In determining fair value, CEFIA utilizes valuation techniques that maximize the use of observable inputs and minimize the use of unobservable inputs. CEFIA also considers nonperformance risk in the overall assessment of fair value.

NOTES TO FINANCIAL STATEMENTS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

NOTE 2 - FAIR VALUE MEASUREMENTS (CONTINUED)

Auditing standards establishes a three tier valuation hierarchy for fair value disclosure purposes. This hierarchy is based on the transparency of the inputs utilized for the valuation. The three levels are defined as follows:

Level 1: Unadjusted quoted prices in active markets that are accessible at the measurement date for identical assets of liabilities.

Level 2: Inputs other than quotes prices in active markets for identical assets and liabilities that are observable either directly or indirectly for substantially the full term of the asset or liability. Level 2 inputs include the following:

- Quotes prices for similar assets and liabilities in active markets
- Quotes prices for identical or similar assets or liabilities in markets that are not active
- Observable inputs other than quotes prices that are used in the valuation of the asset or liability (e.g., interest rate and yield curve quotes at commonly quotes intervals)
- Inputs that are derived principally from or corroborated by observed market data by correlation or other means

Level 3: Unobservable inputs for the asset or liability (supported by little or no market activity). Level 3 inputs include management's own assumptions about the assumptions that market participants would use in pricing the asset or liability (including assumptions about risk).

The asset or liability's fair value measurement level within the fair value hierarchy is based on the lowest level of any input that is significant to the fair value measurement. Valuation techniques used need to maximize the use of observable inputs and minimize the use of unobservable inputs.

The preceding methods described may produce a fair value calculation that may not be indicative of net realizable value or reflective of future fair values. Furthermore, although CEFIA believes its valuation methods are appropriate and consistent with other market participants, the use of different methodologies or assumptions to determine the fair value of certain financial instruments could result in a different fair value measurement at the reporting date.

NOTES TO FINANCIAL STATEMENTS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

NOTE 2 - FAIR VALUE MEASUREMENTS (CONTINUED)

The following table sets forth by level, within the fair value hierarchy, CEFIA's fair value measurements at June 30, 2013:

<i>Investment assets at Fair Value as of June 30, 2013</i>				
	Level 1	Level 2	Level 3	Total
Cash and cash equivalents	\$ 77,641,670	\$ --	\$ --	\$ 77,641,670
Portfolio investments	--	--	4,788,094	4,788,094
	<u>\$ 77,641,670</u>	<u>\$ --</u>	<u>\$ 4,788,094</u>	<u>\$ 82,429,764</u>
	Level 1	Level 2	Level 3	Total
Primary Government:				
Cash and cash equivalents	\$ 72,735,214	\$ --	\$ --	\$ 72,735,214
Portfolio investments	--	--	4,788,094	4,788,094
Discretely Presented Component Units:				
CEFIA Solar Services, Inc.	--	--	--	--
CT Solar Lease 2 LLC				
Cash and cash equivalents	4,906,456	--	--	4,906,456
	<u>\$ 77,641,670</u>	<u>\$ --</u>	<u>\$ 4,788,094</u>	<u>\$ 82,429,764</u>

The following table sets forth by level, within the fair value hierarchy, CEFIA's fair value measurements at June 30, 2012:

<i>Investment assets at Fair Value as of June 30, 2012</i>				
	Level 1	Level 2	Level 3	Total
Cash and cash equivalents	\$ 73,213,594	\$ --	\$ --	\$ 73,213,594
Portfolio investments	--	--	2,155,525	2,155,525
	<u>\$ 73,213,594</u>	<u>\$ --</u>	<u>\$ 2,155,525</u>	<u>\$ 75,369,119</u>

All of the above amounts as of June 30, 2012 pertained to the primary government.

There were no transfers between levels during the years ended June 30, 2013 and 2012.

NOTES TO FINANCIAL STATEMENTS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

NOTE 2 - FAIR VALUE MEASUREMENTS (CONTINUED)

The following is a reconciliation, for the primary government, of the beginning and ending balances of recurring fair value measurements recognized in the accompanying statements of net assets available for benefits using significant unobservable (Level 3) inputs:

	2013	2012
Balance - beginning of year	\$ 2,155,525	\$ 1,698,715
Purchases - CEFIA program promissory notes	2,254,510	--
Purchases - equity investments	--	22,107
Unrealized appreciation in value of investments	<u>378,059</u>	<u>434,703</u>
Balance - end of year	<u>\$ 4,788,094</u>	<u>\$ 2,155,525</u>

NOTE 3 - CASH AND CASH EQUIVALENTS

The following is a summary of cash and cash equivalents at June 30:

	2013	2012
Checking	\$ 1,846,114	\$ 4,050,160
State Treasurer's Short-Term Investment Fund	<u>66,258,900</u>	<u>60,687,137</u>
Unrestricted cash and cash equivalents	68,105,014	64,737,297
Checking - restricted	1,569,975	112,588
Money Market - restricted	3,500,000	--
State Treasurer's Short-Term Investment Fund - restricted	<u>4,466,681</u>	<u>8,363,709</u>
Total cash and cash equivalents	<u>\$ 77,641,670</u>	<u>\$ 73,213,594</u>

NOTES TO FINANCIAL STATEMENTS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

NOTE 3 - CASH AND CASH EQUIVALENTS (CONTINUED)

	Primary Government	CT Solar Lease 2 LLC	CEFIA Solar Services, Inc.	Total
Checking	\$ 1,439,658	\$ 406,456	\$ --	\$ 1,846,114
State Treasurer's Short-Term Investment Fund	<u>66,258,900</u>	<u>--</u>	<u>--</u>	<u>66,258,900</u>
Unrestricted Cash and Cash Equivalents	67,698,558	406,456	--	68,105,014
Restricted Cash				
Checking	569,975	1,000,000	--	1,569,975
Money market	--	3,500,000	--	3,500,000
State Treasurer's Short-Term Investment Fund	<u>4,466,681</u>	<u>--</u>	<u>--</u>	<u>4,466,681</u>
	<u>\$ 72,735,214</u>	<u>\$ 4,906,456</u>	<u>\$ --</u>	<u>\$ 77,641,670</u>

All cash and cash equivalents as of June 30, 2012 were that of the primary government.

STATE TREASURER'S SHORT-TERM INVESTMENT FUND

The State Treasurer's Short-Term Investment Fund is a Standard & Poors AAAM investment pool of high-quality, short-term money market instruments managed by the Cash Management Division of the State Treasurer's Office. It is the investment vehicle for the operating cash of the State of Connecticut Treasury, state agencies and authorities, municipalities, and other political subdivisions of the State. The value of CEFIA's position in the pool is the same as the value of pool shares. Regulatory oversight is provided by an investment advisory council and the State Treasurer's Cash Management Board.

INVESTMENT MATURITIES

The State Treasurer's Short-Term Investment Fund has no maturity date and is available for withdrawal on demand.

INTEREST RATE RISK

CEFIA manages its exposure to declines in fair value by limiting the average maturity of its cash and cash equivalents to no more than one year.

NOTES TO FINANCIAL STATEMENTS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

NOTE 3 - CASH AND CASH EQUIVALENTS (CONTINUED)

CREDIT RISK

Connecticut General Statutes authorize CEFIA to invest in obligations of the U.S. Treasury including its agencies and instrumentalities, commercial paper, banker’s acceptance, repurchase agreements and the State Treasurer’s Short-Term Investment Fund.

Investment ratings for the Fund’s investment is as follows:

	Moody's Investors Service	Standard & Poor's
State Treasurer's Short-Term Investment Fund	Aaa	AAAm

CONCENTRATION OF CREDIT RISK

CEFIA’s investment policy does not limit the investment in any one investment vehicle. The State Treasurer’s Short-term Investment Fund is not subject to this disclosure.

CUSTODIAL CREDIT RISK - DEPOSITS

In the case of deposits, this represents the risk that, in the event of a bank failure, CEFIA’s deposits may not be returned to it. CEFIA does not have a deposit policy for custodial credit risk. As of June 30, 2013, \$6,940,198 of CEFIA’s bank balances were exposed to custodial credit risk (primary government \$2,283,742, CT Solar Lease 2 LLC \$4,656,456). Funds held by banks on behalf of CT Solar Lease 2 LLC include a contractual requirement to maintain \$4,500,000 in deposits with financial institutions participating in the CEFIA Solar Lease Program which represent loan loss and lease maintenance reserves.

CUSTODIAL CREDIT RISK - INVESTMENTS

For an investment, this represents the risk that, in the event of the failure of the counterparty, CEFIA will not be able to recover the value of the investment. As of June 30, 2013 and 2012, the Fund has no reportable custodial risk.

NOTES TO FINANCIAL STATEMENTS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

NOTE 4 - PORTFOLIO INVESTMENTS

The former Connecticut Clean Energy Fund (CCEF) invested in emerging technology companies as equity investments and Alpha and Operational Demonstration programs and projects. As of June 30, 2013, portfolio investments represent equity and debt investments in eleven companies. Based on a memorandum of understanding between CEFIA and CI, and CI manages these investments on behalf of CEFIA.

NOTE 5 - RELATED PARTY TRANSACTIONS AND OPERATING LEASES*RELATED PARTY TRANSACTIONS*

CEFIA utilizes the services of CI, as provided in the General Statutes of the State of Connecticut. CI provides services to CEFIA, at cost, for its operations. Such services include, but are not limited to, staff for accounting and information technology support, office space, equipment, supplies and insurance. Expenses billed to CEFIA by CI totaled \$880,741 and \$1,868,098 for the years ended June 30, 2013 and 2012, respectively. As of June 30, 2013 and 2012, amounts due to CI were \$21,396 and \$94,340, respectively. During 2013, CI staff managing CEFIA programs transferred to CEFIA.

Pursuant to state statute, CEFIA is subject to fringe benefit charges for pension plan and medical plan contributions which are paid at the state level. CEFIA's employer payroll taxes are also paid at the state level. CEFIA reimburses the state for these payments. The reimbursement for 2013 and 2012 comprised 66.25% and 63.0%, respectively, of gross salaries.

OPERATING LEASES

CEFIA sub leases its main office space from CI under a non-cancellable Memorandum of Understanding (MOU). The MOU calls for monthly payments of \$12,213 with escalating payments through December 2020. CEFIA also leases additional office space from an unaffiliated entity which calls for monthly payments of \$7,333, with escalating payments through December 2020.

NOTES TO FINANCIAL STATEMENTS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

NOTE 5 - RELATED PARTY TRANSACTIONS AND OPERATING LEASES (CONTINUED)

Future minimum lease payments for office rentals are as follows:

<u>Years ending June 30,</u>	
2014	\$ 237,678
2015	243,928
2016	250,176
2017	256,424
2018	221,838
Thereafter	<u>683,234</u>
	<u>\$ 1,893,278</u>

Rent expense for the years ended June 30, 2013 and 2012 was \$145,947 and \$161,612, respectively.

In addition, CEFIA leases office equipment on a month-to-month basis. Rent expense related to the office equipment for the years ended June 30, 2013 and 2012 was \$7,344 and \$799, respectively.

NOTES TO FINANCIAL STATEMENTS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

NOTE 6 - CAPITAL ASSETS

Capital asset activity for year ended June 30, 2013 is as follows:

	Balance, July 1, 2012	Additions	Deletions	Adjustments	Balance, June 30, 2013
Capital assets being depreciated:					
Furniture and equipment	\$ 13,049	\$ 188,068	\$ --	\$ 134,627	\$ 335,744
Computer hardware and software	28,460	43,010	--	--	71,470
Leasehold improvements	56,224	80,395	--	40	136,659
	<u>97,733</u>	<u>311,473</u>	<u>--</u>	<u>134,667</u>	<u>543,873</u>
Less accumulated depreciation and amortization:					
Furniture and equipment	626	11,267	--	134,667	146,560
Computer hardware and software	3,807	14,286	--	--	18,093
Leasehold improvements	1,971	14,744	--	--	16,715
	<u>6,404</u>	<u>40,297</u>	<u>--</u>	<u>134,667</u>	<u>181,368</u>
Capital assets, net	<u>\$ 91,329</u>	<u>\$ 271,176</u>	<u>\$ --</u>	<u>\$ --</u>	<u>\$ 362,505</u>

Capital asset activity for year ended June 30, 2012 is as follows:

	Balance, July 1, 2011	Additions	Deletions	Adjustments	Balance, June 30, 2012
Capital assets being depreciated:					
Furniture and equipment	\$ --	\$ 13,049	\$ --	\$ --	\$ 13,049
Computer hardware and software	--	28,460	--	--	28,460
Leasehold improvements	--	56,224	--	--	56,224
	<u>--</u>	<u>97,733</u>	<u>--</u>	<u>--</u>	<u>97,733</u>
Less accumulated depreciation and amortization:					
Furniture and equipment	--	626	--	--	626
Computer hardware and software	--	3,807	--	--	3,807
Leasehold improvements	--	1,971	--	--	1,971
	<u>--</u>	<u>6,404</u>	<u>--</u>	<u>--</u>	<u>6,404</u>
Capital assets, net	<u>\$ --</u>	<u>\$ 91,329</u>	<u>\$ --</u>	<u>\$ --</u>	<u>\$ 91,329</u>

All capital assets are that of the primary government.

NOTES TO FINANCIAL STATEMENTS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

NOTE 7 - GRANT PROGRAMS

CEFIA, the primary government, recognizes grant revenue based on expenditures or fulfillment of program requirements. For the year ended June 30, 2013, CEFIA recognized related grant revenue of \$9,999,250 under Department of Energy programs and \$36,000 under a program sponsored by a private foundation.

NOTE 8 - COMMITMENTS

As of June 30, 2013 and 2012, the Board of Directors designated a portion of CEFIA's unrestricted net position to fund financial incentives for specific commercial and residential projects in the following areas:

	2013	2012
CPACE	\$ 1,458,455	\$ --
Education and outreach	1,305,165	1,219,336
Fuel cells	4,944,157	6,320,367
Geothermal and Solar Thermal	1,036,986	1,095,689
Campus Efficiency NOW Program	1,000,000	--
Operation Demonstration Programs	1,381,974	1,397,895
Other technologies	1,064,500	246,340
Project 150 and Pre-Development Programs	1,500,000	7,487,145
Solar	<u>10,795,323</u>	<u>8,082,471</u>
	<u>\$ 24,486,560</u>	<u>\$ 25,849,243</u>

These incentives are expected to be paid over the next one to six fiscal years and are contingent upon the completion of performance milestones by the recipient of the incentive.

In addition, at June 30, 2013, the Board of Directors through various resolutions has made available an additional \$33,842,000 of unrestricted net position to fund the following programs for which specific commercial and residential projects have not yet been identified:

CPACE	\$ 16,463,000
Solar loan programs	10,179,000
Solar lease program	<u>7,200,000</u>
	<u>\$ 33,842,000</u>

All commitments are those of the primary government.

NOTES TO FINANCIAL STATEMENTS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

NOTE 9 - PENSION PLAN

All employees of the CEFIA participate in the State Employees' Retirement System (SERS), which is administered by the State Employees' Retirement Commission. The CEFIA has no liability for pension costs other than the annual contribution. In addition, an actuarial study was performed on the plan as a whole and does not separate information for employees of the CEFIA. Therefore, certain pension disclosures otherwise required pursuant to accounting principles generally accepted in the United States of America are omitted. Information on the total plan funding status and progress, contribution required and trend information can be found in the State of Connecticut's Comprehensive Annual Financial Report.

PLAN DESCRIPTION

SERS is a single-employer defined benefit public employee retirement system (PERS) established in 1939 and governed by Sections 5-152 and 5-192 of the Connecticut General Statutes. Employees are covered under one of three tiers. Tier I and Tier IIA are contributory plans, and Tier II is a noncontributory plan.

Members who joined the retirement system prior to July 1, 1984 are enrolled in Tier I. Tier I employees who retire at or after age 65 with 10 years of credited service, at or after age 55 with 25 years of service, or at age 55 with 10 years of credited service with reduced benefits are entitled to an annual retirement benefit payable monthly for life, in an amount of 2 percent of the annual average earnings (which are based on the three highest earning years of service) over \$4,800 plus 1 percent of \$4,800 for each year of credited service. Tier II employees who retire at or after age 60 with 25 years of service, or at age 62 with 10 years of service, or at age 65 with 5 years of service, are entitled to one and one-third percent of the average annual earnings plus one-half of one percent of the average annual earnings in excess of the salary breakpoint in the year of retirement for each year of credited service. Tier II employees between the ages of 55 and 62 with 10 years but less than 25 years of service may retire with reduced benefits. In addition, Tier II and Tier IIA members with at least five but less than ten years of actual state service who terminate their state employment July 2, 1997 or later and prior to attaining age 62 will be in deferred vested status and may commence receipt of normal retirement benefits on the first of the month on or following their sixty-fifth (65) birthday.

Employees hired on and after July 1, 1997, will become members of Tier IIA. Tier IIA plan is essentially the existing Tier II plan with the exception that employee contributions of 2 percent of salary are required. Tier I members are vested after ten years of service, while Tier II and Tier IIA members may be vested after five years of service under certain conditions, and all three plans provide for death and disability benefits.

NOTES TO FINANCIAL STATEMENTS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

NOTE 9 - PENSION PLAN (CONTINUED)

PLAN DESCRIPTION (CONTINUED)

Employees hired on or after July 1, 2011 are covered under the Tier III plan. Tier III requires employee contributions of two percent of salary up to a \$250,000 limit after which no additional contributions will be taken on earnings above this limit. The normal retirement date will be the first of any month on or after age 63 if the employee has at least 25 years of vested service or age 65 if the employee has at least 10 but less than 25 years of vested service. Tier III members who have at least 10 years of vested service can receive early reduced retirement benefits if they retire on the first of any month on or following their 58th birthday. Tier III normal retirement benefits include annual retirement benefits for life, in the amount of one and one-third percent of the five year average annual earnings plus one-half of one percent of the five year average annual earnings in excess of the salary breakpoint in the year of retirement for each year of credited service plus one and five-eighths of the five year annual average salary times years of credited service over 35 years.

The total payroll for employees of the CEFIA covered by SERS for the year ended June 30, 2013 was \$2,517,190.

CONTRIBUTIONS MADE

CEFIA's contribution is determined by applying a State mandated percentage to eligible salaries and wages as follows:

	2013	2012
Contributions made:		
By employees	\$ 104,214	\$ 59,034
Percent of current year covered payroll	4.1%	3.8%
By CEFIA	\$ 1,125,649	\$ 601,014
Percent of current year covered payroll	44.7%	39.0%

NOTES TO FINANCIAL STATEMENTS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

NOTE 10 - RESTRICTED NET POSITION (PRIMARY GOVERNMENT)

Restricted net position at June 30, 2013 consisted of the following:

Non-expendable	
CEFIA component units equity interest	\$ <u>1,000</u>
Energy Programs	
Assets restricted to fund maintenance of a fuel cell for a Connecticut municipality	\$ 176,974
Assets restricted for maintaining loan loss and interest rate reserves (Note 1)	<u>7,966,681</u>
	<u>\$ 8,143,655</u>

NOTE 11 - RISK MANAGEMENT

CEFIA is subject to normal risks associated with its operations including property damage, personal injury and employee dishonesty. All risks are managed through the purchase of commercial insurance. There have been no losses exceeding insurance coverage, and there have been no decreases in insurance coverage over the last three years.

NOTE 12 - RENEWABLE ENERGY CREDITS (PRIMARY GOVERNMENT)

CEFIA owns Class 1 Renewable Energy Certificates (RECs) that are generated by certain renewable energy facilities for which CEFIA provided the initial funding. On October 22, 2010, CEFIA entered into an agreement to sell a total of 10,000 RECs generated, or to be generated, during the period January 1 to December 31, 2013 at a price of \$15.00 per REC, totaling \$150,000.

RECs trade on the New England Power Pool (NEPOOL) market. The market price of Connecticut Class 1 RECs as of June 30, 2013 ranged from \$54.00 to \$55.00. However CEFIA's inventory as of June 30, 2013 has been priced at the sales price per the agreements. Based on historical performance, management believes that the RECs it will receive from its funded facilities through December 31, 2013 will exceed its commitment to sell under this agreement.

NOTES TO FINANCIAL STATEMENTS

FOR THE YEARS ENDED JUNE 30, 2013 AND 2012

NOTE 13 - TRANSFER OF ASSETS FROM THE STATE OF CONNECTICUT CLEAN ENERGY FUND (2012)

The Clean Energy Finance and Investment Authority (CEFIA) was established in July 2011 under Title 16, Sec. 16-245n of the General Statutes of the State of Connecticut as the successor entity of the Connecticut Clean Energy Fund. In connection with the succession, below is the detail of amounts transferred into CEFIA by the Clean Energy Fund as of July 1, 2011:

Assets:	
Current	\$ 63,203,685
Non-current	<u>13,792,179</u>
Total	<u>\$ 76,995,864</u>
Liabilities:	
Current	<u>\$ 4,215,625</u>
Net Position:	
Restricted	233,875
Unrestricted	<u>72,546,364</u>
Total	<u>\$ 72,780,239</u>

REPORT ON INTERNAL CONTROL OVER FINANCIAL REPORTING AND ON COMPLIANCE AND OTHER MATTERS BASED ON AN AUDIT OF FINANCIAL STATEMENTS PERFORMED IN ACCORDANCE WITH *GOVERNMENT AUDITING STANDARDS*

To the Board of Directors
Clean Energy Finance and Investment Authority

We have audited, in accordance with auditing standards generally accepted in the United States of America and the standards applicable to financial audits contained in *Government Auditing Standards* issued by the Comptroller General of the United States, the financial statements of the Clean Energy Finance and Investment Authority (a component unit of the State of Connecticut), as of and for the year ended June 30, 2013, which comprise the statement of net position as of June 30, 2013, and the related statements of revenues, expenses and changes in net position and statement of cash flows for the year then ended, and the related notes to the financial statements and have issued our report thereon dated **December XX, 2013**.

INTERNAL CONTROL OVER FINANCIAL REPORTING

In planning and performing our audit of the financial statements, we considered the Clean Energy Finance and Investment Authority's internal control over financial reporting (internal control) to determine the audit procedures that are appropriate in the circumstances for the purpose of expressing our opinion on the financial statements, but not for the purpose of expressing an opinion on the effectiveness of the Clean Energy Finance and Investment Authority's internal control. Accordingly, we do not express an opinion on the effectiveness of the Clean Energy Finance and Investment Authority's internal control.

A deficiency in internal control exists when the design or operation of a control does not allow management or employees, in the normal course of performing their assigned functions, to prevent, or detect and correct misstatements on a timely basis. A *material weakness* is a deficiency, or a combination of deficiencies, in internal control such that there is a reasonable possibility that a material misstatement of the entity's financial statements will not be prevented, or detected and corrected on a timely basis. A *significant deficiency* is a deficiency, or a combination of deficiencies, in internal control less severe than a material weakness, yet important enough to merit attention by those charged with governance.

Our consideration of internal control over financial reporting was for the limited purpose described in the first paragraph of this section and was not designed to identify all deficiencies in internal control over financial reporting that might be material weaknesses or significant deficiencies. Given these limitations, during our audit we did not identify any deficiencies in internal control that we consider to be material weaknesses. However, material weaknesses may exist that have not been identified.

COMPLIANCE AND OTHER MATTERS

As part of obtaining reasonable assurance about whether the Clean Energy Finance and Investment Authority's financial statements are free of material misstatement, we performed tests of its compliance with certain provisions of laws, regulations, contracts, and grant agreements, noncompliance with which could have a direct and material effect on the determination of financial statement amounts. However, providing an opinion on compliance with those provisions was not an objective of our audit and, accordingly, we do not express such an opinion. The results of our tests disclosed no instances of noncompliance or other matters that are required to be reported under *Government Auditing Standards*.

PURPOSE OF THIS REPORT

The purpose of this report is solely to describe the scope and testing of internal control and compliance and results of that testing, and not to provide an opinion on the effectiveness of the entity's internal control or on compliance. This report is an integral part of an audit performed in accordance with *Government Auditing Standards* in considering the entity's internal control and compliance. Accordingly, this communication is not suitable for any other purpose.

Hartford, CT
December XX, 2013

DRAFT

**CLEAN ENERGY FINANCE AND
INVESTMENT AUTHORITY**
(A Component Unit of the State of Connecticut)

**REPORTING UNDER *GOVERNMENT AUDITING STANDARDS*
AND
REPORTING REQUIRED UNDER FEDERAL CIRCULAR OMB A-133**

FOR THE YEAR ENDED JUNE 30, 2013

**CLEAN ENERGY FINANCE AND
INVESTMENT AUTHORITY**

DRAFT

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**REPORT ON INTERNAL CONTROL OVER FINANCIAL
REPORTING AND ON COMPLIANCE AND OTHER
MATTERS BASED ON AN AUDIT OF FINANCIAL
STATEMENTS PERFORMED IN ACCORDANCE WITH
GOVERNMENT AUDITING STANDARDS**

To the Board of Directors
Clean Energy Finance and Investment Authority

We have audited, in accordance with auditing standards generally accepted in the United States of America and the standards applicable to financial audits contained in *Government Auditing Standards* issued by the Comptroller General of the United States, the financial statements of the business-type activities and discretely presented component units of the Clean Energy Finance and Investment Authority (a component unit of the State of Connecticut), as of and for the year ended June 30, 2013 and the related notes to the financial statements, which collectively comprise the Clean Energy Finance and Investment Authority financial statements, and have issued our report thereon dated December __, 2013.

INTERNAL CONTROL OVER FINANCIAL REPORTING

In planning and performing our audit of the financial statements, we considered the Clean Energy Finance and Investment Authority's internal control over financial reporting (internal control) to determine the audit procedures that are appropriate in the circumstances for the purpose of expressing our opinion on the financial statements, but not for the purpose of expressing an opinion on the effectiveness of the Clean Energy Finance and Investment Authority's internal control. Accordingly, we do not express an opinion on the effectiveness of the Clean Energy Finance and Investment Authority's internal control.

A *deficiency in internal control* exists when the design or operation of a control does not allow management or employees, in the normal course of performing their assigned functions, to prevent, or detect and correct misstatements on a timely basis. A *material weakness* is a deficiency, or a combination of deficiencies, in internal control such that there is a reasonable possibility that a material misstatement of the entity's financial statements will not be prevented, or detected and corrected on a timely basis. A *significant deficiency* is a deficiency, or a combination of deficiencies, in internal control less severe than a material weakness, yet important enough to merit attention by those charged with governance.

Our consideration of internal control over financial reporting was for the limited purpose described in the first paragraph of this section and was not designed to identify all deficiencies in internal control over financial reporting that might be material weaknesses or significant deficiencies. Given these limitations, during our audit we did not identify any deficiencies in internal control, that we consider to be material weaknesses. However, material weaknesses may exist that have not been identified.

COMPLIANCE AND OTHER MATTERS

As part of obtaining reasonable assurance about whether the Clean Energy Finance and Investment Authority's financial statements are free of material misstatement, we performed tests of its compliance with certain provisions of laws, regulations, contracts, and grant agreements, noncompliance with which could have a direct and material effect on the determination of financial statement amounts. However, providing an opinion on compliance with those provisions was not an objective of our audit and, accordingly, we do not express such an opinion. The results of our tests disclosed no instances of noncompliance or other matters that are required to be reported under *Government Auditing Standards*.

PURPOSE OF THIS REPORT

The purpose of this report is solely to describe the scope and testing of internal control and compliance and results of that testing, and not to provide an opinion on the effectiveness of the entity's internal control or on compliance. This report is an integral part of an audit performed in accordance with Government auditing Standards in considering the entity's internal control and compliance. Accordingly, this communication is not suitable for any other purpose.

Hartford, CT
December __, 2013

**REPORT ON COMPLIANCE FOR EACH MAJOR FEDERAL PROGRAM;
REPORT ON INTERNAL CONTROL OVER COMPLIANCE;
AND REPORT ON SCHEDULE OF EXPENDITURES OF
FEDERAL AWARDS REQUIRED BY OMB CIRCULAR A-133**

To the Board of Directors
Clean Energy Finance and Investment Authority

Report on Compliance for Each Major Federal Program

We have audited the Clean Energy Finance and Investment Authority's ("CEFIA") compliance with the types of compliance requirements described in the *OMB Circular A-133 Compliance Supplement* that could have a direct and material effect on each of CEFIA's major federal programs for the year ended June 30, 2013. CEFIA's major federal programs are identified in the summary of auditors' results section of the accompanying schedule of findings and questioned costs.

Management's Responsibility

Management is responsible for compliance with the requirements of laws, regulations, contracts, and grants applicable to its federal programs.

Auditor's Responsibility

Our responsibility is to express an opinion on compliance for each of CEFIA's major federal programs based on our audit of the types of compliance requirements referred to above. We conducted our audit of compliance in accordance with auditing standards generally accepted in the United States of America; the standards applicable to financial audits contained in *Government Auditing Standards*, issued by the Comptroller General of the United States; and OMB Circular A-133, *Audits of States, Local Governments, and Non-Profit Organizations*. Those standards and OMB Circular A-133 require that we plan and perform the audit to obtain reasonable assurance about whether noncompliance with the types of compliance requirements referred to above that could have a direct and material effect on a major federal program occurred. An audit includes examining, on a test basis, evidence about CEFIA's compliance with those requirements and performing such other procedures as we considered necessary in the circumstances.

We believe that our audit provides a reasonable basis for our opinion on compliance for each major federal program. However, our audit does not provide a legal determination of CEFIA's compliance.

Opinion on Each Major Federal Program

In our opinion, CEFIA complied, in all material respects, with the types of compliance requirements referred to above that could have a direct and material effect on each of its major federal programs for the year ended June 30, 2013.

Report on Internal Control Over Compliance

Management of CEFIA is responsible for establishing and maintaining effective internal control over compliance with the types of compliance requirements referred to above. In planning and performing our audit of compliance, we considered CEFIA's internal control over compliance with the types of requirements that could have a direct and material effect on each major federal program to determine the auditing procedures that are appropriate in the circumstances for the purpose of expressing an opinion on compliance for each major federal program and to test and report on internal control over compliance in accordance with OMB Circular A-133, but not for the purpose of expressing an opinion on the effectiveness of internal control over compliance. Accordingly, we do not express an opinion on the effectiveness of CEFIA's internal control over compliance.

A deficiency in internal control over compliance exists when the design or operation of a control over compliance does not allow management or employees, in the normal course of performing their assigned functions, to prevent, or detect and correct, noncompliance with a type of compliance requirement of a federal program on a timely basis. *A material weakness in internal control over compliance* is a deficiency, or a combination of deficiencies, in internal control over compliance, such that there is a reasonable possibility that material noncompliance with a type of compliance requirement of a federal program will not be prevented, or detected and corrected, on a timely basis. *A significant deficiency in internal control over compliance* is a deficiency, or a combination of deficiencies, in internal control over compliance with a type of compliance requirement of a federal program that is less severe than a material weakness in internal control over compliance, yet important enough to merit attention by those charged with governance.

Our consideration of internal control over compliance was for the limited purpose described in the first paragraph of this section and was not designed to identify all deficiencies in internal control over compliance that might be material weaknesses or significant deficiencies and therefore, material weaknesses or significant deficiencies may exist that were not identified. We did not identify any deficiencies in internal control over compliance that we consider to be material weaknesses. However, we identified one deficiency in internal control over compliance, as described in the accompanying schedule of findings and questioned costs as finding #2013-1, that we consider to be a significant deficiency.

CEFIA's response to the internal control over compliance finding identified in our audits described in the accompanying management's response in this reporting package. CEFIA's response was not subjected to the auditing procedures applied in the audit of compliance and, accordingly, we express no opinion on the response.

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The purpose of this report on internal control over compliance is solely to describe the scope of our testing of internal control over compliance and the results of that testing based on the requirements of OMB Circular A-133. Accordingly, this report is not suitable of any other purposes.

Report on Schedule of Expenditures of Federal Awards Required by OMB Circular A-133

We have audited the financial statements of CEFIA as of and for the year ended June 30, 2013, and have issued our reported thereon dated _____, 2013, which contained an unmodified opinion on those financial statements. Our audit was conducted for the purpose for forming an opinion on the financial statements as a whole. The accompanying schedule of expenditures of federal awards is presented for purposes of additional analysis as required by OMB Circular A-133 and is not a required part of the financial statements. Such information is the responsibility of management and was derived from and relates directly to the underlying accounting and other records used to prepare the financial statements. The information has been subjected to the auditing procedures applied in the audit of the financial statements and certain additional procedures, including comparing and reconciling such information directly to the underlying accounting and other records used to prepare the additional procedures in accordance with auditing standards generally accepted in the United States of America. In our opinion, the schedule of expenditure of federal awards is fairly stated in all material respects in relation to the financial statements as a whole.

Hartford, CT
December __, 2013

CLEAN ENERGY FINANCE AND
INVESTMENT AUTHORITY

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SCHEDULE OF EXPENDITURES OF FEDERAL AWARDS

FOR THE YEAR ENDED JUNE 30, 2013

Federal Grantor/ Program Title	CFDA Number	Expenditures
Department of Energy		
Passed Through by the State of Connecticut Department of Energy and Environmental Protection:		
State Energy Program (Recovery Act)	81.041	\$ 4,291,250
Energy Efficiency and Conservation Block Grant Program (EECBG) (Recovery Act)	81.128	1,106,720
Energy Efficiency and Renewable Energy Cooperative Agreement (Energy Policy Act)	81.117	<u>436,537</u>
Total Expenditures of Federal Awards		<u>\$ 5,834,507</u>

See Notes to Schedule of Expenditures of Federal Awards.

**CLEAN ENERGY FINANCE AND
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NOTES TO SCHEDULE OF EXPENDITURES OF FEDERAL AWARDS

FOR THE YEAR ENDED JUNE 30, 2013

NOTE 1 – SIGNIFICANT ACCOUNTING POLICIES

BASIS OF PRESENTATION

The accompanying schedule of expenditures of federal awards includes the federal grant activity of the Clean Energy Finance and Investment Authority (CEFIA) and is presented on the accrual basis of accounting and in conformity with the criteria specified by the Department of Energy. The information in this schedule is presented in accordance with the requirements of OMB Circular A-133, *Audits of States, Local Governments and Non-Profit Organizations*.

NOTE 2 – STATE ENERGY PROGRAM (RECOVERY ACT) #81.041

Included within the program's total federal expenditures is \$3,881.050 of funds set aside under written agreements for loan-loss reserves and interest rate buy-down programs with ten banks which participate with CEFIA in financing of solar energy programs. The funds are committed to these loan-loss reserves and interest rate buy-downs for a period of fifteen years and are unavailable for any other use or purpose by CEFIA.

**CLEAN ENERGY FINANCE AND
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SCHEDULE OF FINDINGS AND QUESTIONED COSTS

FOR THE YEAR ENDED JUNE 30, 2013

SECTION I – SUMMARY OF AUDITOR’S RESULTS

Financial Statements

Type of auditor’s report issued: unmodified

Internal control over financial reporting:

- Material weakness(es) identified? yes no
- Significant deficiency(ies) identified? yes none reported

Noncompliance material to financial statements noted? yes no

Federal Awards

Internal control over major programs:

- Material weakness(es) identified? yes no
- Significant deficiency(ies) identified? yes none reported

Type of auditor’s report issued on compliance for major programs: unmodified.

Any audit finding disclosed that are required to be reported in accordance with Section 510(a) of OMB Circular A-133?

yes no

Major Programs:

Funding Source	Program	CDFA No.
U.S. Department of Energy	State Energy Program (Recovery Act)	81.041
	Energy Efficiency and Conservation Block Grant (Recovery Act)	81.128
	Energy Efficiency and Renewable Energy Cooperative Agreement (Recovery Act)	81.117

Dollar Threshold Used to Distinguish Type A and Type B Programs: \$300,000

Qualification of Auditee as a Low-Risk Auditee: Yes

CLEAN ENERGY FINANCE AND
INVESTMENT AUTHORITY

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SCHEDULE OF FINDINGS AND QUESTIONED COSTS

FOR THE YEAR ENDED JUNE 30, 2013

**SECTION II – SUMMARY OF FINDINGS RELATED TO FINANCIAL STATEMENTS REQUIRED UNDER
GENERAL ACCEPTED *GOVERNMENT AUDITING STANDARDS***

- We issued reports, dated December __, 2013, on internal control over financial reporting and on compliance and other matters based on an audit of financial statements performed in accordance with *Government Auditing Standards*.
- Our report on compliance and other matters indicated no reportable instances of noncompliance.
- Our report on internal control over financial reporting indicated no material weaknesses.

SECTION III – FEDERAL AWARD FINDINGS AND QUESTIONED COSTS

Finding #2013-1: Reporting - #84-041 – State Energy Program (ARRA)

Criteria: Expenditure amounts submitted on reports must reflect the correct amounts during the reporting period.

Condition: The Financial Report - Federal Funds submitted by CEFIA to the State of Connecticut Office of Policy and Management for the quarter ended June 30, 2013 did not reflect the correct amount of contractual outlays for the period. The form showed \$4,691,300 but the correct amount should have been \$4,291,250.

Questioned Costs: None

Context and Cause: The report was not reviewed prior to filing and a clerical error went undetected.

Effect: Incorrect information was submitted to the pass-through grantor which can hinder program monitoring.

Recommendation: All future reports should be reviewed for possible errors prior to submission.

Views of Responsible Officials and Planned Corrective Action:

See management's response contained in this reporting package.

**CLEAN ENERGY FINANCE AND
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SUMMARY OF PRIOR YEAR AUDIT FINDINGS

FOR THE YEAR ENDED JUNE 30, 2013

There were no federal award findings in the prior year.



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

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Memo

To: Marcum ,LLP

Re: Federal Award Finding #2013-1

CEFIA management acknowledges finding #2013-1 and is in agreement with the recommendation made. All future reports will be reviewed by CEFIA's legal counsel prior to submission to ensure that all contractual obligations incurred are properly recorded.

Clean Energy Finance and Investment Authority
Financial Analysis
Executive Summary
For the four months ended October 31, 2013

Statement of Income and General Operations and Program Expenses

Revenues for the period totaled \$11,884,100 compared to a budget of \$11,775,500. RGGI auction proceeds to date are \$230,000 greater than anticipated. Utility customer assessments were \$237,600 (2.4%) less than expected. See page 7 for further analysis of utility customer assessments. Other income was approximately \$62,000 greater than anticipated primarily due to payments received as a result of the decommissioning of a gasification project.

Expenses associated with the general operations of CEFIA totaled \$639,000 as compared to a budget of \$764,500 for the period. Generally expenses for operations were in line with budget. Operating expenses by line item were within \$5,000 of the budgeted amount or under budget.

Expenses associated with supporting CEFIA's programs totaled \$2,407,000 as compared to a budget of \$2,558,900. Generally expenses for program administration were in line with budget. Expenses by line item were within \$5,000 of the budgeted amount or under budget. Overall operating expenses for both general operations and program administration were \$3,046,000 compared to a budget of \$3,323,400 which resulted in a favorable budget variance of \$277,400 (8%).

Statement of Assets and CashFlows

Net assets as of October 31, 2013 were \$102,811,300, an increase of \$3,764,700 from June 30, 2013. See page two for an analysis of the changes in net assets for the period. To date \$2,066,700 has been returned to the State Treasurer under legislation enacted at the end of fiscal year 2013. Unrestricted cash balances of \$68,235,100 increased \$438,700 since the beginning of the year. Page four presents a cash flow analysis and listing of unfunded contingent liabilities associated with major programs as of October 31st. The statement of incentives, grants and rebates on page six provides a summary of prior and current year commitments and year to date funding by program. The program investment summary on page 5 provides a detailed list of project financing by program. The largest component of CEFIA's financing efforts to date has been the CPACE program. To date the program has recorded \$14,038,000 in commitments of which \$843,000 has been funded through October 31st.

Clean Energy Finance and Investment Authority
Financial Analysis
Table of Contents
For the four months ended October 31, 2013

<u>Page</u>	<u>Title</u>
1	Statement of Income and General Operations and Program Expenses
2	Statement of Revenues, Expenses and Changes in Net Assets
3	Statement of Net Assets (2 pages)
4	Statement of Cash Flows
5	Statement of Program Investments and Guarantees (3 pages)
6	Statement of Incentives, Grants and Rebates
7	Utility Customer Assessment Analysis
8	ARRA LLR and IRB Reserve Analysis. (2 pages)
9	Statements of Net Assets for CEFIA Component Units

Clean Energy Finance and Investment Authority
Comparison of FY 2014 Budget to Actual
Statement of Income - General Operations and Program Expenses
For the four months ended October 31, 2013

	(000's)								
	Actual FY2014 Gen. Ops	Actual FY2014 Programs	Actual FY2014 Total	Budget FY2014 Gen. Ops	Budget FY2014 Programs	Budget FY2014 Total	(Under) Over Budget	%	
Income									
Utility customer assessments	\$ 9,812.4	\$ -	\$ 9,812.4	\$ 10,050.0	\$ -	\$ 10,050.0	\$ (237.6)	(2%)	
RGGI auction proceeds	\$ 1,705.2	\$ -	\$ 1,705.2	\$ 1,475.0	\$ -	\$ 1,475.0	\$ 230.2	16%	
Interest on bank deposits	\$ 27.1	\$ -	\$ 27.1	\$ 33.0	\$ -	\$ 33.0	\$ (5.9)	(18%)	
Interest on project loans	\$ 67.0	\$ -	\$ 67.0	\$ -	\$ -	\$ -	\$ 67.0		
Interest income-Solar Lease Notes,net of fees	\$ 28.6	\$ -	\$ 28.6	\$ 36.0	\$ -	\$ 36.0	\$ (7.4)	(20%)	
Grant income (N2N)	\$ -	\$ 156.5	\$ 156.5	\$ -	\$ 156.5	\$ 156.5	\$ 0.0	0%	
Other income	\$ 87.4	\$ -	\$ 87.4	\$ 25.0	\$ -	\$ 25.0	\$ 62.4	249%	
Total revenues:	\$ 11,727.6	\$ 156.5	\$ 11,884.1	\$ 11,619.0	\$ 156.5	\$ 11,775.5	\$ 108.6	1%	
Expenses									
<u>Compensation & Benefits:</u>									
-Salaries & Wages-CEFIA employees	\$ 170.2	\$ 765.0	\$ 935.2	\$ 184.2	\$ 827.5	\$ 1,011.7	\$ (76.5)	(8%)	
-Salaries & Wages-CI shared services	\$ 119.1	\$ -	\$ 119.1	\$ 143.3	\$ -	\$ 143.3	\$ (24.2)	(17%)	
-Employee Benefits-CEFIA employees	\$ 123.3	\$ 554.4	\$ 677.7	\$ 137.0	\$ 615.5	\$ 752.5	\$ (74.8)	(10%)	
-Employee Benefits-CI shared services	\$ 96.1	\$ -	\$ 96.1	\$ 106.9	\$ -	\$ 106.9	\$ (10.7)	(10%)	
-Temporary employees	\$ 0.4	\$ -	\$ 0.4	\$ 0.4	\$ -	\$ 0.4	\$ 0.0		
<u>Consulting and professional fees</u>									
- Legal	\$ 3.2	\$ 39.0	\$ 42.2	\$ 10.0	\$ 39.0	\$ 49.0	\$ (6.8)	(14%)	
- Consulting fees	\$ 20.9	\$ 272.2	\$ 293.1	\$ 20.0	\$ 272.2	\$ 292.2	\$ 0.9		
- Project inspection fees	\$ -	\$ 64.1	\$ 64.1	\$ -	\$ 64.1	\$ 64.1	\$ 0.0		
<u>Marketing/External relations</u>	\$ 37.4	\$ 399.5	\$ 436.9	\$ 75.0	\$ 399.5	\$ 474.5	\$ (37.6)	(8%)	
<u>EM&V</u>	\$ -	\$ 84.7	\$ 84.7	\$ -	\$ 84.7	\$ 84.7	\$ 0.0		
<u>Rent and location related expenses</u>									
-Rent/Utilities/Maintenance	\$ 9.6	\$ 43.0	\$ 52.5	\$ 12.0	\$ 53.0	\$ 65.0	\$ (12.5)	(19%)	
-Telephone/Communications	\$ 2.6	\$ 11.5	\$ 14.0	\$ 3.5	\$ 16.5	\$ 20.0	\$ (6.0)	(30%)	
-Depreciation FF&E	\$ 6.3	\$ 28.1	\$ 34.4	\$ 6.2	\$ 27.8	\$ 34.0	\$ 0.4	1%	
<u>Office, computer & other expenses</u>									
-Office expense/leases	\$ 5.3	\$ 23.7	\$ 29.0	\$ 5.0	\$ 23.0	\$ 28.0	\$ 1.0	4%	
-Computer operations	\$ 4.6	\$ 94.7	\$ 99.3	\$ 4.0	\$ 109.0	\$ 113.0	\$ (13.7)	(12%)	
-Training/education/subscriptions	\$ 9.9	\$ 14.6	\$ 24.6	\$ 15.0	\$ 14.6	\$ 29.6	\$ (5.0)	(17%)	
-Travel,meetings & related expenses	\$ 17.1	\$ 12.5	\$ 29.6	\$ 24.0	\$ 12.5	\$ 36.5	\$ (6.9)	(19%)	
-Insurance	\$ 13.0	\$ -	\$ 13.0	\$ 18.0	\$ -	\$ 18.0	\$ (5.0)	(28%)	
Subtotal:	\$ 639.0	\$ 2,407.0	\$ 3,046.0	\$ 764.5	\$ 2,558.9	\$ 3,323.4	\$ (277.4)	(8%)	
<u>Grant expenses(N2N)</u>	\$ -	\$ 152.0	\$ 152.0	\$ -	\$ 152.0	\$ 152.0	\$ -		
<u>Interest Rate Buydowns</u>	\$ -	\$ 5.1	\$ 5.1	\$ -	\$ 5.1	\$ 5.1	\$ -		
<u>Financial Incentives-Grants & Rebates</u>	\$ -	\$ 489.7	\$ 489.7	\$ -	\$ 489.7	\$ 489.7	\$ -		
Total expenses:	\$ 639.0	\$ 3,053.8	\$ 3,692.8	\$ 764.5	\$ 3,205.7	\$ 3,970.2	\$ (277.4)	(7%)	
FY14 revenues over FY14 expenses:			\$ 8,191.3			\$ 7,805.3	\$ 386.0		
Fin. Incen.:Grants/Rebates Paid - Pre FY14 commitments:			\$ (2,359.8)						
Revenues over expenses:			\$ 5,831.4						

Clean Energy Finance and Investment Authority
Statement of Revenues, Expenses
and Changes in Net Assets
For the four months ended October 31, 2013
(000's)

	Total Net Assets	6/30/2013		\$ 99,116.6
FY 2014 expenses over income:				8,191.3
	Utility customer assessments	9,812.4		
	Interest income	122.7		
	RGGI auction proceeds	1,705.2		
	Grant income	156.5		
	Other income	87.4		
			11,884.1	
	Compensation	(1,828.6)		
	Consulting and professional fees	(335.3)		
	Marketing/External relations	(436.9)		
	Project Inspection fees	(64.1)		
	EM&V	(84.7)		
	Rent and location related expenses	(100.9)		
	Office, computer & other expenses	(195.5)		
			(3,046.0)	
	Interest Rate Buydowns - New Programs	(5.1)		
	Residential Solar PV rebates	(489.7)		
			(494.8)	
	NOTE: Subtotal, Recurring Programs		8,343.3	
	Federal Grants	(152.0)		
	NOTE: Subtotal, Non-Recurring/Special Programs		(152.0)	
Expenditures grants and rebates approved prior to FY14				\$ (2,359.9)
	Residential Solar PV Investment Program (Section 106,PA 11-80)		(1,519.1)	
	CI&I On Site Generation - Solar PV		(232.0)	
	Geo Thermal, Solar Thermal and Hot Water Projects		(347.1)	
	Operational Demonstration Program		(62.3)	
	CHP Pilot		(150.0)	
	Education & Outreach Programs		(49.4)	
Transfer to State of Connecticut				(2,066.67)
Other				\$ -
		Total Net Assets	10/31/2013	\$ 102,881.3

Clean Energy Finance and Investment Authority
Financial Analysis
For the four months ended October 31, 2013
Statement of Net Assets
(000's)

	Final 6/30/2013	YTD 10/31/2013	Budgeted 6/30/2014		Final 6/30/2013	YTD 10/31/2013	Budgeted 6/30/2014	
<u>Assets</u>					<u>Liabilities and Net Assets</u>			
<i>Current assets</i>					<i>Liabilities:</i>			
Cash and cash equivalents (Unrestricted)	\$ 67,796.4	\$ 68,235.1	\$ 11,006.9		Accounts payable and accrued expenses	\$ 1,422.9	\$ 830.9	\$ 4,000.0
Utility receivables	\$ 2,604.8	\$ 2,441.9	\$ 2,200.0		Custodial account	\$ 360.0	\$ 360.0	\$ -
Accounts receivable	\$ 1,941.5	\$ 1,707.6	\$ 1,200.0		Deferred Revenue	\$ 33.0	\$ 33.0	\$ -
Other current assets	\$ 243.4	\$ 175.6	\$ 200.0		Total liabilities	\$ 1,815.9	\$ 1,223.9	\$ 4,000.0
Total current assets	\$ 72,586.1	\$ 72,560.1	\$ 14,606.9		<i>Net Assets:</i>			
<i>Noncurrent assets</i>					Investment in capital assets	\$ 362.5	\$ 333.8	\$ 200.0
<i>Investments</i>					Restricted	\$ 8,143.7	\$ 8,144.9	\$ 11,374.5
Promissory notes - solar lease program V1 ,net of reserve	\$ 11,240.2	\$ 11,067.8	\$ 10,496.8		Unrestricted	\$ 90,610.4	\$ 94,402.6	\$ 81,209.8
Promissory notes - solar lease program V2,net of reserve	\$ 2,300.0	\$ 2,300.0	\$ 2,185.0		Total Net Assets	\$ 99,116.5	\$ 102,881.3	\$ 92,784.3
Promissory notes - solar loan program ,net of reserve	\$ -	\$ 185.0	\$ 2,937.4		Total Liabilities and Net Assets	\$ 100,932.4	\$ 104,105.2	\$ 96,784.3
Promissory notes - WIN LISC program,net of reserve	\$ -	\$ -	\$ 1,800.0					
Promissory notes - Campus Efficiency NOW program ,net of reserve	\$ -	\$ -	\$ 900.0					
Promissory notes - Energy Efficiency Loan programs,net of reserve	\$ -	\$ -	\$ 4,750.0					
Promissory notes - CPACE program	\$ 86.0	\$ 843.0	\$ 24,296.2					
Promissory notes - Alpha/Op/Feas. Demo programs	\$ 100.0	\$ 470.0	\$ 667.5					
Promissory notes - Grid tied program program,net of reserve	\$ 3,581.5	\$ 5,717.5	\$ 6,570.0					
Promissory notes - AD/CHP programs	\$ -	\$ -	\$ 2,500.0					
Promissory notes - Solar PV Capital Competition program	\$ -	\$ -	\$ 1,000.0					
Promissory notes - Micro Grid program,net of reserve	\$ -	\$ -	\$ 4,500.0					
Equity Investment/Solar Lease program	\$ -	\$ -	\$ 4,500.0					
Investment in CEFIA Holdings, LLC	\$ 99.0	\$ 99.0	\$ -					
Equity/Debt investments (pre FY13)	\$ 1,000.0	\$ 1,000.0	\$ 2,000.0					
Investments-REC's	\$ 1,217.5	\$ 1,217.5	\$ 1,500.0					
Furniture,Equipment & L/H Improvements	\$ 362.5	\$ 333.8	\$ 200.0					
Due From CT Solar Lease 2 LLC - ARRA Funds for LLR	\$ 3,500.0	\$ 3,500.0	\$ 3,500.0					
Cash and cash equivalents (Restricted)	\$ 4,859.7	\$ 4,811.4	\$ 7,874.5					
Total non current assets	\$ 28,346.4	\$ 31,545.0	\$ 82,177.4					
Total assets	\$ 100,932.4	\$ 104,105.2	\$ 96,784.3					

Clean Energy Finance and Investment Authority

Statement of Cash Flows

As of October 31, 2013

(000's)

	Actual Month of 10/31/2013	Actual YTD 10/31/2013	Budget Fiscal Year 6/30/2014
Cash flows from operating activities			
CASH IN:			
Proceeds from utility customer assessments	1,891.1	9,975.3	\$ 27,600.0
Proceeds from RGGI auctions	-	1,940.8	\$ 5,900.0
Proceeds from RGGI additional sources	-	-	\$ 12,800.0
Proceeds from grants	18.5	235.9	\$ 300.0
Proceeds from RECs/other income	13.8	391.9	\$ 150.0
Proceeds from Interest on deposits, investments, solar lease notes	22.3	71.1	\$ 260.0
CASH OUT:			
Expenditures General and Program Administration	(1,155.6)	(3,278.0)	\$ (10,500.0)
Expenditures federal grants (N2N)	(14.0)	(231.3)	\$ (300.0)
Expenditures grants and rebates approved prior to FY14	(327.8)	(2,432.2)	\$ (8,000.0)
Expenditures grants and rebates -other programs	(211.2)	(874.5)	\$ (5,100.0)
Expenditures residential solar lease PV program- rebates	-	-	\$ (4,750.0)
Expenditures-Credit Enhancement IRB	(3.2)	(5.0)	\$ -
Net cash used by operating activities	\$ 234.0	\$ 5,794.0	\$ 18,360.0
Cash flows from investing activities			
LOAN RECOVERY			
Return of principal on solar lease V1 promissory notes	57.3	229.0	\$ 720.0
Proceeds from residential solar loan program	-	-	\$ 75.0
	<u>57.3</u>	<u>229.0</u>	<u>795.0</u>
LOAN DISBURSEMENTS			
AD/CHP programs	-	(150.0)	\$ (2,500.0)
Alpha & Op Demo programs	(325.0)	(325.0)	\$ (1,335.0)
Campus Efficiency NOW program	-	-	\$ (875.0)
CPACE program	(269.0)	(756.2)	\$ (25,000.0)
Energy Efficiency Loan programs	-	-	\$ (5,000.0)
Grid tied program	(750.0)	(2,125.0)	\$ (3,500.0)
Micro Grid program	-	-	\$ (5,000.0)
Residential solar loan program - CT Solar Loan I	(100.0)	(185.0)	\$ (2,803.9)
Solar PV Capital Competition	-	-	\$ (1,000.0)
WINN LISC program	-	-	\$ (1,875.0)
	<u>(1,444.0)</u>	<u>(3,541.2)</u>	<u>(48,888.9)</u>
EQUITY INVESTMENTS			
Commercial solar lease (MUSH) program	-	-	(675.0)
Residential solar lease SHW program	-	-	(225.0)
Residential solar lease PV program	-	-	(3,600.0)
	<u>-</u>	<u>-</u>	<u>(4,500.0)</u>
Net cash used by investing activities	\$ (1,386.7)	\$ (3,312.2)	\$ (52,593.9)
Cash flows from capital activities			
Purchase of furniture, equipment & software	(1.9)	\$ (24.7)	\$ (25.0)
Net cash used in operating, investing and capital activities	(1,154.7)	2,457.1	\$ (34,258.9)
State of Connecticut Cash Sweep	(2,066.7)	(2,066.7)	\$ (6,200.0)
Cash and cash equiv., Beginning of Period	76,267.8	72,656.1	\$ 62,840.3
Cash and cash equiv., End of Period	\$ 73,046.5	\$ 73,046.5	\$ 22,381.4
UNRESTRICTED CASH:	\$ 68,235.1	\$ 68,235.1	\$ 11,006.9
RESTRICTED CASH:	\$ 4,811.4	\$ 4,811.4	\$ 11,374.5
	<u>\$ 73,046.5</u>	<u>\$ 73,046.5</u>	<u>\$ 22,381.4</u>
Unfunded contingent liabilities and advances to affiliates::			
Unfunded grants and incentives (page 6):		\$ (20,267.9)	
Unfunded project loan financing arrangements (page 5):		\$ (23,373.3)	
Available in CPACE warehouse for new commitments (page 5):		\$ (25,961.9)	
Board commitment to provide equity to CT Solar Lease 2 LLC:		\$ (7,200.0)	
Board commitment to provide revolving loan advances to CT Solar Loan I LLC::		\$ (5,000.0)	
		<u>\$ (81,803.1)</u>	

**Actual
as of
10/31/2013**

Cash flows from operating activities

CASH IN:

Proceeds from utility customer assessments	9,975.3
Proceeds from RGGI auctions	1,940.8
Proceeds from RGGI additional sources	-
Proceeds from grants	235.9
Proceeds from RECs/other income	391.9
Proceeds from Interest on deposits, investments, solar lease notes	71.1

CASH OUT:

Expenditures General and Program Administration	(3,278.0)
Expenditures federal grants (N2N)	(231.3)
Expenditures grants and rebates approved prior to FY14	(2,432.2)
Expenditures grants and rebates -other programs	(874.5)
Expenditures residential solar lease PV program- rebates	-
Expenditures residential solar loan program-rebates	-
Expenditures-Credit Enhancement LLR	-
Expenditures-Credit Enhancement IRB	(5.0)

Net cash used by operating activities

\$ 5,794.0

Cash flows from investing activities

LOAN RECOVERY

Return of principal on solar lease V1 promissory notes	229.0
Proceeds from residential solar loan program	-
Proceeds from WINN LISC program	-
Proceeds from GreenerU program	-
Proceeds from EEloan program	-

\$ 229.0

LOAN DISBURSEMENTS

AD/CHP programs	(150.0)
Alpha & Op Demo programs	(325.0)
Campus Efficiency NOW program	-
CPACE program	(756.2)
Energy Efficiency Loan programs	-
Grid tied program	(2,125.0)
Micro Grid program	-
Residential solar loan program - CT Solar Loan I	(185.0)
Solar PV Capital Competition	-
WINN LISC program	-

\$ (3,541.24)

EQUITY INVESTMENTS

Commercial solar lease (MUSH) program	-
Residential solar lease SHW program	-
Residential solar lease PV program	-

\$ -

Net cash used by investing activities

\$ (3,312.2)

Cash flows from capital activities

Purchase of furniture, equipment & software

(24.7)

Net cash used in operating, investing and capital activities YTD 10/31/2013

2,457.1

State of Connecticut Cash Sweep

(2,066.7)

Cash and cash equiv., 7/1/2013

72,656.1

Cash and cash equiv., 9/30/2013

\$ 73,046.5

Clean Energy Finance and Investment Authority

Statement of Cash Flows

As of October 31, 2013

(000's)

Reclass & Adjustments	6/30/2014	5/31/2014	4/30/2014	3/31/2014
-	-	-	-	-
-	-	-	-	-
-	-	-	-	-
-	-	-	-	-
-	-	-	-	-
-	-	-	-	-
-	-	-	-	-
-	-	-	-	-
-	-	-	-	-
-	-	-	-	-
-	-	-	-	-
\$	\$	\$	\$	\$
-	-	-	-	-
-	-	-	-	-
-	-	-	-	-
-	-	-	-	-
-	-	-	-	-
-	-	-	-	-
-	-	-	-	-
-	-	-	-	-
\$	\$	\$	\$	\$
-	-	-	-	-
-	-	-	-	-
-	-	-	-	-
-	-	-	-	-
-	-	-	-	-
-	-	-	-	-
\$	\$	\$	\$	\$
-	-	-	-	-
-	-	-	-	-
-	-	-	-	-

\$	-	\$	-	\$	-	\$	-	\$	-
\$	-	\$	-	\$	-	\$	-	\$	-

Cas Balance Reconciliation:	<u>10/31/13</u>	<u>06/30/13</u>
General Ledger:	\$ 73,046.49	\$ 72,656.10
ARRA LLR at CT Solar Lease 2 LLC:	\$ 3,502.97	\$ 3,500.00
Maintenance Reserve at Solar Lease 2:	\$ 1,000.00	\$ 1,000.00
Cash Balance in Solar Lease 2 Operating:	\$ 310.81	\$ 406.46
CEFIA Solar Loan I LLC Operating:	\$ 145.49	\$ 54.34
CEFIA Holdings LLC Operating:	\$ 23.28	\$ 24.79
CEFIA Solar Services Inc. Operating:	\$ 0.50	\$ -
	<u>\$ 78,029.54</u>	<u>\$ 77,641.68</u>

2/28/2014

1/31/2014

12/31/2013

11/30/2013

10/31/2013

-	-	-	-	-	1,891.1
-	-	-	-	-	-
-	-	-	-	-	-
-	-	-	-	-	18.5
-	-	-	-	-	13.8
-	-	-	-	-	22.3
-	-	-	-	-	(1,155.6)
-	-	-	-	-	(14.0)
-	-	-	-	-	(327.8)
-	-	-	-	-	(211.2)
-	-	-	-	-	-
-	-	-	-	-	-
-	-	-	-	-	-
-	-	-	-	-	(3.2)
<u>\$</u>	<u>\$</u>	<u>\$</u>	<u>\$</u>	<u>\$</u>	<u>234.0</u>

-	-	-	-	-	57.3
-	-	-	-	-	-
-	-	-	-	-	-
-	-	-	-	-	-
-	-	-	-	-	-
<u>\$</u>	<u>\$</u>	<u>\$</u>	<u>\$</u>	<u>\$</u>	<u>57.26</u>

-	-	-	-	-	-
-	-	-	-	-	(325.0)
-	-	-	-	-	-
-	-	-	-	-	(269.0)
-	-	-	-	-	-
-	-	-	-	-	(750.0)
-	-	-	-	-	-
-	-	-	-	-	(100.0)
-	-	-	-	-	-
-	-	-	-	-	-
<u>\$</u>	<u>\$</u>	<u>\$</u>	<u>\$</u>	<u>\$</u>	<u>(1,444.00)</u>

-	-	-	-	-	-
-	-	-	-	-	-
-	-	-	-	-	-

\$	-	\$	-	\$	-	\$	-	\$	-
----	---	----	---	----	---	----	---	----	---

\$	-	\$	-	\$	-	\$	-	\$	(1,386.7)
----	---	----	---	----	---	----	---	----	-----------

-	-	-	-	-	-	-	-	(1.9)
---	---	---	---	---	---	---	---	-------

-	-	-	-	-	-	-	-	(2,066.7)
---	---	---	---	---	---	---	---	-----------

\$	390.39
\$	2.97
\$	-
\$	(95.64)
\$	91.14
\$	(1.51)
\$	0.50
<u>\$</u>	<u>387.86</u>

9/30/2013

8/31/2013

7/31/2013

3,225.2	2,690.7	2,168.3
-	-	1,940.8
-	-	-
9.9	38.7	168.8
322.6	37.0	18.5
13.6	15.9	19.2

(561.8)	(906.8)	(653.8)
(9.9)	(47.2)	(160.2)
(477.5)	(769.8)	(857.0)
(606.3)	(29.6)	(27.3)

-	-	-
-	-	-
-	-	-
(1.2)	(0.6)	-

\$	1,914.5	\$	1,028.2	\$	2,617.4
----	---------	----	---------	----	---------

57.1	58.0	56.6
-	-	-
-	-	-
-	-	-
-	-	-

\$	57.09	\$	58.03	\$	56.64
----	-------	----	-------	----	-------

(150.0)	-	-
-	-	-
-	-	-
(167.6)	(319.7)	-
-	-	-
(500.0)	-	(875.0)
-	-	-
-	(85.0)	-
-	-	-
-	-	-

\$	(817.57)	\$	(404.7)	\$	(875.00)
----	----------	----	---------	----	----------

-	-	-
-	-	-
-	-	-

\$	-	\$	-	\$	-
----	---	----	---	----	---

\$	(760.5)	\$	(346.6)	\$	(818.4)
----	---------	----	---------	----	---------

-	-	(22.8)
---	---	--------

-	681.5	1,776.2
-	-	-

Clean Energy Finance and Investment Authority
Statement of Program Investments & Guarantees
As of October 31, 2013

<u>Contract Date</u>	<u>Approval Date</u>	<u>Loan No.</u>	<u>Issuer</u>	<u>Project</u>	<u>Approved Commitment</u>	<u>Investment/ Advances to date</u>	<u>Reserve</u>	<u>Current Valuation</u>	<u>Interest Rate</u>	<u>Termination/ Maturity Date</u>
CPACE Construction Loan Program-Total Board Commitment \$40,000,000-Available \$25,961,945										
9/3/2013	02/15/13	CPACE-001	Main Street Ventures LLC	Construction Loan	\$ 1,992,976	\$ -	\$ -	\$ -	5.5%	TDB
4/1&8/13/2013	4/30/2013	CPACE-002	Elite Development Group	Construction Loan	\$ 559,950	\$ 166,000	\$ -	\$ 166,000	4.5%	TDB
6/17/2013	04/30/13	CPACE-003	Bushnell Memorial Hall	Construction Loan	\$ 384,016	\$ -	\$ -	\$ -	5.0%	TDB
	4/30&7/2/2013	CPACE-004	Bridgeport International Academy	Construction Loan	\$ 603,662	\$ -	\$ -	\$ -	5.0%	TDB
11/1/2013	06/21/13	CPACE-005	Danbury YMCA	Construction Loan	\$ 87,938	\$ -	\$ -	\$ -	5.5%	TDB
7/22/2013	06/21/13	CPACE-006	Walnut Hutley LLC	Construction Loan	\$ 145,000	\$ 132,550	\$ -	\$ 132,550	5.5%	TDB
6/28/2013	06/24/13	CPACE-007	Identification Products Corp.	Construction Loan	\$ 107,556	\$ 107,566	\$ -	\$ 107,566	5.5%	TDB
7/22/2013	07/02/13	CPACE-008	ICH, Inc.	Construction Loan	\$ 325,000	\$ 247,125	\$ -	\$ 247,125	5.5%	TDB
10/24/2013	07/02/13	CPACE-009	80 Lamberton Road LLC	Construction Loan	\$ 1,818,486	\$ -	\$ -	\$ -	5.5%	TDB
9/3/2013	07/02/13	CPACE-010	MK Simsbury Group	Construction Loan	\$ 674,566	\$ -	\$ -	\$ -	5.5%	TDB
9/1/2013	07/02/13	CPACE-011	MK Roscommon Group	Construction Loan	\$ 2,513,915	\$ -	\$ -	\$ -	5.5%	TDB
12/4/2013	07/02/13	CPACE-012	290 Pratt LLC	Construction Loan	\$ 1,790,847	\$ -	\$ -	\$ -	5.5%	TDB
9/13/2013	08/26/13	CPACE-013	True Value Hardware	Construction Loan	\$ 259,000	\$ 189,000	\$ -	\$ 189,000	5.5%	TDB
10/25/2013	09/03/13	CPACE-014	Larson Ace Hardware	Construction Loan	\$ 148,500	\$ -	\$ -	\$ -	5.5%	TDB
	09/03/13	CPACE-015	Crest Mechanical	Construction Loan	\$ 350,000	\$ -	\$ -	\$ -	5.5%	TBD
	09/03/13	CPACE-016	WB Staebler Properties	Construction Loan	\$ 378,000	\$ -	\$ -	\$ -	5.5%	TDB
	10/19/13	CPACE-017	Sweetland Realty (22 Waterville Rd.)	Construction Loan	\$ 419,346	\$ -	\$ -	\$ -	5.5%	TDB
11/14/2013	10/19/13	CPACE-018	ISCT Realty (29 Trefoil Dr.)	Construction Loan	\$ 1,001,298	\$ -	\$ -	\$ -	5.5%	TDB
	10/29/13	CPACE-019	Mitchell's Automotive	Construction Loan	\$ 478,000	\$ -	\$ -	\$ -	5.5%	TBD
			Various Projects	Accrued Interest to Date	\$ -	\$ 761	\$ -	\$ 761		
					\$ 14,038,055	\$ 843,002	\$ -	\$ 843,002		
Fuel Cell Project Financing										
3/5/2013	12/21/2012	FCE-001	Fuel Cell Energy, Inc.	Development of Bridgeport Fuel Cell Park	\$ 5,873,188	\$ 5,656,495	\$ -	\$ 5,656,495	5%	3/31/2026
3/5/2013	12/21/2012	FCE-001	Fuel Cell Energy, Inc.	Accrued Interest to Date	\$ -	\$ 61,018	\$ -	\$ 61,018		
					\$ 5,873,188	\$ 5,717,513	\$ -	\$ 5,717,513		
Anaerobic Digester Financing										
	9/13/2013	AD-001	Greenpoint Energy Partners LLC	Development of Anaerobic Facility in the City of Ansonia	\$ 4,500,000	\$ -	\$ -	\$ -	2%	TDB
					\$ 4,500,000	\$ -	\$ -	\$ -		

Clean Energy Finance and Investment Authority
Statement of Program Investments & Guarantees
As of October 31, 2013

<u>Contract Date</u>	<u>Approval Date</u>	<u>Loan No.</u>	<u>Issuer</u>	<u>Project</u>	<u>Approved Commitment</u>	<u>Investment/Advances to date</u>	<u>Reserve</u>	<u>Current Valuation</u>	<u>Interest Rate</u>	<u>Termination/Maturity Date</u>
Energy Efficiency Financing of Low to Moderate Income Housing										
8/13/2013	2/15/2013		LISC/WinnDevelopment Co LP	Combination of loan participation and interest repayment guarantees for energy efficiency upgrades to low and moderate income housing	\$ 2,000,000	\$ -	\$ -	\$ -	TDB	TDB
					\$ 2,000,000	\$ -	\$ -	\$ -		
Feasibility Study Loans										
2/15/2013	2/15/2013	FEA - 001	Nu Power Thermal LLC	Bridgeport District Energy System	\$ 50,000	\$ 50,000	\$ -	\$ 50,000	0%	2/13/2018
	8/19/2013	FEA-002	Distributed Sun LLC	Micro grid Project, Great Pond Windsor	\$ 49,501	\$ -	\$ -	\$ -		
					\$ 99,501	\$ 50,000	\$ -	\$ 50,000		
Energy Efficiency Financing										
9/13/2012	7/27/2012	GU-001	Greener U/Campus Efficiency Now	Energy efficiency financing to Colleges and Universities in the CT Conference of	\$ 1,000,000	\$ -	\$ -	\$ -	IRR of 7%	TBD Project by Project
					\$ 1,000,000	\$ -	\$ -	\$ -		
Capital Competition Financing										
	7/19/2013	CC-001	SunGen Capital Management	Residential PV Financing without the use of Rebates or PBIs.	\$ 1,000,000	\$ -	\$ -	\$ -	TBD	TBD
					\$ 1,000,000	\$ -	\$ -	\$ -		
SHW Financing										
12/9/2013	10/10/2013	SHW - 001	Two Roads Brewery	Commercial SHW Loan	\$ 75,000	\$ -	\$ -	\$ -	2%	12/9/2018
					\$ 75,000	\$ -	\$ -	\$ -		
Alpha Program										
8/28/2012		13-50100-2	Anchor Science, LLC	Development of nanomaterial for thermal energy management in electronics.	\$ 150,000	\$ 135,000	\$ -	\$ 135,000	6% or Prime +1%	8/28/2022
8/9/2012		13-50100-1	Apollo Solar, Inc.	Development of solar smart grid inverter.	\$ 150,000	\$ -	\$ -	\$ -	6% or Prime +1%	8/9/2022
					\$ 300,000	\$ 135,000	\$ -	\$ 135,000		
Op Demo Program (1)										
8/8/2007		ODP-001	Mechatronic Energy Systems, LLC	Low Head Run-of the-River Hydro Turbine Technology Project,	\$ 557,134	\$ 501,421	\$ (501,420)	\$ 1	TBD	8/7/2017
4/5/2010		ODP-003	LiteTrough, LLC	Concentrated Solar Water Heater Technology, Milford, CT	\$ 81,000	\$ 31,380	\$ (31,379)	\$ 1	4.25%	4/4/2020
6/28/2010		ODP-004	Avalence, LLC	High pressure multipurpose electrolyer technology, Hamden, CT	\$ 500,000	\$ 350,000	\$ (349,999)	\$ 1	TBD	6/27/2020
3/1/2013	1/8/2013	ODP-005	New England Hydropower Co., LLC	Demonstration of commercial viability of company's small hydropower technology.	\$ 500,000	\$ 50,000	\$ -	\$ 50,000	TBD	TBD
5/1/2013	1/8/2013	ODP-006	RPM Sustainable Technologies, Inc.	Innovative processing equipment for biofuels production.	\$ 500,000	\$ 235,000	\$ -	\$ 235,000	TBD	TBD
					\$ 2,138,134	\$ 1,167,801	\$ (882,798)	\$ 285,003		

Clean Energy Finance and Investment Authority
Statement of Program Investments & Guarantees
As of October 31, 2013

<u>Contract Date</u>	<u>Approval Date</u>	<u>Loan No.</u>	<u>Issuer</u>	<u>Project</u>	<u>Approved Commitment</u>	<u>Investment/Advances to date</u>	<u>Reserve</u>	<u>Current Valuation</u>	<u>Interest Rate</u>	<u>Termination/Maturity Date</u>
Pre Development Program (1)										
4/30/2009		PD-002	Chestnut Hill BioEnergy CT, LLC	Biomass generation project, Waterbury,CT	\$ 500,000	\$ 237,245	\$ (237,244)	\$ 1	4.25%	TBD
02/19/09		PD-003	BNE Energy Inc.	Colebrook Wind - Phase I	\$ 119,625	\$ 119,625	\$ (119,624)	\$ 1	4.25%	TBD
02/19/09		PD-004	BNE Energy Inc.	Prospect Wind - Phase I	\$ 102,375	\$ 102,375	\$ (102,374)	\$ 1	4.25%	TBD
06/24/10		PD-005	BNE Energy Inc.	Colebrook Wind - Phase II	\$ 380,375	\$ 380,375	\$ (380,374)	\$ 1	4.25%	TBD
06/24/10		PD-006	BNE Energy Inc.	Prospect Wind - Phase II	\$ 397,625	\$ 397,625	\$ (397,624)	\$ 1	4.25%	TBD
					\$ 1,500,000	\$ 1,237,245	\$ (1,237,240)	\$ 5		
Project Loans:					\$ 32,523,878	\$ 9,150,561	\$ (2,120,038)	\$ 7,030,523		
					Unfunded:	\$ 23,373,318				

(1) Due to the nature of the Pre Development and Op Demo Loans, the loans are currently fully reserved for.

CEFIA Guarantees			
<u>Commitment Date</u>	<u>Lender/Equity Holder</u>	<u>Description</u>	<u>Max. Amount</u>
6/28/2013	Firststar Development LLC	Guarantee of performance obligations of CEFIA Solar Service Inc under Solar Lease 2 program	\$ 4,000,000
8/13/2013	Webster Bank	Energy installer line of credit	TBD

Clean Energy Finance and Investment Authority
Statement of Incentives, Grants and Rebates
As of October 31, 2013
(000's)

Program	Pre FY14 Programs				
	Commitments Outstanding 6/30/2013	Fundings FY14	YTD	Withdrawn	Commitments Outstanding 08/31/2013
Pre FY13					
Project 150	\$ 1,500.0	\$ -	\$ -	\$ -	\$ 1,500.0
Commercial Solar (for profit)	\$ 1,658.3	\$ (209.7)	\$ -	\$ -	\$ 1,448.6
Commercial Solar (not for profit/government)	\$ 1,515.9	\$ (22.3)	\$ -	\$ -	\$ 1,493.7
Fuel Cell program	\$ 2,194.9	\$ -	\$ -	\$ -	\$ 2,194.9
CI&I On Site Generation -Feasibility Studies	\$ 130.0	\$ -	\$ -	\$ -	\$ 130.0
Residential Solar PV Investment Program (non PBI) Pre FY13	\$ 147.5	\$ (22.9)	\$ -	\$ -	\$ 124.7
Residential Solar PV Investment Program (FY12 PBI - to be paid out in current & future years)	\$ 776.8	\$ (35.0)	\$ -	\$ -	\$ 741.8
Solar Thermal/Geothermal/Solar Hot Water Programs	\$ 1,033.6	\$ (347.1)	\$ -	\$ -	\$ 686.5
Operational Demonstration & Alpha Programs	\$ 213.4	\$ (62.3)	\$ -	\$ -	\$ 151.1
Education & Outreach Programs	\$ 204.8	\$ (38.0)	\$ -	\$ -	\$ 166.8
Subtotal Pre FY13	\$ 9,375.3	\$ (737.3)	\$ -	\$ -	\$ 8,638.0
FY13					
CHP Pilot	\$ 934.5	\$ (150.0)	\$ -	\$ -	\$ 784.5
Residential Solar PV Investment Program (non PBI) FY13	\$ 2,194.2	\$ (1,362.0)	\$ -	\$ -	\$ 832.2
Residential Solar PV Investment Program (FY13 PBI - to be paid out in current & future years)	\$ 4,312.0	\$ (99.2)	\$ -	\$ -	\$ 4,212.8
Education & Outreach -CTHSS	\$ 363.4	\$ (11.4)	\$ -	\$ -	\$ 352.0
Subtotal FY13	\$ 7,804.1	\$ (1,622.6)	\$ -	\$ -	\$ 6,181.6
	\$ 17,179.4	\$ (2,359.8)	\$ -	\$ -	\$ 14,819.6

Program	FY 14 Programs				
	FY14 Budget	FY14 Commitments	Fundings FY14	YTD	Commitments Outstanding 08/31/2013
Maintain					
Clean Energy Communities	\$ 550.0	\$ 737.0	\$ (16.9)	\$ -	\$ 720.1
Community Innovation Grants	\$ 75.0	\$ -	\$ -	\$ -	\$ -
Project Opportunities/Strategic Investment Fund	\$ 500.0	\$ -	\$ -	\$ -	\$ -
Statutory					
Residential Solar PV Investment Program (Non PBI)	\$ 9,200.0	\$ 2,613.6	\$ (472.8)	\$ -	\$ 2,140.8
Residential Solar PV Investment Program (PBI - to be paid out in current & future years)		\$ 2,205.6	\$ -	\$ -	\$ 2,205.6
Residential Solar PV Investment Program (PBI - Solar Lease 2)		\$ 131.8	\$ -	\$ -	\$ 131.8
Anaerobic Digester Pilot	\$ 1,000.0	\$ -	\$ -	\$ -	\$ -
CHP Pilot	\$ 2,000.0	\$ -	\$ -	\$ -	\$ -
Commercial & Industrial					
Solar PV Capital Competition (REC Purchases)	\$ 525.0	\$ -	\$ -	\$ -	\$ -
Clean Energy Business Solutions	\$ 3,000.0	\$ 250.0	\$ -	\$ -	\$ 250.0
	\$ 16,850.0	\$ 5,938.1	\$ (489.7)	\$ -	\$ 5,448.4
			\$ (2,849.5)		\$ 20,267.9

Clean Energy Finance and Investment Authority
Financial Analysis
Utility Customer Assessment Analysis
For the four months ended October 31, 2013
(000's)

	<u>FY 14 Actual</u>	<u>FY14 Budget</u>	<u>(Under) Over FY 14</u>
July	\$ 2,820.2	\$ 2,650.0	\$ 170.2
August	\$ 2,659.2	\$ 2,850.0	\$ (190.8)
September	\$ 2,375.3	\$ 2,400.0	\$ (24.7)
October	\$ 1,957.7	\$ 2,150.0	\$ (192.3)
November	\$ -	\$ 2,000.0	
December	\$ -	\$ 2,250.0	
January	\$ -	\$ 2,450.0	
February	\$ -	\$ 2,300.0	
March	\$ -	\$ 2,250.0	
April	\$ -	\$ 2,250.0	
May	\$ -	\$ 1,850.0	
June	\$ -	\$ 2,200.0	
Total assessments:	<u>\$ 9,812.4</u>	<u>\$ 27,600.0</u>	<u>\$ (237.6)</u> <u>-2.4%</u>

**Clean Energy Finance and Investment Authority
ARRA Funds - Financial Analysis
Loan Loss and Interest Rate Buydown Outlays
For the four months ended October 31, 2013**

Loan Loss Reserve		(7/2013-10/2013)	(7/2013-10/2013)		(7/2013-10/2013)	(7/2013-10/2013)	(7/2013-10/2013)	(7/2013-10/2013)
Institution		No of Loans Supported	Loans Supported - \$	Loan Loss Reserve	No of Loan Writeoffs	Loan Writeoffs - \$	No of Loans Fully Repaid	Loans Fully Repaid - \$
<u>Energy Efficiency Loan Programs (CE Financial Innovation Program)</u>								
Agreement Date								
02/28/13	Core Plus FCU	9	\$ 90,416.00	\$ 22,500.00	-	\$ -	-	\$ -
04/13/13	Eastern Savings Bank	2	\$ 35,000.00	\$ 22,500.00	-	\$ -	-	\$ -
09/05/13	Liberty Bank	-	\$ -	\$ 68,750.00	-	\$ -	-	\$ -
05/20/13	Naugatuck Savings Bank	2	\$ 37,643.00	\$ 22,500.00	-	\$ -	-	\$ -
04/23/13	Nutmeg State FCU	-	\$ -	\$ 22,500.00	-	\$ -	-	\$ -
04/12/13	Patriot National Bank	2	\$ 25,500.00	\$ 68,750.00	-	\$ -	-	\$ -
05/22/13	Thomaston Savings Bank	-	\$ -	\$ 22,500.00	-	\$ -	-	\$ -
08/14/13	Union Savings Bank	-	\$ -	\$ 22,500.00	-	\$ -	-	\$ -
<i>Sub total Energy Efficiency Loan Program:</i>		15	188,559.00	272,500.00	-	\$ -	-	\$ -
<u>CT Solar Loan I (CE Financial Innovation Program)</u>								
03/26/13	CEFIA (Administered by Sungage)	5	\$ 101,559.00	\$ -	-	\$ -	-	\$ -
<i>Sub total Cozy Loan Program:</i>		5	\$ 101,559.00	\$ -	-	\$ -	-	\$ -
<u>Cozy loan Program (CE Financial Innovation Program)</u>								
03/26/13	The Housing development Fund		\$ -	\$ 360,000.00	-	\$ -	-	\$ -
<i>Sub total Cozy Loan Program:</i>		-	\$ -	\$ 360,000.00	-	\$ -	-	\$ -
<u>Solar Lease 2 Program (CE Financing Program)</u>								
06/28/13	CEFIA Solar Lease 2 LLC		\$ -	\$ 3,500,000.00	-	\$ -	-	\$ -
		-	\$ -	\$ 3,500,000.00	\$ -	\$ -	-	\$ -
Total - All Programs:		20	\$ 290,118.00	\$ 4,132,500.00	-	\$ -	-	\$ -

**Clean Energy Finance and Investment Authority
ARRA Funds - Financial Analysis
Loan Loss and Interest Rate Buydown Outlays
For the four months ended October 31, 2013**

Interest Rate Buydown Reserve

<u>Institution</u>	<u>(7/2013-10/2013) No of Loans Supported</u>	<u>(7/2013-10/2013) Loans Supported - \$</u>	<u>(7/2013-10/2013) IRB Reserve</u>	<u>(7/2013-10/2013) No of Loan Writeoffs</u>	<u>(7/2013-10/2013) Loan Writeoffs -\$</u>	<u>(7/2013-10/2013) No of Loans Fully Repaid</u>	<u>(7/2013-10/2013) Loans Fully Repaid - \$</u>
<u>Energy Efficiency Loan Programs (CE Financial Innovation Program)</u>							
Agreement Date	Total Reserve for Program: \$ 200,000.00						
05/17/13 Core Plus FCU	9	\$ 90,416.00	\$ (2,693.60)	-	\$ -	-	\$ -
07/18/13 Eastern Savings Bank	2	\$ 35,000.00	\$ (783.48)	-	\$ -	-	\$ -
09/05/13 Liberty Bank	-	\$ -	\$ -	-	\$ -	-	\$ -
06/03/13 Naugatuck Savings Bank	2	\$ 37,643.00	\$ (907.62)	-	\$ -	-	\$ -
05/14/13 Nutmeg State FCU	-	\$ -	\$ -	-	\$ -	-	\$ -
05/25/13 Patriot National Bank	2	\$ 25,500.00	\$ (633.25)	-	\$ -	-	\$ -
08/02/13 Quinnipiac Bank	-	\$ -	\$ -	-	\$ -	-	\$ -
08/14/13 Union Savings Bank	-	\$ -	\$ -	-	\$ -	-	\$ -
<i>Sub total Energy Efficiency Loan Program:</i>	15	\$ 188,559.00	\$ 194,982.05	-	\$ -	-	\$ -

Cozy loan Program (CE Financial Innovation Program)

Agreement Date	Total Reserve for Program: \$ 50,000.0						
03/26/13 The Housing Development Fund		\$ -	\$ -	-	\$ -	-	\$ -
<i>Sub total Cozy Loan Program:</i>		\$ -	\$ 50,000.0	-	\$ -	-	\$ -

ARRA Used for LLR:	\$ 4,132,500.00	Note 1: DEEP considers the practice of transferring funds internally to another account and executing a written obligation with a third-party establishing a LLR or IRB reserve to be an "outlay". The CEFIA BOD authorized setting aside \$705,311 in ARRA funds for an LLR for the CT Solar Loan I program. To date all loans have been funded by CEFIA and an agreement to sell the loans and set up an LLR for \$300,000 has not been executed with a thord party. Once this is done, CEFIA will recognize the \$300,000 as an "outlay" for DEEP reporting.
ARRA Funds Used for IRB:	\$ 250,000.00	
Total ARRA Outlays:	\$ 4,382,500.00	
CE Financial Innovation Program:	\$ 882,500.00	
CE Energy Financing Program:	\$ 3,500,000.00	
	\$ 4,382,500.00	

Clean Energy Finance and Investment Authority
Financial Analysis
Condensed Statements of Net Assets for CEFIA Component Units
As of October 31, 2013

	<u>CEFIA Holdings LLC</u>	<u>CEFIA Solar Loan I</u>	<u>CEFIA Solar Services Inc.</u>	<u>CT Solar Lease 2 LLC</u>	<u>Eliminations</u>	<u>Consolidated Component Units</u>
Assets						
Cash - Unrestricted	23,280	145,485	500	310,812	-	480,077
Cash - Restricted: Operating & Maintenance Reserve	-	-	-	1,000,000	-	1,000,000
Cash - Restricted: Debt Reserve (ARRA)	-	-	-	3,502,972	-	3,502,972
Investment in CEFIA Solar Services, Inc.	100	-	-	-	(100)	-
Investment in CT Solar Lease 2 LLC	-	-	100	-	(100)	-
Due from CT Solar Lease 2 LLC - ARRA	-	-	3,500,000	-	(3,500,000)	-
Due from CT Solar Lease 2 LLC - Administration Fees	-	-	40,000	-	(40,000)	-
Due from CEIA Solar Services, Inc.	11,000	-	-	-	(11,000)	-
Due from CT Solar Loan I LLC	148,850	-	-	-	(148,850)	-
Residential Solar Loans	-	101,559	-	-	-	101,559
Residential Solar Loans - interest receivable	-	252	-	-	-	252
Prepaid Insurance	-	-	-	27,111	-	27,111
Total Assets	183,230	247,296	3,540,600	4,840,895	(3,700,050)	5,111,971
Liabilities						
Due to CEFIA	85,000	100,000	3,500,000	69,550	(3,500,000)	254,550
Due to CEFIA Holdings, LLC	-	148,850	11,000	-	(159,850)	-
Due To CEFIA Solar Services, Inc -Administration Fees	-	-	-	40,000	(40,000)	-
Due To Firstar Development LLC	-	-	-	97,596	-	97,596
Note Payable - CEFIA	-	-	-	2,300,000	-	2,300,000
Net Assets						
Capital Contribution - CEFIA	99,000	-	-	-	-	-
Capital Contribution - CI	1,000	-	-	-	-	-
Capital Contribution - Firstar Development LLC	-	-	-	236,594	-	236,594
Capital Contribution - CEFIA Solar Services	-	-	-	100	(100)	-
Capital Contribution ARRA- CEFIA Solar Services Inc.	-	-	-	3,500,000	-	3,500,000
Common Stock - Paid in Capital	-	-	100	-	(100)	-
Accumulated Income (Deficit)	(1,770)	(1,554)	29,500	(1,402,945)	-	(1,376,769)
Total Net Assets and Liabilities	183,230	247,296	3,540,600	4,840,895	(3,700,050)	5,011,971



CLEAN ENERGY
FINANCE AND INVESTMENT AUTHORITY

Memo

To: Board of Directors of the Clean Energy Finance and Investment Authority

From: Bryan Garcia (President and CEO), David Goldberg (Director of Government and External Relations), Ben Healey (Senior Manager of Clean Energy Finance), Dale Hedman (Director of Statutory and Infrastructure Programs), and Bert Hunter (EVP and CIO)

Cc: George Bellas (VP of Finance and Administration, Connecticut Innovations), Mackey Dykes (Chief of Staff), and Brian Farnen (General Counsel and Chief of Staff)

Date: November 8, 2013

Re: Class I REC Asset Portfolio from the Residential Solar Investment Program

Overview

Connecticut has an aggressive renewable portfolio standard policy (see Table 1). The deployment of solar photovoltaic (PV) systems and production of clean energy from such systems are eligible to supply RECs to help competitive electric suppliers and standard offer providers in CL&P and UI service territory satisfy their RPS compliance requirements. In general, every 1.0% of the Connecticut RPS represents about 275,000 RECs. In 2014, for example, approximately 3,025,000 RECs are estimated to be needed in order to satisfy the Class I RPS requirement. To put this number into perspective, the average 7 kW solar PV system in Connecticut generates about 8 RECs per year – or 0.0003% of the 2014 Class I RPS requirement. Put another way, over 375,000 households would have to install solar PV on their roofs in Connecticut to satisfy the amount of RECs required to meet the 2014 Class I RPS.

Table 1. Connecticut's Renewable Portfolio Standard

RPS Class	2014	2015	2016	2017	2018	2019	2020
Class I ¹	11.0%	12.5%	14.0%	15.5%	17.0%	19.5%	20.0%
Class II ²	3.0%	3.0%	3.0%	3.0%	3.0%	3.0%	3.0%
Class III ³	4.0%	4.0%	4.0%	4.0%	4.0%	4.0%	4.0%
Total	18.0%	19.5%	21.0%	22.5%	24.0%	26.5%	27.0%

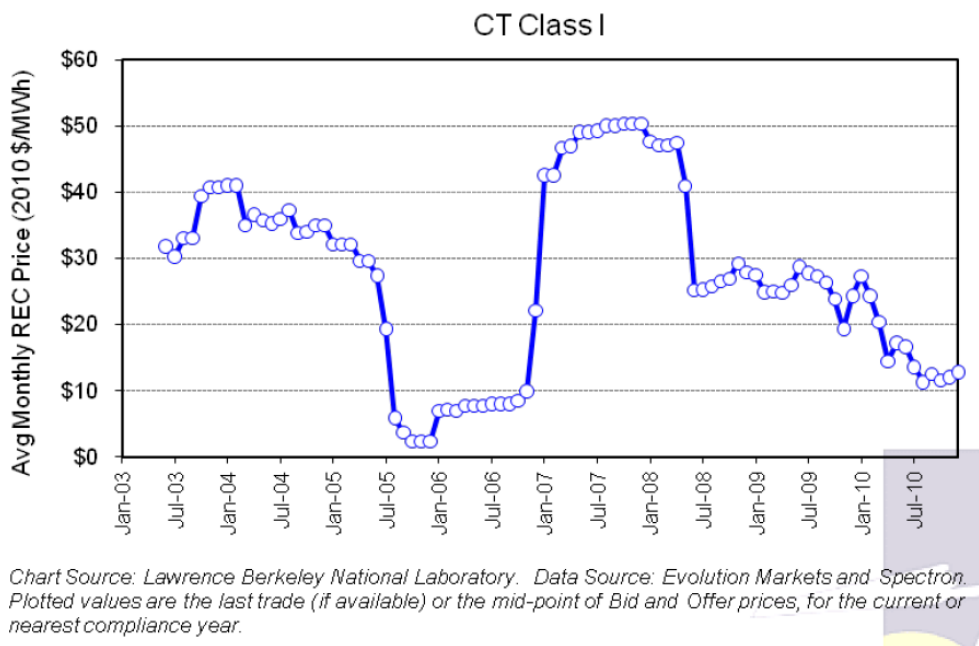
¹ Class I resources include electricity derived from solar power, wind power, fuel cells (using renewable or non-renewable fuels), geothermal, landfill methane gas, anaerobic digestion or other biogas derived from biological sources, ocean thermal power, wave or tidal power, low-emission advanced renewable energy conversion technologies, certain run-of-the-river hydropower facilities not exceeding 30 megawatts (MW) in capacity, and biomass facilities that use sustainable biomass fuel and meet certain emissions requirements. Electricity produced by end-user distributed generation (DG) systems using Class I resources also qualifies.

² Class II resources include trash-to-energy facilities, certain biomass facilities not included in Class I, and certain older run-of-the-river hydropower facilities.

³ Class III resources include: (1) customer-sited CHP systems, with a minimum operating efficiency of 50%, installed at commercial or industrial facilities in Connecticut on or after January 1, 2006; (2) electricity savings from conservation and load management programs that started on or after January 1, 2006, provided that on or after January 1, 2014, no such programs supported by ratepayers shall be eligible; and (3) systems that recover waste heat or pressure from commercial and industrial processes installed on or after April 1, 2007. The revenue from these credits must be divided between the customer and the state Conservation and Load Management Fund, depending on when the Class III systems are installed, whether the owner is residential or nonresidential, and whether the resources received state support.

If a competitive supplier or standard offer provider fails to satisfy the Class I RPS requirement, then they must pay an alternative compliance payment (ACP) of \$55 per REC for the amount of RECs that the supplier or provider is short. Currently, in Connecticut, Class I RECs are traded on the spot market in 2013 for greater than \$54. Historically, Class I REC prices have been volatile (see Figure 1).

Figure 1. Mid-Point of Bid and Offer Prices for Class I RECs in Connecticut from January of 2003 through July of 2010



Per Section 106 of Public Act 11-80, CEFIA is responsible for administering a Residential Solar Investment Program (RSIP) to deploy no less than 30 megawatts (MW) of new solar photovoltaic systems in Connecticut by the end of 2022. As the CEFIA Board of Directors is aware, the RSIP has achieved extraordinary success to date by deploying nearly 14 MW in 20 months since the start of the program in March of 2012. For homeowners that participate in the RSIP, the renewable energy credits (RECs)⁴ that are generated from the systems installed are owned contractually by CEFIA. Every solar photovoltaic system installed through the RSIP has real-time monitoring systems and revenue quality meters that measure the kilowatt-hours of clean energy produced from the system and thus account for the RECs being produced.

Given CEFIA’s ownership of Class I RECs through the RSIP, it is building a sizable asset that can be realized through spot market (i.e. a particular point in time) or future contract (i.e. a specified period of time) transactions whereby CEFIA’s RECs are sold to an interested buyer.

PURA Docket No. 13-02-03

In order to transact RECs in Connecticut, the regulator of the RPS market – the Public Utility Regulatory Authority (PURA) – must determine that a project (or projects) qualifies as a Class I eligible renewable energy technology. In anticipation of selling its Class I RECs from solar PV as a result of the RSIP, CEFIA registered a 30 MW solar PV facility with the New England Power Pool

⁴ 1,000 kilowatt-hours equals 1 megawatt-hour or 1 REC

Generation Information System (NEPOOL GIS) and was assigned a NEPOOL GIS Identification Number NON36589.

Subsequent to receiving its registration from the NEPOOL GIS, CEFIA submitted an application to PURA on February 5, 2013 – a little less than a year after the launch of the RSIP on March 1, 2012. CEFIA requested that PURA determine that the generating facilities being supported through the RSIP would qualify as a portfolio of projects as opposed to applying to PURA for each and every project. PURA determined that CEFIA’s request was consistent with the Class I RPS and that effective January 1, 2013 all RECs created as a result of the RSIP are deemed eligible to be aggregated as a generating behind-the-meter facility and assigned Registration No. CT 00534-13.

Class I REC Asset Portfolio Valuation

Through the RSIP, CEFIA is building a sizable REC asset – see Tables 2 and 3.

Table 2. Net Present Value of Class I RECs from an Average 7 kW Residential Solar PV Installation⁵

Length of Contract	\$25 REC Price	\$35 REC Price	\$45 REC Price
1-year	\$195	\$274	\$352
3-year	\$572	\$801	\$1,029
5-year	\$930	\$1,302	\$1,674
10-year	\$1,752	\$2,453	\$3,153

Table 3. Net Present Value of Class I RECs from 1 MW of Residential Solar PV Installations

Length of Contract	\$25 REC Price	\$35 REC Price	\$45 REC Price
1-year	\$27,912	\$39,076	\$50,241
3-year	\$81,700	\$114,380	\$147,060
5-year	\$132,883	\$186,037	\$239,190
10-year	\$250,261	\$350,365	\$450,470

Based on the average installed cost of \$31,700 for a 7 kW residential solar PV system, and the current level of RSIP incentive provided to these projects by CEFIA of \$8,800, a 10-year contract for RECs at \$35 a REC would generate approximately \$2,450 – or return nearly 30% of the RSIP back to CEFIA.

Depending upon the amount of Class I RECs available to sell, the price a buyer is willing to pay, and the length of time a buyer is willing to contract at (i.e., a one-time transaction for a single year is a spot market transaction, while a commitment to purchase over several years is a forward or future contract), CEFIA can realize additional cash flow into the organization that can be used for various purposes (i.e. administrative and program costs, financing programs, incentives, etc.). To date, CEFIA has reached 14 MW of residential solar PV capacity in Connecticut that will generate Class I RECs over the 25-year life of the projects (see Table 4).

⁵ Estimates are based on the following assumptions – 13% capacity factor, 0.5% degradation rate, a 2.0% discount rate, and an average system size of 7 kW based on the current program performance of the RSIP.

Table 4. Cumulative Amount of Class I RECs Produced Over Time from 14 MW of Residential Solar PV

Cumulative Class RECs Generated Over Time	Amount of Class I RECs
1-year	16,943
3-years	47,591
5-years	78,923
10-years	155,892

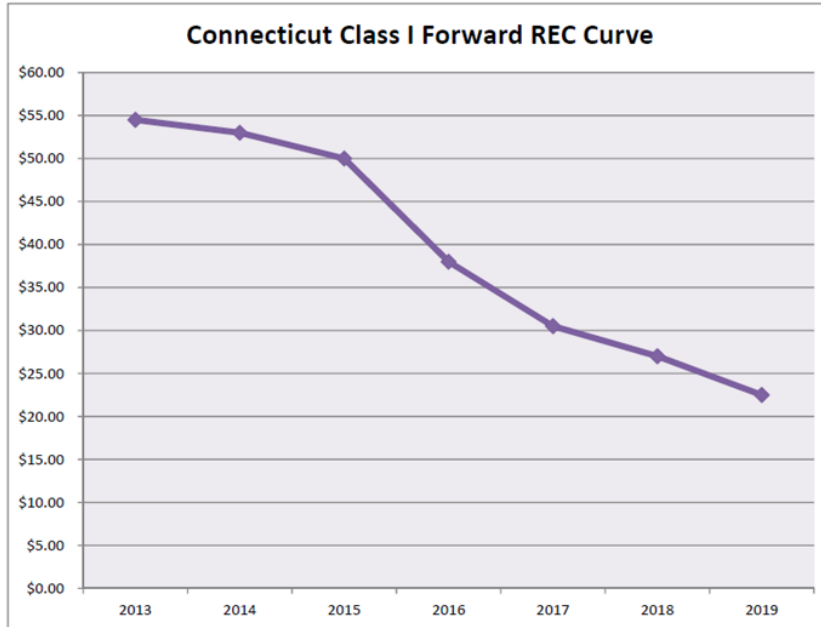
As a result of the successful implementation of the RSIP, CEFIA is producing Class I RECs that have the potential to generate additional revenues into the organization and continue to advance the mission of Connecticut’s “green bank”.

Request for Qualifications from REC Brokers

Over the summer, staff put out an RFQ to identify REC brokers who could potentially serve as CEFIA’s agent in helping us market and sell RECs generated by our RSIP portfolio. The heart of the RFQ was a request for each respondent to discuss the CT Class I REC market and demonstrate his or her understanding of how current and future market dynamics might affect CEFIA’s ability to most effectively monetize our REC portfolio. In particular, CEFIA sought to solicit each respondent’s insight into issues of forward versus spot pricing, contract length (1 year, 3-5 years, 5 years+), and the different options CEFIA could pursue in terms of marketing and selling its future stream of RECs via an auction process. The RFQ also requested indicative pricing from each respondent for a representative transaction or suite of services.

Through the RFQ, CEFIA identified five brokers whom we qualified as potential brokerage partners and whom we could call upon to market specific transactions: BGC Partners, Evolution Markets, GP Renewables, Marex Spectron, and Skystream. Representative pricing among the respondents ranged from 0.75% to 2.00% of proceeds, depending on deal size, and included various proposals for ancillary services. Since pricing responses to the RFQ were only representative and not fixed to specific deal terms, our intention in going to market will now be to ask each qualified broker to price a specific transaction that CEFIA would like to sell. Additionally, at that time, CEFIA will request a firm take-down fee associated with that transaction, so that we can partner with the broker who offers the most attractive combination of pricing, contract length, and transaction fees.

Based on responses to the RFQ and subsequent communications with the various REC brokers, we currently anticipate and modeled the forward price curve as set forth in the graphic below. The strategic decision for CEFIA will be to determine how much of a potential reduction in price CEFIA is willing to take in future years to lock in a longer term REC off-take contract.



Accordingly, staff requests approval by CEFIA’s Board of Directors to engage in contracts to monetize the RECs that have and are reasonably anticipated to accumulate by virtue of the program pursuant to guidelines and procedures that staff shall establish for such purposes.

Resolution

WHEREAS, Section 106 of Public Act 11-80 “An Act Concerning the Establishment of the Department of Energy and Environmental Protection and Planning for Connecticut’s Energy Future” (the “Act”) requires the Clean Energy Finance and Investment Authority (“CEFIA”) to design and implement a Residential Solar Photovoltaic (“PV”) Investment Program (“Program”) that results in a minimum of thirty (30) megawatts of new residential PV installation in Connecticut before December 31, 2022, and CEFIA has designed and implemented the Program;

WHEREAS, Pursuant to Conn. Gen Stat. 16-245a, a renewable portfolio standard (RPS) was established that requires that Connecticut Electric Suppliers and Electric Distribution Company Wholesale Suppliers (“Buyers”) obtain a minimum percentage of their retail load by using renewable energy.

WHEREAS, CEFIA has been assigned by New England Power Pool Generation Information System (“NEPOOL GIS”) an Identification Number NON36589 for the residential solar PV projects it supports through the Program, and subsequently the Public Utility Regulatory Authority (“PURA”) assigned a Registration No. CT 00534-13 to the behind-the-meter facilities supported by the Program;

WHEREAS, real-time revenue quality meters are included as part of solar PV systems being installed through the Program that determine the amount of clean energy production from such systems as well as the associated renewable energy credits (“RECs”) which, in accordance with Program guidelines, become the property of CEFIA to hold, manage and sell in CEFIA’s sole discretion;

WHEREAS, CEFIA staff seek to sell quantities of the Class I RECs produced as a result of the Program to Buyers who are seeking to comply with the Connecticut Class I RPS;

WHEREAS, CEFIA staff issued a Request for Qualifications on August 26, 2013 for brokers that are registered with the NEPOOL GIS to assist it in selling CEFIA's RECs (RFQ);

WHEREAS, CEFIA staff selected five brokers from the RFQ to sell RECs in Connecticut and act as CEFIA's preferred brokerage partners ("Preferred REC Brokers") and whom CEFIA could call upon to market specific REC transactions.

NOW, therefore be it:

RESOLVED, that the President of CEFIA and any other duly authorized officer of CEFIA, pursuant to guidelines and procedures that staff shall establish for such purposes in advance, is authorized to execute and deliver any contract with a Preferred REC Broker for the immediate and/or long-term sale of quantities of CEFIA's RECs from the Program, which shall include any applicable brokerage fees, as he or she shall deem to be in the interests of CEFIA and the ratepayers; and

RESOLVED, that the proper CEFIA officers are authorized and empowered to do all other acts and execute and deliver all other documents and instruments as they shall deem necessary and desirable to effect the above-mentioned legal instrument.



Memo

To: CEFIA Board of Directors

From: Bryan Garcia, President and CEO

Cc: Brian Farnen, General Counsel and CLO; Ben Healey, Senior Manager; Dale Hedman, Director of Statutory and Infrastructure Programs; and David Goldberg, Director of Government and External Relations

Date: December 13, 2013

Subject: Draft Guidelines and Procedures for CEFIA Management of Class I REC Asset Portfolio

Connecticut's aggressive Renewable Portfolio Standard ("RPS") requires a certain percentage of the state's electric load to come from renewable energy sources each year. That figure is 11% from "Class I" sources in 2014, rising steadily to 20% in 2020. RPS fulfillment is measured in Renewable Energy Credits ("RECs") – 1 REC per clean MWh generated – and the 11% of load required for 2014 represents approximately 3,025,000 Class I RECs in the coming year. A general "rule of thumb" is that each 1% of compliance towards the RPS requires about 275,000 RECs.

CEFIA owns the RECs from solar PV systems under the Residential Solar Investment Program, and the average RSIP system produces about 8 RECs per year. As CEFIA has now approved over 2,000 systems, we will have over 16,000 RECs to sell in the coming year alone.

The maximum price that RECs will sell for is \$55,¹ due to the Alternative Compliance Payment ("ACP") cap. However, the market is currently short RECs, given Connecticut's strong RPS, with the forward curve also fairly robust (see Figure 1 below). Assuming CEFIA were to sell the 16,000 RECs it expects to generate in 2014 through a future contract based on the forward curve for 2014 through 2019, then approximately \$3.5 million would be generated in 6 years at an average REC price of about \$37 per REC.

Bid-Offer Strategy with Brokers and REC Market Participants

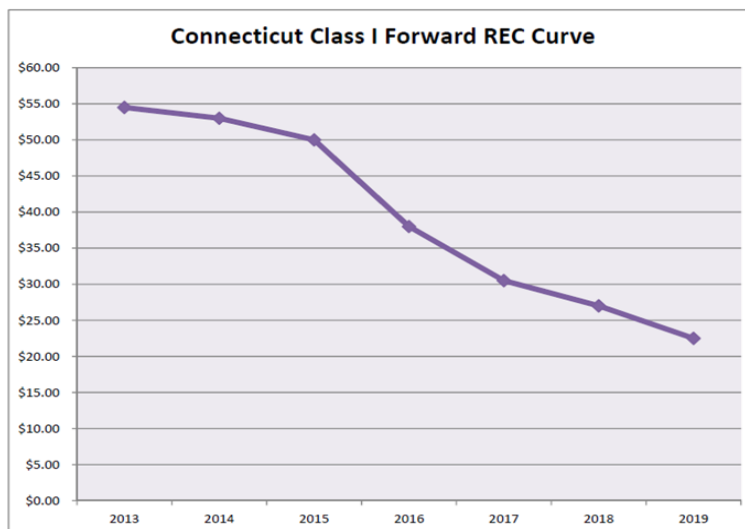
Over the summer of 2013, CEFIA ran a Request for Qualifications ("RFQ") process to select a limited pool of qualified brokers for the purpose of marketing and selling CEFIA's RECs via open-market auctions. We have now five qualified brokers whom CEFIA can use to sound the

¹ As mandated by Section 106 of PA 11-80, RECs will be certified only in Connecticut in order to fulfill the requirement that "the amount of renewable energy produced from Class I renewable energy sources ... under this section shall be applied to reduce the electric distribution company's Class I renewable energy source portfolio standard"

market and then price a transaction for us, when we are ready: BGC Partners, Evolution Markets, GP Renewables & Trading, Marex Spectron, and Skystream Markets.

As CEFIA’s Class I REC portfolio will continue to grow over time, it is an asset that will require ongoing monitoring and management by CEFIA staff. Therefore, we propose the attached guidelines and procedures to govern staff’s management of this portfolio (see Exhibit I). Staff would welcome feedback from the members of the Deployment and Budget & Operations Committees before finalizing these procedures.

Figure 1. Recently Quoted Price Curve for 2013-2019 Vintage Connecticut Class I Renewable Energy Credits



2013 Class I RECs

As a result of projects funded by CEFIA in 2013 and the Connecticut Clean Energy Fund (CCEF) prior, the following is a breakdown of Class I RECs that will be produced² as of November 30, 2013 – see Table 1.

Table 1. Class I 2013 RECs Expected to be Minted through November 30, 2013 from CEFIA and CCEF Funded Projects

	RSIP³	OSDG – Solar PV	OSDG – Fuel Cell	Total
Projects Installed as of November 30, 2013	1,201	45	-	1,246
Installed Capacity (kW)	8,413	7,779	-	16,192
Class I RECs Produced	5,617	7,862	-	13,479

² RECs are not actually “produced” or “minted” until months after the MWh production is generated. For example, 2013-Q3 RECs will not be minted until January 15, 2014, over six months since the commencement of 2013-Q3 (July 1). This timing will also have cash flow implications, as revenue cannot be fully realized until the RECs have been minted and transferred to a buyer.

³ As of November 29, 2013, there are 2,194 residential solar PV projects approved by CEFIA for incentives through the RSIP. Of these approved projects, 1,201 are completed, 391 are in progress, and 602 are approved and moving towards implementation.

in 2013⁴				
RECs Sold in 2013 by Long-Term Contracts	0	0	0	0

Of the Class I RECs that have been or will be minted from 2013 generation from CEFIA and CCEF funded projects, 10,000 are committed for sale through existing long-term contracts entered into by the CCEF at a price of \$15, leaving the remainder of the Class I RECs available for sale in 2013. Note, this does not include the Class I RECs expected to be generated through the rest of the calendar year.

Long-Term REC Purchasing Strategy with the EDCs

Section 71 of Public Act 07-242⁵ would allow Connecticut Electric Distribution Companies (EDCs) to enter into long-term contracts for RECs to support the RPS. CEFIA engaged with both the EDCs and Public Utilities Regulatory Authority (“PURA”) to determine if there was an opportunity for the EDCs to be a long(er)-term counter-party to CEFIA class I RECs. It was determined that the current policy is not to engage in long-term contracts, but rather contracts for shorter durations. CEFIA will continue to monitor EDC REC contracting and determine if there is an opportunity to engage the EDCs in shorter-term REC contracts as one component of our Class I asset management.

⁴ Class I RECs produced includes estimates for October and November.

⁵ Sec. 71. Section 16-245a of the general statutes is amended by adding subsection (g) as follows (*Effective from passage*):

(NEW) (g) (1) Notwithstanding the provisions of this section and section 16-244c, as amended by this act, for periods beginning on and after January 1, 2008, each electric distribution company may procure renewable energy certificates from Class I, Class II and Class III renewable energy sources through long-term contracting mechanisms. The electric distribution companies may enter into long-term contracts for not more than fifteen years to procure such renewable energy certificates. The electric distribution companies shall use any renewable energy certificates obtained pursuant to this section to meet their standard service and supplier of last resort renewable portfolio standard requirements.

(2) On or before July 1, 2007, the department shall initiate a contested case proceeding to examine whether long-term contracts should be used to procure Class I, Class II and Class III certificates. In such examination, the department shall determine (A) the impact of such contracts on price stability, fuel diversity and cost; (B) the method and timing of crediting of the procurement of renewable energy certificates against the renewable portfolio standard purchase obligations of electric suppliers and the electric distribution companies pursuant to subsection (a) of this section; (C) the terms and conditions, including reasonable performance assurance commitments, that may be imposed on entities seeking to supply renewable energy certificates; (D) the level of one-time compensation, not to exceed one mill per kilowatt hour of output and services associated with the renewable energy certificates purchased pursuant to this subsection, which may be payable to the electric distribution companies for administering the procurement provided for under this subsection and recovered as part of the generation services charge or through an appropriate nonbypassable rate component on customers' bills; (E) the manner in which costs for such program may be recovered from electric distribution company customers; and (F) any other issues the department deems appropriate. Revenues from such compensation shall not be included in calculating the electric distribution companies' earnings to determine if rates are just and reasonable, for earnings sharing mechanisms or for purposes of sections 16-19, 16-19a and 16-19e, as amended by this act.

RESOLUTION

WHEREAS, Article V, section 5.3.2 of the Clean Energy Finance and Investment Authority (CEFIA) Bylaws requires the Budget and Operations Committee (the “B&O Committee”) to recommend and monitor compliance with prudent fiscal policies, procedures, and practices to assure that CEFIA has the financial resources and financial strategy necessary to carry out its statutory responsibilities and mission;

WHEREAS, Article V, section 5.3.3 of the CEFIA Bylaws requires the Deployment Committee to provide oversight of policies and practices relating to the evaluation and recommendation of initial investments, follow-on investments, investment modifications and restructurings, and the sale or other disposition of investments by the Authority’s professional investment staff, including implementation of investment exit strategies; and

WHEREAS, both the Deployment and B&O Committees recommend to the Board for approval the draft Guidelines and Procedures for CEFIA Management of Class I REC Asset Portfolio in substantially the form provided to the committees in the memorandum dated December 4, 2013 and which may be revised by CEFIA staff from time to time to incorporate the recommendations of independent third party consultants with REC market expertise.

NOW, therefore be it:

RESOLVED, that the CEFIA Board of Directors approve the Guidelines and Procedures for CEFIA Management of Class I REC Asset Portfolio in the form provided to the Board in the memorandum dated December 13, 2013 and which may be revised by CEFIA staff from time to time to incorporate the recommendations of independent third party consultants with REC market expertise.

EXHIBIT I

Draft Guidelines and Procedures for CEFIA Management of Class I REC Asset Portfolio

Objective: maximize the value of CEFIA's Class I REC asset portfolio to generate revenues that can support the mission of the organization, while taking appropriate measures to hedge portfolio risk over both the short and long terms

Step 1

Beginning March 31, 2014, and thereafter quarterly ~~On an ongoing basis, but not less than once annually,~~ CEFIA staff will evaluate the status of its Class I REC asset portfolio, including the identification of specified key elements of value and risk:

- Current installed capacity (in megawatts (MW)) under the Residential Solar Investment Program or its successor programs. This evaluation will include:
 - o A "look-back" to determine the trajectory of capacity growth, as well as an analysis of any specific drivers that may have led that trajectory to deviate from historical averages
 - o Projections of future capacity build-out
 - A confidence interval will be applied to these projections to enable CEFIA to evaluate the risk of actual installed capacity growth being higher or lower than projected
- REC production, historically by quarter (actual metered generation and registered on NEPOOL-GIS). This evaluation will include:
 - o An analysis demonstrating the relationship between installed capacity and REC production, with a specific focus on the NEPOOL-GIS REC-minting lag between new residential solar PV capacity and the production of REC assets
 - o Projections of estimated future REC production
 - A confidence interval will be applied to these projections to enable CEFIA to evaluate the risk of actual future REC production being higher or lower than projected, based on an analysis of (technology) performance risk (e.g. outages), weather (insolation) variation, and degradation of performance over time

Step 2

On an ongoing basis, but not less than semiannually, CEFIA staff will evaluate the status of the REC markets through conversations with qualified REC brokers, as well as publications and organizations that track the fundamentals of the New England REC markets for insight into policy changes both within Connecticut and elsewhere that might affect the CT Class I market, including the identification of ~~with a focus on identifying~~ specified key elements of value and risk:

- REC prices in both the spot and future markets. This evaluation will include:
 - o A "look-back" to determine REC prices over the previous six months and current market trends
 - o An internal analysis of forward pricing curves ~~from provided by~~ at least two brokers going out no fewer than 3-5 years. This analysis will consider, as available, both pricing and bid-offer spreads, as well as the freshness and volume of relevant data points
 - o An assessment of Integrated Resource Plan ("IRP") proceedings and other Department of Energy and Environmental Protection ("DEEP") and PURA policy

actions that could have a material impact on REC market prices, as well as ideal market timing and contract length

- ~~Furthermore, a qualitative analysis will be undertaken describing any existing or projected price volatility to help guide CEFIA staff decisions about market risk~~An evaluation of market fundamentals, using quantitative methodology where possible, to help guide CEFIA staff decisions about market risk, considering any existing or projected price volatility
- This evaluation will include the identification of potentially large, binary, or non-diversified risk events that could materially impact market prices, as well as the timing for when information about such events could become available. CEFIA staff will evaluate alternative scenarios to the degree that they may highlight the value of acting promptly or waiting for resolution, considering opportunity costs, option theory, etc.

- Contract Length

- Using the forward pricing curves obtained, CEFIA staff will create a matrix to help determine the amount of value (in NPV terms, applying the rate of inflation as the discount rate) potentially sacrificed per REC, in exchange for locking in firm pricing for each vintage year

Step 3

After evaluating the status of CEFIA's existing and projected portfolio at any point in time, CEFIA staff will work with at least one qualified broker selected through CEFIA's Request for Qualifications process to price a variety of potential REC transactions:

- In the spot market, the following conditions must be met for CEFIA staff to transact RECs:
 - The RECs must be officially registered on NEPOOL-GIS
 - In general, the RECs should be offered on the market through a qualified broker. ~~(However, on an exception basis, staff can enter directly into a bilateral agreement with a REC purchaser if price discovery has occurred, meaning that CEFIA has either:~~
 - Already priced the RECs on the market via quotes offered by at least two qualified brokers; or
 - Received market reports from at least two qualified brokers that provide certainly strong evidence of around current spot market prices
 - Unless approved by at least two Officers of CEFIA and as justified by a comprehensive memo articulating the reasons for deviation from standard practice, ~~the~~ REC sale price must be ~~no less than 10% below~~ at least 90% of the average weighted sale price, as quoted by at least two qualified brokers, of spot market transactions over the previous quarter, unless that sale price has declined by at least 10% from the beginning to the end of that quarter
 - The purchaser must be either an investment-grade counterparty or ~~have successfully closed at least one REC purchase transaction of similar size per year over the previous three years~~ a non-investment-grade counterparty who has provided appropriate financial safeguards (i.e. letter of credit, escrow agreement, bonding)
- In the forward market, the following conditions must be met for CEFIA staff to transact RECs:

- Based on staff estimates of future REC production in Step 2 above, as bracketed by a 95% confidence interval, no more than 75% of that 95% lower bracket may be transacted through a “non-contingent” forward contract, in which CEFIA agrees to supply a fixed number of RECs on a given date(s) in the future
- Up to 100% of all future RECs may be transacted through a “unit contingent” forward contract, in which the purchaser agrees to take however many RECs CEFIA ~~chooses to supply~~ the portfolio (or a specified percentage thereof) produces (up to a specified maximum quantity) on a given date(s) in the future⁶
- ~~All RECs to should~~ be offered on the forward market ~~must be priced~~ through a qualified broker (although CEFIA staff can choose to enter directly into a bilateral agreement with a REC purchaser if price discovery has occurred)
- Unless approved by at least two Officers of CEFIA and as justified by a comprehensive memo articulating the reasons for deviation from standard practice, ~~the~~ REC sale price for each vintage year must be ~~no less than 10% below~~ at least 90% of the average forward curve price quoted by at least two qualified brokers for that vintage year, for both non-contingent and unit-contingent RECs, respectively
- The purchaser must be either an investment-grade counterparty ~~or~~ a non-investment-grade counterparty who has provided appropriate financial safeguards (i.e. letter of credit, escrow agreement, bonding) and who have has successfully closed at least one REC purchase transaction of similar size per year over the previous three years, unless approved by at least two Officers of CEFIA and as justified by a comprehensive memo articulating the reasons for deviation from standard practice

In all cases, CEFIA staff will seek to limit transaction costs⁷ while simultaneously taking advantage of expert advice to ensure the organization:

- Locks in attractive pricing where possible;
- Limits downside exposure;
- Retains the opportunity for upside gains; and
- Provides some level of revenue certainty for planning purposes, in terms of reinvestment of REC proceeds.

⁶ In this case the buyer has the obligation to purchase any RECs produced up to the offer quantity at the agreed upon price. Conversely for a unit-contingent transaction, CEFIA as the seller must sell any RECs produced up to the offer quantity at the agreed upon price. If production falls short, there is no penalty to CEFIA. If production is in excess of the 100% estimate, then CEFIA will sell the over-supply on the spot market as described above.

⁷ One approach to limiting transaction costs will be to draft a standard REC Purchase and Sale Agreement that CEFIA can reuse over time, and that will help limit failed closings by providing upfront clarity to prospective purchasers as to expected terms and conditions.



CLEAN ENERGY

FINANCE AND INVESTMENT AUTHORITY

BOARD OF DIRECTORS

REGULAR MEETING SCHEDULE FOR 2014

The following is a list of dates and times for **regular meetings** of the Clean Energy Finance and Investment Authority's Board of Directors through 2014.

- January 17, 2014 – Regular Meeting from 9:00 to 11:00 a.m.
- April 25, 2014 – Regular Meeting from 9:00 to 11:00 a.m.
- June 20, 2014 – Regular Meeting from 9:00 to 11:00 a.m.
- July 18, 2014 – Regular Meeting from 9:00 to 11:00 a.m.
- October 17, 2014 – Regular Meeting from 9:00 to 11:00 a.m.
- December 19, 2014 – Regular Meeting from 9:00 to 11:00 a.m.

Should a **special meeting** need to be convened for the CEFIA Board of Directors to review staff proposals or to address other issues that arise, a meeting will be scheduled accordingly.

All regular and special meetings will take place at the:

Clean Energy Finance and Investment Authority
845 Brook Street, Building #2
Albert Pope Board Room
Rocky Hill, CT 06067



CLEAN ENERGY

FINANCE AND INVESTMENT AUTHORITY

AUDIT, COMPLIANCE AND GOVERNANCE COMMITTEE **REGULAR MEETING SCHEDULE FOR 2014**

The following is a list of dates and times for regular meetings of the Clean Energy Finance and Investment Authority's Audit, Compliance and Governance Committee through 2014.

- Wednesday, April 15, 2014 – Regular Meeting from 1:00pm - 2:00pm
- Wednesday, October 15, 2014 – Regular Meeting from 1:00pm - 2:00pm

All regular meetings will take place at:

Clean Energy Finance and Investment Authority
845 Brook Street, Building #2
Albert Pope Board Room
Rocky Hill, CT 06067



CLEAN ENERGY

FINANCE AND INVESTMENT AUTHORITY

CEFIA BUDGET AND OPERATIONS COMMITTEE 2014 REGULAR MEETING **SCHEDULE**

The following is a list of dates and times for regular meetings of the Clean Energy Finance and Investment Authority's Budget and Operations Committee through **2014**.

- Friday, May 16, 2014 – Regular Meeting from 2:00 to 3:30 p.m.
- Monday, June 9, 2014 – Regular Meeting from 2:00 to 3:30 p.m.

All regular meetings will take place at:

Clean Energy Finance and Investment Authority
845 Brook Street, Building #2
Albert Pope Board Room
Rocky Hill, CT 06067



CLEAN ENERGY

FINANCE AND INVESTMENT AUTHORITY

REGULAR DEPLOYMENT COMMITTEE 2014 MEETING SCHEDULE

The following is a list of dates and times for regular meetings of the Clean Energy Finance and Investment Authority's Deployment Committee through **2014**.

- Wednesday, February 5, 2014 – Regular Meeting from 1:00pm – 2:00pm
- Friday, March 7, 2014 – Regular Meeting from 3:00pm – 4:00pm
- Thursday, May 15, 2014 – Regular Meeting from 2:00pm – 3:00pm
- Monday, September 8, 2014 – Regular Meeting from 2:00pm – 3:00pm
- Tuesday, November 18, 2014 – Regular Meeting from 2:00pm – 3:00pm

All regular meetings will take place at:

Clean Energy Finance and Investment Authority
845 Brook Street, Building #2
Albert Pope Board Room
Rocky Hill, CT 06067



Memo

To: CEFIA BOD
From: Kim Stevenson, Associate Director Multifamily Housing
CC: Jessica Bailey, Andy Brydges, Mackey Dykes, Bryan Garcia, Dave Goldberg, Brian Farnen, Ben Healey, Dale Hedman, Bert Hunter, Kerry O’Neill, Genevieve Sherman
Date: December 5, 2013
Re: Update on CEFIA Multifamily and Affordable Housing Initiatives

EXECUTIVE SUMMARY

CEFIA is developing several multifamily and affordable housing (MFAH) programs, which is a new area of program development and a priority for CEFIA. We will propose new MFAH programs to the CEFIA Board of Directors for input and approval in the first half of FY 14. We have also established working relationships with key channel partners to begin sourcing deal flow, with a prospective pipeline of well over 2,000 units.

Implementing energy improvements in the MFAH market has been difficult to achieve, both in Connecticut and nationally, because of challenges related to securing financing, split incentives between owners and tenants, lack of reliable performance data and case studies to build investor confidence, as well as various other challenges. Therefore, a key tenet of CEFIA’s MFAH strategy has been to identify and bring in national leaders, from within and outside Connecticut, with demonstrated ability to “*crack the multifamily housing nut*” and successfully build and close deal flow and run programs. We have two strong partnerships lined up, each with nationally recognized MFAH experts on their teams, and who are bringing resources to Connecticut to build the market – attracted by the cutting edge clean energy leadership and achievements underway in Connecticut.

As with all CEFIA programs, our approach is to use the minimum level of CEFIA funds necessary to support the market, and then to reduce CEFIA’s participation over time as the market takes off and the private sector takes over. CEFIA has four major multifamily affordable housing initiatives in place, which are described in detail in this document:

1. *Building the Multifamily Market through C-PACE*
2. *Building the Multifamily Market through CDFI's and Strategic Partners*
3. *WINN-HUD open market ESCO*
4. *CT Housing Finance Authority Partnership*

BACKGROUND

Connecticut's Multifamily and Affordable Housing (MFAH) sector presents a critical imperative and significant opportunity for investment in clean energy improvements, with a priority focus on affordable housing, and targeted to:

- Reduce energy costs for residents as well as energy and energy-related maintenance costs for building owners,
- Fund all cost effective energy measures, within the context of a building's lifetime capital improvement plan, including energy related capital improvements, and
- Improve the safety, health and comfort of low income residents.

This MFAH opportunity sits at the nexus of priorities established by the [Connecticut Comprehensive Energy Strategy](#)¹ established by DEEP, [Governor Malloy's Commitment to Affordable Housing](#) including more than \$360 million for State funded affordable housing projects for seniors, working families, young professionals and other residents, and [CEFIA's Comprehensive Plan](#). It includes an important partnership with the CT Housing Finance Authority (CHFA), which finances approximately 45% of the State's affordable, multifamily units¹ and has a [stated policy](#) to require cost effective energy efficiency measures in all multifamily developments as well as support for the use of renewable and alternative energy.

CEFIA began a concerted effort to build deployment capacity in the MFAH sector during Q3 of 2013 as Kim Stevenson transitioned from winding down legacy CT Clean Energy Fund (CEEF) Technology Innovation Programs into the new role of spearheading CEFIA's Multifamily and Affordable Housing Programs, where she has deep expertise and previous professional experience.

This initiative began with a review of the MFAH sector to identify priority opportunities and challenges as well as holding exploratory meetings to establish relationships with sector leaders and key stakeholders including: CHFA, U.S. Department of Housing and Urban Development (HUD), CT based Community Development Financial Institutions (CDFI's), Utilities (CL&P and UI), CT Housing Coalition, Community Action Councils, CT Department of Public Health (DPH),

¹ Over the past 40 years, CHFA has provided financing for the acquisition, construction and/or rehabilitation of more than 35,800 units of affordable rental housing for families and the elderly across Connecticut.

Operation Fuel, and various private and non-profit housing developers. CEFIA's overarching strategy in building deployment capacity in the multifamily affordable housing sector is to identify and fill gaps and leverage CEFIA resources by supporting and partnering with organizations identified with a demonstrated track record of success both in Connecticut and nationally.

During Q3 and Q4 2013 CEFIA made significant progress in identifying opportunities and gaps for CEFIA's MFAH initiatives. We are now establishing important partnerships and are preparing to initiate programs that will require CEFIA Board input, support and approval in Q1 and Q2 of 2014. To that end, this document provides market context, an update on CEFIA's MFAH initiatives, as well as anticipated programs we will be bringing to the CEFIA BOD in 2014.

MARKET OPPORTUNITY AND CHALLENGES

Opportunity

Deployment of cost effective energy efficiency and renewable energy improvements in multifamily housing is sorely lacking in Connecticut (and nationally) and presents significant opportunity for investment. CEFIA estimates, conservatively, that potential annual utility cost savings for the multi-family housing sector is on the order of \$125 million per year².

Much of this housing stock was built before 1970 and now faces significant needs for energy updates and other capital improvements. Approximately 45% of multifamily housing units in Connecticut are located in properties with 20 or more units, which are predominantly concentrated in the State's largest cities (Bridgeport, Hartford, New Haven, Stamford, Waterbury), as well as located near existing or planned natural gas lines. Many are heated by oil furnaces and electrical heating systems, offering significant opportunity for fuel conversion to natural gas as well as other clean energy measures.

The "Fuel Poverty" Imperative

Home energy bills present a significant financial burden to low-income residents in Connecticut, where about one in five households cannot afford to pay their energy bills. These findings are based on a [*study recently commissioned by Operation Fuel*](#). The annual home energy affordability gap currently is about \$700 million for more than 295,000 Connecticut households with incomes at or below 200 percent of the Federal Poverty Level. This means that the average low-income household owes about \$2,363 more in energy bills than it can afford to pay³.

² This number assumes approximately 250,000 units in multi-family buildings (defined as buildings with 5 or more units) with potential to reduce average annual utility costs on the order of about \$500/unit).

³ The Affordability Gap measures the dollar amount by which actual home energy bills exceed affordable home energy bills. If a Connecticut household has an annual income of \$12,000 and an annual home energy bill of \$3,000, that household has a home energy burden of 25% ($\$3,000 / \$12,000 = 0.25$). An *affordable* home energy burden is set at 6% of annual income.

The primary source of energy assistance for Connecticut's lower-income households is the federal [Low-Income Home Energy Assistance Program \(LIHEAP\)](#). With a CT state allocation of about \$76 million, LIHEAP covers less than 11 percent of the state's home energy affordability gap. As a result, Connecticut's lower-income families and elderly residents must often choose between energy, food and other basic necessities and look to organizations such as Operation Fuel for energy assistance.

Clearly, realizing the savings potential of clean energy improvements reduces the need for families to make hard spending choices around basic necessities.

Gaps and Challenges

Connecticut's (as well as the nation's) multifamily residential sector has been difficult to penetrate for a multitude of reasons. These include:

- Lack of available capital to plan and finance upgrade costs (beyond incentives provided by utility and other programs)
- Challenges in securing lender consent for additional, secured financing because of programmatic prohibitions against new property liens (e.g. HUD- and FHA-financed properties), limited or non-existent borrower guarantees (e. g. tax credit projects, housing authorities, FHA-insured projects and securitized debt), or lack of other pledgeable assets, suitable security or limited cash flow or liquidity that prohibits use of conventional financing because of the limited financial strength of many property owners in low-income communities
- Split incentives related to utility cost savings between tenants and owners
- Energy-related health and safety conditions and building code violations, which are often costly, and must be remediated before weatherization and energy related improvements can move forward
- Property owner (customer/ demand side) confusion in negotiating the efficiency and renewable energy improvement process, identifying and securing reliable contractors, and navigating financial and other resources available
- Lack of performance data and case studies to build the business case and tell the story
- Lack of general market knowledge around implementation and benefits, as well as effective marketing efforts

CEFIA MULTIFAMILY HOUSING INITIATIVES

Certainly the biggest challenge confronting the MFAH sector has been building deal flow and closing deals, despite the significant investment opportunity. Therefore, a key tenet of CEFIA's strategy has been to identify and bring in national leaders, from within and outside

Connecticut, with demonstrated ability to “*crack the multifamily housing nut*” and successfully build and close deal flow and run programs. We have two stellar partnerships lined up, each with nationally recognized MFAH experts on their teams, and who are bringing, in combination, approximately \$1.5MM of their own funding and resources to Connecticut to build the market – attracted by the cutting edge clean energy leadership and achievements underway in Connecticut.

Our overall market development approach responds to the key gaps and challenges identified above and, with several strategic partners, we plan to support financing programs and products that provide:

1. ***C-PACE multifamily loans, made on the basis of projected energy cost savings, and secured by a public benefit assessment and lien on the property.*** Based on our current pipeline, we anticipate early C-PACE projects to include CHFA financed properties as well as market rate multifamily rental properties that can secure the lender consent required for C-PACE financing. Properties are anticipated to contain 100 units or more, given the project size needed to make C-PACE economics work.
2. ***Unsecured multifamily loans, made on the basis of projected energy cost savings, with credit enhancements from CEFIA,*** predominantly anticipated to consist of loan loss reserves. Given the programmatic and financial barriers described above, many MFAH properties, especially those with existing HUD or FHA financing or insurance, are banned from securing the lender consent required for C-PACE financing and, in most cases, can take on unsecured debt only. This category includes HUD funded public housing, all FHA and HUD funded or insured properties, as well as many of the underserved 3- to 6-unit buildings in our large cities, which are often over 100 years old, and in great need of energy and other capital improvements.

Channel Partners

We have identified the following organizations as key channels partners for building CEFIA’s MFAH pipeline, and have begun to establish working relationships with each. CHFA, in particular, is a critical partner, with whom CEFIA has been working closely on all our MFAH initiatives, including program development and sourcing deals.

- Connecticut Housing Finance Authority (CHFA)
- Connecticut Housing Coalition
- Community Action Councils
- Community Development Financial Institutions (CDFI’s)
- Federal Department of Housing and Urban Development (HUD)
- Large multifamily property owners and developers, both private and non-profit
- Public Housing Authorities, both state and federally financed
- Utility companies CL&P and UI, including properties deferred from weatherization and other energy improvements due to health and safety hazards

As with all CEFIA programs, our approach is to use the minimum level of CEFIA funds necessary to catalyze the market and leverage/ secure initial private funds, and then to reduce CEFIA's participation over time as the market takes off and the private sector takes over.

CEFIA has four major multifamily affordable housing initiatives in place, described below:

1. *Building the Multifamily Market through C-PACE*
2. *Building the Multifamily Market through CDFI's and Strategic Partners*
3. *WINN-HUD open market ESCO*
4. *CT Housing Finance Authority Partnership*

1. Building the Multifamily Market through C-PACE

CEFIA C-PACE Multifamily Housing Partner

CEFIA's strategy here is to secure and support a C-PACE multifamily housing partner who will be responsible for sourcing C-PACE multifamily transactions, providing technical assistance to owners in developing and submitting applications, and structuring and financing C-PACE eligible energy upgrades. The partner will be compensated on a fee-for-service basis, incorporated into origination and other transaction fees. CEFIA, in turn, will support its multifamily financing partner in building the C-PACE pipeline through lead referrals to qualified projects and by making CEFIA endorsed introductions to key channels partners. CEFIA will also provide credit enhancements to help catalyze the pipeline and close deals, if necessary. We will provide third party technical review and underwriting, as we do for all C-PACE deals.

CEFIA released an RFP for a C-PACE multifamily financing partner in October, 2013. The Urban Ingenuity team, including Clean Energy Solutions, Inc. and financing partners Hannon Armstrong and Wells Fargo Securities, was notified as the winning recipient in November, 2013. The team has secured a capital pool of \$900 million that is available for direct investment in building retrofit projects within the State of Connecticut. Urban Ingenuity estimates that the team will invest time and other resource investments valued at about \$500,000 in the first year of program operations.

Urban Ingenuity serves as Program Administrator for the Washington DC Commercial PACE program and is responsible for shepherding the first multifamily PACE project in the nation to closing.

Pipeline

There are currently 20 MFAH applications in the C-PACE pipeline, from private and non-profit owners, representing 12 municipalities. These prospects conservatively include well over 1,000 residential units and over 1.2 million square feet. CEFIA has received inquiries from 25 additional prospects, with that number now growing daily.

Key Milestones and Next Steps

CEFIA and Urban Ingenuity are currently in the process of establishing partnership terms prior to executing a Letter of Agreement (LOA). Once a LOA is in place, we will formally announce the partnership and CEFIA will initiate introductions to the key channel partners. We will keep the CEFIA BOD apprised of investment progress, as we do for all C-PACE projects. If multifamily specific credit enhancements are necessary for this program, we anticipate seeking CEFIA BOD support and approval in Q1 2014.

2. Building the Multifamily Market through CDFI's and Strategic Partnerships

For multifamily affordable housing projects where C-PACE financing is either not allowed or not a good fit, we are pursuing a strategy to support community development financial institutions (CDFIs) in building their capacity to offer clean energy loan products with strategic channel partners to support deal flow and a CEFIA endorsed technical assistance partner available to support owners in navigating the energy improvement process, and to support CDFIs in building capacity.

Proposed Use of CEFIA Funds/ Credit Enhancements

CEFIA funds of \$4MM, out of the \$5MM budgeted in FY14 for multifamily residential loans, are targeted to be used for these programs. They will be targeted as credit enhancements to support existing and new loan programs run by qualified CDFIs, and made available through a competitive RFP process. Loan programs are anticipated to include, but not be limited to the following:

- Working capital loans to perform necessary pre-development work, including energy audits, required to define project improvement scopes of work and make go/ no go investment decisions on energy improvements
- Bridge loans to cover utility incentives up front, enabling them to be factored in with equity and similar funding sources, thereby increasing the amount of debt financing that can be leveraged as well as the extent of cost effective clean energy improvements that can be made
- Long-term gap financing for comprehensive, cost effective energy improvements, including remediation of energy-related health and safety issues
- Construction and permanent financing for property renovation, to enable deeper and more comprehensive, cost effective energy improvements than were previously possible

Pool of Funds Concept

CEFIA's proposed approach is to establish a pool of funds from which the CDFIs can make minimum and maximum draws for credit enhancements awarded to loan programs proposed through the RFP process. Once a full draw is almost exhausted, a subsequent draw may be

requested. If drawn funds are not used within a pre-determined timeframe, they must be returned to the pool, thus incenting and ensuring funds are available for high performers. CEFIA funds for credit enhancements are expected to be made available to all pool participants until fully disbursed. CEFIA will set floors and ceilings on available credit enhancements – and establish a supportive competitive environment to incent getting loans closed, high quality projects done, cost reduction over time, and maximum leverage of CEFIA dollars with private funds.

Strategic Partnerships

- *CEFIA MFAH Technical Assistance Partner* – As CEFIA’s prospective MFAH Technical Assistance Partner, the team of [New Ecology](#) and [CNT Energy](#) will be recommended to multifamily property owners as a trusted energy advisor and owner’s agent to help navigate the energy improvement process including: benchmarking, auditing, scoping, financing, implementing, commissioning and post-completion monitoring.

New Ecology and CNT Energy are both nationally recognized leaders in building and operating successful MFAH energy improvement programs. They have been funded by the [JPB Foundation](#) of NY, focused on poverty alleviation, to develop the *National Delivery Network for Energy-Efficiency Services to Multifamily Affordable Housing Owners*.

Connecticut has been strategically identified as one of their first locations, where this team plans to open and staff an office and invest approximately \$1MM (\$500K cash/ \$500 in-kind) to help build the market.

- *CT Housing Investment Fund (CHIF)/ CL&P Multifamily Loan Fund (Pilot)* - [CHIF](#), a Hartford based CDFI, has played a leadership role in establishing and operating energy conservation loan funds for housing that serves low income residents in Connecticut. CHIF and CL&P are currently establishing a Multifamily Loan fund for owners of affordable multifamily properties to enable their participation in CL&P’s Home Energy Solutions-Income Eligible (HES-IE) program when other financing is not feasible. It will enable owners to fund the non-rebated portion of HES-IE project costs when other financing options are not available due to restrictions imposed by the underlying financing or limitations of the ownership structure.

CHIF Loan Loss Reserve Funded using CEFIA Innovation RFP Award of \$300,000

CHIF has secured a capital commitment of \$1 million for this multifamily fund through the [Opportunity Finance Network](#), a national technical assistance and funding organization serving the CDFI industry. CHIF was also awarded \$300,000 of American Recovery and Reinvestment Act (ARRA) funding by CEFIA as part of the CEFIA Innovation RFP in 2012. This award will be used as a loan loss reserve for the OFN funding, and for other third-party capital CHIF is able to raise, as this loan product shows proof of concept. CEFIA is currently

negotiating funding terms with CHIF and anticipates signing a funding agreement later this month or in early 2014.

Capitalization Request to CEFIA from CHIF and CL&P for \$1MM

In addition, CL&P has asked CEFIA to consider providing an additional \$1 million of capital to fund this loan program, in place of it coming from CT Energy Efficiency Fund (CEEF) funds. CEFIA has indicated that we are receptive to this request, however, terms must be negotiated with CHIF and CL&P and the request must go through CEFIA's diligence process and be approved by its Board of Directors. We plan to handle this request through the CEFIA strategic investment process and, if approved, funds would come out of the \$5MM budgeted for multifamily residential loans. Anticipated timing for due diligence and then presentation and request for approval to the CEFIA BOD is mid-January 2014.

- *CT Efficient and Healthy Homes Initiative (Expansion)* - As a result of the NU-NSTAR merger, and at the request of the Connecticut Consumer Council, approximately \$1.5MM has been made available to remediate building code and health and safety issues in Connecticut's low income housing sector. At DEEP's request, CEFIA was asked to provide recommendations regarding use of these funds, in order to align their use with the State's and CEFIA's broader goals of using limited public funds to leverage private financing, resulting in broader and deeper market penetration of clean energy measures as well as increased cost savings to tenants and property owners.

To this end, the CEFIA MFAH team recommends using these funds to expand the reach and scope of the [CT Efficient Healthy Homes Initiative \(CTEHHI\)](#), funded by CEEF and DOE under a Weatherization Innovation Pilot Program, which has already demonstrated great success, and has a ready pipeline of clients and homes in need of services, yet has run out of funding. As a result of discussions that took place with the CTEHHI program partners, including the utilities, CHIF, and CT DPH, CEFIA will join this initiative to support development of expanded and innovative financing programs. We will keep the CEFIA BOD updated on progress as the program develops.

Pipeline

CEFIA understands there to be a ready pipeline of utility sponsored Home Energy Solutions – Income Eligible (HES-IE) projects, in excess of 1,200 affordable housing units⁴, that are in need of gap financing for the portion of energy measures not covered by utility incentives as well as energy related health and safety measures in need of remediation.

⁴ According to conversations with the utilities and CHIF.

Key Milestones and Next Steps

We are moving all of these initiatives forward simultaneously against the following targets:

- Completion of the diligence process and proposal to CEFIA BOD for approval of funds to capitalize CHIF MFAH Loan Fund (\$1MM of 5MM budgeted for multifamily loans) – anticipated for Jan 17 CEFIA BOD meeting
- Formal announcements of CEFIA New Ecology-CNT Partnership – Q1 2014
- Release of an RFP to CDFIs for proposals to support MFAH loan programs and CEFIA BOD for approval of winning proposals (\$4MM of \$5MM budgeted for multifamily loans) – latter part of Q1 2014

For those initiatives that do not require CEFIA BOD approval, we will continue to keep the BOD updated on progress.

3. WINN-HUD Open Market ESCO

In the fall of 2011, WINN Development applied for and was awarded a \$5.25 million grant from HUD, with a letter of support from CEFIA, to pilot an innovative energy efficiency program designed to serve multifamily low-income housing developments. This HUD innovation initiative was established to facilitate “game-changing” solutions to effective investment of private capital to improve the energy efficiency of low-income multifamily housing. The WINN proposal – *Multifamily Energy Loan Fund* – created a loan fund to facilitate energy savings agreements (ESA) in the multifamily (40-300 units) housing market. The program operates in Connecticut, Massachusetts and New York.

Because existing debt, programmatic restrictions, and complex partnerships limit the ability of low-income properties to add new debt to finance energy improvements, WINN developed an off-balance sheet approach. Through Energy Savings Performance Contracts (ESPC) and insured savings guarantees, a third party energy services integrator – the Open Market ESCO – borrows funds to finance an energy project on behalf of the multifamily property owner. HUD and CEFIA funds are used to leverage private capital and finance the improvements through the Open Market ESCO.

CEFIA has supported WINN through the program development process and, in August 2013, CEFIA executed a *Master Credit Enhancement and Participation Agreement*, committing up to \$1.87MM for Connecticut projects financed through this program.

Unfortunately, WINN has not made hoped-for progress in selling the program and closing loans because of structural issues with the financing that are not attractive to owners. To its credit, the WINN team has put these issues on the table with HUD and CEFIA, and efforts are being made to restructure the program as a result of lessons learned. CEFIA staff actively participates in regular pipeline reviews with WINN and has actively supported marketing efforts in CT. We will continue to support WINN as they work to put forth creative restructuring proposals.

Key Milestones and Next Steps

CEFIA anticipates a proposal from WINN, in late Dec – early Jan, to restructure financing terms offered to property owners through the Open Market ESCO. We are hopeful that WINN can turn things around, but anticipate that reprogramming of CEFIA funds allocated to this program may be necessary. (HUD funds must be committed/ spent by the Sept 23, 2014 Program deadline, with the possibility of a 6-month extension that cannot be requested until March 2014.) Once CEFIA has more clarity on WINN’s proposed modifications, we will update the CEFIA BOD and seek BOD input and approvals, as necessary.

4. CT Housing Finance Authority (CHFA) Partnership

In June 2013 CEFIA and CHFA signed a Memorandum of Agreement (MOA) that recognized the importance and benefits of cooperation between the two organizations in accelerating the implementation of energy efficiency and renewable energy improvements for owners and tenants of affordable multifamily rental housing. To this end, and in an effort to streamline and coordinate program offerings, CEFIA and CHFA continue to collaborate and share information related to proposed loan programs and funding availability, respective project pipelines, as well as energy monitoring and verification (EM&V) initiatives and requirements.

Most recently, and per the MOA, CHFA has requested a proposal from CEFIA to run a prospective pilot initiative to help inform multifamily energy monitoring and verification (EM&V) and underwriting requirements. A successful outcome will achieve the following:

- Establish a clear process for benchmarking, identifying, underwriting, implementing, and measuring energy improvements.
- Understand how to reliably underwrite energy improvements and provide allowances for additional capital improvements based on an enhanced ability to reliably model, specify and achieve cost savings from the energy improvements.
- Establish when and how to optimally select between or layer the various financing options including CHFA funding, C-PACE funding and other sources of capital.
- Establish case studies and meaningful energy performance data, based on the pilots, to showcase and demonstrate the benefits of energy improvements to multifamily housing resulting from the pilots.

CEFIA has prepared a detailed proposal and budget for CHFA to undertake the pilot on five (5) master-metered properties previously identified by CHFA, with 283 units in total. The Pilot process has proposed to include, for each property, energy benchmarking and auditing, definition of project scope to include all cost effective energy measures, financing, implementation, commissioning, and post project energy performance monitoring and verification. Work will be carried out by CEFIA’s C-PACE and multifamily housing technical advisors, with oversight from CEFIA’s MFAH and C-PACE teams. The implementation of energy improvements for all 5 properties is anticipated to take about 1 year, with 3 years of energy monitoring post commissioning.

Key Milestones and Next Steps

Pending the approval of CHFA's BOD, CEFIA will be funded by CHFA to oversee the Pilot initiative and CEFIA, in turn, will pay its C-PACE technical advisors to perform the bulk of the work. CEFIA hopes to have a contract in place with CHFA and to begin the project in Jan 2014. We will continue to update the CEFIA BOD as progress is made on this initiative.

ⁱ The following are specific priorities in the CT Comprehensive Energy Strategy that relate to CEFIA's MFAH initiatives (pp ii – v):

Energy Efficiency

- Reach all sectors and all buildings including houses, apartments, condos, and senior living centers – with special focus on groups that have not been fully reached by past efficiency programs such as small businesses and the low-income community
- Go beyond a traditional focus on upgraded lighting and weather stripping to deliver deeper efficiency gains in heating, air conditioning, ventilation, insulation, windows, furnaces, boilers, and other appliances such as refrigerators, as well as process efficiencies in the industrial sector
- Leverage private capital through innovative financing mechanisms including Connecticut's first-in-the-nation Green Bank (the —Clean Energy Finance and Investment Authority), standardized energy efficiency performance contracts, and the state's new Commercial Property-Assessed Clean Energy (C-PACE) program
- Reinvigorate and broaden the existing Home Energy Solutions program to ensure that additional ratepayer dollars achieve maximum reach and impact with carefully established goals and metrics to ensure ongoing performance improvements
- Establish building efficiency standards for both new construction and retrofits as well as a mechanism for benchmarking building efficiency and disclosing efficiency scores at the time of rental or sale

Electricity

- Focus on the deployment of renewable energy at scale using limited government resources to induce private sector investment through the Connecticut Green Bank (CEFIA), Zero (and Low) Emissions Renewable Energy Credits, and other innovative financing mechanisms

Natural Gas

- Financing options for homeowners and businesses to eliminate the upfront burden of converting furnaces, boilers, and other appliances to natural gas Alternative financing for low-income homeowners through community banks and credit unions with the state providing incentives or financing through CEFIA



Memo

To: CEFIA Board of Directors
From: Bob Wall, Robert Schmitt and Lucy Charpentier
Date: December 13, 2013
Re: Solarize Connecticut Phase II Report

Executive Summary

Had Phase II of Solarize Connecticut not followed on the heels of the inaugural phase of the pilot, it would be justly recognized for achieving or surpassing the stretch goals that staff established for the program. Although the overall results in Phase II seemingly pale in comparison to Phase I, the program expanded into different regions of the state and made several important breakthroughs including the introduction of a multiple-town coalition, expansion into distressed communities and cross-promotional efforts with the University of Connecticut. The Phase II highlights are as follows (see Table 1):

- Nearly 1.1 MW of new solar PV capacity deployed across the five communities, more than double what was installed in each of those towns during the preceding eight years;
- Nearly 160 projects contracted, representing at least a doubling in the number of homeowners “going solar” in all towns;
- Dramatically reduced costs for solar PV, with two towns hitting Tier 5 pricing and a third narrowly missing Tier 5 pricing;
- Average savings of approximately \$5,400 per customer and cumulative savings of more than \$850,000; and
- Continued reductions in customer acquisition costs, at \$188/kW from a direct program spend perspective and \$255/kW “all-in”. The blended rates of customer acquisition costs for the first two phases are \$128/kW direct program spend and \$183/kW “all in”, which remain significantly less than both the industry average of \$670/kW (per DOE analyses) and local installers’ estimates at \$250-\$500/kW.

Table 1. Residential Solar PV Deployment Pre-Solarize vs. Campaign Results

Town	Pre-Solarize Projects ¹		Solarize Projects ²	
	# of Projects	# of kW Deployed	# of Projects	# of kW Deployed
Bridgeport	8	42	10	56
Canton	29	220	31	238
Coventry	35	238	36	259
Mansfield-Windham	80	506	81	509
Total	152	1,006	158	1,062

Introduction

In response to a Request for Proposals to participate in Phase II of the program, CEFIA received applications from five municipalities, two of which (Mansfield and Windham) requested to participate as a coalition. Because CEFIA and its marketing and outreach partner, SmartPower, desired to conduct at least four campaigns during the Spring of 2013, all applications were accepted. In contrast, Phase I featured a more competitive landscape from which four municipalities were selected out of ten applications. Only three of the unsuccessful Phase I towns re-applied for Phase II (a fourth chose to participate in a privately conducted campaign, the CT Solar Challenge.)

There were several key differences between the municipalities participating in the respective rounds. Several towns in Phase II did not have a “Clean Energy Task Force” but instead relied principally upon municipal staff to spearhead operations. There were two distressed communities, Bridgeport and Windham, which have a higher percentage of rental units and low to moderate incomes.

Phase II launched with a series of kickoff events spread throughout March 2013. The campaigns were scheduled to conclude on July 14 but because of delays in the availability of the CT Solar Lease program, an extension was granted until July 31.

Program Savings

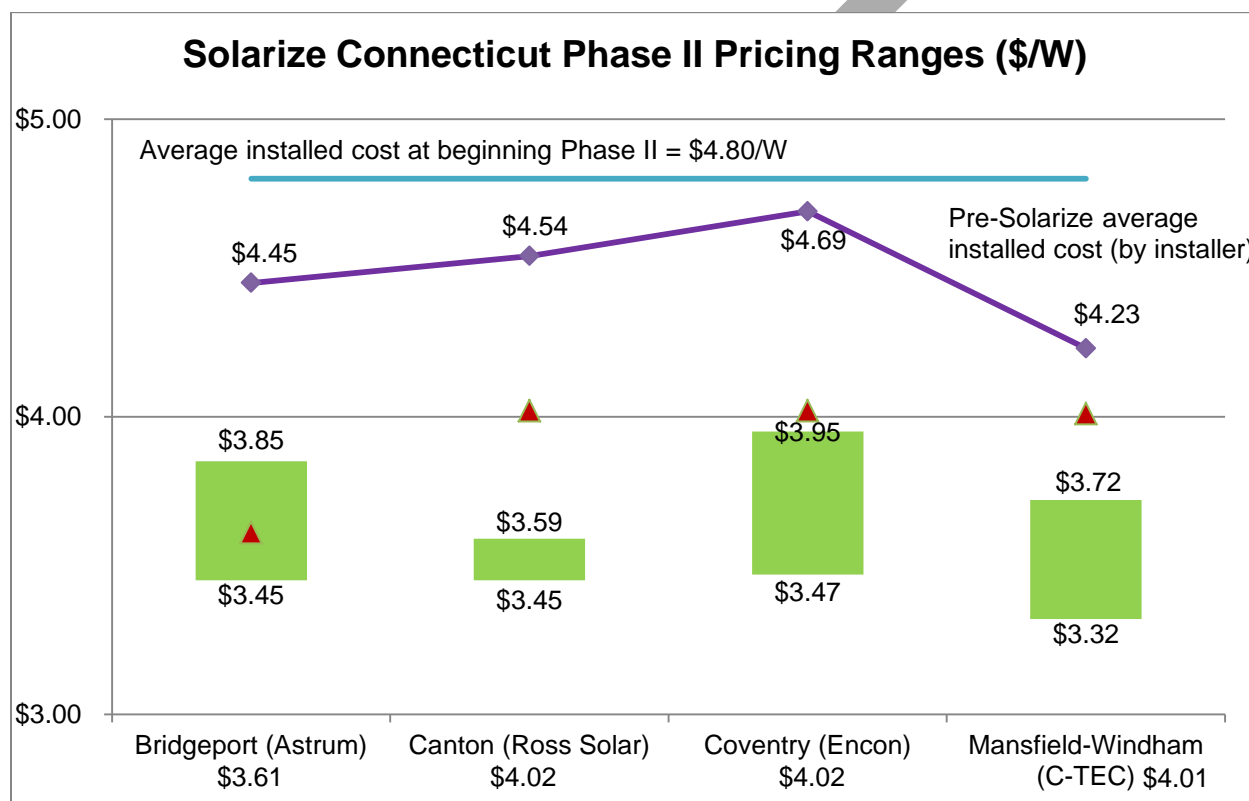
Pricing - At the time of the launch of Phase II, the average installed cost for residential solar PV in Connecticut was approximately \$4.80/W (see Chart 1). Once again, each installer selected bid into the program offering discounts ranging from an average of 21-29 percent below the statewide average depending on the installed capacity achieved. Two of the four communities

¹ Pre-Solarize projects are all of the residential solar PV projects installed from 2004 through February of 2013 in participating communities.

² Information on one additional project representing 7 kW was reported after preparation of this memorandum and is not reflected in analyses presented herein. Please note that approximately 17 contracts reported by installers at conclusion of Phase II are not included in final data for various reasons such as cancellation, late-filed incentive applications and inclusion of one residential ZREC project.

(Mansfield-Windham and Coventry) achieved the lowest pricing tier possible and a third (Canton) narrowly missed that distinction. As discussed below, Phase II projects featured significantly more “adders” (or extra costs due to steep roofs, higher-priced modules, etc.) than in Phase I, which increased prices by approximately 17% above the base price quoted compared to only 6% in Phase I. Nevertheless, the overall average installed costs for Phase II were \$3.99/W – representing savings of nearly 17% from pre-Solarize II levels, and more than achieving the goal of driving installed costs down to \$4.25/W through the Solarize pilot.

Chart 1. Solarize Connecticut Phase II Final Pricing



Adders - Under the Solarize model, tiered pricing is premised on a “basic package” of module, racking and inverter for a standard installation. Nevertheless, installers provide optional upgrades for premium equipment and also are allowed to assess surcharges based on atypical installations that require additional work or non-standard equipment.

The most common adder in Phase II was for module upgrades whether motivated by aesthetic, efficiency or manufacturing location preferences. Of the 158 customers participating in Phase II, 75 customers chose a non-basic module: 35 selected an all-black design. 21 customers opted for high efficiency modules (e.g., SunPower), which might be attributable to a desire to possess the “gold standard” of modules, to maximize output due to limited roof space, to realize

the enhanced warranty qualities or for aesthetic reasons) and 19 customers selected U.S. made panels.

Of the 158 Phase II customers, 67 elected to use microinverters in lieu of central inverters. It is unclear whether such customers chose this upgrade due to shading issues that would have reduced the system efficiency, preference for the extended warranty provided by such product or an interest in having state-of-the-art technology with a special monitoring interface.

The majority of other adders fell into categories that were essentially mandated by the conditions of the host site. These would include roof issues (e.g., multiple roof spaces, steep pitch, rafter reinforcement), non-roof installations (e.g., ground or pole mounts, trackers, trenching), electrical upgrades and small system surcharges (typically assessed for systems less than 5 kW). Certain categories of adders were introduced subsequent to Phase I, perhaps owing to lessons learned by installers in the earlier round.

Three customers chose to purchase battery backup systems, which are not covered by RSIP incentives.

Table 2. Phase II Adders

Category of Adder	Number of Projects with Adder	Percentage of Projects with Adder	Average Cost
Module Upgrade	75	47%	\$0.45
Inverter Upgrade	67	42%	\$0.36
Roof-related	51	32%	\$0.11
Ground Mount	22	14%	\$0.91
Electrical Upgrade	20	13%	\$0.12
Small System	8	5%	\$0.26
Battery Backup	3	2%	\$2.07
Totals	246	88%³	\$0.57

Customer Savings - Savings realized under Phase II continued to be significant⁴. The average homeowner in participating towns saved between \$4,900 to \$6,500 on the base cost of the system compared to the statewide average at the outset of the campaigns. The average savings for all Phase II customers was approximately \$5,400 per system. (see Table 3).

These savings are in addition to a weighted average CEFIA incentive per Solarize home of approximately \$7,800 in ratepayer support and an average federal tax credit of \$5,700. Overall, the Phase II campaigns saved homeowners across the five communities in excess of \$850,000, meaning that from a CEFIA investment of \$100,000, ratepayers achieved a return of 750% over the course of this round.

³ Represents percentage of all Phase II projects that included at least one adder. Many projects included two or more adders.

⁴ Savings estimates based on purchased systems only.

Table 3. Solarize Connecticut Savings

Town	Average Customer Savings	Collective Savings (Townwide)	Cumulative Savings (across all towns)
Bridgeport	\$6,599	\$65,985	\$854,044
Canton	\$6,023	\$186,708	
Coventry	\$5,571	\$200,558	
Mansfield	\$4,893	\$298,454	
Windham	\$5,117	\$102,339	

Looking at the savings realized in terms of payback time and the levelized cost of energy (“LCOE”)⁵ gives further indication of Solarize’s positive impact (see Table 4). In Bridgeport, the simple payback period for a solar PV investment was cut by a third as compared to the statewide average and, for the remaining towns, Solarize reduced the payback period by a quarter. Additionally, in all towns, Solarize pricing reduced the LCOE to at or below \$0.22/kWh overall – meaning Solarize customers are now enjoying clean electricity at an estimated cost of approximately \$0.09-\$0.10/kWh after federal and ratepayer support. This represents a significant discount to standard electricity rates in Connecticut (equal to a discount of approximately 30% in Connecticut Light & Power territory, and nearly 50% in United Illuminating territory).

Table 4. Solarize Connecticut Payback Periods and LCOE

Town	Pre-Solarize Average Statewide Payback (years) ¹	Solarize Payback (years)	Pre-Solarize Statewide Avg. Levelized Cost of Energy	Solarize Levelized Cost of Energy (Total)	Solarize Levelized Cost of Energy (End-User) ²
Bridgeport		8		\$0.191	\$0.086
Canton		9		\$0.214	\$0.103
Coventry	12	9	\$0.254	\$0.217	\$0.104
Mansfield-Windham		9		\$0.212	\$0.101

¹ Assuming RSIP Step 3 incentive levels for all RSIP projects completed within that town

² After state and federal incentives

⁵ Relevant assumptions for payback and LCOE analyses include electricity pricing of \$0.15/kWh with 3% escalation, a 13% capacity factor for solar PV with 0.5% degradation factor, a 25-year expected useful life of the system, and 15-year debt financing at 6.49% to pay for post-incentive installed costs

Customer Acquisition

Phase II of Solarize continued to demonstrate positive results with respect to customer acquisition costs, albeit not at the same levels experienced in Phase I of the program. It appears that various factors may have contributed to this phenomenon:

- **Step 2 to Step 3 Incentive Decrease** - The drop-down in incentive levels from Step 2 to Step 3, which occurred prior to the outset of Phase II, altered the financial proposition for customers resulting in higher out-of-pocket costs and longer payback on the investment. Similarly, the 35% incentive cap, which typically applied as Solarize pricing dropped in higher tiers, further impacted the equation. (Conversely, the lack of an impending drop-down at the conclusion of Phase II may have dampened customer and installer motivation to “act now”.)
- **Lack of Financing** - There were fewer financing options available during Phase II, which appears to have inhibited potential customers from going solar. Only one of the four selected installers offered private financing and, due to delays associated with a switch in lending partners, that company was unable to deliver its lease product until the final weeks of the campaign. Similarly, CEFIA’s suite of residential financing products were not available in most communities until the final weeks of the program. The Smart-E Loan was provided as an option to all installers, albeit only when the campaigns were underway. Similarly, only one of the participating installers was eligible to provide the CT Solar Loan during Phase II. The CT Solar Lease was also made available but only in the final days of the program and prior to the general launch of that product.
- **System Size Deflation** - The average system size in Phase II was 6.72 kW as compared to 7.63 kW⁶ in Phase I. Although the number of contracts in Phase II was nearly 60% compared to Phase I, the installed capacity during the latest round was closer to 50% of the initial round. Whether this was due to economics, physical characteristics of the host site (e.g., available roof space, shading) or other factors, it resulted in a significant increase in customer acquisition costs.
- **Conversion Rate Reduction** - The conversion rate of customers who expressed initial interest to contract dropped from 18.5% in Phase I to only 13.3% in Phase II. In addition to the changes to the incentive levels and limited financing options, several other factors may have contributed to this result. Engagement with two distressed communities presented significantly higher percentages of rental units and lower income populations that were either ineligible or ill-suited for residential solar. The inability to reach Tier 5 pricing levels in two of the communities may have suppressed sales in the final stages. Furthermore, a number of contracts reported by installers were cancelled due to the inability to satisfy financing requirements.

With respect to Phase II, CEFIA committed \$100,000 to support Solarize, matched by grants of equal amounts, collectively, from the John Merck Fund and the Putnam Foundation. Dividing

⁶ Phase I average system size adjusted from 7.84 kW to 7.63 kW due to attrition.

that \$200,000 total by the number of customers acquired, and then again by the average size of a Solarize installation, gives us the average customer acquisition cost per kilowatt of solar PV deployed (see Table 5). At \$188/kW on a direct cost basis, Solarize has delivered a customer acquisition cost figure that is a discount of 72% from the national average of \$670/kW, as reported by the DOE. Even adding in estimated installers' direct marketing costs across all towns, plus the value of CEFIA staff time, Solarize still demonstrates significant customer acquisition savings at \$255/kW.

Table 5. Solarize Connecticut Phase II Only Customer Acquisition Costs

Description	Cost	Acquisition Cost / kW
CEFIA direct contribution	\$100,000	\$188.32
Foundations' matching grants	\$100,000	
Est. installer expenditures	\$23,000	\$21.65
Est. value of CEFIA staff time	\$48,000	\$45.20
Total	\$271,000	\$255.17

Using the combined results of the first two phases of the program, customer acquisition costs were \$128 from a direct spend perspective and \$183 "all in". (See Table 6) Overall, these results compare extremely favorably to national averages and estimates provided by local installers. It should also be noted that a portion of SmartPower and CEFIA staff time in the first year of the program related to development of the basic program structure, contracting documents, branding, website and collateral and thus should be considered as "start-up" costs. Although the program and related materials continue to be refined and customized, it is anticipated that the administrative, marketing and outreach costs for current and future campaigns will be lower than they were in connection with the first two phases.

Table 6 Solarize Connecticut Year 1 Combined (i.e., Phase I and II) Customer Acquisition Costs

Description	Cost	Acquisition Cost / kW
CEFIA direct contribution	\$200,000	\$128.37
Foundations' matching grants	\$200,000	
Est. installer expenditures	\$53,000	\$17.01
Est. value of CEFIA staff time	\$120,000	\$38.51
Total	\$573,000	\$183.89

Once again, given the campaign-style, deadline-driven nature of Solarize, customer acquisition was not linear over the course of Phase II (see Chart 2). For most of the first 19 weeks, total signups were consistently in the range of 5-10 per week. There were four weeks with relatively light activity, which typically coincided with holidays. Week 16, which was originally scheduled to be the deadline week, experienced a pronounced uptick. Similar to Phase I, approximately 25% of all customers signed contracts in the last week of the campaign. The importance of this deadline in moving people to action cannot be overstated.

Performance was not uniform among towns. For example, Canton reported significant signups during the first six weeks of the campaign but levelled off thereafter. Bridgeport, which launched its campaign two to three weeks after the other communities did not achieve its first contract until week 7 of the campaign. In contrast, Mansfield-Windham and, to a lesser extent, Coventry built momentum during the middle phase of the campaign and finished exceptionally strong in week 20.

Chart 2. Solarize Connecticut Customer Acquisition Timeline

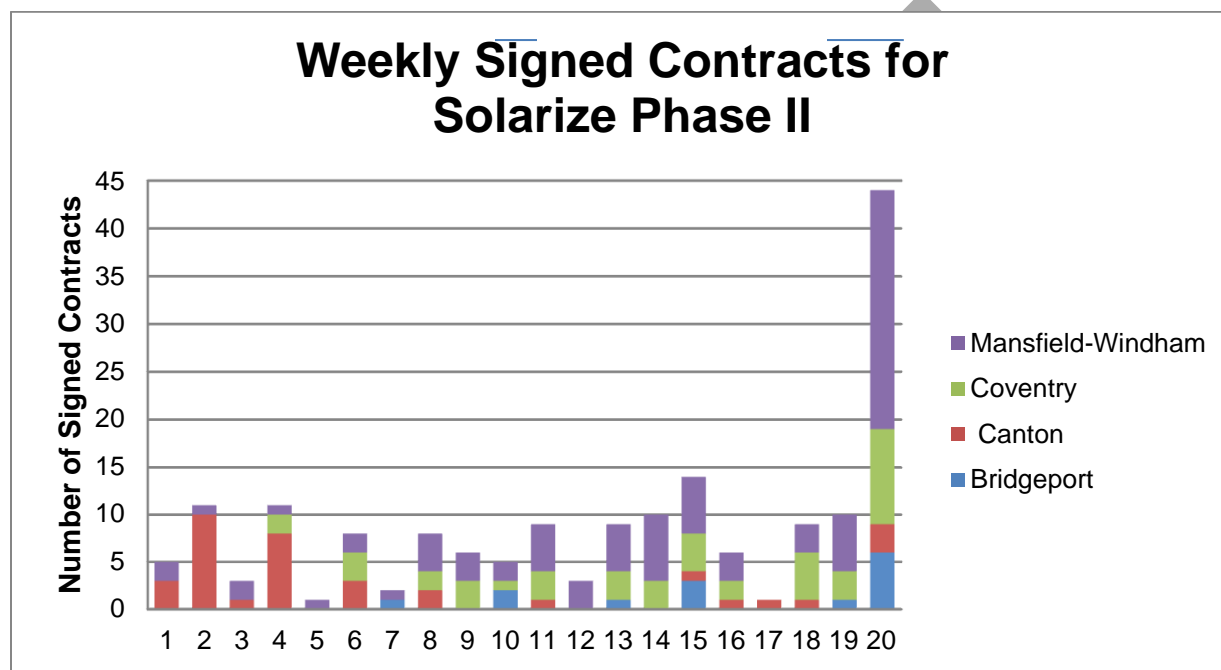


Table 7 shows results from a global perspective with respect to the Solarize Connecticut participants and the rest of the state. Durham remains the only Connecticut municipality with a residential solar PV penetration rate greater than 5%; however, several other Solarize communities stand out as greatly surpassing the performance of a typical town. The table, which reflects overall numbers before, during and after the campaigns, reflects that Solarize communities have collectively achieved approximately double the penetration rate and installed solar PV watts per person as compared to the statewide averages..

Table 7. Residential Solar PV Penetration across Solarize Towns and Statewide

Town	Phase	Projects	Households	Residential Solar PV Projects per Household (Penetration Rate)	kW	2010 Census	Installed Residential Solar PV Watts per Person
Bridgeport	II	28	51,403	0.05%	161.6	144,229	1
Canton	II	55	3,863	1.42%	400.6	10,292	39
Coventry	II	65	4,738	1.37%	470.3	12,435	38

Durham	I	145	2,424	5.98%	1,198.9	7,388	162
Fairfield	I	129	19,973	0.65%	933.7	59,404	16
Mansfield	II	117	24,498	0.48%	772.4	58,241	13
Portland	I	61	1,635	3.73%	411.5	4,247	97
Westport	I	96	3,289	2.92%	622.9	10,179	61
Windham	II	34	4,502	0.76%	193.6	11,242	17
All Solarize Towns	-	730	116,325	0.63%	5,165.5	317,657	16
Statewide	-	4,212	1,297,043	0.32%	28,853.8	3,467,330	8

Comparison to Massachusetts

The Solarize Connecticut program was modeled on the general structure of and lessons learned in the Solarize Massachusetts program, which is administered by the Massachusetts Clean Energy Center. Massachusetts has now completed three rounds of its Solarize program, having served 31 communities between 2011 and 2013. Overall, Massachusetts has reported more than 1,500 contracts and 9.4 MW of solar electric capacity in connection with the program.⁷ Because the respective programs have been conducted on different schedules with different numbers of communities (Massachusetts has typically been one round ahead of Connecticut), a direct comparison is difficult. Nevertheless, a snapshot of the period March 5, 2012 through November 19, 2013 indicates that Massachusetts is ahead of Connecticut with respect to number of projects and installed capacity (not shown)(see Table 8). During that same period, Connecticut has achieved lower prices per watt and higher average system sizes, both with respect to the Solarize program and overall.

Table 8. Comparison between Solarize Connecticut and Massachusetts Results 3/5/12-11/19/13

State	Number of Projects	Total Installed Capacity (kW)	Cost/Watt	Average System Size (kW)
Connecticut	461	3,337	\$3.87	7.24
Massachusetts	741	4,550	\$4.26	6.14
Comparison	(280)	(1,213)	(\$0.40)	1.10

Overview of Key Lessons Learned

The first year of Solarize Connecticut was considered a pilot program and staff has continued to learn and adapt based on lessons learned in the first two phases. Accordingly, various changes to the original program structure have been implemented either in Phase II or the current Phase III. In addition, a U.S. Department of Energy grant to a team comprised of Yale University, New York University, SmartPower and CEFIA under the Solar Energy Evolution and Diffusion Studies (SEEDS) program will provide further testing and analysis to improve upon an already successful program. As previously reported to this Board, staff is working to develop a more

⁷ <http://www.masscec.com/solarizemass>

market-based model that seeks to bring the Solarize program to scale with less input of financial and staff resources.

Some of the most important lessons learned from the program's second phase and responses to them are as follows:

- **Better Town Recruitment Required** - Because of the limited number of town applications received in connection with Phase II, staff engaged in several strategies to encourage greater participation in Phase III of the program, including a webinar offered to all communities, a report entitled "Let's Solarize"⁸ (also intended for potential customers, installers and other states interested in developing a program), new incentives under the Clean Energy Communities program and direct outreach to communities. This resulted in renewed interest with 14 communities submitting applications, each of which was selected for one of the various Solarize campaigns. Staff intends to continue proactive recruitment to ensure strong participation in future rounds.
- **Promotion of Financing** – Recognizing the exciting opportunities provided by the new CEFIA residential financing products, staff has worked hard with the Residential Programs and Finance teams to facilitate broad participation among installers and encourage customer uptake. Measures taken include accelerated eligibility training and marketing training workshops for Solarize installers, financing webinars for volunteers in participating communities, financing workshops for potential customers in certain communities (featuring representatives of Sungage and CEFIA), development of Frequently Asked Questions and fact sheets for the Solarize website and community toolkits and special promotion of the respective products and the GoSolarCT.com website in Solarize media communications and radio interviews. Early results in Phase III reflect that nearly 25% of contracts are using one of the CEFIA financing products.
- **Pre-Launch Preparation with Municipalities** – Timing constraints resulted in the compression of pre-launch meetings with participating Phase II towns into a single session, rather than the two separate meetings that took place in Phase I. Accordingly, CEFIA and SmartPower took additional time with respect to Phase III to carefully develop and implement more robust marketing and outreach plans and earned media opportunities.
- **Coordination of PowerClerk applications and Solarize Contractor Reporting** – Under Solarize program rules, participating installers are required to submit weekly contractor reports detailing all sales, pricing at respective Tiers, adders and rebates to early adopters. This has resulted in extensive work in order to ensure that installers are adhering to the terms, conditions and other contracting language of their proposals as well as to reconcile those terms with PowerClerk applications. The Solarize staff has worked with RSIP staff to achieve greater efficiencies in administrative processing and eliminated inconsistencies in reporting.
- **Changes to Incentive Levels** – Step 3 of CEFIA's expected performance based buydown ("EPBB" rebate) will be exhausted prior to the conclusion of Solarize Phase III

⁸ <http://solarizect.com/wp-content/uploads/2013/09/TheFinalReportSept172013.pdf>

but has been guaranteed for participating communities for the duration of the respective campaigns. As previously noted, the reduction of incentives during a campaign phase would create potential customer confusion and could result in lost contracts. Conversely, because CEFIA has guaranteed current incentive levels to customers in ongoing Solarize campaigns, it can result in perceived unfairness to non-Solarize installers and customers in non-participating towns. This continues to be an issue that bears further scrutiny.

- **Potential Secondary Opportunities** – More than 80% of individuals who expressed interest in “going solar” did not ultimately sign contracts based on non-feasibility or other factors. Staff is working with the Residential Program team to design follow-up opportunities with lost leads and will engage with previous Solarize communities beginning in early 2014. Such campaigns will focus on energy efficiency, fuel conversions and/or other renewable technologies and should provide further return on CEFIA’s investment in Solarize.
- **Application to Other Technologies and “Communities”** – Based upon the success of the deadline-driven community-based approach of the Solarize program, CEFIA has sought adapt the model to other technologies. Accordingly, CEFIA has partnered with Norwich Public Utilities, SmartPower and two local lenders in connection with “Energize Norwich”, which seeks to encourage local customers to convert from oil or propane heating to natural gas and undertake upgrades to more energy efficient appliances. Although not all components of the Solarize model have translated smoothly, the preliminary results appear promising with nearly 300 contracts for fuel conversions since the program launch date of August 19, 2013. Staff is working with the Department of Energy and Environmental Protection, CL&P and United Illuminating to improve upon and administer similar campaigns in other communities. Furthermore, staff is preparing to implement Solarize campaigns with one or more affinity groups, which could include large employers, universities and non-profit membership organizations. As noted at the outset, CEFIA partnered with the University of Connecticut’s Sustainability Office to reinforce outreach efforts in Mansfield, Windham, Coventry and surrounding towns in connection with Phase II. Similarly, staff plans to develop a comparable program with respect to Solar Hot Water in 2014.

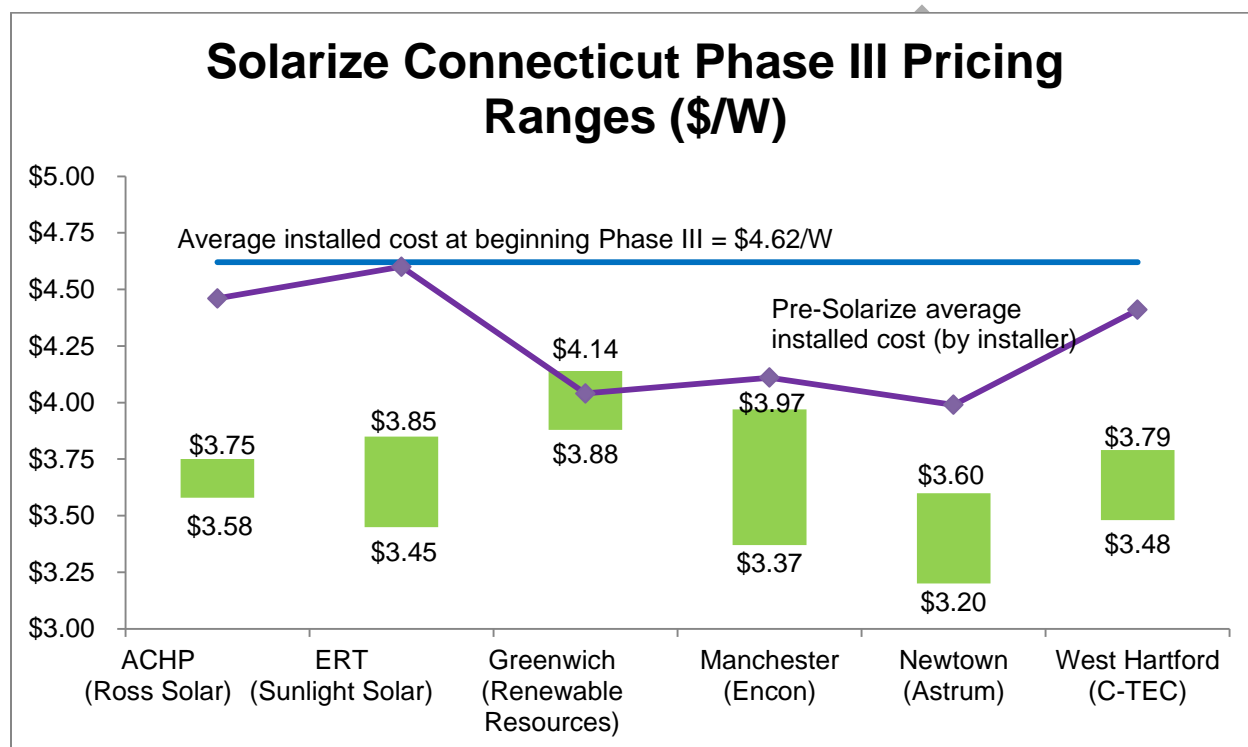
Next Steps

Phase III of Solarize Connecticut features six campaigns involving eleven new towns: Greenwich, Manchester, Newtown, West Hartford and two coalitions of towns (Ashford-Chaplin-Hampton-Pomfret and Easton-Redding-Trumbull). Those towns have selected six installers, two of which have participated in Phases I and II, two have participated in Phase II only and two installers are new to the program (see Chart 3). The Phase III campaigns launched in late September through early October.

At the same time, two slightly different versions of the Solarize program are being run as part of the SEEDS project grant. Solarize Express is identical to the traditional Solarize program in all respects except that it will run for 10 weeks rather than 20. Five towns were selected for this variation including Glastonbury, Hamden, Stafford and a coalition of Roxbury-Washington.

Solarize Choice is similar to the traditional 20-week program except that it features three installers per town, each of which offers a single, not-to-exceed price (exclusive of adders.) Six towns were selected for this variation including Cheshire, Enfield, Stamford, West Haven and a coalition of Columbia-Lenanon. Two distressed communities are participating in Solarize Choice (Enfield and West Haven). The respective Express and Choice campaigns were launched in November.

Chart 3. Solarize Connecticut Pilot Phase III Pricing Ranges versus Average Installed Costs



Solarize Connecticut continues to provide a strong platform for scaling up the deployment of clean energy by driving down the “soft costs” of solar PV and supporting the utilization of innovative financing products. Staff will strive to improve administrative processes and conduct research through surveys and focus groups with relevant stakeholders in an effort to bring Solarize to scale using fewer ratepayer dollars. In connection therewith, the projects and associated research being performed under the SEEDS grant will provide invaluable assistance in helping us reach these objectives.