CRITICAL ISSUES SERIES

ENERGY EFFICIENCY IN THE COMMERCIAL REAL ESTATE INDUSTRY

Underwriting Energy Efficiency Financing in the Innovative Connecticut PACE Program

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Introduction

Property Assessed Clean Energy (PACE) tax lien financing programs allow local governments, when authorized by state law, to fund energy efficiency improvements on commercial and industrial properties via an additional assessment ("benefit assessment") on the property tax bill. Similar to a sewer tax assessment, building energy efficiency improvements financed under a PACE program are secured by a senior lien on the owner's property and re-paid through a voluntary assessment on the owner's property tax bill. The security of the tax lien provides a solution to the inability of many commercial building owners, who often lack investment-grade credit quality, to secure commercially attractive third-party financing for energy retrofits. The lien is attached to the property and transfers with ownership. Repayment security is through the building's financials and the senior lien position of the assessment rather than through the borrower's credit quality. This allows owners to undertake deeper, more capital intensive retrofits with greater energy savings and longer payback periods, even if the owner only plans to hold the property for a few years.

Typical PACE tax lien financing structures make it possible for the property's reduced monthly energy bill (reflecting the energy savings) to more than offset the additional charge (for financing repayment) on the property tax bill, enabling immediate positive cash flow. To date, 28 states (including Connecticut) and the District of Columbia have passed enabling legislation enacting PACE programs. More than a dozen commercial PACE programs are currently in operation or are in an advanced development phase.

Enabling Connecticut PACE Legislation

In July 2011, Connecticut passed energy legislation to create "Sustainable Energy Programs" designed to facilitate increased energy efficiency and expand the use of renewable energy at the municipality level. With this legislation, Connecticut joined the growing wave of states with enabling PACE legislation. Such legislation is necessary prior to development and launch of municipal and/or county-level PACE programs.

Once a "Sustainable Energy Program" is established, a municipality is authorized to enter into a contractual assessment on a property for the amount required to complete building energy efficiency improvements. The assessment is considered a lien on the property and the municipality can collect payments in a manner consistent with other beneficial assessments (such as for sewers). Building energy efficiency upgrades, related energy audits, renewable energy system feasibility studies, construction costs, and associated performance measurement and verification of the energy savings are financeable under the program. In addition, municipalities may issue bonds, secure private funding, or secure state or federal funds (or a combination of these) for financing. Any assessment levied must have a term not to exceed the effective useful life and calculated payback period for the installed energy efficiency improvements and cannot have a prepayment penalty. Assessments levied constitute a lien against the qualifying real property on which they are made until such time as they are paid.

Connecticut C-PACE Program

In June 2012, the Connecticut legislature passed Public Act 12-2. Section 157 of the Act included the Commercial Property Assessed Clean Energy (C-PACE) regulation, directed specifically to the commercial and industrial property market. The bill directed the Clean Energy Finance and Investment Authority (CEFIA) to establish and administer a statewide C-PACE program. Municipalities desiring to participate in C-PACE must "opt-in" to the program through approval by the local government that ensures local taxing authority enablement of financing repayment via the property owner's tax bill.

While CEFIA is authorized to issue bonds, notes or other obligations for the purpose of financing building energy improvements, the quasi-public agency's program is initially planning to attract and leverage private capital to fund projects. Energy improvements include any renovation or retrofitting of qualifying commercial real property (including commercial, industrial, and multifamily properties with five or more units) to reduce energy consumption or installation of a renewable energy system, provided the renovation, retrofit or installation is permanently affixed to the property and achieves an energy savings (over the financing term)-to-investment ratio greater than one.

The bill also required CEFIA to develop program guidelines governing the terms and conditions under which state financing may be made available to the C-PACE program, establish a loan loss reserve or other credit enhancement program, and adopt technical standards to ensure that an energy audit or renewable energy feasibility analysis is conducted to assess the energy savings of a proposed project over its useful life and determine the cost to achieve these savings.

The associated tax lien (benefit assessment) financing provides for lien priority over existing mortgages, and requires the property owner to secure written consent from the existing mortgage holder (when applicable) in order to participate in the C-PACE program. The costs and risks associated with participation in the program are required to be disclosed, including risks related to the property owner's failure to pay the benefit assessment, the fees charged by CEFIA to administer the program, and the risks associated with the financing.

Power of C-PACE in the Commercial Real Estate Market

PACE tax lien financing is a very attractive and potentially game-changing model for the commercial real estate (CRE) market. In Connecticut, CEFIA acts as a conduit for private investment and encourages property owners to arrange financing with their preferred capital provider (alternatively, CEFIA can connect building owners to capital providers on its pre-approved list), leveraging the enforceability of the tax lien on the property as security. This enables building owners to negotiate rates, terms, conditions and schedules that best suit their specific project needs. The owner-negotiated terms are then reflected in a financing agreement directly with the capital provider. Financing is repaid as a line item (or as an insert) on the owner's property tax bill and the repayment obligation transfers with ownership.

The security of the tax lien (benefit assessment) also provides a welcome solution to the inability of many commercial building owners, who often lack investment-grade credit quality, to secure commercially attractive third-party financing for energy retrofits. ***The lien is attached to the property and transfers with ownership***. Repayment security is through the building's financials and the senior lien position of the assessment rather than through the borrower's credit quality. This structure allows owners to undertake deeper, more capital intensive retrofits with greater energy savings and longer payback periods, even if the owner only plans to hold the property for a few years (the outstanding debt is not accelerated upon sale). This is a compelling and timely benefit of PACE financing for building owners in today's challenging market where many owners have pent-up demand for capital intensive equipment replacement, yet have limited internal capital budgets to self-fund such investments.

The CRE industry will find PACE financing programs attractive for a number of reasons.

1. There is no net out-of-pocket capital expense.
2. 100% of the total project cost can be financed, including up-front costs (such as those up-front costs associated with the energy audit, CEFIA administration fees and finance closing costs) and post-construction costs (such as energy savings measurement and verification).
3. Well-developed projects have the potential to achieve immediate positive cash flow, while offering a number of additional benefits (such as reduced building operating costs, increased marketplace competitiveness and higher building value).
4. For multi-tenant investment property utilizing triple-net leases, costs (and associated savings) can typically be passed to tenants. Payments are typically treated as a pass-through operating expense, consistent with existing property tax expense treatment. For multi-tenant investment property utilizing gross leases (that are all-inclusive, except for agreed upon escalation clauses), the building owner benefits directly from lower operating (energy) costs. It also may be possible through the escalation clause section of the gross lease for the building owner to recover over time the capital cost that resulted in the reduction in building operating cost attributable to the energy savings.
5. The loan is secured by the tax lien on the property and the building's financials rather than the borrower's credit quality. The security of the tax lien reduces lender risk and enables more attractive financing terms.
6. The length of time a building is held prior to sale is largely irrelevant since PACE financing transfers with the sale of the building and future owners assume the benefit assessment payments (and also continue to benefit from the energy savings).
7. The lower operating cost resulting from increased energy efficiency will have a positive impact on the property's asset value.
8. The PACE structure enables long term financing (15-20 years depending on the useful life of the improvements) at commercially attractive financing rates. This can result in immediate positive cash flow since the energy savings typically will more than offset the cost associated with achieving these savings.

Connecticut C-PACE Program Innovation

Connecticut's C-PACE program technical standards were developed after reviewing the operating experience gained in other PACE programs around the country and from leading CRE energy retrofit finance programs. First, rather than a rigid, "one size fits all" process, the C-PACE process was designed to include considerable flexibility, allowing it to evolve as experience is gained, recognizing that for maximum benefit the program needs to support a range of project types, from small to large.

A particularly attractive innovation included in the program is the capability for a project to take advantage of Fast Track review. This is applicable for:

- buildings where qualified energy professionals have previously completed energy audits and provided energy conservation measure (ECM) recommendations, but which failed to get implemented due to the owner's inability to self-fund the project or otherwise make the capital expenditure;
- less technically complex projects, such as a lighting upgrade;
- projects directed at only a single ECM ("targeted ECM"), such as a solar project with a completed feasibility study; or
- pre-approved projects developed under local utility energy efficiency incentive or rebate programs which failed to get implemented due to building owner funding constraints.

The alternative to the Fast Track route is the "Full Assessment" review process which is the more traditional pathway followed for whole building energy retrofit projects. The innovative step included in the C-PACE program for Full Assessment routing is a time and cost efficient screening step prior to proceeding to the full ASHRAE Level II or III energy audit. The screening step relies on the ASTM Building Energy Performance Assessment (BEPA) Standard E2797-11 methodology to collect and analyze baseline energy use and cost data combined with an ASHRAE Level I audit and subsequent benchmarking of the building's key performance indicators to relevant local peer buildings. The goal is to leverage best practice building energy performance benchmarking database resources to quickly and cost effectively identify those projects having the potential to achieve significant energy savings, making it much more likely that the energy savings will more than offset the cost and result in immediate positive cash flow.

C-PACE Program Technical Standards

The C-PACE Technical Standards address both the Full Assessment and Fast Track review pathways.

Full Assessment

Projects undergoing comprehensive review (refer to Figure 1 - whole building path) begin with a screening step designed to cost effectively identify projects where potential energy savings appear to support a compelling return on investment. In cases where the energy performance benchmarking analysis suggests there is potential to achieve significant energy savings, the applicant proceeds to conducting a more comprehensive and cost intensive ASHRAE Level II or Level III energy audit. The energy audit determines the optimized bundle of recommended ECMs, establishes total project cost, identifies the expected energy savings, and evaluates key project financial metrics.

Assuming the ECMs are eligible under the C-PACE program (as defined in the program guidelines), the projected energy savings are technically supportable, and the financial metrics meet CEFIA's minimum requirements (such as the need for project energy savings over the anticipated financing term to be greater than the total investment), the project should be deemed qualified to secure C-PACE financing. Depending upon the nature of the project and stakeholder (building owner and/or capital provider) requirements, energy savings insurance may be considered for the project.

Once financing has been arranged via the owner's preferred capital provider, the project proceeds to the implementation phase. After the ECMs are installed, actual energy savings are measured and verified (M&V) and compared with projected energy savings. The specific M&V methodology used will depend on the nature of the ECMs and the M&V plan agreed upon up-front in the contract with the energy service company. Depending on the complexity of the ECMs installed and stakeholder requirements, M&V may be an on-going requirement (at an agreed upon frequency) throughout the duration of the financing term.

All key project data is entered in the CEFIA Data Management Platform (CDMP) by those responsible for the various tasks. The CDMP, powered by Sustainable Real Estate Solution's cloud-based software, contains information collected from the applicant's submittal, the project development and review process, project installation and energy savings M&V. The CDMP also facilitates reporting to all interdependent stakeholders, including but not limited to CEFIA management, capital providers, energy service companies, building owners/managers and/or insurers, to make certain stakeholder underwriting needs are met. (Refer to Exhibits 1-4)

Fast Track Review

If an ASHRAE Level II or Level III energy audit (or equivalent) was conducted within the previous three (3) years and specific ECM recommendations provided, including projected energy savings, or if a targeted inefficient energy-using system is being replaced (for example, an old unit that is past its useful life), or if the facility is proposing to install a renewable energy system (such as a solar PV system), or if the project already has been pre-approved by a utility designated by the Clean Energy Efficiency Fund (CEEF), then Fast Track review processing may be used.

Fast Track routing is designed to reduce the level of "soft costs" incurred by the applicant and expeditiously gain C-PACE financing. The Fast Track process differs from the Full Assessment route in two ways (refer to Figure 1). First, the screening step is replaced with a step designed to confirm/update the information contained in the applicant's proposal. Second, the need for a comprehensive energy audit (which is relatively expensive) is unnecessary. Assuming the applicant's proposal is confirmed, the remaining steps are the same as in the Full Assessment route.

The applicant's proposal must be reviewed and confirmed by a qualified third-party (without any conflict of interest) to confirm that the proposed energy efficiency project is currently valid. Incorporated into the assessment is the collection of energy use data following the ASTM BEPA standard and validation of the projected energy savings. All pertinent data is entered into the CDMP to facilitate third party review.

Technical Underwriting

The technical methodology incorporated into the C-PACE review process relies upon three established industry protocols:

1. ASTM E2797-11, Building Energy Performance Assessment (BEPA) Standard[(1)] directed at data collection and baseline calculations for the energy audit;
2. ASHRAE Level I, Level II and Level III Energy Audit Guidelines[(2)]; and
3. Efficiency Valuation Organization (EVO®), 2012 International Performance Measurement and Verification Protocol (IPMVP®).[(3)]

ASTM BEPA

The ASTM Building Energy Performance Assessment (BEPA) Standard established a standardized methodology for building energy use data collection, compilation and analysis. The methodology is intended to fill data collection and analysis gaps in the ASHRAE energy audit guidelines and establish a technically sound, consistent and transparent building energy use baseline. The ASTM BEPA methodology standardized a number of major variables associated with data collection and analysis. This includes, for example, the time frame over which energy use data should be collected *[three years or back to the last "major renovation" if completed in less than three years, with a minimum of one year if reliability criteria are met]*; what constitutes a "major renovation" *[defined as a building renovation that either involves expansion (or reduction) of a building's gross floor area by 10% or more or that impacts total building energy use by more than 10%];* how building energy use should be normalized *[by gross floor area in square feet and by using the mean value of the statistically evaluated independent variables that impact energy use in the building energy use equation]*; and what weather data needs to be collected *[heating degree days and cooling degree days collected for a minimum 10 year period from the weather station nearest the building that has historical data available]*.

ASHRAE Energy Audit

As a condition of financing, C-PACE legislation requires the building owner to have an energy audit or renewable energy feasibility study performed by a qualified firm that assesses the expected energy consumption and cost savings of the energy improvements over their useful life.

The principal objectives of the energy audit are to:

- Identify and recommend, in collaboration with the property owner/ manager, C-PACE-eligible ECMs;
- Estimate the useful life of each ECM;
- Assess total project capital cost;
- Determine the energy savings that can confidently be achieved (energy savings should be determined by the difference between projected energy use after the ECMs are installed and the projected baseline energy use (without the ECMs installed) under similar conditions);
- Determine the project's key financial metrics, including ROI, IRR, NPV, life cycle savings, savings-to-investment ratio and payback time based on the effective useful life of the ECMs and the corresponding term of the C-PACE loan (the financial analysis performed reflects any rebates or incentives offered by utilities operating in the state).

The principal objectives of the renewable energy feasibility study are to:

- Identify major building energy-use systems;
- Identify electricity metering (number of boxes, location, etc.);
- Identify the utility electricity rate structure for property;
- Collect historic (past three years) electricity use and cost (in accordance with ASTM E2797-11);
- Describe the proposed renewable energy system;
- Identify and evaluate site suitability for the renewable energy system;
- Assess system expected performance and requirements to maintain optimized operation;
- Identify guaranteed performance and useful life;
- Assess total project capital cost;
- Analyze building energy savings including assumptions on avoided future utility electricity costs and any rate escalation (specifically discussing demand charge reduction and electricity cost savings basis);
- Determine the project's key financial metrics, including ROI, IRR, NPV, life cycle savings, savings-to-investment ratio and payback time based on the effective useful life of the renewable energy system (the financial analysis performed should reflect any rebates or incentives offered by utilities operating in the state, REC credits/ sale, potential excess electricity sale back to the grid).

In estimating the total project cost eligible for C-PACE funding, the cost of a preventive maintenance contract for the energy improvements, up to but not exceeding five years, may also be included.

Measurement and Verification

The purpose of performance measurement and verification (M&V) is to ensure that baseline and normalized energy use and cost performance is calculated in a technically sound, consistent and transparent manner, which in turn is used to determine energy savings. To accomplish this goal, an M&V plan must be prepared by the energy service company.

M&V plans should be based on the International Performance Measurement and Verification Protocol (IPMVP®). The IPMVP's fundamental concept stems from the fact that energy savings cannot be measured directly. Savings in this context are the absence of energy use (or "avoided energy use") that would have occurred without the ECMs installed. While it is expected that most projects will rely substantially on the IPMVP, exceptions may be approved depending on the specific nature and size of the project and the ECMs.

The IPMVP provides four options for determining energy savings. These include:

Option A. Retrofit Isolation: Key Parameter Measurement

Option B. Retrofit Isolation: All Parameter Measurement

Option C. Whole Facility

Option D. Calibrated Simulation.

Options A and B focus on the performance of specific ECMs that can be measured in isolation from the rest of the building. In Option A, the key energy use parameter is measured, but other minor effects can be estimated. For example, Option A might include a lighting retrofit, where an electric meter can isolate and measure electricity use for the lighting, but where the relatively minor interactive effect of less cooling in summer and more heating in winter is estimated. Reduced lighting loads will reduce air conditioning energy consumption (a cooling bonus), but increase heating consumption (a heating penalty). In Option B, all parameters necessary to evaluate energy use are measured. This might, for example, be the case with installation of a variable frequency drive and controls to a motor, with a power meter installed on the electrical supply to the motor.

Options C and D are used, for example, when energy use of the ECMs installed is not easily measured in isolation from the rest of building operations. The Option C approach assesses savings at the whole building level. The measured and verified energy savings in the desired reporting period (e.g., 12 months after the ECMs have been installed) is determined from the difference between the actual (measured) energy use in the reporting period and the projected energy use in this same reporting period assuming the ECMs had not been installed. The analysis reflects changes in the independent variables impacting building energy use (such as weather, occupancy, operating hours, etc.) for each month in reporting period as compared to the baseline. Option C is commonly applied for whole building retrofits involving multiple ECMs that may be interactive.

Option D uses computer simulations and building modeling (e.g., U.S. DOE 2.2- based software), and may be applied when baseline year energy use data are considered unreliable or incomplete.

Within the pre-agreed upon period after ECM installation (referred to as the "reporting period"), energy use data and other pertinent data is collected in accordance with the M&V plan and entered in the CEFIA Data Management Platform (CDMP). Recurring M&V reporting may be required by project stakeholders (CEFIA, building owner/manager, energy service company, capital provider, or insurer) over the term of the C-PACE assessment. An energy savings verification report must be prepared that describes the resultant actual energy savings in the reporting period compared to the projected energy savings.

Energy Savings Insurance

For certain projects, energy savings insurance (ESI) may serve as a strategic risk transfer tool that can aid in the underwriting, funding and success of a proposed project. ESI can provide a building owner or operator and/or capital provider with additional confidence that projected energy savings will be realized. The C-PACE program permits the cost of insurance to be bundled into total project financing and effectively be paid over the financing term. Insurance may result in a credit enhancement that may offset a portion or all of the premium cost.

While ESI may not be appropriate for all projects, the following guidance for the C-PACE program has been developed.

*Project scenarios where it is **unlikely** that ESI would be applicable:*

1. For relatively small projects such as projects involving costs of less than approximately $300,000. (Rationale: For such projects, the cost of ESI may represent an unacceptably high percentage of the total project cost.)
2. For projects with relatively short payback periods, such as those with payback periods of less than approximately 3 years. (Rationale: Energy savings for such projects are significant and minor variations in the final outcome will be minor.)
3. For projects solely involving fuel switching, i.e., oil to natural gas. (Rationale: CEFIA will have determined from relatively straight-forward calculations that at current and projected prices for natural gas, combined with high efficiency newer equipment, backed by a reputable manufacturer's guarantee, the need for ESI would be unlikely.)
4. If a single, relatively straight forward ECM is being installed, e.g., lighting upgrade, accompanied by a reputable manufacturer's performance guarantee. (Rationale: Similar to fuel switching, such projects often involve straight-forward calculations that can provide confidence in the projected energy savings.)
5. If an energy savings performance guarantee is obtained from an investment grade energy services company. (Rationale: Such companies have the financial resources to back their energy savings guarantee.)

*Project scenarios where **ESI** may be appropriate:*

1. Where the payback period is relatively long.
2. Where the project cost is significant and therefore the potential risk much greater.
3. For projects involving the installation of multiple energy conservation measures that may have interactive energy use implications, e.g., where the measurement and verification of the projected energy savings will be more difficult and complex.
4. If the project developer lacks sufficient financial resources to provide or back their energy savings performance guarantee.
5. If a capital provider is considering requiring ESI as a condition to fund the project.
6. If a capital provider considers ESI as a credit enhancement that can make the project more financially attractive.
7. If the credit enhancement provided by ESI will offset a significant portion or all of the insurance premium cost.

Data Management Platform

Projects undergoing both Full Assessment and Fast Track review are tracked in CEFIA's Data Management Platform (CDMP) powered by Sustainable Real Estate Solution's cloud-based software. Sample data that will be collected includes, but is not limited to:

- Candidate project information
- Performance baseline determination consistent with ASTM BEPA methodology
- Benchmarking results comparing candidate performance to local peer buildings
- Key energy audit data consistent with ASHRAE guidelines
- ECM data, including projected consumption and cost savings
- Key financial metrics
- Contractor information
- Project implementation data
- M&V data consistent with the IPMVP®
- Scheduling information
- Project approval/denial information.

The platform facilitates the uploading of key project data via excel spreadsheets, appending supporting documents, e.g., ECM data sheets, onsite photographs, modeling and data logging results, etc., in PDF file format. The platform has report generation and analytics capabilities across the project life cycle to support reporting requirements of the multiple interdependent stakeholders (CEFIA, building owners/managers, energy service companies, energy auditors, installation

contractors, capital providers and/or insurers). Standardizing on the CDMP ensures that all program interdependent stakeholders maintain cost effective access to the key performance analytics needed to facilitate project success and drive continuous C-PACE program improvement by all participants. (Refer to Exhibits 1-4)

Conclusion

The C-PACE program has developed a number of innovative approaches to make PACE tax lien financing especially attractive to the CRE industry. Among the compelling benefits are the program capabilities to enable: (1) projects to be accomplished with no capital cost outlay; (2) total project cost to be financed, including up-front costs; (3) positive cash flow to be realized immediately due to long term financing at attractive rates; (4) cost to be a pass through to tenants (who realize the benefits) under triple-net leases; and (5) no acceleration of the outstanding debt upon property sale, as the assessment transfers with ownership.

At the same time, the energy efficiency financial underwriting process supporting the program provides a consistent, cost effective, transparent, and technically sound methodology that enables owners and capital providers to have a high confidence level in the projected energy savings. Moreover, the security of the tax lien reduces capital provider risk and provides a credit enhancement.

In summary, the C-PACE program's innovative structure represents the cumulative experience and best practices developed from PACE programs operating around the country and leading CRE energy retrofit technical and financial underwriting programs. This best practice is now in place to support the emergence of CRE energy efficiency and renewable energy financing as a mainstream financial asset class with a high degree of standardization, predictability and scale. It is expected that the Connecticut C-PACE program will provide the proving ground to accelerate the large-scale adoption of energy efficiency investment in the CRE market and become a standard that other programs around the country may choose to emulate.

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Author Biography

Anthony J Buonicore, P.E.

Anthony Buonicore is a past president and Fellow Member of the Air & Waste Management Association, a Diplomat in the American Academy of Environmental Engineers, a Qualified Environmental Professional and a licensed professional engineer. He is a member of the ASTM Property Environmental Due Diligence committee, former chairman of its ASTM Phase I Task Group, and currently chairs the ASTM Task Group that developed the U.S. standard for vapor intrusion screening for properties involved in real estate transactions. In addition, Mr. Buonicore is chairman of the ASTM Task Group responsible for developing the new Building Energy Performance Assessment and Disclosure Standard.

Mr. Buonicore has been a leader in the energy-environmental industry since the early 1970s, serving as General Chairman of the American Institute of Chemical Engineers' First National Conference on Energy and the Environment in 1973 and as founder and first chairman of the Air Pollution Control Association's Energy-Environmental Interactions Technical Committee in 1974. He pioneered the use of refuse-derived fuel pellets (a bio-fuel) mixed with coal in stoker-fired boilers and has written extensively on energy and environmental issues.

As a Managing Director of Buonicore Partners, LLC, Mr. Buonicore is responsible for management of the firm's commercial real estate holdings and all due diligence activities associated with property acquisition. He holds both a bachelor's and a master's degree in chemical engineering.

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Kerry O'Neill

Kerry O'Neill is Senior Advisor at the Clean Energy Finance Center, a non-profit organization that develops innovative approaches to attract greater private and public sector capital to finance large-scale energy efficiency, renewable energy and carbon reduction initiatives. Ms. O'Neill is an expert in the emerging policies and finance structures that support energy efficiency investment at scale, testifying at regulatory and legislative hearings and advising organizations.

Figure 1.

Connecticut C-PACE Program Project Routing Overview

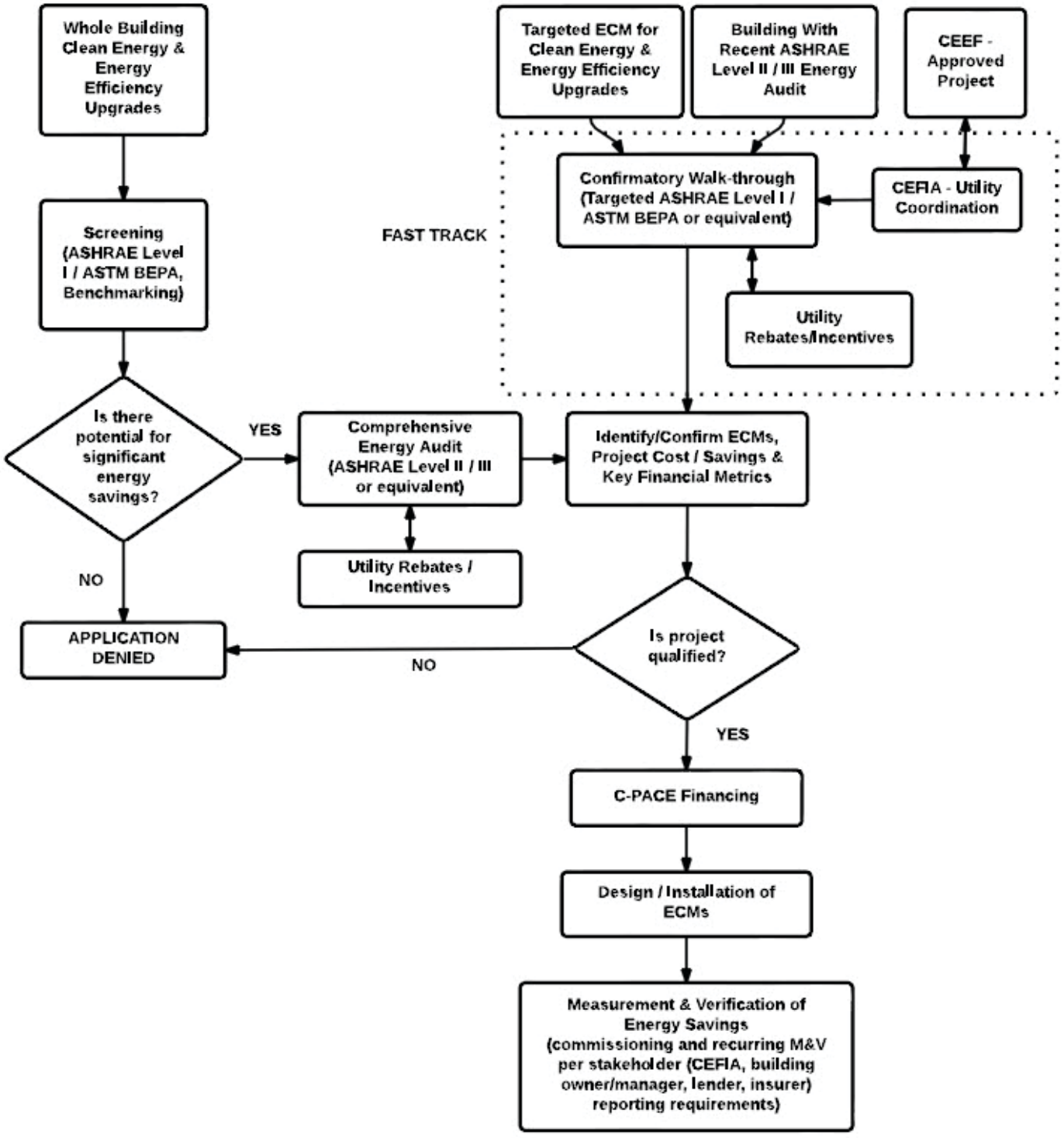
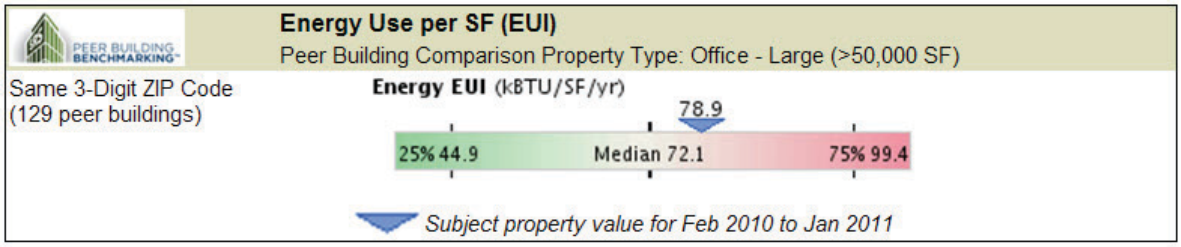
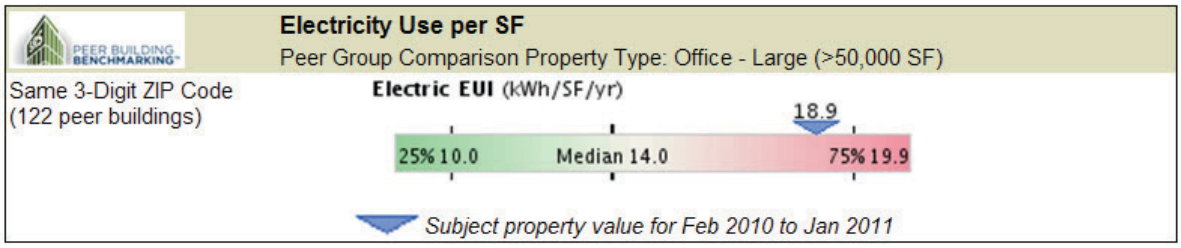


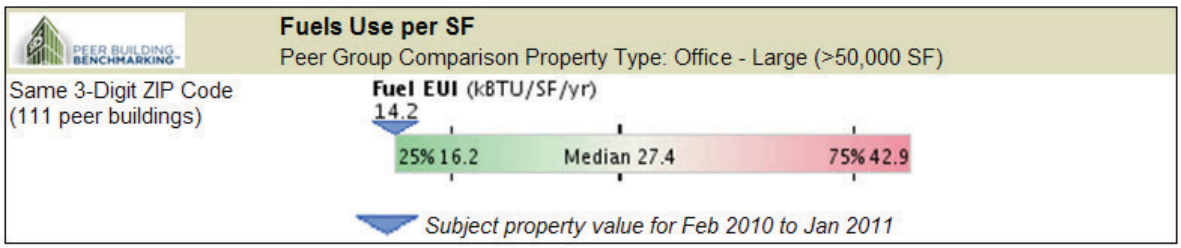
Exhibit 1.

CEFIA Data Management Platform (CDMP)
Performance Benchmarking / Project Screening Module

Energy Use Intensity (EUI) Benchmark Comparisons to Same ZIP Code Peer Group







Cost per Square Foot (SF) Benchmark Comparisons to Same ZIP Code Peer Group

Peer Building Benchmarking - Utility Cost

Property Type: Office - Large (>50,000 SF)
Peer Group: Same 3-Digit ZIP Code (79 peer buildings)

Utility Type	Subject Property 12 Months Spend Feb 2010 to Jan 2011	Subject Property Cost per SF ($/SF/yr)	Peer Group Benchmark Median Cost per SF ($/SF/yr)	Subject Property % Better / (Worse) Than Peer Group Median	Subject Property Potential Annual Cost Savings vs Peer Group Median ($/yr)
Electricity	$873,945	$4.38 / SF	$2.83 / SF	(54.6%)	$308,817
Fuels	$120,517	$0.60 / SF	$0.71 / SF	15.0%	N/A
Water/Sewer	$19,393	$0.10 / SF	$0.18 / SF	46.0%	N/A

SRS Peer Building Benchmarking data is current through May 2011.

As compared to its peer buildings median annual electricity cost per square foot, the electricity cost at the subject property is $1.55 / SF more than its peer group. If the performance of the subject property was improved to meet the median electricity performance of its peer group, the subject property has the potential to reduce its annual electricity cost by $308,817.

Exhibit 2.

CEFIA Data Management Platform (CDMP)
Project Development / Scenarios Module

Baseline & Projected Energy Use / Cost (pre & post ECMs)

Baseline Actual (Jan 2011 - Dec 2012) — Edit

Baseline EUI:	84.17 kBTU/SF
Baseline Consumption:	16,808,383 kBTU/yr
Baseline Cost:	$1,036,404 /yr

Baseline Projected (Weather Normalized, no ECMs) — Edit

Weather Normalized EUI:	84.42 kBTU/SF
Projected Consumption:	16,857,544 kBTU/yr

Projected Cost:
The table below displays baseline projected costs, adjusted for annual utility rate increases, for each year in the specified Projection Period.
Edit Rates

Year	Total Cost ($/yr)
1	$1,060,778
2	$1,115,049

Projected with ECMs (Post ECMs Installation)

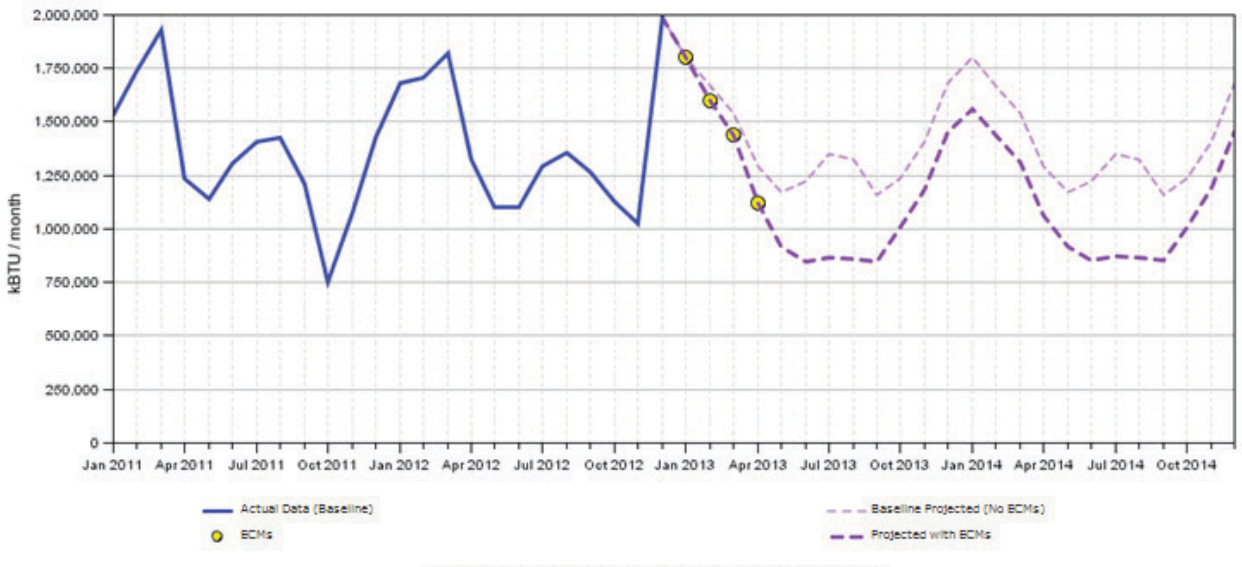
The table below displays projected EUI and energy costs for each year in the specified Projection Period. The percent columns show comparison with Baseline Projected values. Edit Rates

Year	Total EUI (kBTU/SF)	%	Total Cost ($/yr)	%
1	69.85	17.3%	$874,324	17.6%
2	67.02	20.6%	$881,632	20.9%

Current ENERGY STAR Rating: 62

The Projected ENERGY STAR Rating after ECMs installation is 82

Hide Chart | Show Elec/Fuel | Energy Consumption (kBTU/month) | Show Cost | Projection Period: 2 years | Update



Projected consumption includes an annual savings degradation factor of 1.0%.

Exhibit 3.

CEFIA Data Management Platform (CDMP) – Project Financials Module

Projected Key Financial Metrics

Key Financial Metrics About

	Projected	'Worst' Case	'Best' Case
Costs and Savings:			
Estimated Required Investment (Unleveraged):	**$239,400**	$280,538	$198,262
Estimated Annual Savings:	**$209,830**	$178,356	$241,304
Projected: $17,486 avg. / month			
Return on Investment (ROI):	**87.6%**	63.6%	121.7%
Simple Payback Term (years):	**1.14**	1.57	0.82
Finance Scenario:			
Estimated Required Investment (90% leveraged):	**$23,940**	$28,054	$19,826
Amount Financed (90% leveraged):	**$215,460**		
Estimated Annual Debt Service:	**$29,358**		
$2,447 per month for 120 months at 6.5% interest			
Estimated First Year Benefit:	**$0**		
Excess Annual Cash Flow: ($15,039 avg. / month)	**$180,472**	$148,997	$211,946
Financial Projections:			
Asset Value Impact from ECMs:			
@ 6.50% CAP rate	**$3,228,154**	$2,743,931	$3,712,377
@ 7.50% CAP rate	**$2,797,733**	$2,378,073	$3,217,393
@ 8.50% CAP rate	**$2,468,588**	$2,098,300	$2,838,876
Asset Value Impact less Required Investment:			
@ 6.50% CAP rate	**$2,988,754**	$2,463,393	$3,514,114
@ 7.50% CAP rate	**$2,558,333**	$2,097,536	$3,019,131
@ 8.50% CAP rate	**$2,229,188**	$1,817,762	$2,640,614
Internal Rate of Return - Unleveraged (IRR):	**91.4%**	67.0%	125.6%
Internal Rate of Return - Leveraged (IRR):	**757.8%**	550.8%	1,050.8%
Net Present Value (NPV):	**$1,406,339**	$1,118,341	$1,694,338
Time to Positive Cash Flow - Leveraged (years):	**0.13**	0.19	0.09

Estimated 'Best' and 'Worst' cases are calculated using a ±15% level of accuracy. This accuracy range is consistent with the American Society of Heating, Refrigerating and Air-Conditioning Engineers (ASHRAE) energy audit guidelines, i.e. Level I, II, III energy audits, as well as requirements for EPAct 179D tax deductions.

Projected Cash Flows About

Unleveraged				90% Leveraged			
Year	Projected	'Worst' case	'Best' Case	Year	Projected	'Worst' case	'Best' Case
Initial Investment	($239,400)	($280,538)	($198,262)	Initial Investment	($23,940)	($28,054)	($19,826)
1	$209,830	$178,356	$241,304	1	$180,472	$153,401	$207,543
2	$218,118	$185,401	$250,836	2	$187,601	$159,460	$215,741
3	$226,734	$192,724	$260,744	3	$195,011	$165,759	$224,262
4	$235,690	$200,336	$271,043	4	$202,714	$172,307	$233,121
5	$245,000	$208,250	$281,750	5	$210,721	$179,113	$242,329
6	$254,677	$216,476	$292,879	6	$219,044	$186,188	$251,901
7	$264,737	$225,026	$304,447	7	$227,697	$193,542	$261,851
8	$275,194	$233,915	$316,473	8	$236,691	$201,187	$272,194
9	$286,064	$243,155	$328,974	9	$246,040	$209,134	$282,946
10	$297,364	$252,759	$341,968	10	$255,759	$217,395	$294,122

Estimated 'Best' and 'Worst' cases are calculated using a ±15% level of accuracy. This accuracy range is consistent with the American Society of Heating, Refrigerating and Air-Conditioning Engineers (ASHRAE) energy audit guidelines, i.e. Level I, II, III energy audits, as well as requirements for EPAct 179D tax deductions.

Exhibit 4.

CEFIA Data Management Platform (CDMP) Measurement & Verification (M&V) Module

Measurement & Verification of Energy Savings (post ECMs)

Baseline Actual (Jun 2009 - May 2011) — Edit

Baseline EUI:	82.96 kBTU/SF
Baseline Consumption:	16,567,237 kBTU/yr
Baseline Cost:	$995,238 /yr

M&V Reporting* Selected Period: Jan 2012 - Dec 2012 — Edit

Baseline EUI (no ECMs):	81.95 kBTU/SF
Projected EUI (with ECMs):	65.29 kBTU/SF
Actual EUI:	62.88 kBTU/SF

Baseline Projected (Weather Normalized, no ECMs) — Edit

Weather Normalized EUI:	84.14 kBTU/SF
Projected Consumption:	16,802,080 kBTU/yr

Projected Cost:
The table below displays baseline projected costs, adjusted for annual utility rate increases, for each year in the specified Projection Period. Edit Rates

Year	Total Cost ($/yr)
1	$1,031,548
2	$1,084,203

Actual vs. Projected

Total	Consumption	Cost
Projected:	13,038,564 kBTU	$790,214
Actual:	12,556,654 kBTU	$725,807
Difference:	481,910 kBTU	$64,406

Actual consumption **3.7% better** than projected
Actual cost **8.2% better** than projected

* Values in this section from last 12 months of data in the M&V Reporting Period (Jun 2011 - Dec 2012).

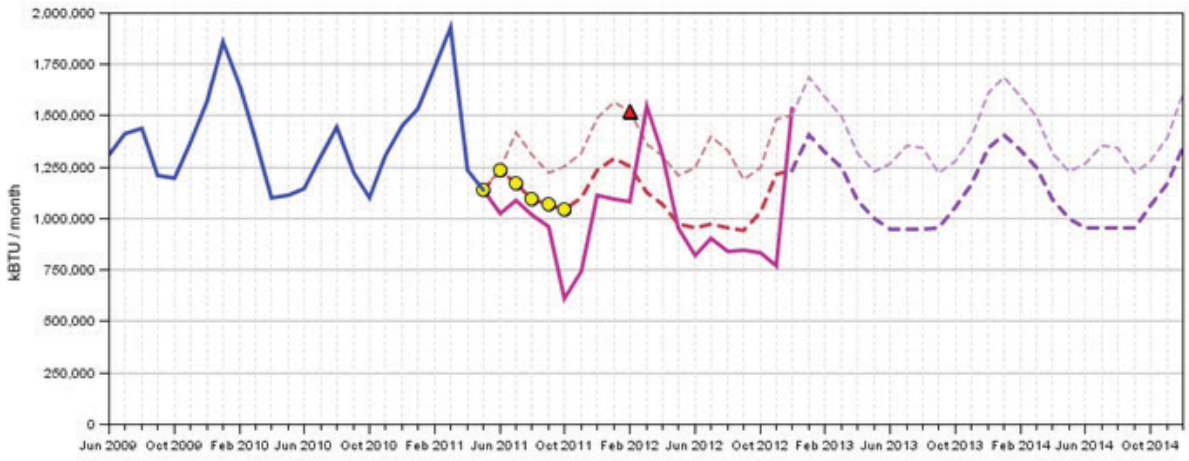
Projected with ECMs (Post ECMs Installation)

The table below displays projected EUI and energy costs for each year in the specified Projection Period. The percent columns show comparison with Baseline Projected values. Edit Rates

Year	Total EUI (kBTU/SF)	%	Total Cost ($/yr)	%
1	67.34	20.0%	$821,370	20.4%
2	67.50	19.8%	$865,471	20.2%

Current ENERGY STAR Rating: 92
Projected ENERGY STAR Rating: Out of Date
Click on the 'ENERGY STAR' tab below to obtain the projected rating.

Hide Chart | Show Elec/Fuel | Energy Consumption (kBTU/month) | Show Cost | Projection Period: 2 years | Update



Projected consumption includes an annual savings degradation factor of 1.0%.

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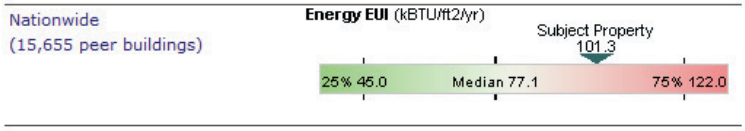

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