E3
Providers of Strategic Energy Services At The Exponential Interface Among

- Energy
- Economics and
- Environment

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THE E CUBED COMPANY, L.L.C.

October 31, 2008

David Salapa
Administrative Law Judge
Commonwealth of Pennsylvania
Pennsylvania Public Utility Commission
PO Box 3265
Harrisburg, PA 17105-3265

Re: Energy Efficiency and Conservation Program and EDC Plans
Docket # M-2008-2069887

Dear Judge Salapa:

The E Cubed Company, LLC, on behalf of the Joint Supporters, a voluntary association of companies and organizations, including providers and end-users that frequently employ distributed generation and clean combined heat and power technology utilizing natural gas, among many other energy efficiency techniques, hereby submits its comments regarding Docket M-2008-2069887. The experience of the Joint Supporters and The E Cubed Company, LLC in and from the design of State Energy Efficiency and Conservation Programs is summarized in Attachment A.

The Joint Supporters have participated in previous Commission efforts regarding energy efficiency, net metering, interconnection, and implementation of the Alternative Energy Portfolio Standards Act of 2004

The Joint Supporters include E Cubed clients deploying highly efficient combined heat and power capabilities in conjunction with energy efficiency mobilizations in the several states. To date nine states have included combined heat and power and waste energy in their efficiency and/or renewable portfolios.[1] We would like to encourage Pennsylvania to recognize highly efficient CHP as a component of its emerging efficiency incentive programs, especially for micro-combined heat and power systems (micro-CHP) for residences and smaller

[1] Pennsylvania, Arizona, Colorado, Connecticut, Hawaii, Massachusetts, North Carolina, North Dakota, Nevada, and Washington. For perspective twelve states and the District of Columbia, including Pennsylvania, allow net metering for CHP.

commercial situations and microturbine CHP systems in all situations. This would expand the opportunities for CHP users available with net metering.

To portray potential efficiency benefits of a sample micro-CHP technology, we offer the following facts regarding the situation in Pennsylvania. There are approximately 3.9 million single-family homes in the Commonwealth that could be candidates for highly efficient production of clean and quiet heat and power at the home site. The homes heated by natural gas and propane are immediate candidates as their heating systems need replacement (approximately 120,000 gas boilers and furnaces are replaced each year). Conversions from oil system may also be candidates. Highly efficient micro-CHP systems are now available that demonstrate societal (before and after) fuel savings in the range of 30-35%, and societal emissions reductions in the range 85% (NOx), 50% (CO2), and SOx (100%). One such system is the freewatt® system[2] that combines ECR International's high efficiency boilers and furnaces and Honda's 1.2 kW clean, quiet CHP system. It is thermally led and operates during the entire heating season. It could be activated also to meet the 100 hour opportunity. The aggregate of systems installed within a network could provide relief of peak load requirements. [3]

Per your notice dated October 21, 2008 (Corrected) what follows are our comments regarding many of the individual aspects of the energy efficiency and conservation program required under Section 2806.1(a)(1)-(11).

(1) Procedures for the approval of plans submitted under Subsection (B) .

The plans submitted under subsection (B) key to subsections (A), (C), and (D). Subsection A comprises the items (1) – (11) discussed in these comment. Subsection (B) provides a bridge to addressing the measures in subsections (C) for consumption reduction and (D) for Peak load reduction. In Attachment C we offer several abbreviated case study descriptions from other States that may be helpful to consider.

The instant legislative mandate here in Pennsylvania appears to be limited to electric distribution companies and the design of programs and incentives (for distribution companies, conservation services providers, and end-users) for electricity uses alone. The AEPS of 2004 has already broadened the mandate and opportunities for multiple measures such as net metering that can mobilize gas-fired combined heat and power, including for residential customers.

a. The Joint Supporters believe that the Commission should broaden this effort at its own initiative without waiting for legislative mandate in order to bring along now

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[2] http://freewatt.com

[3] The updated USEPA CHP emissions calculator has been utilized to demonstrate some of the benefits of 1,000 such installations deployed as a "CHP Fleet" in the Commonwealth. It is attached as Attachment B. Societal fuel consumption is reduced 39,000 MMBtu/year, societal emissions are reduced (NOx 9.2 tons / year, So2 41 tons / year, CO2 4,400 metric tons / year, Carbon 1,100 tons / year.) This carbon reduction is equal to the carbon emissions of 726 passenger vehicles on Pennsylvania's streets and roads and the annual carbon stored by 906 acres of pine and fir forests. The calculator is available as an Excel workbook at http://www.epa.gov/chp/basic/calculator.html

the gas distribution companies to establish parallel and/or analogous planning and mobilization objectives as well to create incentives for hybrid measures that bridge between electricity and other forms of energy, including not only renewables but natural gas and propane as well.

b. The creation of programs and incentives that interface between and among the electric and gas distribution companies, and between and among other related program administrators, such as financing back-stops to energy efficiency endeavors has high potential for success if dealt with up front.

c. Ex post facto additions leave the later entrants out of touch with the earlier entrants who have established their turf and mission and garnered a large share of available funds. Note the discussion on "bridging technology" in the discussion of topic # 5

d. The Joint Supporters propose that stakeholder opportunities to comment and participate during the design phase (both before and after the distribution company submissions) be given high priority and that input opportunities not be limited to potential competitive conservation services providers or be restricted to participants who physically appear in work groups or technical conferences in Harrisburg.

e. A number of other States are conducting similar design processes during the same time periods and valuable expertise, especially among the rapidly evolving provider community, is spread across many jurisdictions. It is extremely helpful for policy and program design to mobilize tele-conference and webinair capabilities. Email list servers provide valuable targeted communications. We encourage the Commission to break from past precedent essentially requiring physical presence at all workgroup sessions in order to participate effectively.

(2) AN EVALUATION PROCESS, INCLUDING A PROCESS TO MONITOR AND VERIFY DATA COLLECTION, QUALITY ASSURANCE AND RESULTS OF EACH PLAN AND THE PROGRAM.

Appropriate measurement and validation techniques (M&V) are widely available and rapidly evolving into universal standards allowing aggregated data that can be evaluated by the providers, the awarding program administrators (such as the Distribution Companies), and by the Commission. These are available in multiple States and also at ISO-NE where hundreds of megawatts of energy efficiency are now participating in the forward capacity market. The ISO-NE M&V guidelines were negotiated among all the State Governments and electric utilities in New England between 2006-2008.

(3) AN ANALYSIS OF THE COST AND BENEFIT OF EACH PLAN SUBMITTED UNDER SUBSECTION (B) IN ACCORDANCE WITH A TOTAL RESOURCE COST TEST APPROVED BY THE COMMISSION.

The Joint Supporters encourage the Commission to consider widening the Total Resource Cost Test (TRC) criteria in order to recognize societal energy (fuel) savings and which recognizes societal environmental savings.

To illustrate the appropriateness of recognizing societal energy savings, we introduce data from the 2008 Annual Energy Outlook (AEO) of the Energy Information Administration (EIA) with respect to residential energy consumption.4

The 2005 historic data for residential energy consumption and the forward forecast demonstrate roughly the following relationships. The total residential energy consumption in the United States is approximately 21 quadrillion btus. Only approximately 11 quadrillion of that is actually delivered to the residences, the balance of 10 quadrillion being lost due to efficiency losses in the production and delivery of electricity. The 11 quadrillion btus of delivered energy include about 5.6 quadrillion btus of natural gas and propane, and about 4 quadrillion of electricity. The balance is oil and other forms.

Typical TRC tests have not addressed the equivalents of the total 21 quadrillion btus as energy inputs to the residences, only the equivalents of the 11 quadrillion btus that are delivered. In short, delivered btus are acknowledged with possible recognition for "line losses" avoided, but not the inefficiencies of off-site conversion of fuel to electricity. That whole benefit of EE and CHP is not acknowledged significantly in typical TRC Tests.

On-site production of clean heat and power offers a dramatic resource to reduce these inefficiencies that are not now typically recognized in the TRC test. The EPA CHP emissions calculator identified above calculates the societal energy savings (btus in and btus out) as a by-product of the calculation of emissions reductions. In the illustration in Attachment B, the traditional model requiring btus supplied for remote electricity generation plus on-site thermal generation is compared to on-site micro-CHP generation where the thermal and electrical loads are partially or fully satisfied on-site. The results of the comparison corresponds to a 34% reduction in societal energy needs in order to heat and electrify one thousand homes with a portion of the electricity produced on-site.

If the additional potential of delivered natural gas and propane can be mobilized to produce electricity at the site, then a dramatic savings in societal energy could occur.

We recommend that the TRC tests authorized by the Commission should be altered to recognize the entire chain of electricity efficiency losses as being displaced by an EE measure, for example efficient clean heat and power.

(4) AN ANALYSIS OF HOW THE PROGRAM AND INDIVIDUAL PLANS WILL ENABLE EACH ELECTRIC DISTRIBUTION COMPANY TO ACHIEVE OR EXCEED THE REQUIREMENTS FOR REDUCTION IN CONSUMPTION UNDER SUBSECTIONS (C) AND (D).

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[4] 2008 Annual Energy Outlook,

Subsection (D) with its emphasis on peak reduction during 100 key hours (most typically in the summer months) offers unique opportunity for thermally led micro-CHP and CHP systems that are normally driven by heating season and other thermal needs. These technologies may be able to provide ongoing and/or supplemental generation to off-set on-site and local need for peak support. This is particularly beneficial for micro-CHP technology that would not normally be operating during the summer months.

A differential incentive for peak reduction would be highly appropriate to stimulate compliance but cannot ensure it. Connecticut employs such incentives in its EE programs. It also includes a differential incentive for net metering payments for certain types of systems that can function in those conditions. A differential incentive (upfront capital, or operating incentive) will help promote compliance.

(5) STANDARDS TO ENSURE THAT EACH PLAN INCLUDES A VARIETY OF ENERGY EFFICIENCY AND CONSERVATION MEASURES AND WILL PROVIDE THE MEASURES EQUITABLY TO ALL CLASSES OF CUSTOMERS.

Standards should be set that allow the energy efficiency benefits of "bridging technology" with all fuels to come to the fore before renewables can be widely and cost-effectively deployed. Policies encouraging the deployment of "bridging technology" helps to emphasize and recognize such efficiency and emissions reduction benefits as those of combined heat and power and especially micro-combined heat and power illustrated above in a footnote. [5]

BRIDGING TECHNOLOGIES: Bridging technologies, such as energy efficiency, combined heat and power, and load management are consciously part of the Alternative Energy Portfolio in Connecticut and Massachusetts, and to a certain extent in the AEP in Pennsylvania. For example, all three recognize CHP as part of their AEPS approach and provide overlapping incentives, including net metering and monetary incentives in the case of the other two jurisdictions. Connecticut, which converts the thermal benefit of CHP to kWh units as illustrated above, then grants Class III certificates to the CHP projects. It is advantageous when a State has already recognized the benefits of a measure, such as Pennsylvania has with its inclusion of CHP in net metering rules. It is important to encourage distribution companies to seek out other roles for bridging technology in the programs that they are preparing, including by program design encouraging the bidding Conservation Service Providers to seek out bridging technologies and services.

> We recommend that the Commission encourage the deployment of bridging technologies in the submissions of the distribution companies and that these become an accepted part of the approval process. Regulators and/or State Energy Offices and other authorities when local custom requires are addressing these issues in

[5] That efficiency benefit of that 35% societal fuel reduction converted from MMBTu to kWh (3,413 btu per kWh) in that example is the equivalent of 11,500,000 kWh saved over the course of a year. Connecticut and various other States employ this device to evaluate in electricity terms the input and output energy comparisons for at-the-site thermal generation and at-the-source electrical generation.

other States in order to optimize the benefits of bridging technology. It is fitting that Pennsylvania do so.

(6) PROCEDURES TO MAKE RECOMMENDATIONS AS TO ADDITIONAL MEASURES THAT WILL ENABLE AN ELECTRIC DISTRIBUTION COMPANY TO IMPROVE ITS PLAN AND EXCEED THE REQUIRED REDUCTIONS IN CONSUMPTION UNDER SUBSECTIONS (C) AND (D).

The five year window is too long to wait for the introduction of new approaches and to provide for the addition or substitution of measures. We suggest an annual review.

(7) PROCEDURES TO REQUIRE THAT ELECTRIC DISTRIBUTION COMPANIES COMPETITIVELY BID ALL CONTRACTS WITH CONSERVATION SERVICE PROVIDERS.

No Comment at this time.

(8) PROCEDURES TO REVIEW ALL PROPOSED CONTRACTS PRIOR TO THE EXECUTION OF THE CONTRACT WITH CONSERVATION SERVICE PROVIDERS TO IMPLEMENT THE PLAN. THE COMMISSION MAY ORDER THE MODIFICATION OF A PROPOSED CONTRACT TO ENSURE THAT THE PLAN MEETS THE REQUIREMENTS FOR REDUCTION IN DEMAND AND CONSUMPTION UNDER SUBSECTIONS (C) AND (D).

No Comment at this time.

(9) PROCEDURES TO ENSURE COMPLIANCE WITH REQUIREMENTS FOR REDUCTION IN CONSUMPTION UNDER SUBSECTIONS (C) AND (D).

Appropriate tracking of information from the operating facility by internet access, perhaps via the distribution company and/or a metering service provider, will demonstrate compliance.

(10) A REQUIREMENT FOR THE PARTICIPATION OF CONSERVATION SERVICE PROVIDERS IN THE IMPLEMENTATION OF ALL OR PART OF A PLAN.

The Joint Supporters are strong advocates of providing competitive opportunities for conservation service providers (CSPs), offering multiple measures to participate in many aspects of implementing a plan. They have assisted in the design and implementation of a number of programs that have been competitively bid by CSPs.

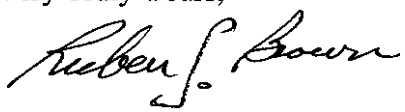
However, they also believe that there is a major role for standard offers for measures in the form of rebates, other incentives, and monetary awards, such as incentives with parity for residential solar installations and for residential micro-CHP systems, e.g. up to 50% of installed cost.

(11) COST RECOVERY TO ENSURE THAT MEASURES APPROVED ARE FINANCED BY THE SAME CUSTOMER CLASS THAT WILL RECEIVE THE DIRECT ENERGY AND CONSERVATION BENEFITS

No Comment at this time.

The E Cubed Company, LLC and the Joint Supporters appreciate this opportunity to submit these comments.

Very Truly Yours,



Ruben S. Brown, M.A.L.D.
President, The E Cubed Company, LLC

Arthur W. Pearson
Director, Project Operations, The E Cubed Company, LLC

On behalf of The Joint Supporters who for this purpose include:

Capstone Turbine Corporation
Climate Energy, LLC
E Cubed Company, LLC
ECR International, Inc.
Energy Concepts Engineering, PC
Energy Curtailment Specialists, Inc.
Energy Spectrum, Inc.

Attachment A

EXPERIENCE OF THE JOINT SUPPORTERS IN AEPS AND EPS PROGRAM DESIGN

The Joint Supporters have participated in previous Commission efforts regarding energy efficiency, net metering, interconnection, and implementation of the Alternative Energy Portfolio Standards Act of 2004. They have addressed similar design and implementation issues in other States, including Connecticut's Energy Independence Act of 2005, Rhode Island's Energy Policy of 2006, New York's Efficiency Portfolio Standard of 2007 (15% reduction by 2015), and the Massachusetts Green Communities Act of 2008,

Earlier they negotiated the design of New York's independently administered System Benefit Charge (SBC) program (more than one billion dollars over ten years) and the demand resource programs of several wholesale market institutions now involving thousands of Megawatts of demand response and energy efficiency. New York's individual regulated utilities who were moved out of DSM a decade ago started returning via demand response several years ago. The North American Electric Reliability Council's current ten year outlook anticipates 80% of load growth between now and 2016 will be met by 34,000 MW of demand response and 11,000 MW of energy efficiency. New York comprises a significant component of these amounts.

In 2005 and 2006 the Joint Supporters negotiated the design and implementation of a $250 million effort to mobilize energy efficiency, demand response, and distributed generation to meet 100% of load growth from 2005-2008 (850 MW) in the Consolidated Edison Company of New York territory. This effort is in the process of transforming into an incremental $180 million per year for a three year series of programs run by multiple program administrators, including the independent administrator (NYSERDA) and all regulated electric and gas utilities who are returning to the management of energy efficiency programs, clean distributed energy, and demand response. The Joint Supporters have been active in six of eight stakeholder workgroups designing the EPS over the past eighteen months. See recommendations below regarding employing a modified New York approval plan.

In addition to these activities, The E Cubed Company offers outsourced energy management services and project management services. Most recently these services were provided for the development of a one megawatt combined heat and power plant for a mixed-use development in Brooklyn. The project provides electric and thermal energy to 45 apartments, offices and a supermarket and received an Energy Star Award from the US EPA in June of this year.

The Joint Supporters include E Cubed clients moving to deploy efficient combined heat and power capabilities in conjunction with energy efficiency mobilizations in the several states. To date nine states have included combined heat and

power and waste energy in their efficiency and/or renewable portfolios.[6] We would like to encourage Pennsylvania to recognize highly efficient CHP as a component of its emerging efficiency incentive programs, especially for micro-combined heat and power systems (micro-CHP) for residences and smaller commercial situations and microturbine CHP systems in all situations.

The procedures employed in other jurisdictions for approval procedures for similar measures may be instructive, although not determinative, of course, given the uniqueness of Pennsylvania's policy determination and regulatory system. It is important to note, for example, that clean energy, efficiency and renewable portfolio policies in the States of Connecticut, Massachusetts, New York, and Michigan typically involve both the electric and the gas distribution companies. The instant legislative mandate here in Pennsylvania appears more narrowly focused on electric distribution companies.

> The Joint Supporters believe that the Commission should broaden the effort at its own initiative in order to bring in the gas distribution companies with parallel and/or analogous planning and mobilization objectives.

This helps permits the energy efficiency benefits of "bridging technology" with all fuels to come to the fore before renewables can be widely and cost-effectively deployed. Policies encouraging the deployment of "bridging technology" helps to emphasize and recognize such efficiency and emissions reduction benefits as those of combined heat and power and especially micro-combined heat and power illustrated above in a footnote. [7]

BRIDGING TECHNOLOGIES: Bridging technologies, such as energy efficiency, combined heat and power, and load management are consciously part of the Alternative Energy Portfolio in Connecticut and Massachusetts, and to a certain extent in the AEP in Pennsylvania. For example, all three recognize CHP as part of their AEPS approach and provide overlapping incentives, including net metering and monetary incentives in the case of the other two jurisdictions. Connecticut which converts the thermal benefit of CHP to kWh units as illustrated above then grants Class III certificates to the CHP projects. It is advantageous when a State has already recognized the benefits

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[7] That efficiency benefit of that 35% societal fuel reduction converted from MMBTu to kWh (3,413 btu per kWh) in that example is the equivalent of 11,500,000 kWh saved over the course of a year. Connecticut and various other States employ this device to evaluate in electricity terms the input and output energy comparisons for at-the-site thermal generation and at-the-source electrical generation.

Attachment A

of a measure, such as Pennsylvania has with its inclusion of CHP in net metering rules. It is important to encourage distribution companies seek out other roles for bridging technology in the programs that are preparing, including by program design encouraging the bidding Conservation Service Providers to seek out bridging technologies and services.

CHP Results

The results generated by the CHP Emissions Calculator are intended for eductional and outreach purposes only; it is not designed for use in developing emission inventories or preparing air permit applications.

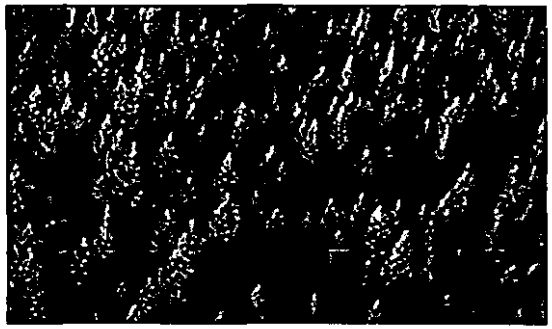
Annual Emissions Analysis

	CHP System	Displaced Electricity Production	Displaced Thermal Production	Emissions/Fuel Reduction	Percent Reduction
NOx (tons/year)	1.53	7.64	3.12	9.23	86%
SO2 (tons/year)	0.02	40.95	0.02	40.95	100%
CO2 (tons/year)	4,510	5,259	3,649	4,398	49%
Carbon (metric tons/year)	1,115	1,300	902	1,087	4[illegible]
Fuel Consumption (MMBtu/year)	77,094	53,800	62,382	39,089	3[illegible]
Equivalent Acres of Pine and Fir Forests				906	
Equivalent Passenger Vehicles				726	

This CHP project will reduce emissions of Carbon Dioxide (CO2) by 4,398 tons per year

This is equal to 1,087 metric tons of carbon equivalent (MTCE) per year

This reduction is equal to the annual carbon stored by 906 acres of pine and fir forests

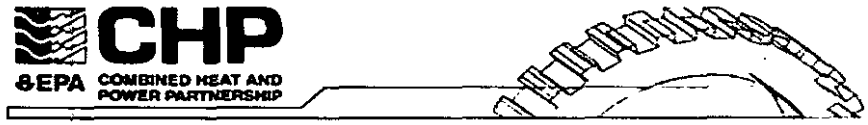


OR

This reduction is equal to the carbon emissions of 726 passenger vehicles per year

CHP Technology: Recip Engine - Rich Burn

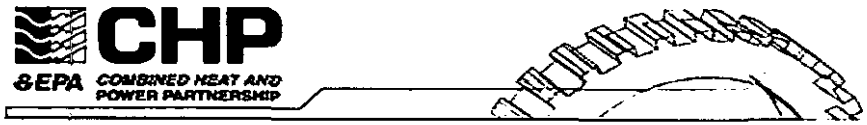
CHP Results



Fuel:	Natural Gas	
Unit Capacity:	1	kW
Number of Units:	1,000	
Total CHP Capacity:	1,200	kW
Operation:	4,160	hours per year
Heat Rate:	15,443	Btu/kWh HHV
CHP Fuel Consumption:	77,094	MMBtu/year
Duct Burner Fuel Consumption:	-	MMBtu/year
Total Fuel Consumption:	**77,094**	**MMBtu/year**
Total CHP Generation:	**4,992**	**MWh/year**
Useful CHP Thermal Output:	49,906	MMBtu/year for thermal applications (non-cooling)
	-	MMBtu/year for electric applications (cooling and electric heating)
	49,906	**MMBtu/year Total**
Displaced On-Site Production for Thermal (non-cooling) Applications:		Existing Gas Boiler
	0.10	lb/MMBtu NOx
	0.00%	sulfur content
Displaced Electric Service (cooling and electric heating):	There is no displaced cooling service	
Displaced Electricity Profile:	eGRID Average Fossil 2004	
Egrid State:	PA	
Distribution Losses:	7%	
Displaced Electricity Production:	4,992	MWh/year CHP generation
	-	MWh/year Displaced Electric Demand (cooling)
	-	MWh/year Displaced Electric Demand (electric heating)
	349	MWh/year Transmission Losses
	5,341	**MWh/year Total**

Annual Analysis for CHP

CHP Results



	CHP System: Recip Engine - Rich Burn			Total Emissions from CHP System
NOx (tons/year)	1.53	-		1.53
SO2 (tons/year)	0.02	-		0.02
CO2 (tons/year)	4,510	-		4,510
Carbon (metric tons/year)	1,115	-		1,115
Fuel Consumption (MMBtu/year)	77,094	-		77,094

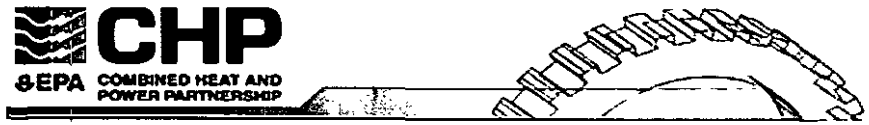
Annual Analysis for Displaced Production for Thermal (non-cooling) Applications				
				Total Displaced Emissions from Thermal Production
NOx (tons/year)				3.12
SO2 (tons/year)				0.02
CO2 (tons/year)				3,649
Carbon (metric tons/year)				902
Fuel Consumption (MMBtu/year)				62,382

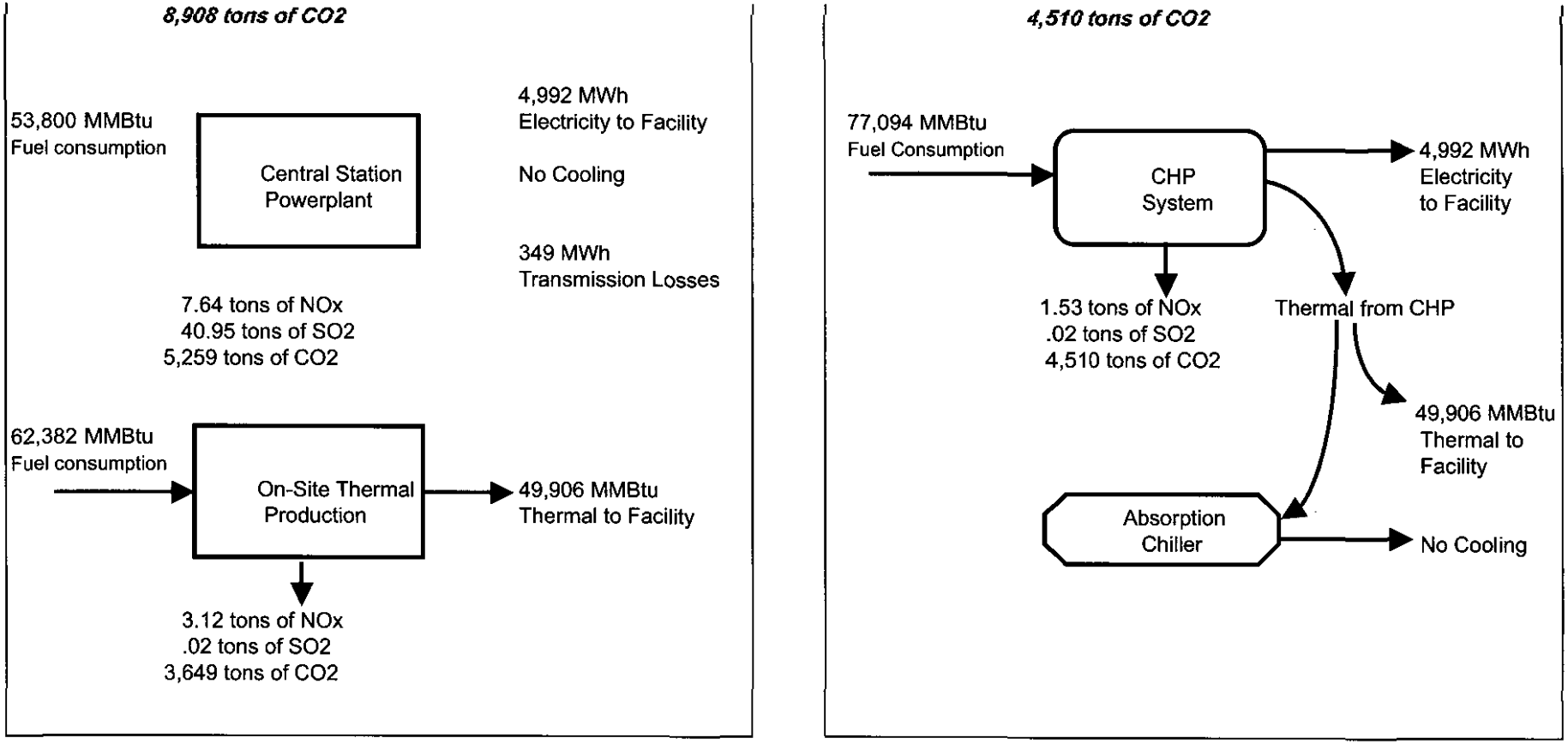
Annual Analysis for Displaced Electricity Production					
	Displaced CHP Electricity Generation	Displaced Electricity for Cooling	Displaced Electricity for Heating	Transmission Losses	Total Displaced Emissions from Electricity Generation
NOx (tons/year)	7.14	-	-	0.50	7.64
SO2 (tons/year)	38.27	-	-	2.68	40.95
CO2 (tons/year)	4,915	-	-	344.03	5,259
Carbon (metric tons/year)	1,215	-	-	85	1,300
Fuel Consumption (MMBtu/year)	50,281	-	-	3,520	53,800

Total Emissions for Conventional Production
10.76 tons of NOx
40.97 tons of SO2

Total Emissions for CHP System
1.53 tons of NOx
.02 tons of SO2

CHP Results





Emission Rates			
	CHP System including Duct Burners	Recip Engine - Rich Burn Alone	Displaced Electricity
NOx (lb/MWh)	0.61	0.61	2.86

CHP Results

SO2 (lb/MWh)	0.01	0.01	15.33
CO2 (lb/MWh)	1,807	1,807	1,969

Emission Rates	
	Displaced Thermal Production
NOx (lb/MMBtu)	0.10
SO2 (lb/MMBtu)	0.00059
CO2 (lb/MMBtu)	117

Attachment C

MICHIGAN: The approval processes for both electric and gas distribution programs can be made parallel. Michigan's recent Act 250 (ck) requires both types of regulated entities to submit "energy optimization" plans on the same schedule which deals with some of the same issues that you are dealing with. Their process is unfolding on a similar timetable as yours. A substantial increase in the Commission's budget was authorized to deal with the expanded mandate.

NEW YORK: New York's administratively initiated process for its Efficiency Portfolio Standard had both types of regulated entities submitting plans on the same time schedules in August and September (after eighteen months of negotiating all kinds of generic issues with eight work groups of interested stakeholders [four at a time in two cycles]). Program Administrators, including a central independent administrator, NYSERDA, and each of the regulated electric and gas distribution companies, submitted plans fast-track early implementation (60 days to submit) and longer term implementation (90 days to submit). Each of these is now undergoing case-by-case review by the Commission with notice and comment procedures, rather than litigated hearings. One of the later workgroups (VIII) has recognized the convergence of EE and Demand Response, especially at the residential level, as does the instant legislative mandate here. It calls on the Commission to encourage the Program Administrators to develop programs and incentives going forward to address the interface of Demand Response and Energy Efficiency programs and to utilize CHP and micro-CHP, especially now that residential CHP is deployable.

The New York process is administered by two Administrative Law Judges who are trained in mediation activity. Periodic reports and proposed decisions are forwarded to the Commission for review and approval in public session.

CONNECTICUT: In implementing its 2005 Energy Independence Act, which served a number of analogous purposes to the instant legislative mandate, the Connecticut Department of Public Utility Control (DPUC) first divided up the substantive issues into a series of 6-8 generic proceedings covering all regulated electric and gas distribution companies. Each of these advanced on distinct time tracks, with one Docket being two phased to dealing with a series of monetary grants and awards to deal with peak load reduction and capacity needs (this being the major concern in the legislation). Each generic proceeding took appearances of interested stakeholders, conducted technical conferences, enlisted workgroups of stakeholders where appropriate to resolve open issues (where agreement was possible or clarified differences where not possible), and then held hearings. This permitted differences to be worked out among interested stakeholders, including the electric distribution companies and all other parties allowed at the regulatory negotiating table in that jurisdiction, including notably service providers, public representatives such as consumer and environmental interests, including long established Energy and Environmental Advisory Boards.

Thereafter, the two electric distribution companies filed compliance documentation treated in discrete dockets. The Commission issued its decisions on each company's items discretely. Connecticut has long conducted utility administered efficiency programs. These continued on their normal cycles (utility plan submission, review, and approval) while the above processes were working through their decisions,

Attachment C

including decisions to centrally procure substantial distributed generation resources and to provide waiver of natural gas delivery charges for combined heat and power projects (cost recovery is from electric rate payers). In that case, the DPUC supervised requests or bids for awards while the administrative implementation of funding by the EDCs was conducted by means of standard contracts negotiated and approved in advance. However, each application for funding was evaluated and approved by the DPUC.

The approval process therefore involved a series of preliminary and final decisions in the generic dockets and in each of the compliance situations. The generic processes took approximately 8-12 months to conduct.