1999 STATE-LEVEL SMALL/MEDIUM NONRESIDENTIAL MA&E STUDY

FINAL REPORT

APPENDIX A

Volume 2 of 2

PG&E-SW035

Prepared for

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SURVEY INSTRUMENTS

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A.1 EXPRESS: PARTICIPANT END-USER SURVEY

1999 CALIFORNIA SMALL NONRESIDENTIAL PROGRAM PARTICIPANTS PROCESS EVALUATION SURVEY

Q1. Hello, this is <INTERVIEWER NAME> calling from Quantum Consulting on behalf of [UTILITY]. May I please speak with [PROGRAM CONTACT]?

[IF NEEDED:] My understanding is that [PROGRAM CONTACT] is responsible for making energy-related decisions for your firm at this location – may I please speak with him/her?

[IF NO PROGRAM CONTACT:]

Hello, this is <INTERVIEWER NAME> calling from Quantum Consulting on behalf of [UTILITY]. I need to speak with the person most knowledgeable about recent changes of cooling, lighting, or other energy-related equipment for your firm at this location.

[IF NEEDED:] We're calling to do a follow-up survey on your firm's participation in the 1999 [UTILITY] Express Efficiency program.

[IF NEEDED:] This is a very important fact-finding survey among firms that have participated recently in an energy efficiency program sponsored by [UTILITY]. We are NOT interested in selling anything, and responses will not be connected with your firm in any way. [UTILITY] wants to understand how businesses think about and manage their energy consumption.

[IF NEEDED:] The four investor-owned utilities in California are cooperating on this important study, authorized by the California Public Utilities Commission, to better understand how businesses like yours think about and manage their energy consumption. Your input is very important to the utilities and to the Commission.

[IF NEEDED, PROVIDE UTILITY-SPECIFIC CONTACT NAME AND PHONE DISPLAYED BELOW IF RESPONDENT ASKS.]

1	Current individual is best contact	Q2
2	Transferred to best contact	Q2
3	Given best contact's name and number	Record for future contact
99	Don't know/refused	Thank & terminate

[WHEN CORRECT RESPONDENT IS ON-LINE (REPEAT AS NEEDED WHEN CURRENT INDIVIDUAL IS BEST CONTACT):]

Q2. Hello, this is <INTERVIEWER NAME> calling from Quantum Consulting, a national energy market research firm. Today we're conducting a very important survey on behalf of [UTILITY], among participants in their 1999 Express Efficiency program. It should take no more than about 15 or 20 minutes, and it's an important opportunity to make sure your views are represented. We believe you'll find it quite interesting.

[IF NEEDED:] Can I confirm that you're responsible for making energy-related decisions for your firm at this location?

[IF NEEDED:] This is a fact-finding survey only – we are NOT interested in selling anything, and responses will not be connected with your firm in any way. [UTILITY] wants to understand how businesses think about and manage their energy consumption.

[IF NEEDED:] The four investor-owned utilities in California are cooperating on this important study, authorized by the California Public Utilities Commission, to better understand how businesses like yours think about and manage their energy consumption. Your input is very important to the utilities and to the Commission.

[IF NEEDED, PROVIDE UTILITY-SPECIFIC CONTACT NAME AND PHONE DISPLAYED BELOW IF RESPONDENT ASKS.]

1	Current individual is best contact	Q3
2	Transferred to best contact	Repeat Q2 w/best contact
3	Given best contact's name and number	Record for future contact
99	Don't know/refused	Thank & terminate

PROGRAM AWARENESS, SOURCES OF AWARENESS, AND PARTICIPATION

Q3. First, we'll be talking about the topic of energy efficiency at your business – specifically, different changes your firm may have made in energy-using equipment, or changes you could make, that will help your firm save energy. Just to check, in 1999 did your firm participate in the [UTILITY] Express Efficiency rebate program at this location? [IF NEEDED:] This is a program where your business received a rebate for installing one or more energy-efficient products covered under the program.

1	Yes, participated in Express Efficiency as described	Q4
2	Yes, participated in Express Efficiency, but at other location	Q4
3	Yes, participated in [UTILITY] program, but don't recall that as	h@4
	name	
4	NO, did NOT participate in Express Efficiency program	Q3a
5 *	NO, did NOT receive rebate (but did participate in program)	Q3a
88	Other [SPECIFY:]	<u>Q</u> 3a
99	DK/refused	Q3a

Q3a. Is it possible that someone else at your location actually dealt with the energy-efficient product installation? Or maybe you installed an energy-efficient product at your location in 1999, but the installer dealt with the program paperwork?

1	Someone else dealt with it	ASK TO SPEAK WITH THAT INDIVIDUAL	Q2
2	Installed EE measures (but	dQ6b	
	recall rebate or program)		
3	Applied for program/have no	OTTERMINATE BUT KEEP SCREENER INFO	Þ
	installed EE measures yet		
88	Other [SPECIFY:]	TERMINATE BUT KEEP SCREENER INFO	þ
99	DK/refused	TERMINATE BUT KEEP SCREENER INFO	þ

Q3b. OK, for the rest of the survey I'll be referring to your participation in the Express Efficiency program, even though you may not have been involved in all of the program paperwork and details. That's not unusual.

Q4. What specific products did you install during 1999, as part of this program? [RECORD ALL MENTIONS. PROBE AS NEEDED FOR CLARITY REGARDING MOST APPROPRIATE RESPONSE CATEGORY.]

1	T8 fluorescent lamps (skinny fluorescent bulbs,	Q5
	skinnier	
	fluorescent bulbs than used to have installed)	
2	Reflectors in lighting fixtures (with de-lamping)	Q5
3	Compact fluorescent lamps (CFLs)	Q5
4	Light occupancy sensors	Q5
5	Energy-efficient air condition/HVAC	Q5
6	Set-back/programmable thermostat	Q5
7	Adjustable speed drives/ASDs [record only for	Q5
	HVAC fans or air handlers]	
8	Window film/treatment	Q5
88	Other [SPECIFY:]	Q5
98	Have NOT YET installed measures	TERMINATE
99	DK/refused	Q5

Q5. Have you received your rebate check for participating in the 1999 program?

1	Yes, have received rebate check(s)	Q5a
2	No, have not received rebate check(s)	Q5a
3	Have received some, but not all, rebate checks	Q5a
4 *	Don't recall/didn't know there was a rebate involve	d Q5a
5	Contractor received rebate check	Q5a
99	DK/refused	Q5a

Q5a. Besides the Express Efficiency rebate program, are you aware of any OTHER programs or resources provided by [UTILITY] in 1999 that were designed to promote energy efficiency for businesses like yours? [IF YES:] What types of programs can you recall? [RECORD ALL MENTIONS.]

1	SPC / Standard Performance Contracting	Q6
2	Business energy audits	Q6
3	Distributor incentives	Q6
88	Other programs [SPECIFY:]	Q6_
98	No, not aware of any programs	Q6
99	DK/refused	Q6

[ASK Q6 IF NOT AWARE OF SPC AT Q5a; ELSE, SKIP TO Q7.]

Q6. Do you recall seeing or hearing about the [UTILITY] Standard Performance Contracting, or SPC program during 1999, as a program promoting energy efficiency for firms like yours?

1	Yes	Q8
2	No	Q8
99	DK/refused	Q8

Q8. Besides the Express Efficiency program, did you participate in any OTHER energy efficiency programs offered by [UTILITY], in 1999? [RECORD ALL MENTIONS]

1	Yes, SPC / Standard Performance Contracting	Q9
2	Yes, energy audits	Q9
3	Yes, other [SPECIFY:]	Q9
4	No, did NOT participate in other 1999 programs	Q9
5	No, but APPLIED for SPC (haven't yet participated)	Q9
6	No, but REQUESTED energy audit (haven't yet participa	teed9
7	No, but APPLIED/INQUIRED about other program:	Q9
99	DK/refused/no more	Q9

Q9. Besides participating in Express Efficiency or any other [UTILITY] programs in 1999, did your firm participate in any [UTILITY] energy efficiency programs in 1996, 1997, or 1998, at this location? [RECORD ALL MENTIONS]

1	Yes, Express Efficiency	Q15
2	Yes, SPC / Standard Performance Contraction	n Q 15
3	Yes, energy audits	Q15
4	Yes, other [SPECIFY:]	Q15
5	No, did NOT participate in previous program	y@a15s
99	DK/refused	Q15

[Q'S 10-14 SKIPPED ON PURPOSE.]

A-7

Q15. OK, for the rest of the survey I'd like you to respond in terms of your knowledge and experience regarding the 1999 Express Efficiency program, not earlier program years. How did you first learn about the 1999 Express Efficiency program? [DO NOT READ CATEGORIES; ENTER ALL THAT APPLY]

1	Respondent approached contractor/ESCO/A&E firm/other 3 rd party	Q16
2	Respondent approached utility concerning another matter and learned about the program	Q16
3	Contacted by utility account rep	Q16
4	Contacted by contractor/ESCO/A&E firm/other 3 rd party	Q16
5	Utility brochure in mail	Q16
6	Bill insert	Q16
7	Word-of-mouth from friends or co-workers within the company	Q16
8	Word-of-mouth from friends or other business associates outside the company	Q16
9	Television, radio, newspaper ad	Q16
10	Magazine or trade journal	Q16
11	Participation in previous years	Q16
12	Manufacturer information/suggestion	Q16
13	Other [SPECIFY:]	Q16
99	DK/NA/refused	Q16

[ASK Q16 IF MORE THAN ONE RESPONSE GIVEN TO Q15; ELSE ASK Q17.] Q16. Which of these was the most influential on your decision to participate in the 1999 Express Efficiency program? [ENTER ONLY ONE CATEGORY; IF NECESSARY, PROMPT WITH RESPONSES GIVEN IN Q15.]

1	Respondent approached contractor/ESCO/A&E firm/other 3	Q17
	party	
2	Respondent approached utility concerning another matter and	Q17
	learned about the program	
3	Contacted by utility account rep	Q17
4	Contacted by contractor/ESCO/A&E firm/other 3 rd party	Q17
5	Utility brochure in mail	Q17
6	Bill insert	Q17
7	Word-of-mouth from friends or co-workers within the company	Q17
8	Word-of-mouth from friends or other business associates outside	Q17
	the company	
9	Television, radio, newspaper ad	Q17
10	Magazine or trade journal	Q17
11	Participation in previous years	Q17
12	Manufacturer information/suggestion	Q17
13	Other [SPECIFY:]	Q17
99	DK/NA/refused	Q17

REASONS FOR PARTICIPATION/MEASURES INSTALLED

Q17. Why did your company participate in the 1999 Express Efficiency program? [DO NOT READ CATEGORIES; ENTER ALL THAT APPLY]

1	Acquiring the latest technology	Q18
2	Saving money on electric bills	Q18
3	Obtaining a rebate	Q18
4	Replacing old or broken equipment	Q18
5	Knowing the program was sponsored by utility	Q18
6	Improving measure performance for employees and/or cus	Q18 tomers
7	Helping to protect the environment	Q18
8	Previous experience with other utility programs	Q18
9	Recommended by utility account reps	Q18
10	Recommended by contractors	Q18
11	Participation in previous years	Q18
12	Part of a broader office remodeling/renovation	Q18
13	Other [SPECIFY:]	Q18
99	DK/NA/refused	Q18

[ASK Q18 IF MORE THAN ONE RESPONSE GIVEN TO Q17; ELSE SKIP TO Q31.] Q18. Which of these was the MOST important reason? [ENTER ONLY ONE CATEGORY; IF NECESSARY, PROMPT W/RESPONSES GIVEN IN Q17.]

1	Acquiring the latest technology	Q31
2	Saving money on electric bills	Q31
3	Obtaining a rebate	Q31
4	Replacing old or broken equipment	Q31
5	Knowing the program was sponsored by utility	Q31
6	Improving measure performance for employees and/or	Q31
	customers	
7	Helping to protect the environment	Q31
8	Previous experience with other utility programs	Q31
9	Recommended by utility account reps	Q31
10	Recommended by contractors	Q31
11	Participation in previous years	Q31
12	Part of a broader office remodeling/renovation	Q31
13	Other [SPECIFY:]	Q31
99	DK/NA/refused	Q31

[Q'S 19-30 SKIPPED ON PURPOSE.]

IMPACT OF CONTRACTORS ON DECISION PROCESS

Q31. Which of the following statements best describes the performance and operating condition of the equipment you replaced as part of the 1999 program? [READ LIST]

1	New equipment installed did NOT replace pre-existing equipment	Q32
2	Existing equipment was fully functional	Q32
3	Existing equipment was functioning, but with significant problems	Q32
4	Or, existing equipment had failed or did not function	Q32
99	[DO NOT READ:] DK/NA	Q32

Q32. Did you use a contractor, engineering firm, energy services firm, or other service provider to design or install the measures you had installed under the 1999 Express Efficiency program?

1	Contractor	Q33
2	Engineering firm	Q33
3	Energy services firm	Q33
4	General/other [SPECIFY:]	Q33
5	DID NOT USE external service provider	Q40
99	DK/refused	Q40

Q33. What is the name of the company or companies that provided that service? [RECORD VERBATIM AND CONTINUE WITH Q34.]

Q34. Had you worked with this provider before your participation in the 1999 program?

1	Yes	Q35
2	No	Q35
9	DK/NA	Q35

Q35.	How many	providers	did you	get quotes	or proposals	from, for	this project?
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# of provider	quotes/proposals
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[ASK Q36 UNLESS Q35=1; IF Q35=1 SKIP TO Q37.]
Q36. What factors were important in selecting the proposal you chose for this work?
[RECORD ALL RESPONSES.]

1	Needed urgent/immediate replacement	Q37
2	Timeliness of response (not urgent/immediate)	Q37
3	Lower price/up-front cost	Q37
4	Lower maintenance cost	Q37
5	Ability to get rebate/incentive	Q37
6	Worked with contractor before/prior experience	Q37
7	Contractor seemed easier to do business with	Q37
8	Contractor reputation/referral	Q37
9	Equipment reputation/recommendation	Q37
10	Higher efficiency level	Q37
11	Better non-energy (comfort, quality) performan	oQ 37
88	Other [SPECIFY:]	Q37
99	DK/NA	Q37

Q37. Did you review equipment or materials that offered different levels of energy efficiency, when deciding which specific equipment or materials to install?

1	Yes, reviewed different efficiency levels	Q38
2	No, did NOT review different efficiency levels	Q39
9	DK/NA	Q39

Q38. How important was the input from the provider you worked with in deciding which specific equipment to install? Please give me a rating from 1 to 10, where 10 means EXTREMELY important, and 1 means NOT AT ALL important.

#	O39
11	Q 05

Q39. How important was the input from the provider you worked with in deciding to participate in the 1999 program? Please give me a rating from 1 to 10, where 10 means EXTREMELY important, and 1 means NOT AT ALL important.

|--|

PROGRAM SATISFACTION AND IMPACT ON ATTITUDES

Q40. Next I'm going to ask a few questions about your 1999 Express Efficiency program experience, both with [UTILITY], as well as with a design or installation firm if you used one. First, would you say that the overall program experience with [UTILITY] was ... [READ LIST]?

1	Much better than you expected	Q42
2	Somewhat better than you expected	Q42
3	About as expected	Q42
4	Somewhat worse than expected, or	Q42
5	Much worse than expected	Q42
9	[DO NOT READ:] DK/NA	Q42

[ASK Q42 IF SERVICE PROVIDER USED AT Q32 (1, 2, 3, OR 4 = YES); ELSE SKIP TO Q45. FILL IN TEXT BELOW WITH Q32 RESPONSE OPTION TEXT OR OPTION 4 OSPEC.]

Q42. Would you say that the overall program experience with [PROVIDER] was ... [READ LIST]?

1	Much better than you expected	Q43
2	Somewhat better than you expected	Q43
3	About as expected	Q43
4	Somewhat worse than expected, or	Q43
5	Much worse than expected	Q43
9	[DO NOT READ:] DK/NA	Q45

Q43. Why do you say that? Why else? [RECORD VERBATIM; GO TO Q45]

[Q44 SKIPPED ON PURPOSE.]

Q45. And, compared to the equipment or system you had before, has the performance of the new equipment or system been ... [READ LIST] ... compared to your previous equipment or system?

1	Much better	Q46
2	Somewhat better	Q46
3	About the same	Q46
4	Somewhat worse, or	Q46
5	Much worse	Q46
9	[DO NOT READ:] Had no previous equipment/system	Q46
9	[DO NOT READ:] DK/NA	Q46

Q46. Please rate your OVERALL satisfaction with the 1999 Express Efficiency program experience using a scale from 1 to 10, where 10 means you're extremely satisfied and 1 means you're extremely Dissatisfied.

#	Ω47
"	3 , ⊤1

Q47. Why do you say that? Why else? [RECORD VERBATIM; GO TO Q48]

Q48. Has your experience with the program increased, decreased, or had no impact on your confidence that energy-efficient investments will reduce your energy bills?

1	Increased	Q49
2	Decreased	Q49
3	Had no impact	Q49
99	DK/NA	Q49

Q49. How likely will you be to actively consider energy-efficient products when installing or replacing energy-using products for your business in the future? Please give me a rating from 1 to 10, where 10 means you're EXTREMELY likely to consider energy-efficient products, and 1 means you're NOT AT ALL likely to consider energy-efficient products.

#	Q50

Q50. And please rate the importance of your 1999 program experience in influencing your likelihood of considering energy efficiency in the future. Please use a scale from 1 to 10, where 10 means your program experience was EXTREMELY important, and 1 means your program experience was NOT AT ALL important in influencing your consideration of energy efficiency in the future.

#	Q51

[SKIP TO Q54 IF DIDN'T RECALL REBATE (*) AT Q3 OR Q5; ELSE CONTINUE.] Q51. Using the same scale, how important was the PROGRAM REBATE in helping you to get over any initial cost barriers? [REPEAT AS NEEDED:] Please give me a rating from 1 to 10, where 10 means the rebate was EXTREMELY important in helping you get over initial cost barriers, and 1 means it was NOT AT ALL important.

#	Q52
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Q52. Using the same scale, how important was the PROGRAM REBATE in convincing you that the high efficiency measure(s) you installed would perform as described? [REPEAT AS NEEDED:] Please give me a rating from 1 to 10, where 10 means the rebate was EXTREMELY important in convincing you of the measure's performance, and 1 means it was NOT AT ALL important.

- 	C = I
 	Q34

NET-TO-GROSS AND PROGRAM INFLUENCE

Q54. Did you become aware of the program before or after you made the decision to purchase the equipment installed through the program?

1	Before	Q55
2	After	Q55
3	At the same time as purchase	Q55
99	DK/NA/refused	Q55

Q55. If you had not replaced this equipment under the program, how long would you have waited to replace it? Would you have ... [READ LIST]?

1	Replaced at the same time	Q56
2	Replaced within the year	Q56
3	Replaced after more than one year	Q56
4	Or, not replaced at all	Q56
99	[DO NOT READ:] DK/NA/Refused	Q56

Q56. Were you aware of the program before you began shopping for the new equipment?

1	Yes	Q57
2	No	Q57
99	DK/NA/refused	Q57

Q57. Before you knew about the [UTILITY] program, which ONE of the following statements BEST describes your company's plans to install that equipment? [READ CATEGORIES; STOP WHEN RESPONDENT SELECTS CATEGORY]

1	You hadn't even considered purchasing new equipment	Q58
2	You were interested in installing new equipment, but hadn't yet decided on energy efficient equipment – that is, you were considering all your options	Q58
3	You had already decided to install HIGH efficiency equipment, but probably not within the year	Q58
4	You had already decided to install HIGH efficiency equipment within	Q58
	the year	
99	[DO NOT READ:] DK/NA/Refused	Q58

Q58. Which of the following statements best describes the actions your firm would have undertaken had the 1999 Express Efficiency program NOT existed...[READ CATEGORIES; STOP WHEN RESPONDENT SELECTS CATEGORY]

1	We would not have changed the existing equipment	Q63
2	We would have bought HIGH efficiency equipment	Q59
3	We would have bought STANDARD efficiency equipment	Q63
99	[DO NOT READ:] DK/NA/Refused	Q63

Q59. Which of the following statements best describes your firm's plans to install HIGH EFFICIENCY equipment had the program NOT existed... [READ LIST]?

1	We would have installed high efficiency equipment at the same time we program	Q63
2	We would have installed high efficiency equipment within the year	Q63
3	We would have installed high efficiency equipment, but not within the	Q60
	year	
4	We wouldn't have installed high-efficiency equipment at all	Q63
99	[DO NOT READ:] DK/NA/Refused	Q63

Q60. How many years would you have waited before installing high efficiency equipment if the program had not existed?

#	# of years	Q63
99	DK/NA Refused	Q63

MARKET BARRIER TRACKING ITEMS

Q63. Now I'd like to read a brief series of statements and I'd like you to tell me how well each statement describes your beliefs about energy efficient investments or practices. We'll again use a 1-to-10 scale, where 1 means you DON'T AGREE AT ALL with the statement, and 10 means you AGREE COMPLETELY with the statement. The first/next one is ... [RANDOMIZE, READ AND OBTAIN A RATING FOR EACH. WHEN SEQUENCE COMPLETE, GO TO Q71.]

When considering a new energy efficiency investment, I am concerned that the actual bill savings will be less than what was estimated

It takes too much time and hassle to get enough information to make an informed decision about energy efficient investments

I feel uncertain about the reliability of information provided by non-utility firms proposing energy-efficient investments for my business

There are energy efficient investments that I'm interested in making, but they always seem to fall below other priorities

Investments in energy-efficient equipment are complicated for my firm, because we don't always have control over those decisions

Energy-efficient equipment like cooling and lighting will perform as well as equipment that is not energy-efficient

[Q'S 64-70 SKIPPED ON PURPOSE.]

DECISION MAKING PROCESSES

Q71. In general, do the decision-makers at your business find energy efficiency very important, somewhat important, not very important, or not at all important?

1	Very important	Q72
2	Somewhat important	Q72
3	Not very important	Q72
4	Not at all important	Q72
9	DK/NA	Q72

Q72. Has your organization assigned responsibility for controlling or monitoring energy usage to a specific person?

1	Yes	Q73
2	No	Q73
9	DK/NA/refused	Q73

Q73. Has your organization developed a policy for the selection of high-efficiency versions of energy-using equipment, rather than standard-efficiency versions?

1	Yes	Q73a
2	No	Q74
99	DK/NA/Refused	Q74

Q73a. And was that policy put in place BEFORE or AFTER you began participating in the Express Efficiency program?

1	Before Express participation	Q74
2	After Express participation	Q74
99	DK/NA/Refused	Q74

Q74. Does your organization routinely apply long-term investment analysis to energy equipment selection, such as estimates of payback periods, life cycle costing, or internal rate-of-return?

1	Yes	Q75
2	No	Q76
9	DK/NA	Q76

Q75. What is the PRIMARY investment criterion you use? [ACCEPT ONLY ONE RESPONSE; PROMPT WITH LIST AS NECESSARY.]

1	Payback period	Q76
2	Life cycle costing analysis	Q76
3	Internal rate of return	Q76
4	Something else (SPECIFY – NOT CODED:)	Q76
9	DK/NA	Q76

Q76. The "payback period" is a way that some firms evaluate investments. For our purposes, it's the period of time your firm would need to achieve savings on your energy bill, in order to pay for any extra up-front cost associated with installing more energy-efficient equipment. Using that definition, what's the longest the payback can be for an energy efficiency investment, for it to be acceptable to your firm?

# Enter years/months data	Q77
---------------------------	-----

Q77. Using a scale from 1 to 10, where 1 means you aren't knowledgeable at all, and 10 means you are fully knowledgeable, please rate how knowledgeable you feel that you are about what energy efficiency products are available, and how they'll perform?

#	Enter 1-10 rating	Q78
• •		~.· ·

DIFFUSION-OF-INNOVATION AND RELATED TRACKING ITEMS

Q78. For each of the next few statements, please rate your agreement on a scale from 1 to 10, where 1 means you DON'T AGREE AT ALL with the statement, and 10 means you AGREE COMPLETELY. They are [RANDOMIZE AND OBTAIN RESPONSE FOR EACH]:

#	There are important practical benefits that come with	Q83
	Energy efficient investments, apart from saving mon	ey
#	In general, energy efficient investments are easy to	Q83
	Understand and use	
#	I actively advocate energy efficient investments and	Q83
	practices	
	to others	

[Q'S 79-82 SKIPPED ON PURPOSE.]

FIRMOGRAPHICS

Q83. OK, these last few questions are just to make sure we talked to a cross-section of businesses in your area. Which of the following categories describes the number of employees your firm has at this location? [READ LIST].

1	1 to 5	Q84
2	6 to 10	Q84
3	11 to 20	Q84
4	21 to 50	Q84
5	51 to 100	Q84
6	Or, over 100	Q84
9	[DO NOT READ:] DK/NA/refused	Q84

Q84. Can you estimate the total square footage of your facility at this location to be ... [READ LIST]?

1	Less than 5,000 square feet	Q85
2	5,000 but less than 10,000 square feet	Q85
3	10,000 but less than 20,000 square feet	Q85
4	20,000 but less than 50,000 square feet	Q85
5	50,000 but less than 100,000 square feet	Q85
6	Or, 100,000 square feet or more	Q85
9	[DO NOT READ:] DK/NA/refused	Q85

Q85. Does your business own or lease the facility?

1	Own	Q88
2	Lease/rent	Q86
9	DK/NA/refused	Q86

Q86. Does your business pay for all, a portion, or none of the electric utility bill for your space at this facility?

1	Pay ALL of bill – NO electric utilities in the lease	Q87
2	Pay some portion of electric utility bill – some throug	hQ87
	lease	
3	Pay NONE of bill - ALL electric utilities through lease	eQ87
9	DK/NA/refused	Q87

Q87. How active a role does your business take in making lighting and climate control equipment purchase decisions at this facility? [READ LIST.]

1	Very active – involved in all phases and have veto power	Q88
2	Somewhat active – we approve decisions and provide some	n € 88
	input and review	
3	Slightly active – we have a voice but it's not the dominant	Q88
	voice	
4	Not active at all – we're part of a larger firm	Q88
5	Or, not active at all – our firm doesn't get involved in these	Q88
	issues	
9	DK/NA/refused	Q88

Q88. Have you remodeled this space since January 1997?

1	Yes	Q89
2	No	Q90
3	DK/NA/refused	Q90

Q89. Which of the following were replaced or installed as part of this remodeling process? [READ LIST, RECORD ALL "YES" ANSWERS.]

1	A significant proportion of overhead lighting	Q90
2	Heating or ventilation equipment	Q90
3	Roof, ceiling, or wall insulation	Q90
4	Windows or window film	Q90
5	[DO NOT READ:] None of the above	Q90
9	[DO NOT READ:] DK/NA/refused	Q90

Q90. What is your job title or role? [GO TO Q91.]

Q91. Is this location ... [READ LIST]?

1	Your firm's only location	Q92
2	A branch office of a larger firm based in California	Q92
3	A branch office of a larger firm based OUTSIDE California	Q92
4	A franchise location of a larger firm based in California	Q92
5	A franchise location of a larger firm based OUTSIDE California	Q92
6	Or, the headquarters of a firm with multiple locations	Q92
99	[DO NOT READ:] None of the above	Q92

Q92. And finally, based on what we've discussed today, what other comments or suggestions do you have regarding energy-efficient products and practices, or utility programs that support energy efficiency? [RECORD VERBATIM]

May I please record your name, simply for verification purposes – a supervisor will confirm a small percentage of the interviews I've done.

Thank you very much for your participation in this very important survey, you've been extremely helpful. I hope you found the process interesting and enjoyable. Thanks again, and have a great day.

A.2 SBSPC: PARTICIPANT END-USER SURVEY

1999 Small/Medium Nonresidential Market Study

SBSPC End-User Participant Survey

Prepared for PG&E on behalf of the CBEE

Prepared by XENERGY Inc.

Interviewer		
SBSPC Utility		
Tracking # from Utility Dbase		
Survey Number		
Completion Date/Survey Length		
IDENTIFY NAME OF SPONSORING EESP PRO	OVIDED IN TRACKING DATABASE	
IDENTIFY UTILITY IN WHICH APPLICATIONS DATABASE	SUBMITTED - PG&E, SCE, OR SDG&E FROM	
CORRECTED INFORMATION PER INTERVIEWEE (SPONSOR NAME or MEASURES INSTALLED)		

END-USER PARTICIPANT INTERVIEW GUIDE – POSSIBLE LEAD IN MATERIAL May I please speak with [CONTACT_______]? [Confirm this person is responsible for participation decision.] Hello, my name is _____ and I am calling about your participation in [UTILITY's] Small Business Standard Performance Contract Program. We are conducting a statewide evaluation of this Program under contract to Pacific Gas & Electric Company on behalf of the California Public Utilities Commission and with the cooperation of your local utility.

We are interviewing firms that are participating in the 1999 Small Business Standard Performance Contract program to discuss a number of topics about the program. Your input to this research is very important. The interview will take between *approximately* 15 minutes and any information that is provided will remain strictly confidential. We will not identify or attribute any of your comments or company information. Is this a good time, or can we schedule a convenient time in the next couple of days to talk?

IF HESITANT: Your input to this survey is very important for ensuring the long-term success of these programs. Without input from the participants, we will have difficulty conducting a fair and complete evaluation of the program. The CA utilities expect that beneficiaries of incentives agree to participate in evaluation activities that are required by the CPUC.

Thank you for taking part in this survey. The major purposes of this study are to (1) obtain feedback on the design and administrative aspects of the program, and (2) understand the characteristics of participants in the program and the types of activity the program has generated. This interview is focused on experiences with the program to date.

RESPONDENT INFORMATION

RI1. First, I'd like to confirm the following information? [CONFIRM CONTACT INFO IN DATABASE, COMPLETE ADDITIONAL INFO AS NECESSARY]

a. NAME	h. PHONE
b. TITLE	i. FAX
c. COMPANY	j. e-MAIL
d. STREET ADDRESS	
e. CITY	k. INTERVIEWER
f. ZIP	I. CALL DATES

[BASED ON DATABASE DETERMINE IF SINGLE OR MULTI-SITE SBSPC APPLICATION THEN CONFIRM]

RI2. According to the SBSPC program records, your application covers: FROM DATABASE: A SINGLE SITE / MULTIPLE SITES

Is this information correct?	
Yes, Single site1	SKIP TO R14
Yes, Multiple sites2	ASK RI3
No, information appears incorrect [TERMINATE TO INVESTIGATE]3	
Don't Know [CONFIRM RIGHT CONTACT, TERMINATE]98	
Refused [CONFIRM RIGHT CONTACT, TERMINATE,]99	

RI3. Great, and according to the program records, your application covers: **NUMBER OF SITES**

Is this information correct?

Yes1
No, information appears incorrect [TERMINATE TO INVESTIGATE]3
Don't Know [TERMINATE, CONFIRM RIGHT CONTACT]98
Refused ITERMINATE. CONFIRM RIGHT CONTACT199

RI4. According to our records, the energy services firm that is the sponsor of the SBSPC program application for which your company is a host site is:

STATE SPONSOR NAME [FROM DATABASE]

Is this information correct?

/es	1
No	2
Don't Know [TERMINATE, CONFIRM RIGHT CONTACT]	98
Refused ITERMINATE TO INVESTIGATE1	99

ESTABLISHMENT CHARACTERISTICS

I'd like to ask you a few questions about your organization and the facilities participating in the SBSPC.

EC1a. What kind of **facility** is this?

DO NOT READ LIST. IF NECESSARY, PROBE CLOSEST CATEGORIES.

IF **SINGLE-SITE PARTICIPANT** (RI2=1) SELECT SINGLE CATEGORY **(ES1a1)**.

IF **MULTI-SITE PARTICIPANT** (RI2=2), GET PERCENT BY TYPE ACROSS SITES (**ES1a2**)

	ES1a1	
	ES1a2	
	Single Site	M-Site
%		
	Primary or Secondary School1	
	College or other post-secondary school2	
	Office	
	Hospital4	
	Non-Food Retail5	
	Restaurant6	
	Government7	
	Grocery/Food Sales/Service8	
	Lodging9	
	Warehouse10	
	Religious11	
	Industrial Manufacturing12	
	Industrial Assembly13	
	Other ()14	
	Don't know98	
	Refused99	
		100

EC1b. And what is the primary business of the **company/organization**?

ENTER VERBATIM

EC2.	[IF SINGLE-SITE PARTICIPANT (RI2=1) ASK] Approximately how large is your organization's space in this facility?
	[ELSE IF MULTI-SITE (RI2=2), ASK] What is the <u>average size</u> of your organization's space among these participating facilities?
	sq. ft. CODE 98 FOR DON'T KNOW; 99 FOR REFUSED
EC3.	Does your organization Own and occupy
EC4	For these participating facilities, does your organization pay its own electric bill directly to [PACIFIC GAS & ELECTRIC/ SOUTHERN CALIFORNIA EDISON / SAN DIEGO GAS & ELECTRIC] or is electricity provided by the owner under your lease arrangement? Pay own electric bill
EC5	[IF SINGLE-SITE PARTICIPANT (RI2=1) ASK] What is your best estimate of your average monthly electric bill at this facility?
	[ELSE IF MULTI-SITE (RI2=2), ASK] What is your best estimate of your <u>average</u> monthly total electric bill across all participating sites?
	ENTER \$ PER MONTH



EC6.	Is this facility[IF RI2=1, DO NOT READ, MARK #1 BELOW]	
	[DON'T READ) Your organization's only location	1
	A franchise location	2
	A headquarters location of an organization with multiple location	ations3
	A branch location of a larger organization	4
	Don't Know	98
	Refused	gg

PARTICIPATION REASONS

Switching now to the 1999 SBSPC...

PA1. Why did your company participate in the 1999 SBSPC program? [DO NOT READ CATEGORIES; ENTER ALL THAT APPLY]

A	Acquiring the latest technology	1
	Saving money on electric bills	
	Obtaining a rebate	
	Replacing old or broken equipment	
	Knowing the program was sponsored by utility	
	mproving measure performance for employees and/or customers.	
	Helping to protect the environment	
	Previous experience with other utility programs	
	Recommended by utility account reps	
	Recommended by contractors	
	Participation in previous years	
	Part of a broader office remodeling/renovation	
	Other [SPECIFY:]	
	DK/NA/refused	
	these was the MOST important reason? [ENTER ONLY ONE RY; IF NECESSARY, PROMPT W/RESPONSES GIVEN IN PA1.]	
CATEGO	RY; IF NECESSARY, PROMPT W/RESPONSES GIVEN IN PA1.]	
CATEGO	RY; IF NECESSARY, PROMPT W/RESPONSES GIVEN IN PA1.	1
CATEGO A S	RY; IF NECESSARY, PROMPT W/RESPONSES GIVEN IN PA1.] Acquiring the latest technology	1 2
CATEGO A S	RY; IF NECESSARY, PROMPT W/RESPONSES GIVEN IN PA1.] Acquiring the latest technology	1 2
CATEGO A S C F	RY; IF NECESSARY, PROMPT W/RESPONSES GIVEN IN PA1.] Acquiring the latest technology	1 2 3
CATEGO A S C F K	RY; IF NECESSARY, PROMPT W/RESPONSES GIVEN IN PA1.] Acquiring the latest technology	1 3 4
CATEGO A S C F K II	RY; IF NECESSARY, PROMPT W/RESPONSES GIVEN IN PA1.] Acquiring the latest technology	1 3 4 5
CATEGO A S C F k II H	RY; IF NECESSARY, PROMPT W/RESPONSES GIVEN IN PA1.] Acquiring the latest technology	1 3 4 5
CATEGO A S C F k II F	RY; IF NECESSARY, PROMPT W/RESPONSES GIVEN IN PA1.] Acquiring the latest technology	1 3 4 5 6
CATEGO A S C F K III F F	RY; IF NECESSARY, PROMPT W/RESPONSES GIVEN IN PA1.] Acquiring the latest technology	1 3 4 5 6 7
CATEGO A S C F K II F F	RY; IF NECESSARY, PROMPT W/RESPONSES GIVEN IN PA1.] Acquiring the latest technology	1 2 4 5 6 7
CATEGO A S C F K III F F F	RY; IF NECESSARY, PROMPT W/RESPONSES GIVEN IN PA1.] Acquiring the latest technology	1 4 5 6 7 8
CATEGO A S C F K II F F F F	RY; IF NECESSARY, PROMPT W/RESPONSES GIVEN IN PA1.] Acquiring the latest technology	1 2 4 5 6 9 10

SBSPC PARTICIPATION - ID DECISION MAKERS

Now I'd like to ask some questions about the measures you submitted as part of your SBSPC application.

PA3. First, I'd like to confirm how far along would you are in the SBSPC application process. Have you:		
	ation only1	
Submitted Detailed Program App	olication, but still in process	
0 11	2	
Submitted Detailed Program App	olication and obtained approval3	
GET AS MUCH OF STATUS AS POS	SIBLE FROM UTILITY TRACKING	
<u>DATABASES</u>]		
	ur company was involved in authorizing program, and what were their roles in	
Name:	Name:	
Role:	Role:	
Phone:	Phone:	
PA5. And who was primarily responsib equipment?	ole for the specification of the installed	
Equipment type:	Equipment type:	
Name:	Name:	
Phone:	Phone:	
Equipment type:	Equipment type:	
Name:	Name:	
Phone:	Phone:	
[CONFIRM/CHECK AGAINST DATA BASE RECORDS]		

SBSPC PARTICIPATION - ID/Confirm measures

(Discuss with interviewee the measures you are going to ask guestions about. Determine which measures they are familiar with and whether they or someone else is the more appropriate person to answer the questions. If necessary, conduct additional interviews with others to accurately answer the questions on the following pages. IF MEASURES FROM DATABASES ARE UNAVAILABLE, ASK RESPONDENT WHICH MEASURES WERE INSTALLED AS PART OF THE 1999 SBSPC PROGRAM AND LIST BELOW) Interviewee Name (if different from interviewee on pg.1):_____ Measures covered by this section. Use additional sections as necessary for different interviewees or for breakout of answers by measure types. List Measures by type, Describe as Necessary. Or attach and reference sheet with measures currently tracked in program database. 1. 2. 3. 4. Section # _____ of #____ sections for this SBSPC Survey Number. Remind the interviewee that the following questions pertain to the particular energy efficiency measures that are to be installed as part of the SBSPC Program and are identified in the above tables. Use multiple forms if answers appear to vary significantly



by measure type.]

PROGRAM-RELATED DECISION MAKING SECTION - NET-TO-GROSS

[Again, make sure interviewee is aware that you are talking about specific technologies that will be installed through the SBSPC program and referred to in the measure identification section above.]

PD1		Which of the following statements best describes the situation that led you to propose the installation of <i>Program-Related Equipment</i> ?	
		Needed to replace older equipment Needed to add equipment because of a remodel, build-out, or expansion Wanted to reduce our energy costs	2 3 4 5
PD		How did you first hear about the Energy Efficiency Equipment that was installed as part of the Program?	
	[A	CCEPT ONLY ONE RESPONSE]	
	1	Contractor	
	2	Architect / Engineer	
	3	Vendor	
	4a	PG&E representative or program literature (confirm, regulated distribution company)	
	4b	SCE representative or program literature (confirm, regulated distribution company)	
	4c	SDG&E representative or program literature (confirm, regulated distribution company)	
	5	Other non-utility literature, including trade publications	
	6	Friend / Business colleague / Professional association	
	7	Previous installation	
	8	Energy Services Company, often referred to as ESCOs	
	9	An unregulated company that provides electricity supply	
	10	OTHER [SPECIFY, OK TO PUT NAME OF COMPANY]	

11 DON'T KNOW / REFUSED

	Specify name of company/source:
	[SELECT SINGLE BEST RESPONSE]
PD3	How did you first learn of the SBSPC Program?

CIRCLE CLOSEST CATEGORY

- 1 Contractor
- 2 Architect / Engineer
- 3 Equipment Vendor
- 4a PG&E representative or program literature (confirm, regulated distribution company)
- 4b SCE representative or program literature (confirm, regulated distribution company)
- 4c SDG&E representative or program literature (confirm, regulated distribution company)
- 5 Friend / Business colleague / Professional association
- 6 SBSPC Workshop
- 7 SBSPC Website
- 8 Other SBSPC marketing materials / advertising
- 9 Energy Services Company, often referred to as ESCOs
- 10 An unregulated company that provides electricity supply
- 11 OTHER [SPECIFY]

12 DON'T KNOW / REFUSED

PD 4a When did you first learn about the SBSPC Program? Was it **BEFORE** or was it **AFTER** you first began to think about installing **Energy Efficient Equipment**?

- 1 BEFORE OR AT SAME TIME
- 2 AFTER
- 9 DON'T KNOW / REFUSED

PD 4a1. And approximately when did you first begin to think about installing *Energy Efficient Equipment*?

	ľ	Month: Year:
[IF 4a=	=1 (e	e.g., Before) THEN SKIP TO PD-4b1]
PD 4b		you learn about the SBSPC Program BEFORE or AFTER you <u>decided to</u> all the Energy Efficient Equipment that you plan to install?
	•	1 BEFORE OR AT SAME TIME
	2	2 AFTER
	Ç	9 DON'T KNOW / REFUSED
PD		. And approximately when did you first decide to install Energy Efficient ipment?
	ľ	Month: Year:
PD4c		ch of the following best describes the process by which <u>you decided to install</u> Energy Efficiency Equipment?
	1 [Developed the idea ourselves and decided solely on our own to pursue installation
		Developed the idea ourselves but were convinced by a third-party to pursue nstallation

- 3 Received the idea from a third-party and were also convinced by this party to pursue installation
- 5 Other →PD4c1. Describe_____
- 9 DON'T KNOW / REFUSED
- PD5. As part of your participation in the SBSPC program, the Energy Efficiency Service Provider that is the sponsor of the program application for your organization will receive an incentive from **UTILITY** payable over two years that is based on the level of energy savings demonstrated to result from your project.

PD5a. Prior to this call, were you aware that incentives will be received by SPONSOR , from the SBSPC program for this project?
Yes1 No2
PD5b. Which of the following statements best describes the arrangement you have with SPONSOR with respect to allocation of the incentives from the SBSPC program? [READ LIST AND SELECT ONLY ONE]
Program incentives will be applied directly to reducing the costs of purchasing and installing the efficient equipment?
PD6a. How significant was the SBSPC program incentive in influencing your decision to install the Energy Efficiency Equipment? Would you say Insignificant
PD6b. How significant was the overall value of the services provided b SPONSOR in influencing your decision to install the Energy Efficiency Equipment? Would you say Insignificant

PD7b. Please describe the specific ways in which **SPONSOR** contributed, if at all, to your decision to install the *Energy Efficient Equipment*?

PD7a. Without the SBSPC program, including both the incentive <u>and</u> the services provided by **SPONSOR**, how likely is it you would have installed the *Energy Efficient Equipment*? Would you...

- 1 Definitely would NOT have installed SKIP TO PD 9a————
- 2 Probably would NOT have installed

SKIP TO PD 9a

- 3 Probably would have installed
- 4 Definitely would have installed
- 9 DON'T KNOW / REFUSED
- PD 8 Without the SBSPC program, how likely is it that the equipment you purchased would have been *as energy efficient* as the equipment you installed with the incentive? Would you say . . .
 - 1 Probably NOT as efficient
 - 2 Probably as efficient
 - 9 DON'T KNOW / REFUSED

PD 8b Without the SBSPC program, would you have installed the *Energy Efficient Equipment* at about the same time as currently planned or over a year later? [If over 1 year later, probe for best estimate of how many years later.]

- 1 Same Time To Less Than 1 Year
- 2 Over 1 Year Later PD9c. Approximately how many years later?
- 9 DON'T KNOW / REFUSED

[SKIP TO 0T1]

PD 9a Without the SBSPC program, including both the incentive <u>and</u> services provided by **SPONSOR**, what type of equipment would you have most likely installed? Would you say. . .

- 1 Standard efficiency equipment
- 2 Equipment with above-standard efficiency but with lower efficiency than the equipment that was actually installed
- 3 Would not have installed anything
- 9 DON'T KNOW / REFUSED

PD 9b Would you have installed the *Energy Efficient Equipment* at a later date? (How many years later)

[If over 1 year later, probe for best estimate of how many years later.]

- 1 Same Time To Less Than 1 Year
- 2 Over 1 Year Later PD9c. Approximately how many years later?

9 DON'T KNOW / REFUSED

PROGRAM-RELATED DECISION MAKING SECTION - OTHER EFFECTS

[IF EC6 NE 1(I.E., MORE THAN ONE LOCATION) ASK OT5, ELSE SKIP TO P	C1] ——
OT1. Do you plan to implement any of the efficiency projects you have included SBSPC application at other facilities of your organization based on your experie these projects as part of the SBSPC program?	•

[Probe for explanation, e.g., will results from program projects be used to decide whether to implement across other facilities regardless of incentive funds?]

FAMILIARITY WITH AND USE OF PERFORMANCE CONTRACTING

Now I'd like to ask some questions about any experience your organization may have with a particular type of energy efficiency related contract.

PC1. Prior to your participation in the SBSPC, had you heard of the term Energy

Yes		Performance Contracting?					
No		Yes1					
Don't Know							
PC2. For the purposes of this survey, we are defining Energy Performance Contracting as follows: a retrofit or new construction project in which energy savings are measured and verified (based on assumptions regarding the level of operations and the cost of energy being saved) and the company performing the work is paid only from total dollar savings actually produced by the project. Prior to your participation in the SBSPC, had your organization been approached by any companies offering an Energy Performance Contract or had you requested such services? Yes							
Contracting as follows: a retrofit or new construction project in which energy savings are measured and verified (based on assumptions regarding the level of operations and the cost of energy being saved) and the company performing the work is paid only from total dollar savings actually produced by the project. Prior to your participation in the SBSPC, had your organization been approached by any companies offering an Energy Performance Contract or had you requested such services? Yes		Don't Know90					
approached by any companies offering an Energy Performance Contract or had you requested such services? Yes	PC2.	Contracting as follows: a retrofit or new construction project in which energy savings are measured and verified (based on assumptions regarding the level of operations and the cost of energy being saved) and the company performing the					
approached by any companies offering an Energy Performance Contract or had you requested such services? Yes		Prior to your participation in the SRSPC, had your organization been					
you requested such services? Yes			or had				
Yes			oi iiau				
No		you requested such services ?					
No		V					
Don't Know							
PC3. And did you sign any energy performance contracts as a result of these offers? Yes		No2					
Yes		Don't Know3	SKIP TO NS1				
Yes							
No	PC3.	, , , , , , , , , , , , , , , , , , , ,					
Don't know			•				
PC4. And in what year did you enter into this(these) Energy Performance Contract(s)? 1 st ContractYear 2 nd ContractYear PC4b. And what firm did you select for the Energy Performance Contract?							
PC4. And in what year did you enter into this(these) Energy Performance Contract(s)? 1 st ContractYear 2 nd ContractYear PC4b. And what firm did you select for the Energy Performance Contract?							
1 st ContractYear 2 nd ContractYear PC4b. And what firm did you select for the Energy Performance Contract?		Refused99	SKIP TO NS1				
, er	PC4.	1 st ContractYear	act(s)?				
, er							
RECORD NAME OF FIRM VERBATIM	PC4b.	And what firm did you select for the Energy Performance Contract?					
	RECC	ORD NAME OF FIRM VERBATIM					

PROGRAM NON-SPONSORS EXPERIENCE WITH 3RD PARTY FIRMS

Now I want to switch back to a few more questions about your participation in the SBSPC.

NS1.	Did you get multiple bids for your SBSPC project(s)?	4
	Yes → NS2f1. How many?	1
	No	2
	Don't Know	
	Refused	
NS2.	What factors were important in selecting the bid you chose for this work?	[RECORD ALL
	RESPONSES.]	
	Needed urgent/immediate replacement	1
	Timeliness of response (not urgent/immediate)	2
	Lower price/up-front cost	3
	Lower maintenance cost	4
	Ability to get rebate/incentive	5
	Worked with contractor before/prior experience	6
	Contractor seemed easier to do business with	7
	Contractor reputation/referral	8
	Equipment reputation/recommendation	9
	Higher efficiency level	10
	Better non-energy (comfort, quality) performance	11
	Other [SPECIFY:]	88
	DK/NA	
NOO	Had account admitted as a CDCDC are in at CDCDCD before a common distribution.	antina in the 1000 CDCDC
N53.	Had you worked with your SBSPC project SPONSOR before your particip	bation in the 1999 SBSPC
	program?	
	Yes	
	No	
	Don't Know	
	Refused	99

NS4.	(And using the definition of Energy Performance Contracting that I provided earlier) Would you describe your contractual arrangement with SPONSOR as an energy performance contract, fee for service contract or something else?
	Energy performance contract1

Energy performance contract	
Fee-for-service/equipment contract	2
Other	3
NS4a (please describe)	
Don't Know	
Refused	99

NS5. Are there any other energy-related products or services that you are receiving from **SPONSOR** besides those that are included in your SBSPC application? [IF NO, SKIP TO NS7]

SPECIFY VERBATIM

NS7. And do you plan to use **SPONSOR** in the future for other energy-efficiency related services?

NSC8a. Would you say that the overall program experience with **SPONSOR** was ... [READ LIST]?

 Excellent
 1

 Good
 2

 Acceptable, about what expected
 3

 Somewhat poor
 4

 Very Poor
 5

 [DO NOT READ:] DK/NA
 9

NSC8b. Why do you say that? (Why else?) [RECORD VERBATIM]

SBSPC PROCESS-RELATED EXPERIENCE

P.1	Based upon your experiences, what do you view as the primary strengths of the SB SPC program? (what did you like about the program)
P.2	Based upon your experiences, what do you view as the primary weaknesses of the SB SPC program? (what didn't you like about the program)
P.3	Are the forms reasonable, and the documentation clear?
	0. No 1. Yes Please Explain:
P.4	Are the periods of time allowed between BPA and DPA submittal appropriate?
	0. No 1. Yes Please Explain:
P.5	Are payment procedures and timing reasonable?
	0. No 1. Yes Please Explain:
P.6	Do you have any thoughts on how the program design could be changed to increase the participation of other customers?
P.7	Are the Measurement &Verification requirements reasonable?
	0. No1. Yes9. Unaware of/Don't Understand M&VPlease Explain:

A-46

	aspects of the SBSPC program process?	peen helpful during the various
	0. NO	
	1. Yes	
	No contact with utility	
	Please Explain:	
P9a.	Would you say that the overall program experier LIST]?	nce with [UTILTY] was [READ
	•	
	Excellent	
	Excellent	
		2
	Good	2 3
	Good Acceptable, about what expected	2 3 4 5

P9b. Why do you say that? (Why else?) [RECORD VERBATIM]

OTHER PROGRAM PARTICIPATION AND EFFICIENCY-RELATED **IMPROVEMENTS**

The next set of	questio	ns l'm ູເ	going to	ask have	to do	with any	y recent	energy-
related pr	rojects y	ou may	y have c	onducted	l.			

IM1.	In the past 2 years, besides participation in the SBSPC program, has your organization at this facility taken part in any other energy efficiency programs offered by your local electric or gas utilities, EPA's Green Lights and Energy Star programs, or the programs of any other organization such as federal, state, or local governments? [DO NOT READ. ACCEPT
	MULTIPLES] Yes - Non-SBSPC Utility Rebate Programs1
	Yes - Utility audit/information programs2
	Yes - EPA Green Lights or Energy Star (Federal)3
	Yes - Other Federal, State, or Local Government4
	No - None5
	Don't Know98
	Other specify99
[SPE	CIFY SPECIFIC PROGRAMS, IF NECESSARY]
IM2a	In the past two years, has your organization taken any specific actions to improve its energy efficiency or otherwise reduce energy consumption besides those actions that you have proposed as part of the SBSPC?
	Yes1
	No2
	Don't Know98
	Refused99
IM2b.	And, in general, what actions did you take?

ENERGY-RELATED DECISION MAKING

Now I'd like to ask some questions about how your organization generally makes energy-related decisions.

DM1	Has your organization assigned responsibility for controcosts to a specific staff person, such as an energy man outside contractor?	0 0, 0
	Yes, in-house staff person	1
	Yes, group of staff	
	Yes, outside contractor	
	No	
	Don't Know	
DM2.	. Has your organization developed a policy for the selecti versions of energy-using equipment, rather than standa Yes	rd-efficiency versions?
	No	
	Don't Know	
DM3.	. Does your organization apply long-term investment and selection such as estimates of payback periods, life cyc return?	
	Yes	1
	No	2
	Don't Know	98

THANK YOU FOR YOUR PARTICIPATION IN THIS STUDY.

Interviewer Notes (Include any comments on the net-to-gross story not covered in the structured questions):

A.3 SBSPC: PARTICIPANT EESP SURVEY

Participant EESP XENERGY Interview Guide Phase II Interviews for 1999 Small Business SPC Study

NAME	PHONE
TITLE	FAX
COMPANY	e-MAIL
STREET ADDRESS	
CITY	INTERVIEWER
STATE	CALL DATES
ZIP	COMPLETE DATE

Hello, my name is	_ and I am calling on behalf of [UTILITY]. We are
contacting Energy Service	Companies that participated in the 1999 Small Business
Standard Performance Cor	tract Program as part of an evaluation study authorized by
the California Public Utilitie	s Commission.
May I please speak with	?

REMIND AND THANK PREVIOUS SURVEY PARTICIPANTS FOR INPUT LAST YEAR.

As I mentioned, we are conducting an assessment of the Small Business SPC program on behalf of the California utilities that administer the Program as authorized by the CPUC. As a part of this study, we are contacting a number of program participants to obtain their input and feedback.

Your input to this assessment is essential and I would like to see if I could talk with you for about 15 - 20 minutes about the program. Any information that is provided will remain strictly confidential. We will not identify or attribute any of your comments or company information. Is this a good time, or can I schedule a convenient time in the next couple of days to talk with you?

IF HESITANT: Your input to this survey is very important for ensuring the long-term success of these programs. Without input from industry representatives such as you, we cannot guarantee that the program will receive a fair and complete evaluation.

If scheduled: Callback date/time:

Thank you for taking part in this survey. The major purpose of this study is to provide feedback to the California utilities and CPUC on the design and administrative aspects of the Small Business SPC Program.

Background

First, I need to characterize the status of your firm's involvement with the Small Business SPC program.

- B.1 My records show that your firm is a participant in the 1999 Small Business SPC program. Is this correct?
 - 0. No
 - 1. Yes [SKIP TO B.2]
- B.1.1 Why? (e.g. rejected by administrator, application withdrawn)

THANK AND TERMINATE INTERVIEW

B.2 Let's review the status of your applications, how many are in each of the following categories?

		Numb	er of Applic	ations	
Utility	BPA Submitte d	BPA Accepted	DPA Submitte d	DPA Accepte d	Project Installed
PG&E					
SCE					
SDG&E					
ALL					

Firmographic Information

The following questions are intended to help us in characterizing the types of firms that are participating in the SBSPC program. Again, all information is strictly confidential.

F.1	Which of the following best characterizes your firm:
	 full-service energy service company (ESCO) general contractor commercial and industrial construction specialty contractor lighting / electric al specialty contractor HVAC / mechanical specialty contractor other (please specify:) engineering / design firm Other (please specify:)
F.2	In which of the following areas does your firm provide services? (take all that apply)
	 HVAC Lighting Lighting controls Refrigeration Motors Controls Other. Specify:
F.3	And roughly what percentage of your business (as % of last year's revenue) would you say is with small customers (<500 kW of demand, or approximately < 100 employees/location, or < 100,000sq.ft.)?%
F.4	Approximately how many employees do you have in California? employees
F.5	What are your approximate annual revenues for California (1999)? \$\$ revenue

Small NSPC Process Issues

P.1 How familiar would you say that you are with the following aspects of the California Small Non-residential SPC program design:

	2. Very	1. Somewhat	0. Not at all
Element	familiar	familiar	familiar
Overall Design			
Application			
Requirements			
Incentive Levels			
Administrative			
Procedures			
M&V Requirements			

- P.2 In general, how would you characterize your firm's experiences with the SBSPC program in 1999?
- P.3 Please indicate, on a scale of 1-5, how much you agree or disagree with the following statements (1= strongly disagree, 5= strongly agree)

	Disagree/Agree 1 - 5
Statement	
It is difficult for customers to find contractors that understand the Program.	
The program is cost beneficial for EESPs/ESCOs to participate.	
The program is well advertised.	

- P.4 What do you view as the primary strengths of the **Small-NSPC** program?
- P.5 What do you view as the primary weaknesses of the **Small-NSPC** program?
- P.6 What is your opinion of the program's M&V and reporting requirements?

Program Effects

- E.1 In your opinion, what impacts do you see SBSPC having in the marketplace? (probe near-term vs. longer-term)
- E.2 How, if at all, has the availability of SBSPC funding affected your business development activities?
- E.3 In what percent of cases in which you presented a customer with an SBSPC-related bid, was contact with the customer initiated by:

	Contact Initiation Method	% Bids
1	Proactive proposal to an existing or referred customer	
2	Proactive proposal to an entirely new customer (i.e., cold call, w/ no previous business history)	
3	Other (please describe)	

E.4	Of your SBSPC projects in 1999, what percent of these projects would you have done anyway without the SBSPC program?
	%
E.5	How has the availability of SPC funding affected:
	(1) types of services your firm offers?
	(2) types of customers targeted?
	(3) marketing approaches used?
E.6	What percent of your SBSPC contracts with customers are of the following types?
	 % Performance-based % Fee-for-service based % Other (please describe) 100%

E.7	What percent of your non-SBSPC contracts with customers are of the following types?
	 % Performance-based % Fee-for-service based % Other (please describe) 100%
E.8	To date, do you think the SPC program has affected the market for performance contracting in comparison with other contract approaches, such as straight feefor-service? (If so, please provide examples of how you think this is occurring.)
E.9	Has the SBSPC led your company to change any of its marketing, advertising, branding, financing, M&V or other business strategies?
E.10	For SBSPC projects in 1999, what proportion of program incentives, if any, did you pass through to the customer (as opposed to applying them to offset your own marketing, project development, and M&V costs)?
	 % passed-through to customers % used to off-set other operating costs 100%
E.11	In a typical project, what percent of SBSPC incentive costs have you expended or expect to expend on M&V? And how about for BPA/DPA submittals?
	% of incentives for M&V% for BPA/DPA submittals
E.12	What percent of total project costs do the incentives typically represent?
E.13.	On an overall basis, do you feel that the SBSPC program has helped, hindered, or had no effect upon the overall success of your firm's energy efficiency services business area? (INTERVIEWER CAN FILL OUT IF OBVIOUS FROM PREVIOUS RESPONSES, IF PREVIOUS ARE AMBIGUOUS, THEN ASK]

E.14	In general, what are the top challenges your company faces in gaining customer acceptance for energy efficiency services (rank, but do not prompt initially)?
	Customer Lack of Financing
	Customer doubt about credibility of offer/service provider
	Customer doubt about validity of energy savings claim
	Lack of technical understanding,
	Aligning competing interests within end user's organization
	Meeting customers' financial criteria for payback or ROI, hurdle rates
	Monitoring & verification
	Other
	PROBE: specifically how do these differ, if at all, for performance contracting projects?

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Future Intentions with respect to Participation in SBSPC

- **S.1** How likely is it that your firm will participate in the **2000 Small Non-Residential SPC** program in the future?
 - 1. Not at all likely
 - 2. Somewhat likely
 - 3. Very likely
 - 4. Already participating
- **S.2** And why is that?

OTHER INPUT

- O.1 Do you have any suggestions for how the SBSPC program should be modified, if at all, as it continues beyond the 2000 program year?
- O.2 And do you have any suggestions, more generally, on how best to increase long-term demand for high-efficiency products and services through temporary program interventions (either new programs or how existing programs could be modified, redesigned)?

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Thank Generously and terminate!

A.4 END USER BASELINE SURVEY

1999 CALIFORNIA SMALL NONRESIDENTIAL PROGRAM END USER BASELINE SURVEY

Q1. Hello, this is <INTERVIEWER NAME> calling from Quantum Consulting on behalf of [UTILITY]. May I please speak with the person at this location who is most knowledgeable about decisions affecting your energy using equipment such as cooling and lighting systems?

[IF NEEDED:] This is a fact-finding survey only – we are NOT interested in selling anything, and responses will not be connected with your firm in any way. Your regulated electric distribution company, [UTILITY], wants to better understand how businesses think about and manage their energy consumption.

[IF NEEDED:] The four investor-owned utilities in California are cooperating on this important study, authorized by the California Public Utilities Commission, to better understand how businesses like yours think about and manage their energy consumption. Your input is very important to the utilities and to the Commission.

[DO NOT RECORD INFORMATION FOR INDIVIDUAL AT SOME OTHER BUILDING OR LOCATION. WE WANT THE INDIVIDUAL MOST KNOWLEDGEABLE AT <u>THIS</u> LOCATION, EVEN IF BUILDING IS OWNED BY OFF-SITE MANAGER.]

1	Current individual is best contact	Q2
2	Transferred to best contact	Q2
3	Given best contact's name and number	Record for future contact
99	Don't know/refused	Thank & terminate

[WHEN CORRECT RESPONDENT IS ON-LINE (REPEAT AS NEEDED WHEN CURRENT INDIVIDUAL IS BEST CONTACT):]

Q2. Hello, this is <INTERVIEWER NAME> calling from Quantum Consulting on behalf of . Your regulated electric distribution company, [UTILITY]. I understand you are the person at this location who is most knowledgeable about decisions affecting the energy using equipment, such as cooling and lighting, at this location. Today we're conducting a very important study on the needs and perceptions of firms like yours, how businesses like yours think about and manage their energy consumption. This survey should take no more than about 15 or 20 minutes, and it's an important opportunity to make sure your views are represented. We believe you'll find it quite interesting.

[IF NEEDED:] Can I confirm that you're responsible for making energy-related decisions for your firm at this location?

[IF NEEDED:] This is a fact-finding survey only – we are NOT interested in selling anything, and responses will not be connected with your firm in any way. [UTILITY] wants to better understand how businesses think about and manage their energy consumption.

[IF NEEDED:] The four investor-owned utilities in California are cooperating on this important study, authorized by the California Public Utilities Commission, to better understand how businesses like yours think about and manage their energy consumption. Your input is very important to the utilities and to the Commission.

1	Current individual is best contact	Q3
2	Transferred to best contact	Repeat Q2 w/best contact
3	Given best contact's name and number	Record for future contact
99	Don't know/refused	Thank & terminate

Q3 Does your business own or lease the facility?

1	Own	Q5
2	Lease/rent	Q4
9	DK/NA/refused	Q4

Q4. Does your business pay for all, a portion, or none of the electric utility bill for your space at this facility?

1	Pay ALL of bill – NO electric utilities in the lease	Q5
2	Pay some portion of electric utility bill – some through	Q5
	lease	
3	Pay NONE of bill – ALL electric utilities through lease	Q6
9	DK/NA/refused	Q6

Q5. Approximately how much is your average monthly electricity bill, for this location? [IF NEEDED: The amount that YOUR firm pays in an average month.]

# Average monthly electricity bill	Q6
------------------------------------	----

Q6. How long have you been in your current space?

#	Enter months/years	Q7
---	--------------------	----

[IF Q3 = 1, SKIP TO Q9; ELSE ASK Q7.]

Q7. How active a role does your business take in making lighting and climate control equipment purchase decisions at this facility? [READ LIST.]

1	Very active – involved in all phases and have veto power	Q8
2	Somewhat active – we approve decisions and provide some	Q8
	input	
	and review	
3	Slightly active – we have a voice but it's not the dominant	Q8
	voice	
4	Not active at all – we're part of a larger firm	Q8
5	Or, not active at all – our firm doesn't get involved in these	Q8
	issues	
9	DK/NA/refused	Q8

Q8. How long do you have left on your current lease? [MAY BE AN OPEN-ENDED LEASE]

# Enter months/years	Q9
----------------------	----

Q9. What are the primary types of lighting fixtures currently inside your facility? (SELECT ALL THAT APPLY)

1	T8 Fluorescent (1" diameter)	&Q9_1	Q10
2	T10 Fluorescent	&Q9_2	Q10
3	T12 Fluorescent	&Q9_3	Q10
	(1.5" diameter)		
4	HID (High Density Discharge)	&Q9_4	Q10
5	Halogen	&Q9_5	Q10
6	Incandescent	&Q9_6	Q10
7	Compact Fluorescent	&Q9_7	Q10
8	Other (SPECIFY)	&Q9_8	Q10
9	Other Fluorescent	&Q9_9	Q10
88	Refused	&Q9_88	Q10
99	Don't Know	&Q9_99	Q10

[If SEGMENT ne "Industrial" then Skip to Q12.]

Q10. Which of the following types of systems or equipment does your facility have?

1	Compressed air	Q12
2	Electric motors and drives for non-HVAC equipment	Q12
3	Industrial Boilers	Q12
4	Industrial refrigeration	Q12
5	Process water treatment	Q12
99	Don't know/refused	Q12

Q12. Since 1998, have you remodeled the space at this facility?

1	Yes	BR020
2	No	BR020
3	DK/NA/refused	BR020

BR020. Since January 1998, have you made any changes in indoor lighting at your facility other than the routine replacement of burned out bulbs. This would include changes to fixtures or ballasts, and the addition of reflectors or lighting controls?

1	No Change	CR020
2	Yes	BR021
88	Refused	CR020
99	Don't Know	CR020

[if Q12 = 1 then ask BR021, else skip toBR030]

BR021. Were these lighting changes part of your remodel, or a separate lighting retrofit, or both?

1	Remodel	LRM030
2	Retrofit	BR030
3	Both Remodel and Retrofit	BR030
88	Refused	LRM030
99	Don't Know	LRM030

LIGHTING RETROFITS

BR030. In what year did you make the lighting retrofit? IF DK, ASK FOR BEST GUESS.

1	1998	BR099
2	1999	BR099
3	2000	BR099
88	Refused	BR099
99	Don't Know	BR099

BR099. What type of fixtures or ballasts were installed as part of the lighting retrofit? [SELECT ALL THAT APPLY, AFTER EACH RESPONSE, PROMPT WITH,] Did you install any other reflectors, lighting controls, or lighting fixtures?"

[SELECT ALL THAT APPLY]

1	2' T8 Fixtures (1" diameter)	&BR100	BRF099
2	4' T8 Fixtures (1" diameter)	&BR101	BRF099
3	8' T8 Fixtures (1" diameter)	&BR102	BRF099
4	2' T10 Fixtures	&BR103	BRF099
5	4' T10 Fixtures	&BR104	BRF099
6	8' T10 Fixtures	&BR105	BRF099
7	2' T12 Fixtures(1.5" diameter)	&BR106	BRF099
8	4' T12 Fixtures (1.5" diameter)	&BR107	BRF099
9	8' T12 Fixtures (1.5" diameter)	&BR108	BRF099
10	HID (High Density Discharge) Fixtures, Standard	&BR109	BRF099
11	HID (High Density Discharge) Fixtures, Compact	&BR110	BRF099
12	Compact Fluorescent, Screw-in Modular	&BR111	BRF099
13	Compact Fluorescent, Hardwire	&BR112	BRF099
14	Incandescent	&BR113	BRF099
15	Exit Signs, Compact Fluorescent	&BR114	BRF099
16	Exit Signs, LED	&BR115	BRF099
17	Halogen	&BR116	BRF099
18	Install Reflectors	&BR117	BRF099
19	Electronic Ballast	&BR118	BRF099
20	Magnetic Ballast	&BR119	BRF099
21	Lighting Controls, Time Clock	&BR120	BRF099
22	Lighting Controls, Occupancy Sensor	&BR121	BRF099
23	Lighting Controls, Bypass/Delay Timers	&BR122	BRF099
24	Lighting Controls, Photocell	&BR123	BRF099
25	Other (PLEASE SPECIFY)	&BR124	BRF099
65	Other Fluorescent	&BR125	BRF099
66	Fat/Thick Tubes	&BR126	BRF099
77	Skinny/Thin Tubes	&BR127	BRF099
26	2' T5 Fixtures (5/8" diameter)	&BR128	BRF099
27	4' T5 Fixtures (5/8" diameter)	&BR129	BRF099
28	8' T5 Fixtures (5/8" diameter)	&BR130	BRF099

[Cycle through for all technologies selected.]

BRF099. How many &TECHNOLOGY_ did you add? [SELECT ALL THAT APPLY]

1	2' T8 Fixtures (1" diameter)	&BRF100	BR070
2	4' T8 Fixtures (1" diameter)	&BRF101	BR070
3	8' T8 Fixtures (1" diameter)	&BRF102	BR070
4	2' T10 Fixtures	&BRF103	BR070
5	4' T10 Fixtures	&BRF104	BR070
6	8' T10 Fixtures	&BRF105	BR070
7	2' T12 Fixtures(1.5" diameter)	&BRF106	BR070
8	4' T12 Fixtures(1.5" diameter)	&BRF107	BR070
9	8' T12 Fixtures(1.5" diameter)	&BRF108	BR070
10	HID (High Density Discharge) Fixtures, Standard	&BRF109	BR070
11	HID (High Density Discharge) Fixtures, Compact	&BRF110	BR070
12	Compact Fluorescent, Screw-in Modular	&BRF111	BR070
13	Compact Fluorescent, Hardwire	&BRF112	BR070
14	Incandescent	&BRF113	BR070
15	Exit Signs, Compact Fluorescent	&BRF114	BR070
16	Exit Signs, LED	&BRF115	BR070
17	Halogen	&BRF116	BR070
18	Install Reflectors	&BRF117	BR070
19	Electronic Ballast	&BRF118	BR070
20	Magnetic Ballast	&BRF119	BR070
21	Lighting Controls, Time Clock	&BRF120	BR070
22	Lighting Controls, Occupancy Sensor	&BRF121	BR070
23	Lighting Controls, Bypass/Delay Timers	&BRF122	BR070
24	Lighting Controls, Photocell	&BRF123	BR070
25	Other (PLEASE SPECIFY)	&BRF124	BR070
65	Other Fluorescent	&BRF125	BR070
66	Fat/Thick Tubes	&BRF126	BR070
77	Skinny/Thin Tubes	&BRF127	BR070
26	2' T5 Fixtures (5/8" diameter)	&BRF128	BR070
27	4' T5 Fixtures (5/8" diameter)	&BRF129	BR070
28	8' T5 Fixtures (5/8" diameter)	&BRF130	BR070

BR070. Please estimate the approximate percentage of the facility's applicable lighting systems that were affected by the retrofit?

&BR07	Enter Value	LRM030
0		
888	Refused	LRM030
999	Don't Know	LRM030

LIGHTING REMODEL

[if Q12=1 AND BR021 ne 2 go to LRM030, else skip to Q31.]

[If LRM030] In what year did you make the lighting changes that were part of your remodel? IF DK, ASK FOR BEST GUESS.

1	1998	LRM099
2	1999	LRM099
3	2000	LRM099
88	Refused	LRM099
99	Don't Know	LRM099

LRM099. What type of lighting fixtures or ballasts were added as part of the remodel? [SELECT ALL THAT APPLY, AFTER EACH RESPONSE, PROMPT WITH,] Did you add any other reflectors, lighting controls, or lighting fixtures?"

[SELECT ALL THAT APPLY]

2 4 3 8 4 2	2' T8 Fixtures (1" diameter) 4' T8 Fixtures (1" diameter) 3' T8 Fixtures (1" diameter)	&LRM100 &LRM101	LRMF099 LRMF099
3 8 4 2	3' T8 Fixtures (1" diameter)		LRMF099
4 2	` '	0 DM400	
	O! T40 C:(&LRM102	LRMF099
5 4	2' T10 Fixtures	&LRM103	LRMF099
	4' T10 Fixtures	&LRM104	LRMF099
6 8	3' T10 Fixtures	&LRM105	LRMF099
7 2	2' T12 Fixtures(1.5" diameter)	&LRM106	LRMF099
8 4	4' T12 Fixtures (1.5" diameter)	&LRM107	LRMF099
9 8	3' T12 Fixtures (1.5" diameter)	&LRM108	LRMF099
	HID (High Density Discharge) Fixtures, Standard	&LRM109	LRMF099
	HID (High Density Discharge) Fixtures,	&LRM110	LRMF099
	Compact		
	Compact Fluorescent, Screw-in Modular	&LRM111	LRMF099
-	Compact Fluorescent, Hardwire	&LRM112	LRMF099
	ncandescent	&LRM113	LRMF099
1	Exit Signs, Compact Fluorescent	&LRM114	LRMF099
	Exit Signs, LED	&LRM115	LRMF099
17 F	Halogen	&LRM116	LRMF099
	nstall Reflectors	&LRM117	LRMF099
19 E	Electronic Ballast	&LRM118	LRMF099
20 N	Magnetic Ballast	&LRM119	LRMF099
	ighting Controls, Time Clock	&LRM120	LRMF099
22 L	ighting Controls, Occupancy Sensor	&LRM121	LRMF099
23 L	ighting Controls, Bypass/Delay Fimers	&LRM122	LRMF099
24 L	ighting Controls, Photocell	&LRM123	LRMF099
25 (Other (PLEASE SPECIFY)	&LRM124	LRMF099
	Other Fluorescent	&LRM125	LRMF099
	Fat/Thick Tubes	&LRM126	LRMF099
77 5	Skinny/Thin Tubes	&LRM127	LRMF099
	2' T5 Fixtures (5/8" diameter)	&LRM128	LRMF099
	4' T5 Fixtures (5/8" diameter)	&LRM129	LRMF099
	3' T5 Fixtures (5/8" diameter)	&LRM130	LRMF099

[Cycle through for all technologies selected.]

LRMF099. How many &TECHNOLOGY_ did you add? [SELECT ALL THAT APPLY]

1	2' T8 Fixtures (1" diameter)	&LRMF100	LRM070
2	4' T8 Fixtures (1" diameter)	&LRMF101	LRM070
3	8' T8 Fixtures (1" diameter)	&LRMF102	LRM070
4	2' T10 Fixtures	&LRMF103	LRM070
5	4' T10 Fixtures	&LRMF104	LRM070
6	8' T10 Fixtures	&LRMF105	LRM070
7	2' T12 Fixtures(1.5" diameter)	&LRMF106	LRM070
8	4' T12 Fixtures(1.5" diameter)	&LRMF107	LRM070
9	8' T12 Fixtures(1.5" diameter)	&LRMF108	LRM070
10	HID (High Density Discharge) Fixtures, Standard	&LRMF109	LRM070
11	HID (High Density Discharge) Fixtures, Compact	&LRMF110	LRM070
12	Compact Fluorescent, Screw-in Modular	&LRMF111	LRM070
13	Compact Fluorescent, Hardwire	&LRMF112	LRM070
14	Incandescent	&LRMF113	LRM070
15	Exit Signs, Compact Fluorescent	&LRMF114	LRM070
16	Exit Signs, LED	&LRMF115	LRM070
17	Halogen	&LRMF116	LRM070
18	Install Reflectors	&LRMF117	LRM070
19	Electronic Ballast	&LRMF118	LRM070
20	Magnetic Ballast	&LRMF119	LRM070
21	Lighting Controls, Time Clock	&LRMF120	LRM070
22	Lighting Controls, Occupancy Sensor	&LRMF121	LRM070
23	Lighting Controls, Bypass/Delay Timers	&LRMF122	LRM070
24	Lighting Controls, Photocell	&LRMF123	LRM070
25	Other (PLEASE SPECIFY)	&LRMF124	LRM070
65	Other Fluorescent	&LRMF125	LRM070
66	Fat/Thick Tubes	&LRMF126	LRM070
77	Skinny/Thin Tubes	&LRMF127	LRM070
26	2' T5 Fixtures (5/8" diameter)	&LRMF128	LRM070
27	4' T5 Fixtures (5/8" diameter)	&LRMF129	LRM070
	8' T5 Fixtures (5/8" diameter)	&LRMF130	LRM070

LRM070. Please estimate what percentage of the facility's lighting was affected by the remodel?

&LRM07 0	Enter Value	LRM060
888	Refused	LRM060
999	Don't Know	LRM060

[If BR020 ne 2, go to CR020]

Q31. Overall, which of the following statements best describes the performance and operating condition of the lighting equipment before you replaced it? [READ LIST]

1	New equipment installed did NOT replace pre-existing	CR020
2	Existing equipment was fully functional	CR020
3	Existing equipment was functioning, but with significant problems	CR020
4	Or, existing equipment had failed or did not function	CR020
99	[DO NOT READ:] DK/NA	CR020

[IF &Segment ne "Industrial", then ask CR020 else skip to IR020]

CR020. Since January 1998, did you make any changes related to cooling at your facility, including HVAC units, reflective window film, HVAC controls, energy management systems, cooling towers, or adjustable speed drives?

1	No Change	IR020	
2	Yes	CR021	
88	Refused	IR020	
99	Don't Know	IR020	

[if Q12 = 1 then ask CR021, else skip to CR030.]

cr021. Were these cooling related changes part of your remodel, or a separate cooling related retrofit, or both?

1	Remodel	CRM030
2	Retrofit	CR030
3	Both Remodel and Retrofit	CR030
88	Refused	CRM030
99	Don't Know	CRM030

HVAC RETROFIT

CR030. In what year did you make the cooling related retrofit? ASK FOR MOST RECENT YEAR IF NECESSARY. IF DK, ASK FOR BEST GUESS.

1	1998	CR099
2	1999	CR099
3	2000	CR099
88	Refused	CR099
99	Don't Know	CR099

CR099. What types of equipment were installed as part of the cooling retrofit? [SELECT ALL THAT APPLY,AFTER INITIAL RESPONSE, PROMPT WITH] 'Did you install any other items such as reflective window film, HVAC controls, cooling tower, adjustable speed drive, or other HVAC units?' [SELECT ALL THAT APPLY]

1	Split system	&CR100	CRU099
	(two components; compressor is		
	separate from the supply air fan)		
2	Packaged systems	&CR101	CRU099
	(one component)		
3	Package Terminal A/C	&CR102	CRU099
	(e.g., Hotel/Motel units)		
4	Remote Condensing Unit	&CR103	CRU099
5	Evaporative coolers	&CR104	CRU099
	(swamp coolers)		
6	Water Chiller	&CR105	CRU099
7	Evaporative Condenser	&CR106	CRU099
8	Cooling Tower	&CR107	CRU099
9	Adjustable Speed Drives	&CR108	CRU099
10	Energy Management System	&CR109	CRU099
11	Reflective Window Film	&CR110	CRU099
12	HVAC Controls: Bypass Timer	&CR111	CRU099
13	HVAC Controls: Time Clock	&CR112	CRU099
14	HVAC Controls: Set-Back	&CR113	CRU099
	Programmable Thermostat		
15	Other (SPECIFY)	&CR114	
71	Individual A/C or Heat Pump Units	&CR115	CRU099
	(e.g., Rooftop units, Unitary Equipment,		
	Central A/C with multiple units, single unit		
	for small business)		
	NOTE:(ask if split or package system)		
72	Window/Wall Units	&CR116	CRU099

[CYCLE THROUGH ALL TECHNOLOGIES SELECTED.]

CRU099. How many &TECHNOLOGY did you install?

1	Split system	&CRU100	CR116	
	(two components; compressor is			
	separate from the supply air fan)			
2	Packaged systems	&CRU101	CR116	
	(one component; rooftop units)			
3	Package Terminal A/C	&CRU102	CR116	
	(e.g., Hotel/Motel units)			
4	Remote Condensing Unit	&CRU103	CR116	
5	Evaporative coolers	&CRU104	CR116	
	(swamp coolers)			
6	Water Chiller	&CRU105	CR116	
	(Central Plant)			
7	Evaporative Condenser	&CRU106	CR116	
8	Cooling Tower	&CRU107	CR116	
9	Adjustable Speed Drives	&CRU108	CR116	
10	Energy Management System	&CRU109	CR116	
11	Reflective Window Film (Square	&CRU110	CR116	
	feet)			
12	HVAC Controls: Bypass Timer	&CRU111	CR116	
13	HVAC Controls: Time Clock	&CRU112	CR116	
14	HVAC Controls: Set-Back	&CRU113	CR116	
	Programmable Thermostat			
15	Other (SPECIFY)	&CRU114	CR116	
16	Individual A/C or Heat Pump Units	&CRU115	CR116	
	(e.g., Unitary Equipment, Central			
	A/C with multiple units, single unit			
	for small business)			
	NOTE:(ask if split or package			
	system)			
17	Window/Wall Units	&CRU116	CR116	

REVIEW IF STATEMENT LIST: [ASK IF CR100-CR103, CR107, CR114-CR116 EQ 1, ELSE SKIP TO CR070]

CR116. Is the new equipment about as efficient as required of new units by government standards or much more efficient than required by current standards? (IF UNSURE, PROBE: units much more efficient than current standards often cost more than standard efficiency units.)

1	Standard Efficiency	CR070
2	High Efficiency	CR070
88	Refused	CR070
99	Don't Know	CR070

CR070. Please estimate what percentage of the facility's air conditioning capacity was retrofited?

&NU M	Enter Value	CRM030
888	Refused	CRM030
999	Don't Know	CRM030

[If Q12=1 AND cr021 ne 2 then go to CRM030, else skip to Q31a.]

CRM030 In what year did you make the cooling changes associated with your remodel? ASK FOR MOST RECENT YEAR IF NECESSARY. IF DK, ASK FOR BEST GUESS.

1	1998	CRM099
2	1999	CRM099
3	2000	CRM099
88	Refused	CRM099
99	Don't Know	CRM099

CRM099. What types of cooling equipment were installed during the remodel? [SELECT ALL THAT APPLY,AFTER INITIAL RESPONSE, PROMPT WITH] 'Did you install any other items such as reflective window film, HVAC controls, cooling tower, adjustable speed drive, or other HVAC units?'

[SELECT ALL THAT APPLY]

LOLL	CI ALL INAI APPLT]		
1	Split system	&CRM100	CRMU099
	(two components; compressor is		
	separate from the supply air fan)		
2	Packaged systems	&CRM101	CRMU099
	(one component)		
3	Package Terminal A/C	&CRM102	CRMU099
	(e.g., Hotel/Motel units)		
4	Remote Condensing Unit	&CRM103	CRMU099
5	Evaporative coolers	&CRM104	CRMU099
	(swamp coolers)		
6	Water Chiller	&CRM105	CRMU099
7	Evaporative Condenser	&CRM106	CRMU099
8	Cooling Tower	&CRM107	CRMU099
9	Adjustable Speed Drives	&CRM108	CRMU099
10	Energy Management System	&CRM109	CRMU099
11	Reflective Window Film	&CRM110	CRMU099
12	HVAC Controls: Bypass Timer	&CRM111	CRMU099
13	HVAC Controls: Time Clock	&CRM112	CRMU099
14	HVAC Controls: Set-Back	&CRM113	CRMU099
	Programmable Thermostat		
15	Other (SPECIFY)	&CRM114	
71	Individual A/C or Heat Pump Units	&CRM115	CRMU099
	(e.g., Rooftop units, Unitary		
	Equipment, Central A/C with		
	multiple units, single unit for small		
	business)		
	NOTE:(ask if split or package		
	system)		
72	Window/Wall Units	&CRM116	CRMU099

[CYCLE THROUGH ALL TECHNOLOGIES SELECTED.]

CRMU099. How many &TECHNOLOGY did you install?

1	Split system	&CRMU100	CRM116
	(two components; compressor is		
	separate from the supply air fan)		
2	Packaged systems	&CRMU101	CRM116
	(one component; rooftop units)		
3	Package Terminal A/C	&CRMU102	CRM116
	(e.g., Hotel/Motel units)		
4	Remote Condensing Unit	&CRMU103	CRM116
5	Evaporative coolers	&CRMU104	CRM116
	(swamp coolers)		
6	Water Chiller	&CRMU105	CRM116
	(Central Plant)		
7	Evaporative Condenser	&CRMU106	CRM116
8	Cooling Tower	&CRMU107	CRM116
9	Adjustable Speed Drives	&CRMU108	CRM116
10	Energy Management System	&CRMU109	CRM116
11	Reflective Window Film (Square	&CRMU110	CRM116
	Feet)		
12	HVAC Controls: Bypass Timer	&CRMU111	CRM116
13	HVAC Controls: Time Clock	&CRMU112	CRM116
14	HVAC Controls: Set-Back	&CRMU113	CRM116
	Programmable Thermostat		
15	Other (SPECIFY)	&CRMU114	CRM116
16	Individual A/C or Heat Pump Units	&CRMU115	CRM116
	(e.g., Unitary Equipment, Central		
	A/C with multiple units, single unit		
	for small business)		
	NOTE:(ask if split or package		
	system)		
17	Window/Wall Units	&CRMU116	CRM116

[ASK IF CRM100-CRM103, CRM107, CRM114-CRM116 EQ 1, ELSE SKIP TO CRM070]

CRM116. Is the new equipment about as efficient as required of new units by government standards or much more efficient than required by current standards? (IF UNSURE, PROBE: units much more efficient than current standards often cost more than standard efficiency units.)?

1	Standard Efficiency	CRM070
2	High Efficiency	CRM070
88	Refused	CRM070
99	Don't Know	CRM070

CRM070. Please estimate what percentage of the facility's air conditioning capacity was affected by the remodel?

&NU M	Enter Value	Q31a
888	Refused	Q31a
999	Don't Know	Q31a

[IF CR020 ne 2 go to IR020, else ask Q31a]

Q31a. Overall, which of the following statements best describes the performance and operating condition of the cooling equipment before you replaced it? [READ LIST]

1	New equipment installed did NOT replace pre-existing equipment	IR020
2	Existing equipment was fully functional	IR020
3	Existing equipment was functioning, but with significant problems	IR020
4	Or, existing equipment had failed or did not function	IR020
99	[DO NOT READ:] DK/NA	IR020

[IF Segment ne "Industrial", then skip to Q32]

IR020. Since January 1998, have you installed any equipment or implemented any measures or practices to improve the energy efficiency of your industrial equipment or processes?

1	No Change	IRP020
2	Yes	IR030
88	Refused	IRP020
99	Don't Know	IRP020

IR030. In what year did you make these changes? ASK FOR MOST RECENT YEAR IF NECESSARY. IF DK, ASK FOR BEST GUESS.

1	1998	IR099
2	1999	IR099
3	2000	IR099
88	Refused	IR099
99	Don't Know	IR099

IR099. And, briefly, what were those actions? (Note: Focus respondent on simple listing of actions at general level, not complex descriptions)

[SELECT ALL THAT APPLY]

_	LECTALL INATA	T = = = = = = = = = = = = = = = = = = =	T	1
1	Motors	Installed premium-efficiency motors	&IR100	IRU099
2		Installed Variable Speed Drives (also referred to as VSDs, VFDs, or ASDs)	&IR101	IRU099
3		Implemented operation & maintenance program to improve motor/drive efficiency	&IR102	IRU099
4		General/undefined motor efficiency improvements	&IR103	IRU099
5	Air Compressors	Installed high efficiency air compressors	&IR104	IRU099
6		Installed more efficient air compressor controls or compressor control strategies	&IR105	IRU099
7		Implemented maintenance practices to increase compressed air system efficiency	&IR106	IRU099
8		Implemented compressed air system leak detection or prevention	&IR107	IRU099
9		General/undefined compressed air efficiency improvements	&IR108	IRU099
10	Ind. Refrigeration	Installed high-efficiency industrial refrigeration system	&IR109	IRU099
11		Other actions to improve industrial refrigeration efficiency	&IR110	IRU099
12	Ind. Boilers	Installed high-efficiency boilers	&IR111	IRU099
13		Implemented O&M to improve boiler system efficiency	&IR112	IRU099
14	Process	Improved energy efficiency of manufacturing process	&IR113	IRU099
15	Wastewater	Implemented energy efficiency measures for wastewater treatment	&IR114	IRU099
16	Other	OtherDescribe	&IR115	IRU099
			•	

[CYCLE THROUGH ALL TECHNOLOGIES SELECTED.]

IRU099. And roughly what percent of your applicable industrial load did &TECHNOLOGY affect?

1	Motors	Installed premium-efficiency motors	&IRU100	IRP020
2		Installed Variable Speed Drives (also referred to as VSDs, VFDs, or ASDs)	&IRU101	IRP020
3		Implemented operation & maintenance program to improve motor/drive efficiency	&IRU102	IRP020
4		General/undefined motor efficiency improvements	&IRU103	IRP020
5	Air Compressors	Installed high efficiency air compressors	&IRU104	IRP020
6		Installed more efficient air compressor controls or compressor control strategies	&IRU105	IRP020
7		Implemented maintenance practices to increase compressed air system efficiency	&IRU106	IRP020
8		Implemented compressed air system leak detection or prevention	&IRU107	IRP020
9		General/undefined compressed air efficiency improvements	&IRU108	IRP020
10	Ind. Refrigeration	Installed high-efficiency industrial refrigeration system	&IRU109	IRP020
11		Other actions to improve industrial refrigeration efficiency	&IRU110	IRP020
12	Ind. Boilers	Installed high-efficiency boilers	&IRU111	IRP020
13		Implemented O&M to improve boiler system efficiency	&IRU112	IRP020
14	Process	Improved energy efficiency of manufacturing process	&IRU113	IRP020
15	Wastewater	Implemented energy efficiency measures for wastewater treatment	&IRU114	IRP020
16	Other	OtherDescribe	&IRU115	IRP020

IRP020. And how about prior to January 1998, had your firm installed any equipment or implemented any measures or practices to improve the energy efficiency of your industrial equipment or processes prior to 1998?

1	No Change	Q31b
2	Yes	IRP099
88	Refused	Q31b
99	Don't Know	Q31b

IRP099. And, briefly, what were those actions? (Note: Focus respondent on simple listing of actions at general level, not complex descriptions). [SELECT ALL THAT APPLY]

1	Motors	Installed premium-efficiency motors	&IRP100	IRPU099
2		Installed Variable Speed Drives (also	&IRP101	IRPU099
		referred to as VSDs, VFDs, or ASDs)		
3		Implemented operation &	&IRP102	IRPU099
		maintenance program to improve		
		motor/drive efficiency		
4		General/undefined motor efficiency	&IRP103	IRPU099
		improvements		
5	Air Compressors	Installed high efficiency air	&IRP104	IRPU099
		compressors		
6		Installed more efficient air	&IRP105	IRPU099
		compressor controls or compressor		
		control strategies		
7		Implemented maintenance practices	&IRP106	IRPU099
		to increase compressed air system		
		efficiency		
8		Implemented compressed air system	&IRP107	IRPU099
		leak detection or prevention		
9		General/undefined compressed air	&IRP108	IRPU099
		efficiency improvements		
10	Ind. Refrigeration	Installed high-efficiency industrial	&IRP109	IRPU099
		refrigeration system		
11		Other actions to improve industrial	&IRP110	IRPU099
		refrigeration efficiency		
12	Ind. Boilers	Installed high-efficiency boilers	&IRP111	IRPU099
13		Implemented O&M to improve boiler	&IRP112	IRPU099
		system efficiency		
14	Process	Improved energy efficiency of	&IRP113	IRPU099
		manufacturing process		
15	Wastewater	Implemented energy efficiency	&IRP114	IRPU099
		measures for wastewater treatment		
16	Other	OtherDescribe	&IRP115	IRPU099

[CYCLE THROUGH ALL TECHNOLOGIES SELECTED.]

IRPU099. And roughly what percent of your applicable industrial load did &TECHNOLOGY affect?

1	Motors	Installed premium-efficiency motors	&IRPU100	Q31b
2		Installed Variable Speed Drives (also referred to as VSDs, VFDs, or ASDs)	&IRPU101	Q31b
3		Implemented operation & maintenance program to improve motor/drive efficiency	&IRPU102	Q31b
4		General/undefined motor efficiency improvements	&IRPU103	Q31b
5	Air Compressors	Installed high efficiency air compressors	&IRPU104	Q31b
6		Installed more efficient air compressor controls or compressor control strategies	&IRPU105	Q31b
7		Implemented maintenance practices to increase compressed air system efficiency	&IRPU106	Q31b
8		Implemented compressed air system leak detection or prevention	&IRPU107	Q31b
9		General/undefined compressed air efficiency improvements	&IRPU108	Q31b
10	Ind. Refrigeration	Installed high-efficiency industrial refrigeration system	&IRPU109	Q31b
11		Other actions to improve industrial refrigeration efficiency	&IRPU110	Q31b
12	Ind. Boilers	Installed high-efficiency boilers	&IRPU111	Q31b
13		Implemented O&M to improve boiler system efficiency	&IRPU112	Q31b
14	Process	Improved energy efficiency of manufacturing process	&IRPU113	Q31b
15	Wastewater	Implemented energy efficiency measures for wastewater treatment	&IRPU114	Q31b
16	Other	OtherDescribe	&IRPU115	Q31b

[IF IR020 = 2 or IRP020 = 2 then ask Q31b, else go to Q32]

Q31b. Overall, which of the following statements best describes the performance and operating condition of the equipment before you replaced it? [READ LIST]

1	New equipment installed did NOT replace pre-existing equipment	Q32
2	Existing equipment was fully functional	Q32
3	Existing equipment was functioning, but with significant problems	Q32
4	Or, existing equipment had failed or did not function	Q32
99	[DO NOT READ:] DK/NA	Q32

We are now going to ask you some questions about installation of your [&ENDUSE] equipment and your satisfaction with this equipment.

Q32. Did you use a contractor, engineering firm, energy services firm, or other service provider to design or install the equipment you added?

1	Contractor	Q35
2	Engineering firm	Q35
3	Energy services firm	Q35
4	General/other [SPECIFY:]	Q35
5	DID NOT USE external service provider	Q37
99	DK/refused	Q37

Q35. How many providers did you get quotes or proposals from, for this project?
______ # of provider quotes/proposals

[ASK Q36 UNLESS Q35=1; IF Q35=1 SKIP TO Q38.]

Q36. What factors were important in selecting the proposal you chose for this work? [RECORD ALL RESPONSES.]

1	Needed urgent/immediate replacement	&Q36_1	Q38
2	Timeliness of response (not urgent/immediate)	&Q36_2	Q38
3	Lower price/up-front cost	&Q36_3	Q38
4	Lower maintenance cost	&Q36_4	Q38
5	Ability to get rebate/incentive	&Q36_5	Q38
6	Worked with contractor before/prior experience	&Q36_6	Q38
7	Contractor seemed easier to do business with	&Q36_7	Q38
8	Contractor reputation/referral	&Q36_8	Q38
9	Equipment reputation/recommendation	&Q36_9	Q38
10	Higher efficiency level	&Q36_10	Q38
11	Better non-energy (comfort, quality) performance	&Q36_11	Q38
88	Other [SPECIFY:]	&Q36_88	Q38
99	DK/NA	&Q36_99	Q38

Q38. How important was the input from the contractor or vendor you worked with in deciding which specific equipment to install? Please give me a rating from 1 to 10, where 10 means EXTREMELY important, and 1 means NOT AT ALL important.

#		Q37
77	Did not work with a contractor or vendor	Q37
88	refused	Q37
99	Don't Know	Q37

Q37. Did you review equipment or materials that offered different levels of energy efficiency, when deciding which specific equipment or materials to install?

1	Yes, reviewed different efficiency levels	Q46
2	No, did NOT review different efficiency levels	Q46
9	DK/NA	Q46

Q46. Using a scale from 1 to 10, where 1 means very DISsatisfied and 10 means very SATISFIED, please rate your satisfaction with the energy savings and general performance of the equipment you installed.

#	O49
π	QTJ

Q49. As a result of your experience with the equipment, how likely will you be to actively consider energy-efficient products when installing or replacing energy-using products for your business in the future? Please give me a rating from 1 to 10, where 10 means you're EXTREMELY likely to consider energy-efficient products, and 1 means you're NOT AT ALL likely to consider energy-efficient products.

#	Q50

[IF ANY OF {BR100, BR109-112, BR115-119, BR121-24, BR127-30, LRM100, LRM 109-112, LRM 115-119, LRM 121-24, LRM 127-30} = 1, then ask Q50, else skip to Q51.]

Q50. Some of the lighting equipment you mentioned installing is considered to be high efficiency. What were the most important reasons that you installed high efficiency lighting equipment? [DO NOT READ. ACCEPT MULTIPLES. ALLOW VERBATIM.]

Q50		Q50	
1	Lower energy (operating) cost	&Q50_1	Q52
2	Enhance productivity	&Q50_2	Q52
3	Improve quality of worker or merchandising environment	&Q50_3	Q52
4	Take advantage of rebates offered by utilities	&Q50_4	Q52
5	Reduce organization's environmental impact	&Q50_5	Q52
6	Improve organization's environmental image	&Q50_6	Q52
7	Other (Specify)	&Q50_7	Q52
8	NONE	&Q50_8	Q52
88	Don't Know	&Q50_88	Q52
99	Refused	&Q50_99	Q52

[IF BR020 = 2 then ask, else skip to Q52]

Q51. What were the most important reasons that you did not install energy efficient lighting equipment in your retrofit or remodel, such as T-8 Fixtures, electronic ballasts, HIDs, Compact Fluorescents, or lighting controls? [DO NOT READ. ACCEPT MULTIPLES. ALLOW VERBATIM RECORDING.]

1	Other priorities for capital spending	&Q51_1	Q52
2	Amount of savings did not justify added investment costs	&Q51_2	Q52
3	No funds available for investment	&Q51_3	Q52
4	Energy savings were too uncertain	&Q51_4	Q52
5	Could not obtain financing for investment	&Q51_5	Q52
6	Needed more information to make decision or convince	&Q51_6	Q52
	management		
7	Not enough management time to oversee project	&Q51_7	Q52
8	Would have took too much time to get a convincing	&Q51_8	Q52
	analysis		
9	Uncertainty created by deregulation	&Q51_9	Q52
10	Expectation that energy prices would decrease	&Q51_10	Q52
11	Building Owner would not allow it	&Q51_11	Q52
12	Other (Specify)	&Q51_12	Q52
13	NONE	&Q51_13	Q52
88	Don't Know	&Q51_88	Q52
99	Refused	&Q51_99	Q52

[IF ANY OF { CR116 = 2, or CRM116=2 or [ANY of CRM104-CRM106,CRM108-CRM113EQ 1] } then ask Q52, ELSE SKIP TO Q53]

Q52. What were the most important reasons that you installed energy efficient cooling equipment [DO NOT READ. ACCEPT MULTIPLES. ALLOW VERBATIM.]

1	Lower energy (operating) cost	&Q52_1	Q54
2	Enhance productivity	&Q52_2	Q54
3	Improve quality of merchandising environment	&Q52_3	Q54
4	Take advantage of rebates offered by utilities	&Q52_4	Q54
5	Reduce organization's environmental impact	&Q52_5	Q54
6	Improve organization's environmental image	&Q52_6	Q54
7	Other (Specify)	&Q52_7	Q54
8	NONE	&Q52_8	Q54
88	Don't Know	&Q520_88	Q54
99	Proceed to next question	&Q52_99	Q54

[If CR020 = 2 then ask, else skip to Q54]

Q53. What were the most important reasons that you did not install energy efficient cooling equipment in your retrofit or remodel? [DO NOT READ. ACCEPT MULTIPLES. ALLOW VERBATIM RECORDING.]

1	Other priorities for capital spending	&Q53_1	Q54
2	Amount of savings did not justify added investment costs	&Q53_2	Q54
3	No funds available for investment	&Q53_3	Q54
4	Energy savings were too uncertain	&Q53_4	Q54
5	Could not obtain financing for investment	&Q53_5	Q54
6	Needed more information to make decision or convince management	&Q53_6	Q54
7	Not enough management time to oversee project	&Q53_7	Q54
8	Would have took too much time to get a convincing analysis	&Q53_8	Q54
9	Uncertainty created by deregulation	&Q53_9	Q54
10	Expectation that energy prices would decrease	&Q53_10	Q54
11	Building Owner would not allow it	&Q53_11	Q54
12	Other (Specify)	&Q53_12	Q54
13	NONE	&Q53_13	Q54
88	Don't Know	&Q53_88	Q54
99	Proceed to next question	&Q53_99	Q54

Q54. Since January 1998, were there any actions to improve energy efficiency or otherwise reduce energy consumption at your facility that were identified <u>but not undertaken</u>?

1	Yes	Q55
2	No	Q56
9	DK/NA	Q56

[IF Q54=1 ASK Q55, ELSE SKIP TO Q56]

Q55. And, overall, what were the most important reasons that you did not take these energy saving actions? [DO NOT READ. ACCEPT MULTIPLES. ALLOW VERBATIM RECORDING.]

1	Other priorities for capital spending	&Q55_1	Q56
2	Amount of savings did not justify added investment costs	&Q55_2	Q56
3	No funds available for investment	&Q55_3	Q56
4	Energy savings were too uncertain	&Q55_4	Q56
5	Could not obtain financing for investment	&Q55_5	Q56
6	Needed more information to make decision or convince management	&Q55_6	Q56
7	Not enough management time to oversee project	&Q55_7	Q56
8	Would have took too much time to get a convincing analysis	&Q55_8	Q56
9	Uncertainty created by deregulation	&Q55_9	Q56
10	Expectation that energy prices would decrease	&Q55_10	Q56
11	Building Owner would not allow it	&Q55_11	Q56
12	Other (Specify)_	&Q55_12	Q56
13	NONE	&Q55_13	Q56
88	Don't Know	&Q55_88	Q56
99	Proceed to next question	&Q55_99	Q56

What do you believe to be the primary advantages, if any, of energy efficient lighting equipment such as electronic ballasts, T-8 lamps and compact fluorescents, over standard efficiency equipment such as magnetic ballasts, T-12 lamps and incandescents? [DO NOT READ. ACCEPT MULTIPLES. ALLOW VERBATIM.]

1	Lower operating cost	&Q56_1	Q57
2	Longer useful life	&Q56_2	Q57
3	Less hum	&Q56_3	Q57
4	New equipment looks better	&Q56_4	Q57
5	Better light/ Brighter light	&Q56_5	Q57
6	Less decay of lighting levels over time	&Q56_6	Q57
7	Better light promotes worker productivity, cuts down complaints	&Q56_7	Q57
8	More flexibility in installation	&Q56_8	Q57
9	Easier maintenance	&Q56_9	Q57
10	Other (Specify)	&Q56_10	Q57
88	Refused	&Q56_88	Q57
99	Don't know	&Q56_88	Q57

Q57. What do you believe to be the primary advantages of high efficiency cooling equipment, and related energy efficient cooling measures, such HVAC units, reflective window film, HVAC controls, energy management systems, cooling towers, or adjustable speed drives. [DO NOT READ. ACCEPT MULTIPLES. ALLOW VERBATIM.]

1	Lower operating cost	&Q57_1	DM1
2	Longer useful life	&Q57_2	DM1
3	More Comfortable Working Enviornment	&Q57_3	DM1
4	Better cooling promotes worker productivity, cuts down complaints	&Q57_4	DM1
5	More flexibility in installation	&Q57_5	DM1
6	Easier maintenance	&Q57_6	DM1
7	Other (Specify)	&Q57_7	DM1
88	Refused	&Q57_88	DM1
99	Don't know	&Q57_99	DM1

DECISION MAKING PROCESSES

DM1. Has your organization assigned responsibility for controlling or monitoring energy usage and costs to a specific staff person, such as an energy manager, group of staff, or outside contractor?

1	Yes, in-house staff person	DM2
2	Yes, group of staff	DM2
3	Yes, outside contractor	DM2
4	No	DM2
9	DK/NA/refused	DM2

DM2. Has your organization developed a policy that requires or emphasizes the selection of high-efficiency versions of energy-using equipment, rather than standard-efficiency versions? (INTERVIEWER NOTE: For example, a policy requiring all new fluorescent lighting systems to be T8 lamps with electronic ballasts, or that all new motors be premium efficiency).

1	Yes	DM3
2	No	DM3
99	DK/NA/Refused	DM3

DM3 When magnetic fluorescent ballasts fail in your facility, do you typically replace them with ..**SELECT ONE ONLY**

1	the same kind of equipment	DM4
2	with electronic ballasts and T-8 lamps	DM4
3	with whatever your contractor recommends	DM4
4	Don't control decision (lessee), owner decides	DM4
5	Don't use fluorescent equipment	DM4
99	DK/NA/Refused	DM4

DM4 When cooling units fail in your facility, do you typically . .. SELECT ONE ONLY

1	replace them with standard efficiency or lowest cost	DM5
	equipment	
2	pay more to replace them with high efficiency	DM5
	equipment that exceeds government Standards	
3	replace them with whatever your contractor	DM5
	recommends	
4	Don't control decision (lessee), owner decides	DM5
5	Don't have a cooling unit	DM5
99	Don't know	DM5

DM5. Does your organization routinely apply long-term investment analysis to energy equipment selection, such as estimates of payback periods, life cycle costing, or internal rate-of-return?

1	Yes	DM6
2	No	DM7
99	DK/NA	DM7

DM6. What is the PRIMARY investment criterion you use? [ACCEPT ONLY ONE RESPONSE; PROMPT WITH LIST AS NECESSARY.]

1	Payback period	DM7
2	Life cycle costing analysis	DM7
3	Internal rate of return	DM7
4	Something else (SPECIFY – NOT CODED®	DM7
99	DK/NA	DM7

DM7. The "payback period" is a way that some firms evaluate investments. For our purposes, it's the period of time your firm would need to achieve savings on your energy bill, in order to pay for any extra up-front cost associated with installing more energy-efficient equipment. Using that definition, what's the longest the payback can be for an energy efficiency investment, for it to be acceptable to your firm?

DM8. Using a scale from 1 to 10, where 1 means you aren't knowledgeable at all, and 10 means you are fully knowledgeable, please rate how knowledgeable you feel that you are about what energy efficiency products are available, and how they'll perform?

A-88

# Enter 1-10 rating	T1
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MARKET BARRIER TRACKING ITEMS

T1. Now I'd like to read a brief series of statements and I'd like you to tell me how well each statement describes your beliefs about energy efficient investments or practices. We'll again use a 1-to-10 scale, where 1 means you DON'T AGREE AT ALL with the statement, and 10 means you AGREE COMPLETELY with the statement. The first/next one is ... [RANDOMIZE, READ AND OBTAIN A RATING FOR EACH. WHEN SEQUENCE COMPLETE, GO TO Q71.]

When considering a new energy efficiency investment, I am concerned that the actual bill savings will be less than what was estimated

It takes too much time and hassle to get enough information to make an informed decision about energy efficient investments

I feel uncertain about the reliability of information provided by non-utility firms proposing energyefficient investments for my business

There are energy efficient investments that I'm interested in making, but they always seem to fall below other priorities

My firm does not always have control over decisions to install energy-efficient heating, air conditioning, or lighting in this facility.

Energy-efficient equipment like cooling and lighting will perform as well as equipment that is not energy-efficient

There is too much time and hassle involved in selecting a qualified energy efficiency contractor

Lack of financing is a barrier to our organization making energy efficiency investments that we want to make

T2. Please help me understand how important energy costs are compared to the total costs of running your business. Would you say that energy costs are very important, somewhat important, not very important, or not at all important, compared to your total costs of doing business?

1	Very important	T3
2	Somewhat important	T3
3	Not very important	T3
4	Not at all important	T3
99	DK/NA	T3

T3. In general, do the decision-makers at your business find energy efficiency very important, somewhat important, not very important, or not at all important?

1	Very important	T4
1	' '	ודי
2	Somewhat important	T4
3	Not very important	T4
4	Not at all important	T4
99	DK/NA	T4

DIFFUSION-OF-INNOVATION AND RELATED TRACKING ITEMS

T4. For each of the next few statements, please rate your agreement on a scale from 1 to 10, where 1 means you DON'T AGREE AT ALL with the statement, and 10 means you AGREE COMPLETELY. They are [RANDOMIZE AND OBTAIN RESPONSE FOR EACH]:

#	There are important practical benefits that come with energy efficient investments, apart from saving money	T5
#	In general, energy efficient investments are easy to understand and use	T5
#	I actively advocate energy efficient investments and practices to others	T5
#	I regularly hear about energy efficient investments and practices from business contacts and/or professional organizations.	T5

T5. If you needed help or information related to energy efficiency, what type of company would you typically call first:

[Do NOT READ LIST, Enter Verbatim, Upcode afterwards]

1	Engineering / Architectural Design Firms	Q83
2	Energy Equipment Contractors and Installers (e.g., lighting, HVAC)	
3	Energy Service Companies, often referred to as ESCOs	Q83
4	Your electric distribution company (e.g., PG&E, SCE, SDG&E)	Q83
5	Companies, besides your electric distribution company, that	Q83
	provide electricity supply, referred to also as ESPs (Energy	
	Service Providers)	
6	Building operations and maintenance companies	Q83
7	Equipment manufacturers	Q83
8	Other	Q83
99	[DON'T READ] Don't Know/ Refused	Q83

FIRMOGRAPHICS

Q83. OK, these last few questions are just to make sure we talked to a cross-section of businesses in your area. Which of the following categories describes the number of employees your firm has at this location?

1	1 to 5	Q84
2	6 to 10	Q84
3	11 to 20	Q84
4	21 to 50	Q84
5	51 to 100	Q84
6	Or, over 100	Q84
9	[DO NOT READ:] DK/NA/refused	Q84

Q84. Can you estimate the total square footage of your facility at this location to be?

1	Less than 5,000 square feet	Q90
2	5,000 but less than 10,000 square feet	Q90
3	10,000 but less than 20,000 square feet	Q90
4	20,000 but less than 50,000 square feet	Q90
5	50,000 but less than 100,000 square feet	Q90
6	Or, 100,000 square feet or more	Q90
9	[DO NOT READ:] DK/NA/refused	Q90

Q90. What is your job title or role? [GO TO Q91.]

	deer make year jee kine er reier [ee re de m]		
1	Facilities Manager	Q91	
2	Energy Manager	Q91	
3	Other facilities management/maintenance position	Q91	
4	Chief Financial Officer	Q91	
5	Other financial/administrative position	Q91	
6	Proprietor/Owner	Q91	
7	President/CEO	Q91	
8	Other (Specify)	Q91	
99	Don't know/refused	Q91	

A-91

Q91. Is this location ... [READ LIST]?

1	Your firm's only location	Q92
2	A branch office of a larger firm based in California	Q92
3	A branch office of a larger firm based OUTSIDE California	Q92
4	A franchise location of a larger firm based in California	Q92
5	A franchise location of a larger firm based OUTSIDE California	Q92
6	Or, the headquarters of a firm with multiple locations	Q92
99	[DO NOT READ:] None of the above	Q92

Q92. Does your firm have access to the World Wide Web (the Web) for business purposes?

1	Yes	Q93
2	No	Q95
9	DK/NA	Q95

Q93. Has your firm every used the Web to obtain information on purchase energy-related products and services?

1	Yes	Q94
2	No	Q95
9	DK/NA	Q95

Q94. Which energy-related Web sites has your firm used?

Q95. Are you aware of any programs or resources provided by [UTILITY] in 1999 that were designed to promote energy efficiency for businesses like yours? [IF YES:] What types of programs can you recall? [RECORD ALL MENTIONS.]

1	SPC / Standard Performance Contracting	Q96
2	Business energy audits	Q96
3	Distributor incentives	Q96
4	Express Efficiency	Q96
5	Rebates/incentives (non-specific)	Q96
88	Other programs [SPECIFY:]	Q96
98	No, not aware of any programs	Q97
99	DK/refused	Q97

PROGRAM PARTICIPATION/MEASURE CHANGES

Q96. Did your firm participate in any energy efficiency programs offered by [UTILITY], in 1999? [RECORD ALL MENTIONS]

1	Yes, Express Efficiency	Q97
2	Yes, SPC/Standard Performance Contracting	Q97
3	Yes, energy audits	Q97
4	Yes, other [SPECIFY:]	Q97
5	No, did NOT participate in other 1999 programs	Q97
99	DK/refused/no more	Q97

Q97. And finally, based on what we've discussed today, what other comments or suggestions do you have regarding energy-efficient products and practices, or utility programs that support energy efficiency? [RECORD VERBATIM]

May I please record your name, simply for verification purposes – a supervisor will confirm a small percentage of the interviews I've done.

Thank you very much for your participation in this very important survey, you've been extremely helpful. I hope you found the process interesting and enjoyable. Thanks again, and have a great day.

A.5 SUPPLY SIDE SURVEYS: LIGHTING CONTRACTORS

business.

SMALL BUSINESS SPC MARKET EFFECTS STUDY IN-DEPTH INTERVIEW GUIDE COMMERCIAL LIGHTING CONTRACTORS

Name	Title	Phone
Company		Fax
Street Address		email
City, State, ZIP		Interviewer
D&B Sales		Call dates
D&B Employees		Complete Date
Lead-in		
•		ng on behalf of [Utility]. We are contacting mmercial lighting market.

May I speak with the individual who is most knowledgeable of your commercial lighting

IF THE CONTACT IS NOT AVAILABLE, ASK FOR NAME AND BEST TIME TO CALL BACK.

ONCE CONTACT IS ON THE LINE, REPEAT LEAD IN IF NECESSARY, THEN: We would like to ask you a few questions about trends in your experience installing and specifying lighting equipment and your perceptions of changes in the market. The whole interview should take about 15 minutes. Please be assured that the information you provide in the interview will remain confidential with {the utility}. We will not identify or attribute any of your comments or company information.

[SCREENING QUESTIONS]

S.1	Does your company [accept multiple]
	Manufacture commercial lighting equipment
	Install commercial lighting equipment2
	Sell commercial lighting equipment
	Design or layout commercial lighting
	None5

[IF S.1 NOT EQUAL TO 2 or 4, THEN TERMINATE]

S.2	Does your company do more than \$50,000 in commercial lighting business a year?
	Yes1
	No2
	Don't Know3
IF S.2	2 = 1 OR 3, THEN PROCEED, IF S.2= 2, THANK AND TERMINATE
S.3	And does your firm do a quarter or more of your lighting business with small and
5.5	medium-sized commercial customers [defined as customers who have less than 100 full-time equivalent employees or <100,000 sq.ft.]?
	Yes
	No
	Don't know
IF NO	O or DON'T KNOW, THEN TERMINATE
First,	we would like to learn a little about your business.
1.1	Which of the following best describes your firm
	Electrical contractor1
	Energy service company
	Lighting management company
	[read only as needed] Other: 4
1.4	Approximately how many years has your company been in business? ENTER NUMBER OF YEARS
1.5	About how many full time equivalent workers of all types do you employ at this location? ENTER NUMBER OF FTEs
1.6	And approximately what were the total sales of all products and services
	for your company in 1999 at this location?
	Actual Total
[If re	luctant or refuses, ask which range they would fall in.]
-	< \$1 million
	\$1 - 4.9 million
	\$5 - 49.9 million
	>\$50 million
	Don't know/Proprietary5



1.7	About what percentage of your company's total sales <u>at this locat</u> commercial lighting products or lighting-related services?	tion came from	
	ENTER PERCENTAGE	0/2	
	DON'T KNOW		
	DOIL I INTO W	•	
1.8	And does your company specify or install [circle all that apply]		
	a) 4-foot fluorescent lamps	1	
	b) Dimming ballasts		
	c) 4-foot fluorescent fixtures		
	d) Compact fluorescent lamps		
	e) HID lamps or fixtures		
	f) Occupancy controls		
	,		
[IF 1	.8A=0 AND 1.8B=0 AND1.8C=0 THEN SKIP 2.5A, 2.7B]		
	.8D=0 THEN SKIP 2.5B, 2.7A]		
<u> </u>			
Mar	ket Characteristics Section		
Now	we would like to ask a few questions about the characteristics o	f the market vo	ıı serve
	is location.	1 tile 111ti 110t j o	u ser ve
at tii	is location.		
2.1	What percent of your lighting projects are provided to each of the	following	
	a) Other contractors	_	
	b) Direct to end users		
	c) Developers		
	d) [read as needed] Other:		
		should add to	100 %
	total		
2.2	Roughly what percent of your lighting projects are retrofits or exp	nansions as comr	vared
	with new construction? [Total should add to 100%]	pansions as comp	, area
	a) Retrofits and expansions	0/0	
	b) New construction		
	c) Other:		
	·	should add to	100 %
	totai	should add to _	<u> 100</u> /0
2.3	Approximately what percent of your lighting business at this loca	otion corves com	moroio1
2.3	versus residential and industrial customers? [Total should add to		Herciai
	<u>-</u>	-	
	a) Commercial		
	b) Residential		
	c) Industrial		
	d) Other:		100.04
	total	should add to	100 %

2.4	Approximately what percentage of your purchases of lighting equipment lamps comes from each of the following [totals should add to 100%] a) Wholesalers and distributors
	total should add to100_%
	ve would like to ask a couple of questions about the market for fluorescent lamps and ts in existing buildings
2.5.a	In approximately what percent of cases for existing buildings do you recommend or specify T8 lamps instead of or as an option to T12 lamps? ENTER PERCENTAGE
2.5.b	In approximately what percent of cases do you recommend or specify compact fluorescent lamps instead of or as an option to incandescent lamps for existing buildings? ENTER PERCENTAGE
2.6	In terms of maintaining your firm's competitive position, how important is offering T8 lamps, electronic ballasts, compact fluorescent lamps, daylighting, or occupancy controls in your installations for existing buildings? Would you say Very important
	ve would like to ask some questions about your company's installation of efficient ng equipment in existing buildings
2.7a	Of all your downlight or sconce sales in existing buildings, roughly what percent were compact fluorescent in 1999? ENTER PERCENT
2.7b	Of all your linear fluorescent sales (in existing buildings), roughly what percent were T8 in 1999? ENTER PERCENT

2.7c	Of all your linear fluorescent ballast sales (in existing	g buildings), app	roximately what
	percent were electronic in 1999?		
	ENTER PERCENT		
	DON'T KNOW		
2.8.a	In approximately what percent of projects in existing	buildings do yo	u install daylighting
	system, such as dimming or switching controls?		
	ENTER PERCENT	1999	%
	DON'T KNOW		
2.9	About what percentage of the 4-foot fluorescent fixtu	res you install a	re indirect?
	ENTER PERCENT		
	DON'T KNOW		
Now v	we would like to ask some questions about building	commissioning	
Buildi	ling commissioning is a method of confirming proper	functioning of l	building systems
	occupancy through the use of measurement and verifi	, ,	
BC.1	Prior to this conversation, were you aware of the use	of building com	missioning to
	enhance energy efficiency in buildings?		
	Yes		1
	No		2 SKIP TO 3.1
BC.2	Have you used or considered using building commiss	sioning to sell pr	oducts or to enhance
	your business? Would you say		
	You have used Building commissioning		1
	You've considered it, but have not used it to d	date	2
	No, not used it al all		3
	BC.2a. [If BC.2=2 or 3] Why not? [open end]		
BC.3	From whom did you first hear about building commis	ssioning? [read]	ist only if neededl
D C.3	Trade Organization	-	-
	Business colleague		
	[Utility] Representative		
	Mail advertisement		
	Equipment Distributor		
	* *		
	Other: Don't Recall		0 7

A-99

Barriers / Perceptions Section

Now we would like to ask a few questions about issues associated with specifying lighting equipment

3.1 In general, what are the obstacles to increasing customer demand for installing high-efficiency lighting? [open end]

A-100

[GENERAL MODULE FOR PROGRAMS]

Now we would like to ask you a few questions regarding programs offering incentives and rebates to customers and service providers in order to increase the use and installation of energy efficient equipment.

Energy Efficiency Programs

6.1 [IN STATE ONLY] Are you familiar with the following programs to promote high-efficiency equipment... (How about...) [CODE DON"T KNOW AS 0=NO]

	Yes=1	No=0
6.1.a Express Efficiency		
6.1.b Small Business Standard Performance		
Contracting (SBSPC) Program		
6.1.c Large Nonresidential Standard Performance		
Contracting (LNSPC) Program		
6.1.d [Utility] energy audits for small and		
medium sized businesses?		

IF NO TO ALL GO TO 7.1

6.1 [OUT OF STATE ONLY] Does your electric utility offer any of the following types of programs to promote energy efficient equipment. [CODE DON"T KNOW AS 0=NO]

		Yes=1	No=0
6.1.a Rebate Programs?			
6.1.b Standard Performan	ce Contracting		
Programs?	_		
6.1.c Energy audits for bu	sinesses?		
6.1.d Informational or Ed	ucation programs?		

IF NO TO ALL GO TO 7.1

6.2 [IN STATE ONLY][Ask for only those they were familiar above, i.e,. where 5.1=1] And now focusing on those programs with which you are familiar, have you used or considered using the [Express Efficiency/SBSPC/LNSPC/Auditing] Program to sell products or to enhance your business? (Have you used the program, considered but not

used, or have not considered using the program)

	Used it=1	Considered,	Not	
		but not	Considered	
		used=2	=3	
6.2.a Express				If $=2$ or 1,
Efficiency				ask 6.2.a.1
6.2.b Small Business				If $=2$ or 1,
Standard Performance				ask 6.2.b.1
Contracting (SBSPC)				
Program				
6.2.c Large				If $=2$ or 1,
Nonresidential Standard				ask 6.2.c.1
Performance				
Contracting (LNSPC)				
Program				
6.2.d Energy audits				If $=2$ or 1,
				ask 6.2.d.1

6.2 [OUT OF STATE ONLY] [Ask for only those they were familiar above, i.e,. where 6.1=1] And now focusing on those programs with which you are familiar, have you used or considered using the [Rebate/SPC/Audit/Informational] Program to sell products or to enhance your business? (Have you used the program, considered but not used, or have not considered using the program)

	Used it=1	Considered,	Not	
		but not	Considered	
		used=2	=3	
6.2.a Rebate Programs?				If $=2$ or 1,
				ask 6.2.a.1
6.2.b Standard				If $=2$ or 1,
Performance				ask 6.2.b.1
Contracting Programs?				
6.2.c Energy audits for				If $=2$ or 1,
businesses?				ask 6.2.c.1
6.2.d Informational or				If $=2$ or 1,
Education programs?				ask 6.2.d.1

6.3	[IN STATE ONLY] For [the/those] programs of which you are familiar, from whom did
you f	irst hear about the program[s]? [accept multiples]
	Trade Organization1
	Business colleague
	[Utility] Representative
	Mail advertisement4
	Equipment Distributor5
	[read only if needed] Other:6
6.4	Now, I'd like to know how much of an effect you think the [se] Program [s] [has/have] had in some specific areas. On a scale from 1 to 5, where 1 means little effect at all and 5 means a major effect, do you think the program [s] [has/have] a) Increased your sales of high-efficiency equipment b) Improved your opinion of the quality & performance of high-efficiency equipment
6.5	[Ask only if 5.1.d.=1] In the past 2 years, has your firm obtained any business installing energy saving measures for customers based on recommendations they received from an energy audit? [IF NEEDED, PROVIDE EXAMPLES, E.G., SET-BACK THERMOSTATS & HVAC MAINTENANCE, VSDs] Yes
EE V	Vebsite Section
7.1	Does your firm use the World Wide Web?
	Yes1
	No2
7.2	How much does your firm use the World Wide Web for business? Would you say your usage is Non existent
7.3	What types of sites or information do you usually seek out when using the Web for business? (e.g., manufacturers, competitor, customer, or utility sites, energy efficiency information.)

A-103

[IN STATE ONLY] Prior to this conversation, were you aware that [Utility] website has a section addressing Energy Efficiency?					
PROMPT IF NEEDED: The website is the place where [Utility] puts reb	oate and energy				
efficiency program information. It provides product information, articles					
vendor information as well. [If in PG&E territory] (PG&E's website is c	alled Smarter				
energy and is located at www.smarterenergy.com)					
Yes	. 1				
No	2 SKIP TO 8.1				
7.4 [OUT OF STATE ONLY] Have you ever visited your electric utility's w	eb site?				
Yes					
No					
7.4.2 [IN STATE ONLY] Have you ever looked at the energy efficiency se [Utility's] website?	ection of				
Yes	. 1				
No	2 SKIP TO 8.1				
7.4.3 [IN STATE ONLY] Do you think the information about the program equipment, and vendors is useful?	s, efficient				
Yes	. 1				
No					
Can't remember/don't know	. 3				
7.4.4 [IN STATE ONLY] Is there any other information you would like to website relating to energy efficiency?	see on [Utility]				
7.5 [OUT OF STATE ONLY][if 7.4=1]Does your electric utility's web site prinformation on the following:	provide any				
Energy efficient equipment0					
Energy-efficiency rebates, Standard Performance Contracting, or	_				
Vendors or contractors who provide energy-efficiency products o					
Wrap Up					
8.1 Finally how you think energy efficiency programs could be improved to	more effectively				

Thank you very much for your assistance in this important project [END]

promote the specification and use of high efficiency equipment? [open-end]

A.6 SUPPLY SIDE SURVEYS: HVAC CONTRACTORS

A-105

SMALL BUSINESS SPC MARKET EFFECTS STUDY IN-DEPTH INTERVIEW GUIDE COMMERCIAL HVAC CONTRACTORS & DESIGNERS

Lead-in	
Hello, my name is and I am calling on behalf [Utility]. We are contacting HVAC contractors as part of a study of the commercial HVAC market.	Z
May I speak with the individual who is in charge of your commercial HVAC business?	
IF THE CONTACT IS NOT AVAILABLE, ASK FOR NAME AND BEST TIME TO CALL BACK. FAX RESPONSE MATRICES. ONCE CONTACT IS ON THE LINE, REPEAT LEAD IN IF NECESSARY, THEN:	,
We would like to ask you a few questions about trends in your experience installing and specifying HVAC equipment and your perceptions of changes in the market. The whole interview should take about 15 minutes. Please be assured that the information you provide in the interview will remain confidential with {the utility}. We will not identify or attribute any your comments or company information.	
[SCREENING QUESTIONS]	
S.1 Does your company [accept multiples] Manufacture commercial packaged HVAC units	
[IF S.1 NOT EQUAL TO 2 or 4, THEN TERMINATE]	
S.2 Does your company do more than \$100,000 in commercial packaged HVAC unit business a year? [IF RELUCTANT TO RESPOND TO THIS SCREEN ASK IF THE INSTALL/SPECIFY >10 PACKAGE UNIT SYSTEMS PER YEAR] Yes	EΥ
[IF S.2 = 1 OR 3, THEN PROCEED; IF NO, TERMINATE SURVEY]	

S.3	Besides air-cooled packaged AC units, which of the following products does your company install or specify [O= does not sell, 1= does sell] a) Water-cooled or evaporative air conditioners
Firmo	ographics Section
First o	of all, we would like to learn a little about your business
1.1	Which of the following best describes your firm HVAC contractor
1.2	And does your firm do a quarter or more of your HVAC business with small and medium-sized commercial customers [defined as customers who have less than 100 full-time equivalent employees or <100,000 sq.ft.]? Yes
[IF NO	D, TERMINATE]
1.4	Approximately how many years has your company been in business? ENTER NUMBER OF YEARS
1.5	About how many full time equivalent workers of all types do you employ at this location? ENTER NUMBER OF FTEs
1.6	And approximately what were the total sales of all products and services for your company in 1999 at this location? Actual Total
[If rel	Actual Total



1.7	About what percentage of your company's total sales at this location came from products
	or services related to commercial packaged units?
	ENTER PERCENTAGE%
	DON'T KNOW
Marl	ket Characteristics Section
.,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	Ret Character istres Section
	we would like to ask a few questions about the characteristics of the market you serve is location.
2.1	What percent of your HVAC projects are provided to each of the following
	a) Other contractors%
	b) Direct to end users%
	c) Developers%
	d) Something else:
	total should add to100_%
2.2	Please tell me roughly what percent of your sales of packaged units are
	a) Planned replacement of existing units%
	b) Emergency replacement of existing units%
	c) New units in existing buildings (expansion)%
	d) New units in new buildings%
	e) Other:
	total should add to100_%
[IF U	NABLE TO ANSWER 2.2 ABOVE, ASK 2.2.1, OTHERWISE GO TO 2.3]
	2.2.1 How about the breakdown of sales of commercial packaged units in terms of new
	versus existing? [Totals should add to 100%]
	a) New units%
	b) Replacement of existing units%
2.3	Approximately what percent of your HVAC business at this location serves commercial,
	residential and industrial customers? [Total should add to 100%]
	a) Commercial%
	b) Residential%
	c) Industrial%
	d) Other:%
	total should add to100_%

2.4	Approximately what percentage of your purchases of packaged air conditioners comes from each of the following [Totals should add to 100%] a) Wholesalers, distributors and manufacturer's reps% b) Directly from manufacturers
2.5	Approximately how many packaged units does your firm install per year? ENTER NUMBERDON'T KNOW
2.6	What would you say is the average number of packaged HVAC units you install per job? ENTER AVERAGE
Now	we would like to ask a couple of questions about the market for packaged HVAC units
2.7	What types of changes in the packaged AC market do you anticipate over the next three years, if any?
2.8	With respect to the efficiency of units, we're trying to get a sense of what "high efficiency" means in the market right now. If a customer asked for a high efficiency 15-ton packaged air-cooled air conditioner, what would be the EER of the unit you would recommend? ENTER EFFICIENCY OF 15-TON UNIT
to rea	emainder of the survey focuses on equipment for existing buildings. Also, I am going ad some efficiency levels for commercial packaged AC units, for the remainder of the y, when I say 'high-efficiency" these are the definitions I'll be referring to Table 1: Survey Definitions for High Efficiency Air-Cooled AC Units
	A. <= 5 tonSEER =11.0 (or higher) B. 6 - 12 tonEER =10.3 (or higher) C. 13 - 20 tonEER = 9.7 (or higher)

9.5 (or higher)

D. > 20 - ton.....EER=

2.9	Do you actively promote or market high-efficiency commercial packaged units as defined
	earlier for existing buildings? [refer to Table 1 as needed]
	Yes1
	No2
2.10	In what percent of all your jobs in existing buildings do you recommend or specify high-efficiency commercial packaged units instead of or as an option to standard efficiency units? [refer to Table 1 as needed]
	ENTER PERCENTAGE% DON'T KNOW
2.11	And, in general, how difficult or easy is it to sell a high efficiency package unit compared to a standard one? Would you say it is [refer to Table 1 as needed] Much more difficult
2.14	In terms of maintaining your firm's competitive position, how important is offering high-efficiency commercial packaged units in your installations (in existing buildings)? Would you say
	Very important
	Somewhat important
	Not very important
	Not at all important4
Now v	we would like to ask some questions about your company's installation of packaged HVAC units
2.	15.1 In 1999, among your sales of units 5 tons or less, what % were high efficiency (SEER >=11) 1999?
	ENTER PERCENTAGE
2.	15.2 In 1999, among your sales of units 6-12 tons, what % were high efficiency (EER >=10.3)
	ENTER PERCENTAGE%
	DON'T KNOW

Now we would like to ask some questions about building commissioning

Building commissioning is a method of confirming proper functioning of building systems after occupancy through the use of measurement and verification.

BC.1	Prior to this conversation, were you aware of the use of building commissioning to enhance energy efficiency in buildings?
	Yes1
	No
BC.2	Have you used or considered using building commissioning to sell products or to enhance your business? Would you say
	You have Used Building commissioning 1
	You've Considered it, but have not used it to date2
	No, you have not used it at all
	BC.2a. [If BC.2=2 or 3] Why not? [open end]
BC.3	From whom did you first hear about building commissioning? [read list only if needed]
	Trade Organization1
	Business colleague
	[Utility] Representative
	Mail advertisement4
	Equipment Distributor5
	Other:6
	Don't Pagall

Barriers / Perceptions Section

Now we would like to ask a few questions about issues associated with high efficiency equipment

3.1 In general, what are the obstacles to increasing customer demand for installing high-efficiency systems and controls? [open end]

[GENERAL MODULE FOR PROGRAMS]

Now we would like to ask you a few questions regarding programs offering incentives and rebates to customers and service providers in order to increase the use and installation of energy efficient equipment.

Energy Efficiency Programs

6.1 [IN STATE ONLY] Are you familiar with the following programs to promote high-efficiency equipment... (How about...) [CODE DON"T KNOW AS 0=NO]

	Yes=1	No=0
6.1.a Express Efficiency		
6.1.b Small Business Standard Performance		
Contracting (SBSPC) Program		
6.1.c Large Nonresidential Standard Performance		
Contracting (LNSPC) Program		
6.1.d [Utility] energy audits for small and		
medium sized businesses?		

IF NO TO ALL GO TO 7.1

6.1 [OUT OF STATE ONLY] Does your electric utility offer any of the following types of programs to promote energy efficient equipment. [CODE DON"T KNOW AS 0=NO]

	Yes=1	No=0
6.1.a Rebate Programs?		
6.1.b Standard Performance Contracting		
Programs?		
6.1.c Energy audits for businesses?		
6.1.d Informational or Education programs?		

IF NO TO ALL GO TO 7.1

6.2 [IN STATE ONLY][Ask for only those they were familiar above, i.e,. where 5.1=1] And now focusing on those programs with which you are familiar, have you used or considered using the [Express Efficiency/SBSPC/LNSPC/Auditing] Program to sell products or to enhance your business? (Have you used the program, considered but not

used, or have not considered using the program)

	Used it=1	Considered,	Not	
		but not	Considered	
		used=2	=3	
6.2.a Express				If $=2$ or 1,
Efficiency				ask 6.2.a.1
6.2.b Small Business				If $=2$ or 1,
Standard Performance				ask 6.2.b.1
Contracting (SBSPC)				
Program				
6.2.c Large				If $=2$ or 1,
Nonresidential Standard				ask 6.2.c.1
Performance				
Contracting (LNSPC)				
Program				
6.2.d Energy audits				If $=2$ or 1,
				ask 6.2.d.1

6.2 [OUT OF STATE ONLY] [Ask for only those they were familiar above, i.e,. where 6.1=1] And now focusing on those programs with which you are familiar, have you used or considered using the [Rebate/SPC/Audit/Informational] Program to sell products or to enhance your business? (Have you used the program, considered but not used, or have not considered using the program)

	Used it=1	Considered,	Not	
		but not	Considered	
		used=2	=3	
6.2.a Rebate Programs?				If $=2$ or 1,
				ask 6.2.a.1
6.2.b Standard				If $=2$ or 1,
Performance				ask 6.2.b.1
Contracting Programs?				
6.2.c Energy audits for				If $=2$ or 1,
businesses?				ask 6.2.c.1
6.2.d Informational or				If $=2$ or 1,
Education programs?				ask 6.2.d.1

6.3	[IN STATE ONLY] For [the/those] programs of which you are familiar, from whom did
you f	irst hear about the program[s]? [accept multiples]
	Trade Organization1
	Business colleague
	[Utility] Representative
	Mail advertisement4
	Equipment Distributor5
	[read only if needed] Other:6
6.4	Now, I'd like to know how much of an effect you think the [se] Program [s] [has/have] had in some specific areas. On a scale from 1 to 5, where 1 means little effect at all and 5 means a major effect, do you think the program [s] [has/have] a) Increased your sales of high-efficiency equipment b) Improved your opinion of the quality & performance of high-efficiency equipment
6.5	[Ask only if 5.1.d.=1] In the past 2 years, has your firm obtained any business installing energy saving measures for customers based on recommendations they received from an energy audit? [IF NEEDED, PROVIDE EXAMPLES, E.G., SET-BACK THERMOSTATS & HVAC MAINTENANCE, VSDs] Yes
EE V	Vebsite Section
7.1	Does your firm use the World Wide Web?
	Yes1
	No2
7.2	How much does your firm use the World Wide Web for business? Would you say your usage is Non existent
	Moderate
7.3	What types of sites or information do you usually seek out when using the Web for business? (e.g., manufacturers, competitor, customer, or utility sites, energy efficiency information.)

7.4	a so PR eff	STATE ONLY] Prior to this conversation, were you aware that [Utility] website has ection addressing Energy Efficiency? OMPT IF NEEDED: The website is the place where [Utility] puts rebate and energy iciency program information. It provides product information, articles, and some ador information as well. [If in PG&E territory] (PG&E's website is called Smarter ergy and is located at www.smarterenergy.com)
		Yes
7.4	[O]	UT OF STATE ONLY] Have you ever visited your electric utility's web site? Yes
	7.4.2	[IN STATE ONLY] Have you ever looked at the energy efficiency section of [Utility's] website? Yes
	7.4.3	[IN STATE ONLY] Do you think the information about the programs, efficient equipment, and vendors is useful? Yes
	7.4.4	[IN STATE ONLY] Is there any other information you would like to see on [Utility] website relating to energy efficiency?
7.5	_	UT OF STATE ONLY][if 7.4=1]Does your electric utility's web site provide any ormation on the following: Energy efficient equipment
		Vendors or contractors who provide energy-efficiency products or services 0/1
Wr	ap Up	
8.1	Fin	ally how you think energy efficiency programs could be improved to more effectively

Thank you very much for your assistance in this important project [END]

promote the specification and use of high efficiency equipment? [open-end]

A.7 SUPPLY SIDE SURVEYS: LIGHTING DISTRIBUTORS

SMALL BUSINESS SPC MARKET EFFECTS STUDY In-Depth Interview Guide COMMERCIAL LIGHTING DISTRIBUTORS

Name	Title	Phone
Company		Fax
Street Address		email
City, State, ZIP		Interviewer
D&B Sales		Call dates
D&B Employees		Complete Date

City, State, ZIP	Interviewer		
D&B Sales	Call dates		
D&B Employees	Complete Date		
Lead-in			
Hello, my name is and I am calling on beha lighting companies as part of a study of the commercial I	•		
May I speak with the individual who is in charge of your	commercial lighting business.		
IF THE CONTACT IS NOT AVAILABLE, ASK FOR NAME AND BEST TIME TO CALL BACK.			
ONCE CONTACT IS ON THE LINE, REPEAT LEAD IN IF NECESSARY, THEN: We are conducting a study on the commercial lighting market. We would like to ask you a few questions about trends in selling lighting equipment and your perceptions of changes in the market. The whole interview should take about 15 minutes. Please be assured that the information you provide in the interview will remain confidential with XENERGY. We will not identify or attribute any of your comments or company information.			
[SCREENING QUESTIONS]			
S.1 Does your company [accept multiples] Manufacture commercial lighting equipm Install commercial lighting equipment Distribute commercial lighting equipment Design or layout commercial lighting	2 t3		

IF S.1 NOT EQUAL TO 3, THEN TERMINATE

S.2	Does your company do more than \$100,000 in commercial lighting business a year? Yes
IF S.2	2 = 1 OR 3, THEN PROCEED; IF S.2=2, THEN THANK & TERMINATE
S.3	And does your firm do a quarter or more of your lighting business with small and medium-sized commercial customers [defined as customers who have less than 100 full-time equivalent employees or <100,000 sq.ft.]? Yes
IF NO	O, THEN TERMINATE
1.1	Which of the following best describes your firm Catalog/mail order firm
1.4	Approximately how many years has your company been in business? ENTER NUMBER OF YEARS
1.5	About how many full time equivalent workers of all types do you employ at this location? ENTER NUMBER OF FTEs
	lso, for statistical purposes so we can group your answers, approximately what were the stal sales of all products and services for your company in 1999 at this location? Actual Total
[If re	luctant or refuses, ask which range they would fall in.] < \$1 million
	\$5 - 49.9 million

1.7	About what percentage of your company's total sales at this location came from					
	commercial lighting products or lighting-related services?					
	ENTER PERCENTAGE					
	DON'T KNOW	%				
Now	we would like to review the products your company handle	es				
2.1	Does your company sell [circle all that apply]					
	4-foot fluorescent lamps	1				
	Electronic dimming ballasts					
	4-foot fluorescent fixtures					
	Compact fluorescent lamps					
	HID lamps or fixtures					
	Occupancy Sensors					
2.2	Wilest annual of committee to a marinet and a marinet and a second	- f 41 f - 11 :				
2.2	What percent of your lighting projects are provided to each	_				
	Contractors					
	Direct to end users					
	Other distributors					
	Retail Stores					
	[read as needed]Other:					
		total should add to _	<u>100</u> %			
2.3	What types of changes in the lighting equipment market do years, if any?	you anticipate over th	ne next 3			
The f	following questions focus on equipment in existing building	ys				
2.4a	In approximately what percent of sales of equipment for exirceommend or specify T8 lamps instead of or as an option to ENTER PERCENTAGE	o T12 lamps?	u			
2.4b	In approximately what percent of sales of equipment in exis recommend or specify compact fluorescent lamps instead of incandescent lamps? ENTER PERCENTAGE	or as an option to				
	DON'T KNOW	·······				

2.5	In terms of maintaining your firm's competitive position, how important is offering T8 lamps, electronic ballasts, compact fluorescent lamps, daylighting, or occupancy controls in your installations in existing buildings? Would you say			
	Very important1			
	Somewhat important			
	Not very important			
	Not at all important4			
	we would like to ask some questions about your company's sales of efficient lighting oment in existing buildings			
	Deleted (missing from Bellview)			
2.6b	Of all your linear fluorescent sales of equipment for existing buildings, roughly what percent were T8 in 1999?			
	ENTER PERCENT1999%			
	DON'T KNOW			
2.6c	Of all your linear fluorescent ballast sales of equipment for existing buildings, what percent were electronic in 1999?			
	ENTER PERCENT			
	DON'T KNOW			
	2.7			
	Deleted.			
2.8	About what percentage of the 4-foot fluorescent fixtures you sell for existing buildings are indirect or direct/indirect?			
	ENTER PERCENT1999%			
	DON'T KNOW			
Barri	ers / Perceptions Section			
Now	Now we would like to ask a few questions about issues associated with specifying lighting			
_ , _ ,,	ow we would like to ask a few questions about issues associated with speenying lighting			

equipment

3.1 In general, what are the obstacles to increasing customer demand for installing highefficiency lighting? [open end]

[GENERAL MODULE FOR PROGRAMS]

Now we would like to ask you a few questions regarding programs offering incentives and rebates to customers and service providers in order to increase the use and installation of energy efficient equipment.

Energy Efficiency Programs

6.1 Are you familiar with the following programs to promote high-efficiency equipment... (How about...) [CODE DON"T KNOW AS 0=NO]

	Yes=1	No=0
6.1.a Express Efficiency		
6.1.b Small Business Standard Performance		
Contracting (SBSPC) Program		
6.1.c Large Nonresidential Standard Performance		
Contracting (LNSPC) Program		
6.1.d [Utility] energy audits for small and		
medium sized businesses?		

IF NO TO ALL GO TO 7.1

6.2 [Ask for only those they were familiar above, i.e., where 5.1=1] And now focusing on those programs with which you are familiar, have you used or considered using the [Express Efficiency/SBSPC/LNSPC/Auditing] Program(s) to sell products or to enhance your business? (Have you used the program, considered it but not used, or have not considered using the program)

	Used it=1	Considere	Not	
		d, but not	Considered	
		used=2	=3	
6.2.a Express				If $=2$ or 1, ask
Efficiency				6.2.a.1
6.2.b SBSPC Program				If $=2$ or 1, ask
				6.2.b.1
6.2.c LNSPC Program				If $=2$ or 1, ask
				6.2.c.1
6.2.d Energy audits				If $=2$ or 1, ask
				6.2.d.1

the program[s]? [accept multiples] Trade Organization	6.3	For [the/those] programs of which you are familiar, from whom did you first hear about
Trade Organization	the p	rogram[s]? [accept multiples]
Business colleague 2 [Utility] Representative 3 Mail advertisement 4 Equipment Distributor 5 [read only if needed] Other: 6 6 6.4 Now, I'd like to know how much of an effect you think the [se] Program[s] [has/have] had in some specific areas. On a scale from 1 to 5, where 1 means little effect at all and 5 means a major effect, do you think the program[s] [has/have] a) Increased your sales of high-efficiency equipment		
[Utility] Representative		
Mail advertisement		
Equipment Distributor		- • • •
[read only if needed] Other:		
Now, I'd like to know how much of an effect you think the [se] Program [s] [has/have] had in some specific areas. On a scale from 1 to 5, where 1 means little effect at all and 5 means a major effect, do you think the program [s] [has/have] a) Increased your sales of high-efficiency equipment		
in some specific areas. On a scale from 1 to 5, where 1 means little effect at all and 5 means a major effect, do you think the program[s] [has/have] a) Increased your sales of high-efficiency equipment		[read only if needed] Other 0
in some specific areas. On a scale from 1 to 5, where 1 means little effect at all and 5 means a major effect, do you think the program[s] [has/have] a) Increased your sales of high-efficiency equipment	6.4	Now, I'd like to know how much of an effect you think the [sel Program[s] [has/have] had
means a major effect, do you think the program[s] [has/have] a) Increased your sales of high-efficiency equipment		
a) Increased your sales of high-efficiency equipment		
b) Improved your opinion of the quality & performance of high-efficiency equipment		
high-efficiency equipment		
6.5 [Ask only if 5.1.d.=1] In the past 2 years, has your firm obtained any business installing energy saving measures for customers based on recommendations they received from an energy audit? [IF NEEDED, PROVIDE EXAMPLES, E.G., SET-BACK THERMOSTATS & HVAC MAINTENANCE, VSDs] Yes		
energy saving measures for customers based on recommendations they received from an energy audit? [IF NEEDED, PROVIDE EXAMPLES, E.G., SET-BACK THERMOSTATS & HVAC MAINTENANCE, VSDs] Yes		nign-efficiency equipment
energy saving measures for customers based on recommendations they received from an energy audit? [IF NEEDED, PROVIDE EXAMPLES, E.G., SET-BACK THERMOSTATS & HVAC MAINTENANCE, VSDs] Yes	6.5	[Ask only if 5.1 d -1]. In the past 2 years, has your firm obtained any business installing
energy audit? [IF NEEDED, PROVIDE EXAMPLES, E.G., SET-BACK THERMOSTATS & HVAC MAINTENANCE, VSDs] Yes	0.5	
THERMOSTATS & HVAC MAINTENANCE, VSDs] Yes		er e
Yes		
No		,
DK		
7.1 Does your firm use the World Wide Web (the Web) for business purposes? Yes		
7.1 Does your firm use the World Wide Web (the Web) for business purposes? Yes		DK3
Yes	EE V	Vebsite Section
Yes	7 1	Decrees fine and the West Wile Web (the Web) for hereinger
No	7.1	· · · · · · · · · · · · · · · · · · ·
7.2 How much does your firm use the Web to facilitate your business? Would you say your usage is Non existent		
usage is Non existent		No2
usage is Non existent	7.2	How much does your firm use the Web to facilitate your business? Would you say your
Non existent	1.2	
Minimal		
Moderate3		
Extensive4		
		Extensive4
7.3 What types of sites or information do you usually seek out when using the Web for	7.3	What types of sites or information do you usually seek out when using the Web for
business? (e.g., manufacturers, competitor, customer, or utility sites, energy efficiency		· · · · · · · · · · · · · · · · · · ·
information.)		

7.4	Energy Eff PROMPT A efficiency i vendor info	s conversation, were you aware that [Utility] website has a section ficiency? IF NEEDED: The website is the place where [Utility] puts rebate program information. It provides product information, articles, arormation as well. [If in PG&E territory] (PG&E's website is called its located at www.smarterenergy.com)	e and energy
		s	
7.4	Yes	our business look at the energy efficiency section of [Utility's] we s	
7.4	useful? Yes No	think the information about the programs, efficient equipment, as	nd vendors is
7.4	.4 Is there	e any other information you would like to see on [Utility] website	relating to

Wrap Up

energy efficiency?

8.1 Finally, how do you think energy efficiency programs could be improved to more effectively promote the specification and use of high-efficiency equipment? [open-end]

Thank you very much for your assistance in this important project [END]

A.8 SUPPLY SIDE SURVEYS: HVAC DISTRIBUTORS

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SMALL BUSINESS SPC MARKET EFFECTS STUDY IN-DEPTH INTERVIEW GUIDE COMMERCIAL HVAC DISTRIBUTORS

Name	Title	Phone
Company		Fax
company		
Street Address		email
City, State, ZIP		Interviewer
D&B Sales		Call dates
D&B Employees		Complete Date

Lead-in

Hello, my name is _____ and I am calling on behalf of [Utility]. We are contacting HVAC distributors as part of a study of the commercial HVAC market.

May I speak with the individual who is in charge of your commercial HVAC business?

IF THE CONTACT IS NOT AVAILABLE, ASK FOR NAME AND BEST TIME TO CALL BACK. ONCE CONTACT IS ON THE LINE, REPEAT LEAD IN IF NECESSARY, THEN:

We would like to ask you a few questions about trends in your experience selling HVAC equipment and your perceptions of changes in the market. The whole interview should take about 15 minutes. Please be assured that the information you provide in the interview will remain confidential with XENERGY. We will not identify or attribute any of your comments or company information

[SCREENING QUESTIONS]

S.1 Does your company ...

Manufacture commercial packaged AC units	1
Install commercial packaged AC units	
Distribute commercial air-cooled packaged AC units	. 3
Design commercial HVAC systems	. 4

IF S.1 = 1 or 4, TERMINATE SURVEY.

IF S.1 = 2, THEN USE CONTRACTOR SURVEY.

IF S.1 = 3, CONTINUE.

S.2	Are you a wholesale distributor that sells primarily to contractors and installers, a retailer that sells primarily to end users, or do you do both? Exclusively Retail
IF S.2	= 1, THEN TERMINATE
S.3	Does your company do more than \$500,000 in wholesale commercial packaged AC unit business a year at this location? [IF RELUCTANT TO RESPOND TO THIS SCREEN ASK IF THEY SELL >100 PACKAGE UNITS A YEAR] Yes
	= 1 OR 3, THEN PROCEED = NO, TERMINATE SURVEY
Firmo	ographics section
1.1	Which of the following best describes your commercial HVAC distribution business (0= No, 1= Yes) Manufacturer representative
1.2	And does your firm do a quarter or more of your HVAC business with small and medium-sized commercial customers [defined as customers who have less than 100 full-time equivalent employees or <100,000 sq.ft.]? Yes
1.4	Approximately how many years has your company been in business? ENTER NUMBER OF YEARS
1.5	About how many full time equivalent workers of all types do you employ at this location? ENTER NUMBER OF FTEs

1.6	And approximately what were the total sales of all products and services
	for your company in 1999 at this location?
	Actual Total
[If rel	uctant or refuses, ask which range they would fall in.]
_	< \$1 million 1
	\$1 - 4.9 million
	\$5 - 49.9 million
	>\$50 million
	Don't know/Proprietary5
	2 0.1 V y
1.7	About what percentage of your company's total sales at this location came from products
	or services related to commercial packaged units?
	ENTER PERCENTAGE%
	DON'T KNOW
1.8	In addition to commercial packaged air-cooled AC units which of the following products
1.0	does your company sell? [O= does not sell, 1= does sell]
	a1) Water-cooled air conditioners
	a2) Evaporative air conditioners
	b) Gas packs (gas powered AC/heat unit) [supposed to be removed, but was left
	in]
	d) VSDs (variable speed drive controllers)
	e) Programmable thermostats
	f) Other
	1) Other
1.9	In 1999, what was the approximate percentage of number of air-cooled
1.)	package AC unit sales in each of the following four size categories?
	a) <= 5 ton
	b) 6 - 12 ton%
	c) 13 - 20 ton%
	d) > 20 ton% total should add to 100 %
	total should add to100_%
N	we would like to cake a counter of amosticing about the about suigities of the monket way
	we would like to ask a couple of questions about the characteristics of the market you
serve	at this location.
0.1.7	1
	rough percentages so that they add to 100%, what percent of commercial packaged units
	ould you say you sell to each of the following (percentage of # of units not sales \$)
[T	otals should add to 100%]
	a) Contractors%
	b) End Users (direct sales)%
	c) Other distributors%
	d) Retail (e.g., Home Depot)%
	total should add to%

2.2	Please tell me roughly what percent of your packaged units are commercial packaged units sold in terms of [Totals should add to 100%] a) Planned replacement of existing units
	total should add to100_%
[IF UI	NABLE TO ANSWER 2.2 ABOVE, ASK 2.2.1, OTHERWISE GO TO 2.3]
	2.2.1 How about the breakdown of sales of commercial packaged units in terms of new versus existing? [Totals should add to 100%] a) New units
Now v	we would like to ask a couple of questions about the market for commercial packaged nits
2.3	What types of changes in the commercial packaged AC market do you anticipate over the next three years, if any?
2.4	With respect to the efficiency of units, we're trying to get a sense of what "high efficiency" means in the market right now. If a customer asked for a high efficiency 15-ton commercial packaged air-cooled air conditioner, what would be the <u>EER</u> of the unit you would recommend? How about if they asked for a high-efficiency 5-ton unit, what would be the <u>SEER</u> of the unit you would recommend? ENTER EFFICIENCY OF 15-TON UNIT EER = ENTER EFFICIENCY OF 5-TON UNIT SEER =
you k packa	emainder of the survey focuses on equipment for existing buildings to the extent that now that information. Also, I am going to read some efficiency levels for commercial aged AC units, for the remainder of the survey, when I say 'high-efficiency' these are effinitions I'll be referring to Table 1: Survey Definitions for High Efficiency Air-Cooled AC Units

2.5	Do you actively promote or market high-efficiency commercial packaged units as defined earlier (in existing buildings)? [refer to Table 1 as needed]				
	Yes				
2.6	In terms of maintaining your firm's competitive position, how important is offering high-efficiency commercial packaged units? Would you say Very important				
2.7	what percent of all your jobs in existing buildings do you recommend or specify high- efficiency commercial packaged units instead of or as an option to standard efficiency units for existing buildings? [refer to Table 1 as needed] ENTER PERCENTAGE				
2.8	And, in general, how difficult or easy is it to sell a high efficiency package unit compared to a standard one? Would you say it is [refer to Table 1 as needed] Much more difficult				
	would like to ask some questions about your sales and stocking of commercial ged AC units				
2.9	Which of the following (air-cooled) high-efficiency commercial packaged units do you currently stock in quantities sufficient to ensure timely delivery? [ENTER 1 FOR STOCKED AND 0 FOR NOT STOCKED] a) <5 ton with 11.0 SEER or higher				
IF NO	HE UNITS STOCKED IN ANY GROUP, ASK 2.9.1, ELSE ASK 2.10				
2.9.1	What are the main reasons you do not stock high-efficiency units? [open-end, SKIP to BC.1]				

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2.10	How has your stock of high-efficiency air-cooled commercial packaged units (as defined
	above) changed over the past three years? Would you say it has

Significantly increased	1
Somewhat increased	2
Stayed about the same	3
Somewhat decreased	
Significantly decreased	5

2.15 What percentage of your sales of air-cooled commercial packaged units in each of the following size category were high-efficiency units in 1999?... [CONFIRM % H.E. PLUS % STANDARD = 100% WITHIN EACH SIZE GROUP]

a)	<5 ton with 11.0 SEER or higher a	%
	6 -12 ton with 10.3 EER or higherb	
c)	13 - 20 ton with 9.7 EER or higher c	%
	>20 ton with 9.5 EER or higher	

Barriers / Perceptions Section

Now we would like to ask a few questions about issues associated with specifying high efficiency equipment

3.1 In general, what are the obstacles to increasing customer demand for installing high-efficiency systems and controls? [open end]

[GENERAL MODULE FOR PROGRAMS]

Now we would like to ask you a few questions regarding programs offering incentives and rebates to customers and service providers in order to increase the use and installation of energy efficient equipment.

Energy Efficiency Programs

6.1 Are you familiar with the following programs to promote high-efficiency equipment... (How about...) [CODE DON"T KNOW AS 0=NO]

	Yes=1	No=0
6.1.a Express Efficiency		
6.1.b Small Business Standard Performance		
Contracting (SBSPC) Program		
6.1.c Large Nonresidential Standard Performance		
Contracting (LNSPC) Program		
6.1.d [Utility] energy audits for small and		
medium sized businesses?		

IF NO TO ALL GO TO 7.1

6.2 [Ask for only those they were familiar above, i.e,. where 5.1=1] And now focusing on those programs with which you are familiar, have you used or considered using the [Express Efficiency/SBSPC/LNSPC/Auditing] Program to sell products or to enhance your business? (Have you used the program, considered but not used, or have not considered using the program)

	Used it=1	Considered,	Not	
		but not	Considered	
		used=2	=3	
6.2.a Express				If $=2$ or 1,
Efficiency				ask 6.2.a.1
6.2.b SBSPC Program				If $=2$ or 1,
				ask 6.2.b.1
6.2.c LNSPC Program				If $=2$ or 1,
				ask 6.2.c.1
6.2.d Energy audits				If $=2$ or 1,
				ask 6.2.d.1

6.3 the pro	For [the/those] programs of which you are familiar, from whom did you first hear about ogram[s]? [accept multiples] Trade Organization
	[read only if needed] Other:6
6.4	Now, I'd like to know how much of an effect you think the [se] Program [s] [has/have] had in some specific areas. On a scale from 1 to 5, where 1 means little effect at all and 5 means a major effect, do you think the program [s] [has/have] a) Increased your sales of high-efficiency equipment b) Improved your opinion of the quality & performance of high-efficiency equipment
6.5	[Ask only if 5.1.d.=1] In the past 2 years, has your firm obtained any business installing energy saving measures for customers based on recommendations they received from an energy audit? [IF NEEDED, PROVIDE EXAMPLES, E.G., SET-BACK THERMOSTATS & HVAC MAINTENANCE, VSDs] Yes
EE W	ebsite Section
7.1	Does your firm use the World Wide Web (the Web) for business purposes? Yes
7.2	How much does your firm use the Web to facilitate your business? Would you say your usage is Non existent
7.3	What types of sites or information do you usually seek out when using the Web for business? (e.g., manufacturers, competitor, customer, or utility sites, energy efficiency information.)

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7.4	Prior to this conversation, were you aware that [Utility] website has a section addressing Energy Efficiency? PROMPT IF NEEDED: The website is the place where [Utility] puts rebate and energy efficiency program information. It provides product information, articles, and some vendor information as well. [If in PG&E territory] (PG&E's website is called Smarter
	energy and is located at www.smarterenergy.com) Yes
7.4	1.2 Does your business look at the energy efficiency section of [Utility's] website? Yes

7.4.3 Do you think the information about the programs, efficient equipment, and vendors is useful?

Yes	. 1
No	
Can't remember/don't know	

7.4.4 Is there any other information you would like to see on [Utility] website relating to energy efficiency?

Wrap Up

8.1 Finally, do you have any concluding thoughts on how you think energy efficiency programs could be improved to more effectively promote the specification and use of high-efficiency equipment? [open-end]

Thank you very much for your assistance in this important project [END]