Process Evaluation of SDG&E's 2006–2008 Non-Residential Energy Efficiency Programs Volume III of III: Data Collection Resources



Prepared for: San Diego Gas & Electric Company

Prepared by: KEMA, Inc.

and our subcontractors:

Opinion Dynamics Corporation Equipoise Consulting Energy Market Innovations Wirtshafter & Associates ECO Northwest

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1. SDGE 3004: Codes and Standards Program (C&S)

Table 1-1 Final Research List

Final Research List							
Target for Data Collection	Data collection mode	Timing of data collection	Key Research Issues	Sample Size	Number of Data points	From where did you get the sample?	
Program Managers	In-depth interview	July / August	Determine level of understanding about the program.	2	2	List of program managers provided by SDG&E	
Contractors	In-depth interview	October	Satisfaction with program, program effectiveness	6	5	Program Manager	
Stakeholders	In-depth interview	October	Satisfaction with program, program effectiveness	4	4	Program Manager	



1.1 In-depth Interview Guide: C&S Contractors

- 1. Can you describe your role with the CASE studies?
- 2. How do you coordinate with the utilities on the CASE studies?
- 3. How are the CASE study issues chosen? How is this process working? How can this be improved?
- 4. Get detailed information on the CASE study process, what goes on during study period, how are results used at the end and who do they report their results to?
- 5. What data reporting activities do you engage in, and how often? Ask for any reports, presentations, and memos that present findings or recommendations from CASE studies discussed.
- 6. How did you interact with stakeholders? What stakeholder groups? Are there other people we should talk to that were involved in these CASE studies? Do you feel that there was sufficient stakeholder involvement? (ask for contacts for EACH study they are involved in.)
- 7. What challenges, if any, do/did you face during the CASE study process (i.e., technical problems or issues with stakeholders)?
- 8. How do/did you work with the utilities, if at all, to resolve these issues?
- 9. What could SDG&E and SCG do to better support you through the code revision process? Get specific detail on their interaction with SDG&E/SCG if they work almost exclusively with SCE or PG&E on joint CASE studies, then note this.
- 10. Conversely, is there anything that your team might be able to do to better support the utilities?
- 11. Do you have any other suggestions on how SCG and SDG&E can create a more successful Codes and Standards program?
- 12. What is the role of the CEC in this process, how do you interact with them?
- 13. Do you feel that the CEC considers your input carefully? What can be done to improve this? Has the CEC ever overridden your recommendations?
- 14. Is there anything else you can recommend that might need to be changed in the CASE study process?
- 15. Are there other people we should talk to that were involved in these CASE studies? (ask for contacts for EACH study they are involved in.)
- 16. Which CASE studies have led to code revisions so far (or will)?

Be sure to ask them if you can call back if you have additional questions.



1.2 In-depth Interview Guide: C&S Stakeholders

- 1. How or why did you get involved with this CASE study/code revision process?
- 2. Can you describe your role with the CASE studies?
- 3. Who did you coordinate with on the CASE studies? How did you coordinate with them meetings, reports, phone conversations?
- 4. What guidance did you provide (and to whom)?
- 5. How was the advice received and did it affect the final outcome of the CASE studies?
- 6. What other stakeholders are involved? How do you coordinate with them?
- 7. What is the role of the CEC in this process, how do you interact with them?
- 8. What challenges, if any, do/did you face during the CASE study process (i.e., technical problems or issues with other stakeholders)?
- 9. How were these issues resolved?
- 10. What could the utilities or the engineers conducting the CASE studies do to better to work with you during code revision process? Get specific detail on their interaction with SDG&E/SCG if they work almost exclusively with SCE or PG&E on joint CASE studies, then note this.
- 11. Conversely, do you see any ways that people involved in the industry like you might be able to better support the code revision process?
- 12. Do you feel that there is sufficient stakeholder involvement in the CASE study/code revision process in general?
- 13. Is there anything else you can recommend that might need to be changed in the CASE study process?
- 14. Are there other people we should talk to that were involved? (ask for contacts for EACH study they are involved in.)

Be sure to ask them if you can call back if you have additional questions.





2. SDGE 3010: Energy Savings Bid Program (ESB)

Table 2-1 Final Research List

Final Research List						
Target for Data Collection	Data collection mode	Timing of data collection	Key Research Issues	Sample Size	Number of Data points	From where did you get the sample?
ESB Program Manager	In-depth interview	September	Identify participating vendors, experience with vendors, TEC component, program tracking, experience with AEs, targeted market segments, marketing approach, staffing	1	1-Jan	
EESP Project Sponsors	In-depth interview	October- November	Reasons for participating, how found out about program, satisfaction with program and SDG&E, target customers/enduses, likelihood to participate in future, suggestions for improvement/new ideas.	16	12-13	Program tracking spreadsheet
Customer Project Sponsors	In-depth interview		Reasons for participating, how found out about program, why self-sponsor, would they self-sponsor again, pros/cons of self-sponsoring, would they participate again through an EESP, satisfaction with program and SDG&E, suggestions for improvement/new ideas.	12	8	Program tracking spreadsheet
CCSE	In-depth interview	January	TEC component of program, issues specific to municipalities & government agencies, issues with TECs, satisfaction with program and SDG&E, suggestions for improvement/new ideas.	1	1	Program Manager
M&V contractors	In-depth interview	January	Measurement and verification issues: Methods, timing, procedures, reasons for delays, etc.	3	2	Program Manager
Customers participating through EESP	In-depth interview	September- January	Reasons for participating, how found out about program, how chose EESP, satisfaction w/ EESP, would they consider self-sponsoring (large customers only), likelihood of participating again, satisfaction with program and SDG&E, suggestions for improvement/new ideas.	~300	16	Customers identified in tracking spreadsheet; specific contacts from project sponsors



2.1 In-depth Interview Guide: ESB Program Manager

- 1. You sent a list of service providers involved in the ESB program. You identified six primary contractors [AC Energy Systems, American Lighting, American Power Solutions, Newmatic Engineering, PECI, Siemens Building Technologies], three participants whose participation you were trying to expand [Alpha Mechanical, National Resource Management, Pacific Rim Mechanical] and three newcomers [Agilsys, NORESCO, VMWare] that you were grooming to become active participants. Reviewing the program tracking materials [file Reporting 6-29-07.xls], we identified a few more, and were wondering if you could clarify their status:
 - Amtech Lighting Services (2 projects)
 - KJ Kammerer & Associates (2)
 - Tetra Tech EMI (1)
 - The Irvine Company (1)
 - Ecos Consulting (?—on project list w/ no project description)
 - Enovity, Inc. (?—on project list w/ no project description)

Why didn't they make your earlier list?

- 2. I would like to understand better the LEAP and tax-exempt customer components of the program.
 - Describe LEAP
 - Describe TEC
 - How do the two relate to each other? Do they duplicate, e.g. for municipalities?
 - SDREO is a sponsor for some projects. Do they sponsor all LEAP project or can LEAP projects be sponsored by other service providers?
 - Is there someone we could talk to at SDREO?
- 3. About program data:

We received the spreadsheet Reporting 6-29-07.xls that has a description of the sites and customers included under each project, with the project sponsor and contact information.

We also received a hard copy of a Monthly Report that includes for each project net and gross kWh, kW, therms, incentive amounts and the name of the M&V provider. We have a separate shorter list of installed projects.

We would like to consolidate this information.

- Were these data extracted from one larger database?
- Who can we talk to about data extracts?
- Can we at least get the monthly report in electronic format?
- How is project status tracked?
- I would not expect you to have contact information for the end-customers participating through a service provider. Is that correct? Will we have to get contacts at the project sites from the project sponsors?
- 4. Also relating to the tracking material you sent, the spreadsheet Reporting 6-29-07.xls had a field called Payment Group, with a letter A-G. Can you tell me what those codes mean?



- 5. We understand the program is being marketed through account executives, and that you haven't had as much success with this as you'd like.
 - Could you elaborate on any difficulties you've had?
 - How many participants have you gotten through this marketing channel?
 - Do you think that we should interview any account executives? Can you provide contact information?
- 6. What market segments, if any, are you specifically targeting?
 - Business or organization types (besides TEC and LEAP)?
 - Specific end-uses? (Kathleen mentioned air compressors)
 - Are there any segments that you would like to address that aren't currently being served (or are underserved)
 - How do you identify and prioritize market segments?
- 7. How is the program marketed to service providers? How do you identify contractors addressing underserved market segments?
- 8. Are there any upcoming events/workshops that it might be useful for us to attend as part of the evaluation?
- 9. Are there any steps in the implementation process that would be helpful for us to learn onsite?
- 10. Could you provide contact information for the program's M&V providers?
- 11. Could you describe your staffing for the program? Are there any additional staff we should interview?
- 12. Could you provide us with your most recent monthly report?
- 13. Reminders for information requests
 - SDREO contact information
 - M&V contact information
 - Most recent monthly report (electronically, if possible)
 - Account executive contact info
 - Upcoming event information



2.2 In-depth Interview Guide: California Center for Sustainable Energy (CCSE)

Note that CCSE sponsors project for:

- City of Escondido
- City of Lemon Grove
- City of Vista
- County Ramona
- County of San Diego
- Natural History Museum
- Rueben H. Fleet Science Center
- San Diego Unified Port District
- San Elijo Joint Power Authority

Hello, this is Carrie Webber, calling from KEMA. May I please speak with [Contact Name]?

On behalf of San Diego Gas & Electric, I'd like to talk to you today about SDG&E's Energy Savings Bid Program. Jerry Humphrey gave us your name as the person to talk to about the Tax Exempt Company component of the ESB program. Is that correct?

The interview will take about 20 minutes. Is this a good time or can I schedule a time to call back in the next few days?

I'd like to start with some questions about the TEC so I can get a better sense of what the TEC does.

- 1. What role does the TEC play in the ESB program?
- 2. How does the TEC component work? (CCSE as project sponsor, some cities/schools self-sponsor, some through 3rd party, do they all get benefits?)
- 3. What additional benefits and services are available to TEC participants?
- 4. How are the elements of the ESB program and TEC component administered between SDG&E and CCSE?
- 5. It is my understanding from Jerry that the TEC component covers K-12 schools, municipalities and the military. Is that correct? Are there other types of organizations that it covers?
- 6. What about counties?
- 7. What about tax-exempt institutions—museums?
- 8. Nonprofits?
- 9. How do you market the ESB program to these organizations?



- 10. How do you approach these organizations about participating in the ESB program? (What is your marketing approach)
- 11. What are some of the things that make it easier to get tax-exempt organizations to participate in the ESB program?
- 12. What are some of the challenges of getting tax-exempt organizations to participate in the ESB program? What is the biggest obstacle?
- 13. Why do you think that these types of organizations, in particular, need additional help in completing energy efficiency projects? (bureaucracy, budgets, timelines, staffing)
- 14. How does the ESB program address those issues?
- 15. Are there any changes you would like to see SDG&E make to the ESB program?
- 16. How would you characterize you interactions with Jerry Humphrey, the program manager? What are the positives and negatives of working with Jerry?
- 17. How would you characterize your interactions with Kathleen Polangco, his assistant? What are the positives and negatives of working with Kathleen?

That's all of my questions. Thank you for your time. If I have any follow-up questions, may I contact you by email?



2.3 In-depth Interview Guide: ESB EESP-Sponsored Participants

Customer name	
Site name	
Site address	
Contact name	
Contact phone	
Contact email	
Sponsor name(s)	
Measure description	
Account Executive Name	
Date	

Hello, this is Carrie Webber, calling from KEMA. May I please speak with [Contact Name]?

On behalf of San Diego Gas & Electric, I am calling to ask a few questions about your company's participation in the Energy Savings Bid, or ESB, Program. You were listed as the primary contact for your company on the application.

My questions will cover your participation and satisfaction with the ESB program. The interview will take about 20 minutes. Is this a good time or can I schedule a time to call back in the next few days?

First, I would like to confirm: Are you an SDG&E customer that had equipment installed using financial incentives from the Energy Savings Bid Program? [AS OPPOSED TO A CONTRACTOR OR OTHER SERVICE PROVIDER]

[IF NO, EXPLAIN THAT WE ARE ONLY INTERESTED IN TALKING TO THE END CUSTOMER AT THIS TIME. ASK FOR CUSTOMER CONTACT INFORMATION. GET EMAIL ADDRESS FOR FOLLOW-UP]

Participation in ESB Program

- 1. How did you first hear about the Energy Savings Bid Program?
- 2. What motivated your company to participate in the ESB program?
- 3. How would you describe your experience with the Energy Savings Bid program?
- 4. What types of issues or concerns did you face in participating in the program (budget, approvals, priorities, timelines)? Which of these issues were the biggest obstacles to participation?
- 5. Did the ideas for the energy efficiency projects come before or after learning about the ESB program?
- 6. Would you have done the project without the assistance of the ESB program? Why or why not?



7. Now I have some questions about [the service provider]:
Did [service provider] approach you about the ESB program or did you approach them?

Customers that Were Approached to Participate

- 8. Had you previously heard about the Energy Savings Bid Program?
- 9. Were you familiar with [service provider] before they approached you?
- 10. How did they contact you?
- 11. How did they describe the ESB program? What was their marketing pitch?
- 12. What was your reaction?
- 13. Did you contact SDG&E to check out the ESB program? To check out the service provider?

For Companies that Approached the Service Provider

- 14. How long had you or your company known about the ESB program before deciding to participate?
- 15. How well defined was the project scope before you approached the service provider?
- 16. How did you identify the service provider?

Satisfaction with EESP

- 17. Did [Service Provider] do the work themselves or was there another contractor involved?
- 18. In general terms, what were the financial arrangements with the service provider? Did you have to pay any money up front? How much (what percent) of the cost of the project did you bear?
- 19. On a scale of 1 to 5, where 1 is very dissatisfied and 5 is very satisfied, how would you rate [Service Provider] for their performance overall?
- 20. On the same scale, how satisfied were you with [service providers'] responsiveness, for example in returning phone calls or addressing complaints?
- 21. How satisfied were you how clean they left the worksite during the job?
- 22. On the same scale, how satisfied were you with the quality of the finished work?
- 23. How satisfied were you with the time needed to complete the job?



Customers that have participated through more than one EESP

Genomics Institute of the Novartis	Newmatic, Siemens
Research Foundation	
Omni Hotel	American Lighting Supply, American
	Power Solutions (both lighting)
University of California San Diego	American Lighting Supply, American
	Power Solutions (both lighting)

- 24. We noticed that you have participated through different third-party service providers. Which did you work with first? For what kind of project?
- 25. How satisfied were you with them?
- 26. Why did you choose a different provider the next time?

Satisfaction with Program Elements

- 27. What parts of the ESB program were you most pleased with?
- 28. What parts of the ESB program were the most challenging?
- 29. Are there any downsides to participating in the ESB program?
- 30. On a scale of 1 to 5 where 1 is very difficult and 5 is very easy, How difficult or easy was it to participate in the ESB program?
- 31. Did you have any contact with SDG&E's program staff, Jerry Humphrey or Kathleen Polangco, during the project? How would you characterize those interactions? What are the positives and negatives of working with [Jerry or Kathleen]?
- 32. Does your organization have an account executive with SDG&E? Did you have any contact with him or her in connection with this project? How would you characterize your interaction with the account executive?
- 33. Did you have any contact with the San Diego Regional Energy Office or the California Center for Sustainable Energy [THESE ARE THE SAME ORGANIZATION; ONLY THE NAME HAS CHANGED] in relation to your participation in the Energy Savings Bid Program? How would you characterize you interaction with them?
- 34. The Energy Savings Bid Program requires pre- and post-inspections and that measurement and verification be conducted for all participating sites. Do you recall these visits?
- 35. On a scale of 1 to 5, where 1 is very bothersome and 5 is not bothersome at all, how much of a bother was the process of scheduling these inspection visits?
- 36. On the same scale, how much of a bother were the visits themselves?
- 37. What did you think of the staff people who conducted these inspections?



Future Participation/Suggestions for Changes

- 38. Would you participate again with the same service provider? For what types of projects?
- 39. Would you participate again through a different service provider? For what types of projects?
- 40. [For large customers] Would you participate again independently, handling the program paperwork yourself? For what types of projects?
- 41. Are there any changes that you would like to see made to the program?

That's all of my questions. Thank you for your time. If I have any follow-up questions, may I contact you by email?



2.4 In-depth Interview Guide: ESB EESP Project Sponsors

EESP Name	
Contact Name	
Contact phone	
Contact email	
Types of projects	
Types of customers	
How many projects?	
How many sites?	

Hello, this is Carrie Webber, calling from KEMA. May I please speak with [Contact Name]?

On behalf of San Diego Gas & Electric, I am calling to ask a few questions about your company's participation in the Energy Savings Bid, or ESB, Program. You were listed as the primary contact for your company on the application.

My questions will cover your involvement in and satisfaction with the ESB program. The interview will take about 20 minutes. Is this a good time or can I schedule a time to call back in the next few days?

Participation in ESB Program

- 1. How did you first hear about the ESB program?
- 2. What motivated your company to participate in the ESB program?
- 3. What types of issues or concerns did you have in deciding to participate in the program?
- 4. When did you first apply to the ESB program?
- 5. How would you describe your experience with the ESB program?
- 6. What parts of the ESB program have you been most pleased with?
- 7. What parts of the ESB program have been the most challenging?
- 8. Are there any downsides to participating in the ESB program?

Identifying/Creating Projects and Recruiting Sites

- 9. Do you approach customers to participate in ESB projects or do they contact you to participate?
- 10. How do you identify sites to include in an ESB project?
- 11. Do you target a specific type of business or organization for ESB projects? What types?
- 12. How do you approach the sites about participating in the ESB program? (What is your marketing approach)



- 13. Comparing site that have chosen to participate with those that declined, what seem to be the factors—characteristics of the project or of the customer—that influence the decision to participate?
- 14. What percentage of contacts that you approach about the ESB program end up participating? (If applicable compare to other programs/no programs)
- 15. Could you describe, in general terms, the financial arrangements with sites participating in the ESB program?

Is the agreement the same for all sites?

How much of the costs does the site bear?

How much up front?

16. What types of projects do you do? (Probe especially for EESPs with high #s of "other" and not specified: KJ Kammerer, PECI, Siemens, National Resource Management, Pacific Rim Mechanical, Tetra Tech)

Satisfaction with program elements

17. On a scale of 1 to 5 where 1 is not at all satisfied and 5 is extremely satisfied, how would you rate the following for the ESB Program:

Application submission and approval process Why?

Reporting requirements

Why?

Timeliness of SDG&E's pre- and post- inspections Why?

Other aspects of SDG&E's pre- and post- inspections (people, process) Why?

Payment schedule (60% upon installation, 40% upon verification, etc) Why?

Timeliness of measurement and verification process Why?

Other aspects of measurement and verification process Why?

- 18. How would you characterize your interactions with Jerry Humphrey, the program manager? What are the positives and negatives of working with Jerry?
- 19. Have you had any interactions with Kathleen Polangco, his assistant? [IF YES] How would you characterize your interactions with her? What are the positives and negatives of working with Kathleen?



20. Have you had any contact with SDG&E's account executives? [IF YES] How would you characterize your experiences with them?

Future Participation/Suggestions for Changes

- 21. Do you plan to participate in the program in the future? Why or why not?
- 22. Are there any changes you would like to see made to the program?

Participation in other SDG&E Programs

- 23. Have you participated in other SDG&E programs? Which ones?
- 24. Do you plan to participate in these programs in the future? Why or why not?

That's all of my questions. Thank you for your time. If I have any follow-up questions, may I contact you by email?



2.5 In-depth Interview Guide: ESB Self-Sponsored Participants

Customer name	
Site name	
Site address	
Contact name	
Contact phone	
Contact email	
Measure description	
Date	

Hello, this is Carrie Webber, calling from KEMA. May I please speak with [Contact Name]?

On behalf of San Diego Gas & Electric, I am calling to ask a few questions about your company's participation in the Energy Savings Bid, or ESB, Program. You were listed as the primary contact for your company on the application.

My questions will cover your participation and satisfaction with the ESB program. The interview will take about 20 minutes. Is this a good time or can I schedule a time to call back in the next few days?

Participation in ESB Program

- 1. How did you first hear about the ESB program?
- 2. How long had you known about the ESB program before deciding to participate?
- 3. What motivated your company to participate in the ESB program?
- 4. How would you describe your experience with the Energy Savings Bid program?
- 5. What types of issues or concerns did you face in participating in the program (budget, approvals, priorities, timelines)? Which of these issues were the biggest obstacles to participation?
- 6. Did the ideas for the energy efficiency projects come before or after learning about the ESB program?
- 7. How did you formulate the project for the ESB program?
- 8. What types of project or projects did you do?
- 9. Would you have done the project without the assistance of the ESB program? Why or why not?
- 10. Did you use a contractor, engineering firm or other service provider to complete the ESB project?



Self-Sponsoring Participants that Also Participated Through an EESP

City of Escondido	SDREO, self
County of San Diego	SDREO, self
Kaiser Permanente	Self, American Lighting Supply
USMC - Camp Pendleton	Self, Amtech Lighting Service
Sharp Grossmont Hospital	Self, American Power Solutions
Vista Unified School District	Self (2004), KJ Kammerer

11. We noticed that you have participated in the ESB program both independently and through a third-party service provider.

Which did you do first?

Why did you take the other approach for the second project?

- 12. How did you identify the service provider, or did they identify you?
- 13. How was you experience with [service provider]?
- 14. Would you use the same service provider again? For what types of projects?
- 15. Would you participate in the ESB program again through a different service provider? For what types of projects?
- 16. Would you participate in the ESB program again as project sponsor? For what types of projects?

Self-Sponsoring Participants that Have NOT Participated Through an EESP

17. Were you aware that you can participate in the program through an intermediary, a service provider that will do the work, handle the administrative details of program participation, and collect the incentive payment from SDG&E?

If yes: Why did you choose to participate directly rather than through a third party?

If no: Based on your experience with the program, if you were to do it over again would you choose direct participation or going through a third party?

Satisfaction with Program Elements

- 18. What parts of the ESB program have you been most pleased with?
- 19. What parts of the ESB program have been the most challenging?
- 20. Are there any downsides to participating in the ESB program?



21. On a scale of 1 to 5 where 1 is not at all satisfied and 5 is extremely satisfied, how would you rate the following for the ESB Program:

```
Application submission and approval process Why?
```

```
Timeliness of SDG&E's pre- and post- inspections Why?
```

```
Other aspects of SDG&E's pre- and post- inspections (people, process) Why?
```

Payment schedule (60% upon installation, 40% upon verification, etc) Why?

Timeliness of measurement and verification process Why?

Other aspects of measurement and verification process Why?

- 22. How would you characterize your interactions with Jerry Humphrey, the program manager? What are the positives and negatives of working with Jerry?
- 23. Have you had any interactions with Kathleen Polangco, his assistant? [IF YES] How would you characterize your interactions with her? What are the positives and negatives of working with Kathleen?
- 24. Have you had any contact with SDG&E's account executives? [IF YES] How would you characterize your experiences with them?

Future Participation/Suggestions for Changes

- 25. Do you plan to participate in the program in the future? Why or why not? Participating directly or through a third party?
- 26. Are there any changes you would like to see made to the program?

That's all of my questions. Thank you for your time. If I have any follow-up questions, may I contact you by email?





3. SDGE 3011: Emerging Technologies Program

Table 3-1 Final Research List

Final Research List						
Target for Data Collection	Data collection mode	Timing of data collection	Key Research Issues	Sample Size	Number of Data points	From where did you get the sample?
Program Managers	In-depth interview	Aug / Sept	Determine level of understanding about the program. What criteria are used to find technologies and customers used for ET assessments?		2	List of program managers provided by SDG&E
Other EE Program Managers (Express, SBSS, SPC)	In-depth interview	January	How do other program interact with the ETP, what information do they need?	2	2	List of program managers provided by SDG&E





4. SDGE 3012: Express Efficiency Rebate Program

Table 4-1 Final Research List

Final Research List						
Target for Data Collection	Data collection mode	Timing of data collection	Key Research Issues	Sample Size	Number of Data points	From where did you get the sample?
Program Managers	In-depth interview	June - August	Understand how program is operating, key challenges, successes, areas for research	2	2	Identified from initial meetings
Trade Professionals Forum	On-site observation	August	Observe how program responds to contractor feedback and hear areas for improvement	Approximat ely 75 attendees	55-60 were contractors, remainder were SDGE	not applicable
Vendors/contractors/m arket actors	In-depth interview	December - January	Contractor satisfaction / suggestions for improvement. Find out marketing strategies employed	560	10	Received list from Hector
Participant customers	CATI Interview	December - January	Satisfaction with program, motivating factors. Program awareness	266	54	Received list from Hector



4.1 **CATI Interview Guide: Express Participants**

Date	11/26/07
Utility	SoCalGas and SDG&E
Program Name	Express Efficiency Program
Target	100 (SoCalGas), 53 (SDG&E)
Sample Size	2,200 (SoCalGas), 250 (SDG&E)
Quotas (if applicable)	At least 10 food service participants (SDG&E)
Sample File Name	SDGE_EXP_Particip_Sample
	SCG _EXP_Particip_Sample
Contractor Name	KEMA
Primary Contact (person	Betty Seto
who should be contacted	
with any questionnaire	
questions)	
Phone	510-891-0446
Email	Betty.seto@kema.com

A. INTRODUCTION

_, calling from Opinion Dynamics, an independent research firm. Can I please speak to [CONTACT NAME]? We are conducting research on behalf of [UTILITY] to help them develop programs to better serve their business customers. We are doing a follow-up study about your organization's participation in the Express Efficiency Program. The Express Efficiency Program is a rebate program to help customers add or retrofit existing equipment with high-efficiency equipment.

Are you the person who handled the application for the Express Efficiency Program? (IF NOT, ASK TO SPEAK WITH THE PERSON WHO DID. IF NEEDED, SUGGEST THE BUSINESS MANAGER/OWNER, FACILITY MANAGER OR BUILDING OPERATOR)

- 1. Yes (CONTINUE WITH CORRECT CONTACT) [ADD DISPOSITION CODE FOR CORRECT CONTACT IS NO LONGER AVAILABLE] [ADD DISPOSITION CODE FOR NO ONE THERE REMEMBERS ANYTHING BEING DONE]
- A1. According to our records, your organization installed new [PROJECT_DESC FROM DATABASE] [in INSTAL_DT IN DATABASE] through the Express Efficiency Program. Is that correct?
 - 1. Yes
 - 2. No.
 - 3. (Don't know/Refused) [THANK AND TERMINATE]

[ASK IF Q.A1=2] A1a. What did you install? [OPEN END]



B. PROGRAM AWARENESS

I would like to start with some questions about your program participation.

B1. How did your organization first learn about the Express Efficiency program? (DO NOT READ) [ACCEPT MULTIPLES]

- 1 Energy Audit Program
- 2 Respondent approached contractor/ESCO/A&E firm/other 3rd party
- 3 Respondent approached utility concerning another matter and learned about the program
- 4 Informed by [UTILITY] account executive
- 5 Informed by [UTILITY] commercial or industrial service technician
- 6 Informed by contractor/ESCO/A&E firm/other 3rd party
- Utility brochure in mail 7
- 8 Bill insert
- Word-of-mouth from friend or co-workers
- 10 Television, radio, newspaper ad
- 11 Magazine or trade journal
- 12 Participation in previous years
- 13 Manufacturer information/suggestion
- 14 Community organization such as Chamber of Commerce
- 15 Respondent called their utility to complain about their electric or gas bill
- 16 Energy Resource Center (ERC) or Customer Technology Assessment Center (CTAC)
- 17 Seminar or Training Class sponsored by Utility
- 18 Seminar or Training Class NOT sponsored by Utility
- 19 [UTILITY] website
- 20 (Other, specify)
- 98 (Don't know/Refused)

B2. What motivated your organization to participate in the Express Efficiency program? (DO NOT READ) [ACCEPT MULTIPLES]

- 1. Acquiring the latest technology
- 2. Saving money on energy bills
- 3. To use less energy
- 4. Obtaining a rebate
- 5. Replacing old or broken equipment
- 6. Because the program was sponsored by a utility
- 7. Helping protect the environment
- 8. Previous experience with other utility programs
- 9. Recommended by utility account executive
- 10. recommended by utility service technician
- 11. Recommended by contractors
- 12. Participation in previous years
- 13. Part of broader facility remodeling/renovation
- 14. (Other, specify)
- 98. (Don't know/Refused)



C. ROLE OF CONTRACTORS

Now I have some questions about working with contractors and vendors.

- C1. Did your organization work with a vendor or contractor for any of the measures rebated through the 2006-2008 Express Efficiency program?
 - 1. Yes
 - 2. No [SKIP TO SECTION D]
 - 3. (Other, specify.....) [SKIP TO SECTION D]
 - 98. (Don't know/Refused) [SKIP TO SECTION D]
- C2. Had your organization worked with this vendor or contractor before participating in the 2006-2008 Express Efficiency program?
 - 1. Yes
 - 2. No
 - 3. (Don't know/Refused)
- C3. How unimportant or important was the input from the vendor or contractor in deciding which specific equipment to install?
 - 1. Very unimportant
 - 2. Somewhat unimportant
 - 3. Neither unimportant or important
 - 4. Somewhat important
 - 5. Very important
 - 6. (Don't know/Refused)
- C4. How dissatisfied or satisfied was your organization with the vendor or contractor?
 - 1. Very dissatisfied
 - 2. Somewhat dissatisfied
 - 3. Neither dissatisfied nor satisfied
 - 4. Somewhat satisfied
 - 5. Very satisfied
 - 6. (Don't know/Refused)

[ASK IF C4 = 1 or 2]

C5. Why do you say this? Anything else? [OPEN END]

D. PARTICIPATION EXPERIENCE

Now I'd like to ask you a few questions about participating in the Express Efficiency program.

- D1. Are you aware that the Express Efficiency program allows you to reserve rebate funds before purchasing and installing equipment, to ensure funding availability? (IF NEEDED: CUSTOMERS CAN RESERVE REBATE FUNDS BEFORE EQUIPMENT IS PURCHASED AND/OR INSTALLED).
 - 1. Yes
 - 2. No [SKIP TO D5]
 - 3. (Don't know/Refused) [SKIP TO D5]



- D2. Was a reservation made for funds for a rebate on your equipment?
 - 1. Yes
 - 2. No [SKIP TO D5]
 - 3. (Don't know/Refused) [SKIP TO D5]
- D3. Who reserved the rebate funds? [ALLOW MULTIPLE]
 - 1. Me/my organization
 - 2. My vendor or contractor
 - 3. (Other, specify)
 - 98. (Don't know/Refused)
- D4. How dissatisfied or satisfied was your organization with the process for reserving rebate funds for the program?
 - 1. Very dissatisfied
 - 2. Somewhat dissatisfied
 - 3. Neither dissatisfied nor satisfied
 - 4. Somewhat satisfied
 - 5. Very satisfied
 - 6. (Don't know/Refused)

[ASK IF D4 = 1 or 2]

D4a. Why do you say this? Anything else? [OPEN END]

- D5. From where did you get the Express Efficiency application for a rebate. Was it from . . .[ALLOW MULTIPLE RESPONSES]
 - 1. A vendor or contractor
 - 2. The [UTILITY]'s website
 - 3. From a representative of [UTILITY] (specify Account Rep, Service Tech, other)
 - 4. Somewhere else? (specify)
 - 98. (Don't know/Refused)
- D6. Who submitted the application for a rebate from the Express Efficiency program? [ALLOW MULTIPLE]
 - 1. Me/my organization
 - 2. My vendor or contractor
 - 3. (Other, specify)
 - 98. (Don't know/Refused)



[ASK IF D6 = 1]

D7. Using a five-point scale, with 1 meaning "very difficult" and 5 meaning "very easy", how difficult or easy was it to submit the completed application and necessary documentation?

- 1. [very difficult]
- 2. ..
- 3. ..
- 4. ..
- 5. very easy].
- 6. (Don't know/Refused)

[ASK IF D7 = 1 or 2]

D7a. Why do you say this? Anything else? [OPEN END]

D8. Did [UTILITY] contact you because your application was missing information or documentation?

- 1. Yes
- 2. No [SKIP TO E1]
- 3. (Don't know/Refused) [SKIP TO E1]

D9. Did [UTILITY] send back the application and documentation that you initially submitted for you to add the missing information and resubmit the complete package?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

D10. Using a five-point scale, with 1 meaning "very difficult" and 5 meaning "very easy", how difficult or easy was it to submit the additional materials as requested?

- 1. [very difficult]
- 2. ..
- 3. ..
- 4. ..
- 5. very easy].
- 6. (Don't know/Refused)

[ASK IF
$$D10 = 1 \text{ or } 2$$
]

D10a. Why do you say this? Anything else? [OPEN END]



E. SATISFACTION

- E1. Was the rebate payment issued to your organization or to a vendor or contractor?
 - 1. My organization
 - 2. vendor, contractor
 - 3. (Other, specify)
 - 98. (Don't know/Refused)
- E2. How dissatisfied or satisfied was your organization with the rebate amount?
 - 1. Very dissatisfied
 - 2. Somewhat dissatisfied
 - 3. Neither dissatisfied nor satisfied
 - 4. Somewhat satisfied
 - 5. Very satisfied
 - 6. (Don't know/Refused)

[ASK IF E2 = 1 or 2]

E2a. Why do you say this? Anything else? [OPEN END]

- E3. How dissatisfied or satisfied was your organization with the amount of time it took to get the rebate payment after you submitted the application?
 - 1. Very dissatisfied
 - 2. Somewhat dissatisfied
 - 3. Neither dissatisfied nor satisfied
 - 4. Somewhat satisfied
 - 5. Very satisfied
 - 6. (Don't know/Refused)

[ASK IF E3 = 1 or 2]

E3a. Why do you say this? Anything else? [OPEN END]

E4.How dissatisfied or satisfied has your organization been with the overall 2006- 2008 Express Efficiency program experience?

- 1. Very dissatisfied
- 2. Somewhat dissatisfied
- 3. Neither dissatisfied nor satisfied
- 4. Somewhat satisfied
- 5. Very satisfied
- 6. (Don't know/Refused)

[ASK IF E4 = 1 or 2]

E4a. Why do you say this? Anything else? [OPEN END]



EP. PROGRAM EFFECTS

Now I want to ask questions about your organization's satisfaction with the energy efficiency improvements and your decision to go forward with them.

EP1. How dissatisfied or satisfied has your organization been with the equipment they purchased under this program? (READ OPTIONS)

- 1. Very dissatisfied
- 2. Somewhat dissatisfied
- 3. Neither dissatisfied nor satisfied
- 4. Somewhat satisfied
- 5. Very satisfied
- 6. (Don't know/Refused)

[ASK IF EP1 = 1 or 2]

EP2. Why do you say this? Anything else? [OPEN END]

EP3. Would your organization consider installing similar energy efficiency improvements in the future in this or other facilities?

- 1. Yes
- 2. No.
- 3. (Don't know/Refused)

EP4. Would your organization consider installing similar improvements in the future without assistance from [UTILITY]'s Express Efficiency program?

- 1. Yes
- 2. No.
- 3. (Don't know/Refused)

EP5. Before your organization installed these improvements, had your organization installed any similar improvements at this or any other facilities without receiving rebates like those from Express Efficiency?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[SKIP IF EP5 = 2 or 3]

EP6. What type of improvements? [OPEN END]

EP7. Did the ideas for the [MSR_DESC] project come . . . (READ except for Don't Know, CODE ONE)

- 1. BEFORE learning about the Express program?
- 2. About the SAME TIME as learning about the Express program?
- 3. Or AFTER learning about the Express program?
- 4. (Don't know/Refused)



EP8. How unlikely or likely would your organization have been to implement the efficiency improvements without a rebate from the Express Efficiency program?

- 1. Very unlikely
- 2. Somewhat unlikely
- 3. Neither unlikely nor likely
- 4. Somewhat likely
- 5. Very likely
- 6. (Don't know/Refused)

EP9. Without the program's assistance, how different might the timing have been for these improvements? Would your organization have undertaken them ... (READ CHOICES)

- 1. At the same time
- 2. Earlier
- 3. Later
- 4. (Don't know/Refused)

EP10. Besides the Express Efficiency rebate program, are you aware of OTHER programs or resources currently offered by [UTILITY] to promote energy efficiency for businesses like yours?

- 1. Yes
- 2. No [SKIP TO NEXT SECTION, ROLE OF UTILITY STAFF]
- 3. (Don't know/Refused) [SKIP TO NEXT SECTION, ROLE OF UTILITY STAFF]

[SKIP IF EP10 = 2 or 3]

EP11. What types of programs are you aware of? [ACCEPT MULTIPLES] (AFTER EACH RESPONSE, PROMPT WITH "Any others?")

- 1. (Standard Performance Contract program)
- 2. (Local Business Energy Efficiency program)
- 3. (Small Business Super Saver)
- 4. (Energy Savings Bid)
- 5. (On-Bill Financing)
- 6. (Energy audits)
- 7. (Other unspecified rebate programs)
- 00. (Other, Specify)
- 98. (Don't know/Refused) [SKIP TO NEXT SECTION, ROLE OF UTILITY STAFF]

[SKIP IF EP10 = 2 or 3]

EP12. Has your organization participated in any of these other programs?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)



[SKIP IF EP12 = 2 or 3]

EP13. Which ones has your organization participated in?

- 1. (Standard Performance Contract program)
- 2. (Local Business Energy Efficiency program)
- 3. (Small Business Super Saver)
- 4. (Energy Savings Bid)
- 5. (On-Bill Financing)
- 6. (Energy audits)
- 7. (Other unspecified rebate programs)
- 00. (Other, Specify)
- 98. (Don't know/Refused)



US. ROLE OF UTILITY STAFF

- US1. Have you had any interactions with an account executive from [UTILITY] in the past year?
 - 1. Yes
 - 2. No [[IF UTILITY=SOCALGAS, SKIP TO US4, ELSE SKIP TO DCI SECTION]
 - 3. (Not sure what an account executive is) [IF UTILITY=SOCALGAS, SKIP TO US4, ELSE SKIP TO DCI SECTION]
 - 4. (Don't know/refused) [[IF UTILITY=SOCALGAS, SKIP TO US4, ELSE SKIP TO DCI SECTION]
- US2. In general, how many times a year do you interact with an account executive from [UTILITY]?
 - 1. Never
 - 2. 1-2 times a year
 - 3. 3-5 times a year
 - 4. Less than once per month (about once every 2 months or 6 times a year)
 - 5. At least once every month or more often
 - 6. (Other, Specify)
 - 98. (Don't know/Refused)

[SKIP IF US2 = 5 or 98]

US3. Did the account executive mention the [UTILITY] Express Efficiency rebate program to you?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[If [UTILITY = SDG&E, SKIP TO DCI SECTION]

[ASK IF, [UTILITY = SOCALGAS]]

US4. Have you had any interactions with a commercial or industrial service technician from The Gas Company in the past year? (IF NEEDED) The Gas Company service technicians assist customers with technical problems related to commercial or industrial equipment.

- 1. Yes
- 2. No [SKIP TO DCI SECTION]
- 3. (Not sure what a service technician is) [SKIP TO DCI SECTION]
- 4. (Don't know/Refused) [SKIP TO DCI SECTION]

US5. In general, how many times a year do you interact with a service technician from The Gas Company?

- 1. At least once every month or more often
- 2. Less than once per month (about once every 2 months or 6 times a year)
- 3. 3-5 times a year
- 4. 1-2 times a year
- 5. Never
- 6. (Other, Specify)
- 98. (Don't know/Refused)



US6. Has any service technician mentioned the The Gas Company Express Efficiency rebate program to you? .

- 1. Yes
- 2. No
- 3. (Don't know/Refused

Delivery Channel Innovation Questions (DCI)

[ASK ABOUT 4 OF THESE – A, D, G, & H OR B, E, K, & L OR C, F, I, & J]

DC1. I'm going to ask you about several ways in which you might have seen or heard about information on energy efficiency. Have you ever... (1=Yes, 2=No, 3=(Don't know/Refused)) [ROTATE – B THRU L]

- A. Visited [The Gas Company's/San Diego Gas and Electric's] website?

 A2.[IF A=1] Did you see anything on the website about energy efficiency opportunities?
- B. Received information from [The Gas Company/San Diego Gas and Electric] through the mail, such as a bill insert or newsletter with information about energy efficiency opportunities?
- C. Received an email from [The Gas Company/San Diego Gas and Electric] utility regarding energy efficiency information?
- D. Attended an event, such as a business forum or trade meeting, where information about energy efficiency was distributed?
- E. Seen advertisements in a newspaper or trade journal regarding energy efficiency?
- F. Heard about energy efficiency opportunities by television or radio specifically for Flex Your Power?
- G. Learned about energy efficiency efforts from a contractor or vendor?
- H. Been contacted in person by [The Gas Company/San Diego Gas and Electric], (such as by an Account Executive or Commercial Service Technician) about energy efficiency opportunities?
- I. Called [The Gas Company/San Diego Gas and Electric] and had someone inform you about energy efficiency opportunities?
- J. Heard about energy efficiency opportunities from your local government or from a non-profit organization in your community?
- K. Attended a training seminar provided by [The Gas Company/San Diego Gas and Electric]
- L. Performed an Internet search for energy efficiency information and/or programs?

[IF YES TO DC1A2=1, or B=1, or C=1]

DC2a. On a scale of 1 to 5 where 1 is not at all useful and 5 is very useful, how useful did you find the information provided by [Southern California Gas/San Diego Gas and Electric] [through email, through the mail, on its website]?

- 1. Not at all useful
- 2. Somewhat un-useful
- 3. Neither useful nor un-useful
- 4. Somewhat useful
- 5. Very useful
- 6. (Don't know/Refused)

[SKIP IF DC2=5,6]

DC3. What would have made this information more useful? [OPEN END]



DC4. Based on all of the things that you can think of, what is the best way to provide you with information about energy efficiency opportunities? [OPEN END, MULTIPLE RESPONSES – ALLOW UP TO 5 RESPONSES]

- 1. (Gas or electric utility website)
- 2. (Information from utility received through the mail, such as a bill insert or newsletter)
- 3. (An email from gas or electric utility)
- 4. (An event, such as a business forum or trade meeting)
- 5. (Advertisements in a newspaper or trade journal)
- 6. (Television or radio advertisements specifically for Flex Your Power)
- 7. (Other television or radio advertisements)
- 8. (A contractor)
- 9. (A representative of the gas or electric utility—didn't mention Account Representative)
- 10. (Specifically mentioned Account Executive or Account Representative)
- 11. (A local government or non-profit agency in the community)
- 00. (Other, specify)
- 98. (Don't know/Refused)

Education and Training [SoCalGas Participants Only]

ET1. Have any of your facility's employees attended a training seminar at the Gas Company's Energy Resource Center (ERC)? (The ERC is the Southern California Gas Company's training facility in Downey, California.)

- 1. Yes
- 2. No
- 3. (Don't know)

[IF ET1=1]

ET2. On a scale of 1 to 5 where 1 is not at all influential and 5 is very influential, how influential was the seminar to your decision to participate in this program?

ET3. Apart from participating in the program that we've been discussing, has your facility made any other energy efficiency improvements – such as replacing equipment or changing processes or maintenance practices – as a result of attending a seminar at the Energy Resource Center?

- 1. Yes
- 2. No
- 3. (Don't know)

ET4. What changes have you made as a result of attending the seminar at the Energy Resources Center? (OPEN END)



F. FIRMOGRAPHICS

Okay, last of all, I have some questions about your facility and your organization.

- F1. Does your organization lease or own your facility?
 - 1. Lease
 - 2. Own
 - 3. (Other, specify)
 - 4. (Don't know)
- F2. Would you describe your business as... (Probe as necessary for number of people or square footage and record best guess)
 - 1. A small business
 - 2. A medium-sized business
 - 3. A large business
 - 4. (Don't know/refused)

F3a. What is the approximate TOTAL square footage of your facility at this location (IF NEEDED, [SITE_ADDR1])?

- 1. Less than 1,500 sq ft
- 2. 1,500 4,999 sq ft
- 3. 5,000 9,999 sq ft
- 4. 10,000 24,999 sq ft
- 5. 25,000 49,999 sq ft
- 6. 50,000 74,999 sq ft
- 7. 75,000 99,999 sq ft
- 8. Over 100,000 sq ft
- 9. (Don't know/Refused)

F3b. What is the approximate percentage of your square footage that is AIR-CONDITIONED?

- 1. 0%
- 2. 1-50%
- 3. 51-99%
- 4. 100%
- 5. (Don't know/Refused)

F4a. Is your business in one location, or do you have multiple locations?

- 1. One location
- 2. Multiple locations
- 3. (Don't know/refused)

F4b. Is your business in its own building, or are you located in a building with multiple businesses?

- 1. Own building
- 2. Multiple businesses in building
- 3. (Don't know/refused)



- F5. Do you have anyone devoted full-time as a building engineer or facility manager?
 - 1. Yes
 - 2. No
 - 00. (Other, specify)
 - 98. (Don't know/Refused)
- F6. Would you say that your [IF SoCalGas: gas/IF SDG&E: gas and electric] costs represent a . . . (READ LIST)
 - 1. Very small
 - 2. Small
 - 3. Medium
 - 4. Large, or
 - 5. Very large part of your operating costs each month?
 - 6. (Don't know/refused)
- F7. On average, how many hours a day is your facility in use?
 - 1. Less than 8 hours
 - 2. 8 to 11 hours
 - 3. 12 to 15 hours
 - 4. 16 to 23 hours
 - 5. 24 hours
 - 6. (Don't know/refused)
- F8. Is there a language other than English spoken at your organization?
 - 1. Yes
 - 2. No
 - 3. (Don't know/Refused)

[SKIP IF F8 = 2 or 99]

- F9. What languages other than English are spoken at your organization?
 - 1. Spanish
 - 2. Chinese
 - 3. Korean
 - 4. Vietnamese
 - 5. Japanese
 - 6. Hindi
 - 00. (Other, Specify)
 - 98. (Don't know/Refused)

Your responses will remain confidential, but may I get/confirm your name and title in case I need to call you back? (RECORD NAME AND TITLE, REFUSED=WOULD NOT GIVE NAME AND/OR TITLE)

Great. These are all the questions I have for you today. Thanks very much for your time.



4.2 In-depth Interview Guide: Express Contractors

Hello, my name is	calling on behalf of ECONorthwest, an energy research firm based
	go Gas and Electric (SDG&E) has asked us to help them better understand the
	features and their Express Efficiency Rebate Program. Could I speak to
	or could I speak to the person at your familiar with the Express program?
[WHEN CORRECT PERS	ON IS ON-LINE:
Name:	
Company:	
–	
Title:	
Phone:	
Hello, my name is	and I'm calling on behalf of ECONorthwest, an energy research firm
based in Portland, OR. Sar	Diego Gas and Electric (SDG&E) has asked us to help them better understand
the market for energy-sav	ing features and their Express Efficiency Rebate Program. We are talking to
contractors to understand t	heir experience in relation to the Express Efficiency Rebate Program. Is this a
good time to talk about the	program?

I. INTRODUCTION AND BUSINESS SCOPE

- 1. How did you first hear about the Express Efficiency Rebate Program?
- 2. When did you first participate in the program?
- 3. Approximately how many installations under the Express Program have you done in the past year?
- 4. What percent of your jobs each year are done through the Express program?
- 5. What is the primary equipment that you install through the Express Program?
- 6. Do you also do projects through the Small Business Super Saver program (SBSS)? What percentage of your business goes to SBSS and what goes to Express?
- 7. Are you aware of SDG&E's On-Bill Financing program? Do you promote the On-Bill Financing program to your customers?

II. PROGRAM PARTICIPATION

8. How do you promote EE equipment to your customers, what benefits do you emphasize?



- 9. Do you market the Express program directly to your customers? What do you tell them?
- 10. What are the challenges of getting customers to participate in the Express program?
- 11. How do you overcome these challenges?
- 12. How can the Express program change to help address these issues?
- 13. Are there certain types of businesses that are more likely to participate in the program? Why?
- 14. Are there certain types of businesses that are less likely to participate in the program? Why?
- 15. Is there equipment that you think should be added to the Express program that is not currently eligible?

III. PROGRAM PROCESS

- 16. Do you have the XX handbook? Do you think this provides contractors adequate information about the program? Any suggestions for improvement?
- 17. Have you had any issues with the paperwork that needs to be filed for the program (rebate application)? Any suggestions for improvement?
- 18. How about the rebate application process, any issues? How long does it take on average for SDG&E to process the rebates?
- 19. Have you had any issues with the reservation system? Any suggestions for improvement?
- 20. How about the rebate application process, any issues? How long does it take on average for SDG&E to process the rebates?

IV. SATISFACTION

- 21. Overall, how satisfied are you with the Express program?
- 22. Any areas of dissatisfaction?
- 23. What is the most valuable aspect of the program to you?
- 24. How can the program be improved?
- 25. Who do you talk to at SDG&E about the program? Any issues?
- 26. Any final comments on the Express program?



Onsite Data Collection Form: Trade Professionals Forum 4.3

UTILITY/PROGRAM:	
Event Title:	
Event Description:	
Location:	
Date and Time:	
Total Participants and/or Approximate	
Number of People at the Overall Event	
(for events, also include description of the	
percentage or number that came into contact	
with the program, e.g., 1000 people at	
event, 10% touched)	
Did You Get Lists of Attendees or People	☐ Yes
Touched by the Event:	☐ No, but list is available contact
	☐ No list available
Utility or 3P Contact Name(s) and	
Title/Company:	
Contact Info/Phone:	
Instructor Name and Title/Company, if	
applicable:	
Instructor Info/Phone	

I. Description of The Target Market (e.g., who attended, market segment or business type, job titles)

Text here on who attended, market segment or business type, job titles. For larger events, if you have any indication of the percentage of the market segment or business type, include that here.

II. Description of the Education Approach or How They Educate The Target Market

Text here on how they educate

III. Observations on the Applicability of this Approach for the Target Market, and the Value of this Approach (refer to actual observations or comments from participants if possible)

Text here on "why this approach" and whether it is a good approach, with supporting observations

IV. Description of All Materials or Information Used During the Event (e.g., brochures, booths, presentations, handouts etc.)



List all materials or hard copy information used:

Type of Material	Description of Material Content	Number Handed Out or Used	Was This Material "Taken Away" by Participants?	ODC Received Copy or Picture
			_	

V. Description of the Specific Concepts Taught to the Target Market

Text here on what energy saving actions they emphasized

VIa. Did they Promote Any Utility or Other 3P Programs (and if so, which ones and to whom)

VIb. Did they Promote Any Other Parts of Their Own Program (e.g., outreach event promoting one-on-one counseling or a hotline or website) (and if so, what and to whom)

VII. If Event Was At Customer Facility, Describe Actual Energy Saving Actions That Were Implemented at Time of Observation

VIII. Observations Made By "Participants" (include comments made during events and comments you might gather in your interactions after the event)

- **IX.** Observations Made by Instructors or Implementers (include comments made during events and comments you might gather in your interactions after the event)
- **X.** Recommendations for Improvements to Approach (please indicate whether these are recommendations made specifically by the target market, or recommendations from the evaluator based on observations.)
- **XI.** Other Comments Specific To This Event



4.4 Frequency Tables for Express Efficiency Program Participant Survey

Utility	SDG&E
Program Name	Express Efficiency Program
Target	65 (SDG&E
Sample Size	250 (SDG&E)

B. PROGRAM AWARENESS

B1. How did your organization first learn about the Express Efficiency program? (DO NOT READ) [ACCEPT MULTIPLES]

	SDG&E
TOTAL ANSWERING	54
Energy Audit Program	2%
Respondent approached contractor/ESCO/A&E firm/other 3rd party	28%
Respondent approached utility concerning another matter and learned about the	4%
program	
Informed by [UTILITY] account executive	20%
Informed by [UTILITY] commercial or industrial service technician	6%
Informed by contractor/ESCO/A&E firm/other 3rd party	11%
Utility brochure in mail	7%
Bill insert	-
Word-of-mouth from friend or co-workers	4%
Television, radio, newspaper ad	-
Magazine or trade journal	
Participation in previous years	2%
Manufacturer information/suggestion	
Community organization such as Chamber of Commerce	-
Respondent called their utility to complain about their electric or gas bill	2%
Energy Resource Center (ERC) or Customer Technology Assessment Center	
(CTAC)	
Seminar or Training Class sponsored by Utility	
Seminar or Training Class NOT sponsored by Utility	
[UTILITY] website	4%
(Other, specify)	9%
(Don't know/Refused)	



B2. What motivated your organization to participate in the Express Efficiency program? (DO NOT READ) [ACCEPT MULTIPLES]

	SDG&E
TOTAL ANSWERING	54
Acquiring the latest technology	11%
Saving money on energy bills	78%
To use less energy	43%
Obtaining a rebate	28%
Replacing old or broken equipment	22%
Because the program was sponsored by a utility	-
Helping protect the environment	7%
Previous experience with other utility programs	2%
Recommended by utility account executive	-
Recommended by utility service technician	-
Participation in previous years	2%
Part of broader facility remodeling/renovation	-
Other, specify)	2%
(Don't know/Refused)	-



C. ROLE OF CONTRACTORS

Now I have some questions about working with contractors and vendors.

C1. Did your organization work with a vendor or contractor for any of the measures rebated through the 2006-2008 Express Efficiency program?

	SDG&E
TOTAL ANSWERING	54
Yes	76%
No	17%
Other	-
Don't know/Refused	7%

C2. Had your organization worked with this vendor or contractor before participating in the 2006-2008 Express Efficiency program?

	SDG&E
TOTAL ANSWERING	41
Yes	44%
No	54%
Don't know/Refused	2%

C3. How unimportant or important was the input from the vendor or contractor in deciding which specific equipment to install?

	SDG&E
TOTAL ANSWERING	41
Very unimportant	10%
Somewhat unimportant	-
(neither important or	2%
unimportant	
Somewhat important	15%
Very important	68%
Don't know/Refused	5%

C4. How dissatisfied or satisfied was your organization with the vendor or contractor?

	SDG&E
TOTAL ANSWERING	41
Very dissatisfied	2%
Somewhat dissatisfied	2%



Neither satisfied nor dissatisfied	2%
Somewhat satisfied	17%
Very satisfied	68%
Don't know/Refused	7%

[ASK IF C4 = 1 or 2] C5. Why do you say this? Anything else? [OPEN END]



D. PARTICIPATION EXPERIENCE

Now I'd like to ask you a few questions about participating in the Express Efficiency program.

D1. Are you aware that the Express Efficiency program allows you to reserve rebate funds before purchasing and installing equipment, to ensure funding availability? (IF NEEDED: CUSTOMERS CAN RESERVE REBATE FUNDS BEFORE EQUIPMENT IS PURCHASED AND/OR INSTALLED).

	SDG&E
TOTAL ANSWERING	54
Yes	43%
No	56%
Don't know/Refused	2%

D2. Was a reservation made for funds for a rebate on your equipment?

	SDG&E
TOTAL ANSWERING	23
Yes	57%
No	39%
Don't know/Refused	4%

D3. Who reserved the rebate funds? [ALLOW MULTIPLE]

	SDG&E
TOTAL ANSWERING	13
Me/my organization	38%
My vendor/contractor	46%
Other	23%

D4. How dissatisfied or satisfied was your organization with the process for reserving rebate funds for the program?

	SDG&E
TOTAL ANSWERING	13
Very dissatisfied	1
Somewhat dissatisfied	1
Neither satisfied nor	15%
dissatisfied	
Somewhat satisfied	23%
Very satisfied	62%
Don't know/Refused	-



[ASK IF D4 = 1 or 2]

D4a. Why do you say this? Anything else? [OPEN END]

D5. From where did you get the Express Efficiency application for a rebate. Was it from . . .[ALLOW MULTIPLE RESPONSES]

	SDG&E
TOTAL ANSWERING	54
A vendor or contractor	56%
The utility's website	19%
From a representative	15%
Somewhere else	7%
Don't know/refused	4%

D6. Who submitted the application for a rebate from the Express Efficiency program? [ALLOW MULTIPLE]

	SDG&E
TOTAL ANSWERING	54
Me/My organization	44%
My vendor or contractor	48%
Other, Specify	6%
Don't know/Refused	7%

[ASK IF D6 = 1]

D7. Using a five-point scale, with 1 meaning "very difficult" and 5 meaning "very easy", how difficult or easy was it to submit the completed application and necessary documentation?

	SDG&E
TOTAL ANSWERING	24
Very difficult	-
Somewhat difficult	-
(neither easy or difficult	25%
Somewhat easy	17%
Very easy	50%
Don't know/Refused	8%
MEAN	4.27

[ASK IF D7 = 1 or 2]

D7a. Why do you say this? Anything else? [OPEN END]



D8. Did [UTILITY] contact you because your application was missing information or documentation?

	SDG&E
TOTAL ANSWERING	54
Yes	13%
No	81%
Don't know/Refused	6%

D9. Did [UTILITY] send back the application and documentation that you initially submitted for you to add the missing information and resubmit the complete package?

	SDG&E
TOTAL ANSWERING	7
Yes	71%
No	14%
Don't know/Refused	14%

D10. Using a five-point scale, with 1 meaning "very difficult" and 5 meaning "very easy", how difficult or easy was it to submit the additional materials as requested?

	SDG&E
TOTAL ANSWERING	7
Very difficult	-
Somewhat difficult	14%
(neither easy or	-
difficult	
Somewhat easy	14%
Very easy	71%
Don't know/Refused	-
MEAN	4.43

[ASK IF D10 = 1 or 2]

D10a. Why do you say this? Anything else? [OPEN END]



E. SATISFACTION

E1. Was the rebate payment issued to your organization or to a vendor or contractor?

	SDG&E
TOTAL ANSWERING	54
Me/My organization	48%
Vendor or contractor	45%
Other, Specify	7%
Don't know/Refused	9%

E2. How dissatisfied or satisfied was your organization with the rebate amount?

	SDG&E
TOTAL ANSWERING	54
Very dissatisfied	2%
Somewhat dissatisfied	2%
neither satisfied nor	6%
dissatisfied	
Somewhat satisfied	22%
Very satisfied	46%
Don't know/Refused	22%

[ASK IF E2 = 1 or 2]

E2a. Why do you say this? Anything else? [OPEN END]

E3. How dissatisfied or satisfied was your organization with the amount of time it took to get the rebate payment after you submitted the application?

	SDG&E
TOTAL ANSWERING	54
Very dissatisfied	6%
Somewhat dissatisfied	-
neither satisfied nor	6%
dissatisfied	
Somewhat satisfied	15%
Very satisfied	44%
Don't know/Refused	30%

[ASK IF E3 = 1 or 2]

E3a. Why do you say this? Anything else? [OPEN END]



E4.How dissatisfied or satisfied has your organization been with the overall 2006- 2008 Express Efficiency program experience?

	SDG&E
TOTAL ANSWERING	54
Very dissatisfied	4%
Somewhat dissatisfied	2%
neither satisfied nor	6%
dissatisfied	
Somewhat satisfied	20%
Very satisfied	65%
Don't know/Refused	4%

[ASK IF E4 = 1 or 2] E4a. Why do you say this? Anything else? [OPEN END]



EP. PROGRAM EFFECTS

Now I want to ask questions about your organization's satisfaction with the energy efficiency improvements and your decision to go forward with them.

EP1. How dissatisfied or satisfied has your organization been with the equipment they purchased under this program? (READ OPTIONS)

	SDG&E
TOTAL ANSWERING	54
Very dissatisfied	7%
Somewhat dissatisfied	2%
Neither satisfied nor	-
dissatisfied	
Somewhat satisfied	13%
Very satisfied	74%
Don't know/Refused	4%

[ASK IF EP1 = 1 or 2]

EP2. Why do you say this? Anything else? [OPEN END]

EP3. Would your organization consider installing similar energy efficiency improvements in the future in this or other facilities?

	SDG&E
TOTAL ANSWERING	54
Yes	89%
No	4%
Don't know/Refused	7%

EP4. Would your organization consider installing similar improvements in the future without assistance from [UTILITY]'s Express Efficiency program?

	SDG&E
TOTAL ANSWERING	54
Yes	44%
No	41%
Don't know/Refused	15%



EP5. Before your organization installed these improvements, had your organization installed any similar improvements at this or any other facilities without receiving rebates like those from Express Efficiency?

	SDG&E
TOTAL ANSWERING	54
Yes	33%
No	59%
Don't know/Refused	7%

[SKIP IF EP5 = 2 or 3]

EP6. What type of improvements? [OPEN END]

EP7. Did the ideas for the [MSR_DESC] project come . . . (READ except for Don't Know, CODE ONE)

	SDG&E
TOTAL ANSWERING	54
BEFORE learning	30%
about the Express	
program?	
About the SAME	35%
TIME as learning about	
the Express program?	
Or AFTER learning	28%
about the Express	
program?	
(Don't know/Refused)	7%

EP8. How unlikely or likely would your organization have been to implement the efficiency improvements without a rebate from the Express Efficiency program? (DO NOT READ)

	SDG&E
TOTAL ANSWERING	54
Very unlikely	15%
Somewhat unlikely	44%
neither likely nor	13%
unlikely	
Somewhat likely	15%
Very likely	9%
Don't know/Refused	4%



EP9. Without the program's assistance, how different might the timing have been for these improvements? Would your organization have undertaken them ... (READ CHOICES)

	SDG&E
TOTAL ANSWERING	54
At the same time	15%
Earlier	15%
Later	59%
Don't know/Refused	11%

EP10. Besides the Express Efficiency rebate program, are you aware of OTHER programs or resources currently offered by [UTILITY] to promote energy efficiency for businesses like yours?

	SDG&E
TOTAL ANSWERING	54
Yes	41%
No	56%
Don't know/Refused	4%

[SKIP IF EP10 = 2 or 3]

EP11. What types of programs are you aware of? [ACCEPT MULTIPLES] (AFTER EACH RESPONSE, PROMPT WITH "Any others?")

	SDG&E
TOTAL ANSWERING	22
(Standard Performance	18%
Contract program)	
(Local Business Energy	18%
Efficiency program)	
(Small Business Super	18%
Saver)	
(Energy Savings Bid)	27%
(On-Bill Financing)	5%
(Energy audits)	5%
(Other unspecified	32%
rebate programs)	
(Other, Specify)	5%
(Don't know/Refused	23%



[SKIP IF EP10 = 2 or 3]

EP12. Has your organization participated in any of these other programs?

	SDG&E
TOTAL ANSWERING	17
Yes	59%
No	41%
Don't know/Refused	-

[SKIP IF EP12 = 2 or 3]

EP13. Which ones has your organization participated in?

	SDG&E
TOTAL ANSWERING	10
(Standard Performance	20%
Contract program)	
(Local Business Energy	_
Efficiency program)	
(Small Business Super	20%
Saver)	
(Energy Savings Bid)	10%
(On-Bill Financing)	-
(Energy audits)	-
(Other unspecified	30%
rebate programs)	
(Other, Specify)	-
(Don't know/Refused	30%



US. ROLE OF UTILITY STAFF

US1. Have you had any interactions with an account executive from [UTILITY] in the past year?

	SDG&E
TOTAL ANSWERING	54
Yes	43%
No	54%
(Not sure what an	4%
account executive is)	
Don't know/Refused	-

US2. In general, how many times a year do you interact with an account executive from [UTILITY]?

	SDG&E
TOTAL ANSWERING	23
Never	4%
1-2 times a year	26%
3-5 times a year	30%
Less than once per	17%
month (about once	
every 2 months or 6	
times a year)	
At least once every	17%
month or more often	
(Other, Specify)	-
(Don't know/Refused)	4%

US3. Did the account executive mention the [UTILITY] Express Efficiency rebate program to you?

	SDG&E
TOTAL ANSWERING	19
Yes	78%
No	
Don't know/Refused	



Delivery Channel Innovation Questions (DCI)

DC1. I'm going to ask you about several ways in which you might have seen or heard about information on energy efficiency. Have you ever... (1=Yes, 2=No, 3=DK) [READ AND ROTATE – B-J]

M. Visited [Southern California Gas's/San Diego Gas and Electric's] website?

	SDG&E
TOTAL ANSWERING	14
Yes	64%
No	36%
Don't know/Refused	-

A2.[IF A=1] Did you see anything on the website about energy efficiency opportunities?

	SDG&E
TOTAL ANSWERING	9
Yes	44%
No	44%
Don't know/Refused	11%

N. Received information from [Southern California Gas/San Diego Gas and Electric] through the mail, such as a bill insert or newsletter with information about energy efficiency opportunities?

	SDG&E
TOTAL ANSWERING	21
Yes	71%
No	24%
Don't know/Refused	5%

O. Received an email from [Southern California Gas/San Diego Gas and Electric] utility regarding energy efficiency information?

	SDG&E
TOTAL ANSWERING	22
Yes	55%
No	36%
Don't know/Refused	9%

P. Attended an event, such as a business forum or trade meeting, where information about energy efficiency was distributed?

	SDG&E
TOTAL ANSWERING	14
Yes	50%
No	50%
Don't know/Refused	-



Q. Seen advertisements in a newspaper or trade journal regarding energy efficiency?

	SDG&E
TOTAL ANSWERING	21
Yes	38%
No	57%
Don't know/Refused	5%

R. Heard about energy efficiency opportunities by television or radio specifically for Flex Your Power?

	SDG&E
TOTAL ANSWERING	22
Yes	50%
No	45%
Don't know/Refused	5%

S. Learned about energy efficiency efforts from a contractor?

	SDG&E
TOTAL ANSWERING	14
Yes	71%
No	29%
Don't know/Refused	-

T. Been contacted by [Southern California Gas/San Diego Gas and Electric], (such as by an Account Executive or Commercial Service Technician) about energy efficiency opportunities?

	SDG&E
TOTAL ANSWERING	14
Yes	57%
No	43%
Don't know/Refused	-

U. Called [Southern California Gas/San Diego Gas and Electric] and had someone inform you about energy efficiency opportunities?

	SDG&E
TOTAL ANSWERING	22
Yes	23%
No	77%
Don't know/Refused	-



V. Heard about energy efficiency opportunities from your local government or from a non-profit agency in your community?

	SDG&E
TOTAL ANSWERING	22
Yes	27%
No	73%
Don't know/Refused	-

[IF YES TO DC1A=1, or B=1, or C=1]

DC2a. On a scale of 1 to 5 where 1 is not at all useful and 5 is very useful, how useful did you find the information provided by [Southern California Gas/San Diego Gas and Electric]?

	SDG&E
TOTAL ANSWERING	4
Not at all useful	-
Somewhat un-useful	-
Neither useful nor un-useful	25%
Somewhat useful	50%
Very useful	25%
Don't know/Refused	
MEAN	4.00

[SKIP IF DC2=5] DC3. What would have made this information more useful? [OPEN END]



DC4. Based on all of the things that you can think of, what is the best way to provide you with information about energy efficiency opportunities? [OPEN END, MULTIPLE RESPONSES – ALLOW UP TO 5 RESPONSES]

	SDG&E
TOTAL ANSWERING	54
(Gas or electric utility website)	15%
(Information from utility	39%
received through the mail, such	
as a bill insert or newsletter)	
(An email from gas or electric	41%
utility)	
(An event, such as a business	4%
forum or trade meeting)	
(Advertisements in a newspaper	4%
or trade journal)	
(Television or radio	4%
advertisements specifically for	
Flex Your Power)	
(Other television or radio	4%
advertisements)	
(A contractor)	4%
A representative of the gas or	7%
electric utility—didn't mention	
Account Representative)	
Specifically mentioned Account	4%
Executive or Account	
Representative	
A local government or non-	-
profit agency in the community	
Other, specify	-
Don't know/Refused	-



F. FIRMOGRAPHICS

Okay, last of all, I have some questions about your facility and your organization.

F1. Does your organization lease or own your facility?

	SDG&E
TOTAL ANSWERING	54
Lease	41%
Own	54%
Other, specify	6%

F2. Would you describe your business as... (Probe as necessary for number of people or square footage and record best guess)

	SDG&E
TOTAL ANSWERING	54
A small business	13%
A medium-sized	41%
business	
A large business	46%
Don't know	

F3a. What is the approximate TOTAL square footage of your facility at this location (IF NEEDED, [SITE_ADDR1])?

	SDG&E
TOTAL ANSWERING	54
less than 1,500 sq ft	-
1,500 – 4,999 sq ft	6%
5,000 – 9,999 sq ft	6%
10,000 – 24,999 sq ft	9%
25,000 – 49,999 sq ft	6%
50,000 – 74,999 sq ft	13%
75,000 – 99,999 sq ft	15%
Over 100,000 sq ft	33%
(Don't know/Refused)	13%



F3b. What is the approximate percentage of your square footage that is AIR-CONDITIONED?

	SDG&E
TOTAL ANSWERING	54
0%	7%
1-50%	28%
51-99%	20%
100%	43%
Don't know/Refused	3%

F4a. Is your business in one location, or do you have multiple locations?

	SDG&E
TOTAL ANSWERING	54
One location	43%
Multiple locations	56%
Don't know/refused	1%

F4b. Is your business in its own building, or are you located in a building with multiple businesses?

	SDG&E
TOTAL ANSWERING	54
Own building	78%
Multiple businesses in	19%
building	
Don't know/refused	4%

F5. Do you have anyone devoted full-time as a building engineer or facility manager?

	SDG&E
TOTAL ANSWERING	54
Yes	57%
No	41%
Other, specify	2%
Don't know/Refused	-



F6. Would you say that your [IF SoCalGas: gas/IF SDG&E: gas and electric] costs represent a . . . (READ LIST)

	SDG&E
TOTAL ANSWERING	54
Very small	2%
Small	24%
Medium	24%
Large, or	41%
Very large part of your	7%
operating costs each	
month?	
Don't know/refused	2%

F7. On average, how many hours a day is your facility in use?

	SDG&E
TOTAL ANSWERING	54
Less than 8 hours	2%
8 to 11 hours	26%
12 to 15 hours	22%
16 to 23 hours	17%
24 hours	33%
Don't know/refused	-

F8. Is there a language other than English spoken at your organization?

	SDG&E
TOTAL ANSWERING	54
Yes	69%
No	30%
Don't know/Refused	2%



[SKIP IF F8 = 2 or 99]

F9. What languages other than English are spoken at your organization?

	SDG&E
TOTAL ANSWERING	37
Spanish	95%
Korean	3%
Chinese	8%
Vietnamese	8%
Japanese	8%
Hindi	3%
Other, Specify	3%
Don't know/Refused	3%

Your responses will remain confidential, but may I get/confirm your name and title in case I need to call you back? (RECORD NAME AND TITLE, REFUSED=WOULD NOT GIVE NAME AND/OR TITLE)

Great. These are all the questions I have for you today. Thanks very much for your time.





5. SDGE 3019: On-Bill Financing Program (OBF)

Table 5-1 Final Research List

Final Research List						
Target for Data Collection	Data collection mode	Timing of data collection	Key Research Issues	Sample Size	Number of Data points	From where did you get the sample?
Program Managers	In-depth interview	July	Determine level of understanding about the program.	2	2	List of program managers provided by SDG&E
Participants	In-depth interview	January	Satisfaction, ease of installation	12	6	Program Manager



5.1 In-depth Interview Guide: OBF Participants

Interview Date	
Customer Name	
Customer Firm/Organization	
Customer Phone	
Customer Email	
Customer Utility	SCG/SDG&E
Interviewer/Primary Contact (person to contact regarding questions about interview)	
Interviewer Phone	
Interviewer Email	
research firm. We are not tryin	and I'm calling from, an independent ng to sell you anything. We are conducting a study on behalf of the ny (SCG)/San Diego Gas and Electric (SDG&E).
May I speak with [READ CUST	OMER NAME]?
If contact is not available, ask for	r best time to call back.
CALL BACK DATE/TIME:	

We are conducting a study on the On-Bill Financing Program. The On-Bill Financing Program offers zero percent financing to small-sized, nonresidential customers who purchase qualifying lighting, refrigeration, food service, gas equipment and other technologies to improve the energy efficiency of their businesses.

We are calling to get feedback on your experience with this program and we estimate the interview will take about 15 minutes. All responses you provide will be confidential.

Program Awareness and Participation Decision

First, I'd like to ask you some questions about your decision to participate in the On-Bill Financing Program and the equipment you installed.

- 1. How did you first learn about the On-Bill Financing Program? (Probe for: contractor, account executive, utility website, other energy program, coworker, etc.)
- 2. Who makes decisions about energy efficiency investments at your company? Is it upper management, and/or process engineers or facility managers? Do they communicate with each other?



- 3. What is best way to promote this program to businesses like yours?
- 4. What types of equipment have you installed through the On-Bill Financing Program?
- 5. Why did you decide to replace your previous equipment? (Probe for: old/failing equipment, expansion/retrofit, new equipment much more efficient, 0% financing, management decision)
- 6. Did the On-Bill Financing Program change the nature of your energy efficient equipment installations in any way? (Probe for: would not have purchased equipment, no change to plans, purchased additional equipment, better/more expensive equipment, earlier purchase)
 - a. If installations CHANGED ask: How important was the availability of On-Bill Financing relative to other factors?
- 7. About what percent of your equipment and installation costs has been covered by your loans?
- 8. How would you have paid for the energy efficient equipment if the On-Bill Financing Program did not exist?
- 9. Why did you decide to use the On-Bill Financing Program instead of other financing sources? Are there specific criteria you apply when considering alternative funding sources? (Probe for: constraints related to other sources, advantages of OBF)
- 10. Did you have any concerns prior to your participation in the program?
 - a. If YES ask: Were these resolved?

Program Satisfaction and Future Intentions

Now I'm going to ask you a few questions about your satisfaction with the On-Bill Financing Program.

- 11. How satisfied are you with the clarity and accuracy of the information you receive on the On-Bill Financing Program? (If NOT satisfied ask why)
- 12. How satisfied are you with the loan application process? (If NOT satisfied ask why)
- 13. How satisfied are you with the required loan payback period? (If NOT satisfied ask why)



- 14. What have been your interactions with the utility program staff? How have these gone? Are there areas that could be improved?
- 15. Are there other types of equipment that you wanted to purchase using On-Bill Financing that you were not able to due to program requirements?
 - a. If YES ask: What was the equipment, and why were you not able to use On-Bill Financing?
- 16. Overall, would you say that the program has met your expectations? (If NOT ask why)
- 17. Would you recommend any changes to the program? (Probe for: eligible equipment, loan amounts, participation process, loan payments reporting)
- 18. Do you plan to use On-Bill Financing to purchase other energy efficient equipment in the future?
 - a. If YES ask: For what types of equipment?
 - b. If NO ask: Why not? (Probe for barriers related to: loan min/max amounts, process hassles, problems with efficient equipment, need for new equipment, business factors, economic trends)

Those are all the questions I have for you. If you have any additional thoughts on any of these topics, please feel free to call or email me. Thank you for your time and good information.



6. SDGE 3020: Small Business Super Saver Program (SBSS)

Table 6-1 Final Research List

Final Research List								
Target for Data Collection	Data collection mode	Timing of data collection	Key Research Issues	Sample Size	Number of Data points	From where did you get the sample?		
Program Managers	In-depth interview	July	Determine level of understanding about the program.	2	2	List of program managers provided by SDG&E		
Participants	CATI Interview	October	Satisfaction, ease of installation	6,482	100	Program Manager		
Contractors	In-depth interview	November	Contractor satisfaction / suggestions for improvement. Find out program barriers from nonactive contractors that signed up for program but haven't done much.	39	10	Program Manager		



6.1 In-depth Interview Guide: SBSS Contractors

in Portinarket to	my name is calling on behalf of ECONorthwest, an energy research firm based land, OR. San Diego Gas and Electric (SDG&E) has asked us to help them better understand the for energy-saving features and their Small Business Super Saver Program (SBSS). Could I speak or could I speak to the person at your familiar with the Small Business Saver program?
[WHEI	N CORRECT PERSON IS ON-LINE:] Name:
	Company:
	Title:
	Phone:
based in the man contract	my name is and I'm calling on behalf of ECONorthwest, an energy research firm n Portland, OR. San Diego Gas and Electric (SDG&E) has asked us to help them better understand rket for energy-saving features and their Small Business Super Saver Program. We are talking to tors to understand their experience in relation to the Small Business Super Saver (SBSS) Program. a good time to talk about the program?
I. INT	RODUCTION AND BUSINESS SCOPE
1.	How did you first hear about the Small Business Super Saver Program?
2.	When did you first participate in the program?
3.	Approximately how many installations under the SBSS Program have you done in the past year?
4.	What percent of your jobs each year are done through the SBSS program?
5.	What is the primary equipment that you install through the SBSS Program?
6.	Do you also do projects through the Express Efficiency program (Express provides rebates for larger commercial customers)? What percentage of your business goes to SBSS and what goes to Express?



- 7. Are you aware of SDG&E's On-Bill Financing program? Do you promote the On-Bill Financing program to your customers?
- 8. Are you aware of SDG&E's Energy Savings Bid program? Do you promote the Energy Savings Bid program to your customers?
- 9. Are you aware of SDG&E's Standard Performance Contract program (SPC)? Do you promote Standard Performance Contract program to your customers?

II. PROGRAM PARTICIPATION

- 10. How do you promote EE equipment to your customers, what benefits do you emphasize?
- 11. Do you market the SBSS program directly to your customers? What do you tell them?
- 12. What are the challenges of getting customers to participate in the SBSS program?
- 13. How do you overcome these challenges?
- 14. How can the SBSS program change to help address these issues?
- 15. Are there certain types of businesses that are more likely to participate in the program? Why?
- 16. Are there certain types of businesses that are less likely to participate in the program? Why?
- 17. Is there equipment that you think should be added to the SBSS program that is not currently eligible?

III. PROGRAM PROCESS

- 18. Do you have the Small Business Super Saver Rebate Application? Do you think this provides contractors adequate information about the program? Any suggestions for improvement?
- 19. Have you had any issues with the paperwork that needs to be filed for the program (rebate application)? Any suggestions for improvement?



20. How about the rebate application process, any issues? How long does it take on average for SDG&E to process the rebates?

IV. SATISFACTION

- 21. Overall, how satisfied are you with the SBSS program?
- 22. Any areas of dissatisfaction?
- 23. What is the most valuable aspect of the program to you?
- 24. How can the program be improved?
- 25. Who do you talk to at SDG&E about the program? Any issues?
- 26. Any final comments on the SBSS program?



6.2 CATI Interview Guide: SBSS Participants

Date October 22, 2007

Utility SDG&E

Program Name Small Business Super Saver Rebate Program, SDGE3020

Target Small Commercial

Sample Size

Quotas (if applicable)

Sample File Name

Contractor Name ECONorthwest
Primary Contact (person who Christian Miner

should be contacted with any

questionnaire questions)

Phone 503-222-6060

Email miner@portland.econw.com

Programmer Notes

(Intro Screener)

ASK FOR: [CONTACT NAME]

(IF WRONG CONTACT, ASK TO SPEAK TO THE BUSINESS MANAGER/OWNER OR OFFICE

MANAGER.)

Hello, my name is ______ and I'm calling from Opinion Dynamics, an independent research firm. We are conducting research on behalf of San Diego Gas and Electric to help them develop programs to better serve their business customers. Our records indicate that you have worked with a contractor to install energy efficient equipment at your business and received a rebate through San Diego Gas and Electric's Small Business Super Saver Rebate Program.

Are you the employee at your firm who is most familiar with this?

(IF NEEDED: THE SMALL BUSINESS SUPER SAVER REBATE PROGRAM OFFERS REBATES TO SMALL BUSINESS CUSTOMERS WHO PURCHASE QUALIFYING LIGHTING, REFRIGERATION, FOOD SERVICE, GAS EQUIPMENT AND OTHER TECHNOLOGIES TO IMPROVE THE ENERGY EFFICIENCY OF THEIR BUSINESSES.)

Delivery of Program to the customer

A1. Our records show that you installed the following equipment at [ADDR], [CITY] through the Small Business Super Saver Rebate Program:

[MSR_DESC1], [DATE1]

[MSR DESC2], [DATE2]

[MSR DESC3], [DATE3]



Is this correct?

- 1. Yes [SKIP TO A2]
- 2. No [GO TO A1a]
- 3. (Don't know / refused) [THANK AND TERMINATE]

A1a. What did you install?

[OPEN END-get correct information]

A2. How did you first learn about the Small Business Super Saver Rebate Program?

[ALLOW MULTIPLE RESPONSE]

- 1. (Contractor)
- 2. (Mail insert)
- 3. (Utility website)
- 4. (Equipment manufacturer)
- 5. (Referral from another SDG&E energy efficiency program)
- 6. (Through my trade association (Small Business Association))
- 7. (Utility Rep/Account representative)
- 8. (Friend/Coworker)
- 9. (Other, specify)
- 10. (Don't know/Refused)

A3. Did you receive the Small Business Super Saver Rebate Application that explains the program and lists the equipment that is eligible for a rebate?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[ASK IF A3=1, OTHERWISE GO TO A4]

A3b. Concerning your choice of equipment, which was more important to you, your contractor's advice or the information in the Small Business Super Saver Rebate Application?

- 1. (Small Business Super Saver Rebate Application)
- 2. (Contractor's advice)
- 3. (Neither)
- 4. (Other, Specify)
- 5. (Don't know/Refused)

A4. Had you already decided on purchasing the energy efficient equipment prior to becoming aware of the Small Business Super Saver Rebate Program?

- 1. Yes
- 2. No [SKIP to A5]
- 3. (Don't know/Refused) [SKIP to A5]



A4a. What prompted you to make this decision?

[ALLOW MULTIPLE RESPONSE]

- 1. (Save money on energy bills)
- 2. (The environment)
- 3. (Receiving money for purchasing new equipment)
- 4. (Other, Specify)
- 5. (Don't know/Refused)

A5. Had you already decided on purchasing the energy efficient equipment prior to talking with your contractor?

- 1. Yes
- 2. No [SKIP to A6]
- 3. (Don't know/Refused) [SKIP to A6]

[ASK IF QA5 = 1]

A5a. What prompted you to make this decision?

[ALLOW MULTIPLE RESPONSE]

- 1. (Save money on energy bills)
- 2. (The environment)
- 3. (Receiving money for purchasing new equipment)
- 4. (Other, Specify)
- 5. (Don't know/Refused)

[ASK IF QA5 = 2]

A6. What changed your mind to go with the energy efficient model?

[OPEN END]

A7. Did vour contractor suggest purchasing and installing your energy efficient equipment?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

I'm going to read you a list of factors. For each, please tell me if the factor was very important, somewhat important, neither important nor unimportant, somewhat unimportant or very unimportant in your decision to select energy efficient equipment.

A8. How important in your decision to select energy efficient equipment was... Information or recommendations from the contractor? (READ LIST IF NEEDED)

- 1. Very unimportant
- 2. Somewhat unimportant
- 3. Neither unimportant or important
- 4. Somewhat important
- 5. Very important
- 6. (Does not apply)



A9. How important in your decision to select energy efficient equipment was... The money you would save from lower energy bills? (READ LIST IF NEEDED)

- 1. Very unimportant
- 2. Somewhat unimportant
- 3. Neither unimportant or important
- 4. Somewhat important
- 5. Very important
- 6. (Does not apply)

A10. How important in your decision to select energy efficient equipment was... The feeling that you were doing something good for the environment? (READ LIST IF NEEDED)

- 1. Very unimportant
- 2. Somewhat unimportant
- 3. Neither unimportant or important
- 4. Somewhat important
- 5. Very important
- 6. (Does not apply)

A11. What was the most important factor in your decision to purchase energy efficient equipment?

(Rebate application)

(Improve equipment life)

(Improve equipment performance)

(Information/encouragement from salesperson/contractor)

(Contractor influence)

(Lower energy bills)

(Doing good for the environment)

(Non-energy factors such as color, style)

(Other, specify)

(Don't know/Refused)

A11a. Did you use the rebate application to assist you in making the decision to install energy efficient equipment?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

A11d. Did you have an out of pocket cost for the purchase and installation of the energy efficient equipment?

- 1. Yes
- 2. No [SKIP TO A12]
- 3. (Don't know/Refused) No [SKIP TO A12]

A11e. What percent of the project was paid for by an out of pocket expense? [OPEN END]



A12. Did your contractor tell you about the On-Bill Financing program, an SDG&E program that loans money to small businesses for energy efficiency upgrades?

- 1. Yes
- 2. No [SKIP TO QS0]
- 3. (Don't know/Refused) [SKIP TO QS0]

A13. Are you currently using the On-bill financing program for any of your equipment?

- 1. Yes
- 2. No [SKIP TO Q A15]
- 3. (Don't know/Refused) [SKIP TO Q A15]

A14. Which equipment?

[OPEN END]

A15. Why did you decide not to use it?

[ALLOW MULTIPLE RESPONSE]

- 1. (Did not understand the program)
 - 2. (Was not eligible for the program)
- 3. (Could afford to fund the project myself/Did not need a loan)
- 4. (Received a loan from another source)
- 5. (Other, specify)
- 6. (Don't know/Refused)

Program Satisfaction

S0. How did you find your contractor?

- 1. (Brochure)
- 2. (Phone call)
- 3. (Manufacturer)
- 4. (Trade association)
- 5. (Referral)
- 6. (Other, Specify)
- 7. (Don't know/Refused)

S0a. Was it clear that the contractor was not representing SDG&E but was informing you about SDG&E rebates?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

Next, I'd like you to rate your satisfaction with various aspects of your contractor, your equipment, and the program. For each question I read, please tell me if you are very satisfied, somewhat satisfied, neither satisfied nor dissatisfied, somewhat dissatisfied, or very dissatisfied.

S1. How satisfied are you with the installation of your equipment?

- 1. Very dissatisfied
- 2. Somewhat dissatisfied
- 3. Neither satisfied nor dissatisfied



- 4. Somewhat satisfied
- 5. Very satisfied
- 6. (Don't know/Refused)

[ASK IF Previous Q=1, 2, 3, or 4]

S2. In what ways were you not completely satisfied? [OPEN END]

- S3. In general, how easy was it to find a contractor to install the equipment. Please tell me if it was very difficult, somewhat difficult, neither difficult nor easy, somewhat easy, or very easy to find a contractor.
 - 1. Very difficult
 - 2. Somewhat difficult
 - 3. Neither difficult nor easy
 - 4. Somewhat easy
 - 5. Very easy
 - 6. (Don't know/Refused)

[ASK IF Previous Q=1, 2, 3, or 4]

S4. In what ways was it not very easy?

[OPEN END]

- S5. How satisfied were you with the courteousness and professionalism of your contractor?
 - 1. Very dissatisfied
 - 2. Somewhat dissatisfied
 - Neither satisfied nor dissatisfied.
 - 4. Somewhat satisfied
 - 5. Very satisfied
 - 6. (Don't know/Refused)

[ASK IF Previous Q=1, 2, 3, or 4]

S6. In what ways were you not completely satisfied? [OPEN END]

- S7. How satisfied are you with the performance of your new energy efficiency equipment. Please tell me if you were very satisfied, somewhat satisfied, neither satisfied nor dissatisfied, somewhat dissatisfied, or very dissatisfied with the performance of the new equipment.
 - 1. Very dissatisfied
 - 2. Somewhat dissatisfied
 - Neither satisfied nor dissatisfied.
 - 4. Somewhat satisfied
 - 5. Very satisfied
 - 6. (Don't know/Refused)

[ASK IF Previous Q=1, 2, 3, or 4]

S8. In what ways were you not completely satisfied? [OPEN END]



S9. How satisfied are you with the amount of time your contractor took to install the new equipment?

- 1. Very dissatisfied
- 2. Somewhat dissatisfied
- 3. Neither satisfied nor dissatisfied
- 4. Somewhat satisfied
- 5. Very satisfied
- 6. (Don't know/Refused)

[ASK IF Previous Q=1, 2, 3, or 4]

S10. In what ways were you not completely satisfied?

[OPEN END]

S10a. Were there costs associated with the installation of the energy efficiency equipment?

- 1. Yes
- 2. No [SKIP TO QS11]
- 3. (Don't know/Refused) [SKIP TO QS11]

S10b. What were they?

[OPEN END]

S11. Did a SDG&E representative come to your business to inspect the equipment you had installed?

- 4. Yes
- 5. No [SKIP TO QS13a]
- 6. (Don't know/Refused) [SKIP TO QS13a]

S12. Please rate your satisfaction with the courteousness and professionalism of the inspector who came to your business? (Please tell me if you were very satisfied, somewhat satisfied, neither satisfied nor dissatisfied, somewhat dissatisfied, or very dissatisfied.)

- 1. Very dissatisfied
- 2. Somewhat dissatisfied
- 3. Neither satisfied nor dissatisfied
- 4. Somewhat satisfied
- 5. Very satisfied
- 6. (Don't know/Refused)

[ASK IF Previous Q=1, 2, 3, or 4]

S13. In what ways were you not completely satisfied?

[OPEN END]

S13a. How satisfied are you with the energy savings you are receiving from your equipment?

- 1. Very dissatisfied
- 2. Somewhat dissatisfied
- 3. Neither satisfied nor dissatisfied
- 4. Somewhat satisfied
- 5. Very satisfied
- 6. (Don't know/Refused)



[ASK IF Previous Q=1, 2, 3, or 4]

S13b. In what ways were you not completely satisfied? [OPEN END]

- S14. Please rate your overall satisfaction with the Small Business Super Saver Rebate Program? (Please tell me if you were very satisfied, somewhat satisfied, neither satisfied nor dissatisfied, somewhat dissatisfied, or very dissatisfied.)
 - 1. Very dissatisfied
 - 2. Somewhat dissatisfied
 - 3. Neither satisfied nor dissatisfied
 - 4. Somewhat satisfied
 - 5. Very satisfied
 - 6. (Don't know/Refused)

[ASK IF Previous Q=1, 2, 3, or 4]

S15. In what ways were you not completely satisfied? [OPEN END]

- S16. Have you ever suggested the Small Business Super Saver Rebate Program to someone outside of your business?
 - 1. Yes
 - 2. No
 - 3. (Don't know/Refused)
- S17. Were there any energy efficiency upgrades that you wanted to install but were not covered by the Small Business Super Saver Rebate Program?
 - 1. Yes
 - 2. No [SKIP TO APPLICATION PROCESS SECTION]
 - 3. (Don't know/Refused) [SKIP TO APPLICATION PROCESS SECTION]

S18. What were they?

[OPEN END]

- S19. Did you install them anyway?
 - 1. Yes [SKIP TO APPLICATION PROCESS SECTION]
 - 2. No
 - 3. (Don't know/Refused) [SKIP TO APPLICATION PROCESS SECTION]



S19a. Why did you choose not to install them?

[MULTIPLE RESPONSE]

- 1. (Too expensive)
- 2. (Didn't think they were necessary)
- 3. (Interfere with daily business practices)
- 4. (Need permission from property owner)
- 5. (Need approval from corporate office)
- 6. (Don't have time)
- 7. (Don't believe they will save energy claimed)
- 8. (Other, specify)
- 9. (Don't know/Refused)

APPLICATION PROCESS

[If A3 = 1, then ask S20. Otherwise skip to P1]

Next we would like to know how well SDG&E accomplished its goal of getting clear information to you on the program. For each of following, please tell me if you if the information you received was extremely clear, pretty clear, not very clear or not at all clear.

S20. How clear was the information you received in the Small Business Super Saver Rebate Application that described the Small Business Super Saver Rebate Program? Would you say extremely clear, pretty clear, not very clear or not at all clear?

Not at all clear Not very clear Pretty clear Extremely clear (Don't know/Refused)

[ASK IF PREVIOUS Q=1, 2, or 3] **S21. In what ways was the information not clear?** [OPEN END]

S22. How clear was the information you received on the makes and models of the products listed in the Small Business Super Saver Rebate Application? (Would you say extremely clear, pretty clear, not very clear or not at all clear?)

Not at all clear Not very clear Pretty clear Extremely clear (Don't know/Refused)

[ASK IF PREVIOUS Q=1, 2, or 3] **S23. In what ways was the information not clear?** [OPEN END]



S24. How helpful was the Small Business Super Saver Rebate Application in helping you with selecting equipment? Would you say it was extremely helpful, pretty helpful, not very helpful, or not at all helpful?

- 1. Not at all helpful
- 2. Not very helpful
- 3. Pretty helpful
- 4. Extremely helpful
- 5. (Don't know/Refused)

[ASK IF PREVIOUS Q=1, 2, or 3]

S25. What would have been more helpful to have in the Rebate Application? [OPEN END]

PARTICIPATION BARRIERS

Some people may have doubts or reservations about purchasing energy efficient equipment. PRIOR to purchasing your equipment, can you tell me if you had any doubts or concerns about the following items?

P1. Finding a qualified contractor to do the installation?

Yes No [SKIP TO QP3] (Don't know/Refused) [SKIP TO QP3]

[ASK IF PREVIOUS Q=1]

P2. Briefly, what happened and how did you overcome this concern? [OPEN END]

P3. Being able to find parts or a qualified repairman to maintain equipment?

Yes No [SKIP TO QP5] (Don't know/Refused) [SKIP TO QP5]

[ASK IF PREVIOUS Q=1]

P4. Briefly, what happened and how did you overcome this concern? [OPEN END]

P5. That the amount of energy your equipment will save may be exaggerated?

Yes No [SKIP TO QP7] (Don't know/Refused) [SKIP TO QP7]

[ASK IF PREVIOUS Q=1]

P6. Briefly, what happened and how did you overcome this concern? [OPEN END]



P7. Energy savings not worth extra price?

- 1. Yes
- 2. No [SKIP TO QP9]
- 3. (Don't know/Refused) [SKIP TO QP9]

[ASK IF PREVIOUS Q =1]

P8. Briefly, what happened and how did you overcome this concern? [OPEN END]

P9. What is the one thing SDG&E could do to improve the SBSS Program? [OPEN END]

P10. What other programs or services could the utility provide to help you manage your energy use better?

[ALLOW MULTIPLE RESPONSE]

- 1. (Email notification of critical usage periods)
- 2. (Email notification of energy trends in my business sector)
- 3. (Web access to energy usage and billing data)
- 4. (Demand Response training classes)
- 5. (Energy Efficiency training classes)
- 6. (Green Energy training classes)
- 7. (Other, Specify)
- 8. (Don't know/Refused)



DELIVERY CHANNEL INNOVATION QUESTIONS

[ASK ABOUT 4 OF THESE – A, D, G, & H OR B, E, K, & L OR C, F, I, & J]

DC1. I'm going to ask you about several ways in which you might have seen or heard about information on energy efficiency. Have you ever... (1=Yes, 2=No, 3=(Don't know/Refused)) [ROTATE – B THRU L]

- A. Visited San Diego Gas and Electric's website?
 - A2.[IF A=1] Did you see anything on the website about energy efficiency opportunities?
- B. Received information from San Diego Gas and Electric through the mail, such as a bill insert or newsletter with information about energy efficiency opportunities?
- C. Received an email from San Diego Gas and Electric utility regarding energy efficiency information?
- D. Attended an event, such as a business forum or trade meeting, where information about energy efficiency was distributed?
- E. Seen advertisements in a newspaper or trade journal regarding energy efficiency?
- F. Heard about energy efficiency opportunities by television or radio specifically for Flex Your Power?
- G. Learned about energy efficiency efforts from a contractor or vendor?
- H. Been contacted in person by San Diego Gas and Electric, (such as by an Account Executive or Commercial Service Technician) about energy efficiency opportunities?
- I. Called San Diego Gas and Electric and had someone inform you about energy efficiency opportunities?
- J. Heard about energy efficiency opportunities from your local government or from a non-profit organization in your community?
- K. Attended a training seminar provided by San Diego Gas and Electric
- L. Performed an Internet search for energy efficiency information and/or programs?

[IF YES TO DC1A2=1, or B=1, or C=1]

DC2a. On a scale of 1 to 5 where 1 is not at all useful and 5 is very useful, how useful did you find the information provided by San Diego Gas and Electric [through email, through the mail, on its website]?

- 1. Not at all useful
- 2. Somewhat un-useful
- 3. Neither useful nor un-useful
- 4. Somewhat useful
- 5. Very useful
- 6. (Don't know/Refused)

[SKIP IF DC2a=5]

DC3. What would have made this information more useful? [OPEN END]



DC4. Based on all of the things that you can think of, what is the best way to provide you with information about energy efficiency opportunities? [OPEN END, MULTIPLE RESPONSES – ALLOW UP TO 5 RESPONSES]

- 1. (Gas or electric utility website)
- 2. (Information from utility received through the mail, such as a bill insert or newsletter)
- 3. (An email from gas or electric utility)
- 4. (An event, such as a business forum or trade meeting)
- 5. (Advertisements in a newspaper or trade journal)
- 6. (Television or radio advertisements specifically for Flex Your Power)
- 7. (Other television or radio advertisements)
- 8. (A contractor)
- 9. (A representative of the gas or electric utility—didn't mention Account Representative)
- 10. (Specifically mentioned Account Executive or Account Representative)
- 11. (A local government or non-profit agency in the community)
- 00. (Other, specify)
- 99. (Don't know/Refused)

FIRMOGRAPHICS

F0. Finally, I just have some general questions about your business. What business sector does your firm belong to?

- 1. (Retail or wholesale)
- 2. (Manufacturing)
- 3. (Agricultural/Mining)
- 4. (Financial Services)
- 5. (Real Estate)
- 6. (Transportation)
- 7. (Marketing and Sales)
- 8. (Medical)
- 9. (Non-Profit)
- 10. (Research)
- 11. (Government)
- 12. (Law)
- 13. (Media/Entertainment)
- 14. (Other, specify)
- 15. (Don't know/Refused)

F1. Do you lease or own your facility?

- A. Lease
- B. Own
- C. (Other, specify)
- D. (Don't know/Refused)



F3a. What is the approximate TOTAL square footage of your facility at this location?

- 1. (Less than 1,500 sq ft)
- 2. (1,500 4,999 sq ft)
- 3. (5,000 9,999 sq ft)
- 4. (10,000 24,999 sq ft)
- 5. (25,000 49,999 sq ft)
- 6. (50,000 74,999 sq ft)
- 7. (75,000 99,999 sq ft)
- 8. (Over 100,000 sq ft)
- 9. (Don't know/Refused)

F3b. What is the approximate percentage of your square footage that is AIR-CONDITIONED?

- 1. 0%
- 2. 1-50%
- 3. 51-99%
- 4. 100%
- 5. (Don't know/Refused)

F4a. Is your business in one location, or do you have multiple locations?

- 1. One location
- 2. Multiple locations
- 3. (Don't know/refused)

F4b. Is your business in its own building, or are you located in a building with multiple businesses?

- 4. Own building
- 5. Multiple businesses in building
- 6. (Don't know/refused)

F5. Do you have anyone devoted full-time as a building engineer or facility manager?

- 1. Yes
- 2. No
- 3. (Other, specify)
- 4. (Don't know/Refused)

F6. Would you say that your gas and electric costs represent a . . . (READ LIST)

- 1. Very small
- 2. Small
- 3. Medium
- 4. Large, or
- 5. Very large part of your operating costs each month?
- 6. (Don't know/refused)



F7. On average, how many hours a day is your facility in use?

- 1. Less than 8 hours
- 2. 8 to 11 hours
- 3. 12 to 15 hours
- 4. 16 to 23 hours
- 5. 24 hours
- 6. (Don't know/refused)

Your responses will remain confidential, but may I confirm your name and title in case I need to call you back? (RECORD NAME AND TITLE, REFUSED=WOULD NOT GIVE NAME AND/OR TITLE)



6.3 Frequency Tables: SBSS Participants

January 2008

Note: Open-ended responses are at the end of the document.

QA1. Our records show that you installed the following equipment at (street address),(city) through the Small Business Super Saver Rebate Program: **<MEAS1 >,<IMON1 ><IYR1> **<MEAS2 >,<IMON2 ><IYR2> **<MEAS3 >,<IMON3 ><IYR3>

Is this correct?

	•	Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	99	99.0	99.0	99.0
	No	1	1.0	1.0	100.0
	Total	100	100.0	100.0	

QA1a. What did you install?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	1	1.0	100.0	100.0
Missing	System	99	99.0		
Total	•	100	100.0		

Case Summary

		Cases						
	Valid		Missing		Total			
	N	Percent	N	Percent	N	Percent		
QA2	100	100.0%	0	.0%	100	100.0%		



QA2. How did you first learn about the Small Business Super Saver Rebate Program?

		Responses		
		N	Percent	Percent of Cases
QA2	(Other)	27	24.5%	27.0%
	(Contractor)	35	31.8%	35.0%
	(Mail insert)	1	.9%	1.0%
	(Equipment manufacturer)	1	.9%	1.0%
	(Referral from another SDG&E energy efficiency program)	16	14.5%	16.0%
	(Through my trade association (Small Business Association))	3	2.7%	3.0%
	(Utility Rep/Account representative)	18	16.4%	18.0%
	(Friend/Coworker)	6	5.5%	6.0%
	(Don't know/Refused)	3	2.7%	3.0%
	Total	110	100.0%	110.0%

QA3. Did you receive the Small Business Super Saver Rebate Application that explains the program and lists the equipment that is eligible for a rebate?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	59	59.0	59.0	59.0
	No	20	20.0	20.0	79.0
	(Don't know/Refused)	21	21.0	21.0	100.0
	Total	100	100.0	100.0	



QA3b. Concerning your choice of equipment, which was more important to you, your contractor's advice or the information in the Small Business Super Saver Rebate Application?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	11	11.0	18.6	18.6
	(Small Business Super Saver Rebate Application)	16	16.0	27.1	45.8
	(Contractor's advice)	25	25.0	42.4	88.1
	(Neither)	4	4.0	6.8	94.9
	(Don't know/Refused)	3	3.0	5.1	100.0
	Total	59	59.0	100.0	
Missing	System	41	41.0		
Total		100	100.0		

QA4. Had you already decided on purchasing the energy efficient equipment prior to becoming aware of the Small Business Super Saver Rebate Program?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	18	18.0	18.0	18.0
	No	73	73.0	73.0	91.0
	(Don't know/Refused)	9	9.0	9.0	100.0
	Total	100	100.0	100.0	

Case Summary

		Cases						
	Valid		Missing		Total			
	N	Percent	N	Percent	N	Percent		
QA4a	18	18.0%	82	82.0%	100	100.0%		



QA4a. What prompted you to make this decision?

		Responses		
		N	Percent	Percent of Cases
QA4a	(Other)	4	16.7%	22.2%
	(Save money on energy bills)	12	50.0%	66.7%
	(The environment)	4	16.7%	22.2%
	(Receiving money for purchasing new equipment)	3	12.5%	16.7%
	(Don't know/Refused)	1	4.2%	5.6%
	Total	24	100.0%	133.3%

QA5. Had you already decided on purchasing the energy efficient equipment prior to talking with your contractor?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	15	15.0	15.0	15.0
	No	77	77.0	77.0	92.0
	(Don't know/Refused)	8	8.0	8.0	100.0
	Total	100	100.0	100.0	

Case Summary

		Cases						
	Valid		Missing		Total			
	N	Percent	N	Percent	N	Percent		
QA5a	15	15.0%	85	85.0%	100	100.0%		



QA5a. What prompted you to make this decision?

	-	Responses		
		N	Percent	Percent of Cases
QA5a	(Other)	3	15.0%	20.0%
	(Save money on energy bills)	10	50.0%	66.7%
	(The environment)	4	20.0%	26.7%
	(Receiving money for purchasing new equipment)	3	15.0%	20.0%
	Total	20	100.0%	133.3%

QA6. What changed your mind to go with the energy efficient model?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	69	69.0	89.6	89.6
	(Don't know/Refused)	8	8.0	10.4	100.0
	Total	77	77.0	100.0	
Missing	System	23	23.0		
Total		100	100.0		

QA7. Did your contractor suggest purchasing and installing your energy efficient equipment?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	68	68.0	68.0	68.0
	No	29	29.0	29.0	97.0
	(Don't know/Refused)	3	3.0	3.0	100.0
	Total	100	100.0	100.0	



QA8. How important in your decision to select energy efficient equipment was...Information or recommendations from the contractor.

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Very unimportant	2	2.0	2.0	2.0
	Somewhat unimportant	5	5.0	5.0	7.0
	Neither unimportant or important	4	4.0	4.0	11.0
	Somewhat important	33	33.0	33.0	44.0
	Very important	52	52.0	52.0	96.0
	(Does not apply)	4	4.0	4.0	100.0
	Total	100	100.0	100.0	

QA9. How important in your decision to select energy efficient equipment was...The money you would save from lower energy bills.

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Very unimportant	2	2.0	2.0	2.0
	Somewhat unimportant	2	2.0	2.0	4.0
	Neither unimportant or important	1	1.0	1.0	5.0
	Somewhat important	9	9.0	9.0	14.0
	Very important	83	83.0	83.0	97.0
	(Does not apply)	3	3.0	3.0	100.0
	Total	100	100.0	100.0	



QA10. How important in your decision to select energy efficient equipment was... The feeling that you were doing something good for the environment.

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Very unimportant	5	5.0	5.0	5.0
	Somewhat unimportant	2	2.0	2.0	7.0
	Neither unimportant or important	3	3.0	3.0	10.0
	Somewhat important	14	14.0	14.0	24.0
	Very important	76	76.0	76.0	100.0
	Total	100	100.0	100.0	

QA11. What was the most important factor in your decision to purchase energy efficient equipment?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	17	17.0	17.0	17.0
	(Rebate application)	1	1.0	1.0	18.0
	(Improve equipment life)	2	2.0	2.0	20.0
	(Improve equipment performance)	4	4.0	4.0	24.0
	(Information/encouragement from salesperson/ contractor)	1	1.0	1.0	25.0
	(Lower energy bills)	63	63.0	63.0	88.0
	(Doing good for the environment)	6	6.0	6.0	94.0
	(Non-energy factors such as color, style)	1	1.0	1.0	95.0
	(Don't know/Refused)	5	5.0	5.0	100.0
	Total	100	100.0	100.0	



QA11a. Did you use the rebate application to assist you in making the decision to install energy efficient equipment?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	43	43.0	43.0	43.0
	No	42	42.0	42.0	85.0
	(Don't know/Refused)	15	15.0	15.0	100.0
	Total	100	100.0	100.0	

QA11b. Did your contractor identify the energy efficient measures for you?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	3	3.0	100.0	100.0
Missing	System	97	97.0		
Total	•	100	100.0		

QA11c. How did your contractor identify the energy efficient measures for you?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	3	3.0	100.0	100.0
Missing	System	97	97.0		
Total	•	100	100.0		



QA11d. Did you have an out of pocket cost for the purchase and installation of the energy efficient equipment?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	25	25.0	25.0	25.0
	No	67	67.0	67.0	92.0
	(Don't know/Refused)	8	8.0	8.0	100.0
	Total	100	100.0	100.0	

QA11e. What percent of the project was paid for by an out of pocket expense?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	1	1.0	4.0	4.0
	7	1	1.0	4.0	8.0
	10	4	4.0	16.0	24.0
	20	1	1.0	4.0	28.0
	30	3	3.0	12.0	40.0
	50	2	2.0	8.0	48.0
	60	1	1.0	4.0	52.0
	65	1	1.0	4.0	56.0
	100	2	2.0	8.0	64.0
	(Don't know)	9	9.0	36.0	100.0
	Total	25	25.0	100.0	
Missing	System	75	75.0		
Total		100	100.0		



QA12. Did your contractor tell you about the On-Bill Financing program, an SDG&E program that loans money to small businesses for energy efficiency upgrades?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	25	25.0	25.0	25.0
	No	64	64.0	64.0	89.0
	(Don't know/Refused)	11	11.0	11.0	100.0
	Total	100	100.0	100.0	

QA13. Are you currently using the On-bill financing program for any of your equipment?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	1	1.0	4.0	4.0
	No	23	23.0	92.0	96.0
	(Don't know/Refused)	1	1.0	4.0	100.0
	Total	25	25.0	100.0	
Missing	System	75	75.0		
Total		100	100.0		

QA14. Which equipment?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Other)	1	1.0	100.0	100.0
Missing	System	99	99.0		
Total	<u>-</u> -	100	100.0		



Q15. Why did you decide not to use it?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	14	14.0	56.0	56.0
	(Did not understand the program)	2	2.0	8.0	64.0
	(Could afford to fund the project myself/Did not need a loan)	2	2.0	8.0	72.0
	(Received a loan from another source)	1	1.0	4.0	76.0
	(Don't know/Refused)	6	6.0	24.0	100.0
	Total	25	25.0	100.0	
Missing	System	75	75.0		
Total		100	100.0		

QS0. How did you find your contractor?

	•	Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	61	61.0	61.0	61.0
	(Brochure)	2	2.0	2.0	63.0
	(Phone call)	3	3.0	3.0	66.0
	(Referral)	28	28.0	28.0	94.0
	(Don't know/Refused)	6	6.0	6.0	100.0
	Total	100	100.0	100.0	



QS0a. Was it clear that the contractor was not representing SDG&E but was informing you about SDG&E rebates?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	79	79.0	79.0	79.0
	No	12	12.0	12.0	91.0
	(Don't know/Refused)	9	9.0	9.0	100.0
	Total	100	100.0	100.0	

QS1. How satisfied are you with the installation of your equipment?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Very dissatisfied	3	3.0	3.0	3.0
	Somewhat dissatisfied	3	3.0	3.0	6.0
	Neither satisfied nor dissatisfied	3	3.0	3.0	9.0
	Somewhat satisfied	12	12.0	12.0	21.0
	Very satisfied	79	79.0	79.0	100.0
	Total	100	100.0	100.0	

QS2. In what ways were you not completely satisfied?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	16	16.0	76.2	76.2
	(Don't know/Refused)	5	5.0	23.8	100.0
	Total	21	21.0	100.0	
Missing	System	79	79.0		
Total		100	100.0		



QS3. In general, how easy was it to find a contractor to install the equipment? Please tell me if it was very difficult, somewhat difficult, neither difficult nor easy, somewhat easy, or very easy to find a contractor.

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Somewhat difficult	2	2.0	2.0	2.0
	Neither difficult nor easy	1	1.0	1.0	3.0
	Somewhat easy	7	7.0	7.0	10.0
	Very easy	84	84.0	84.0	94.0
	(Don't know/Refused)	6	6.0	6.0	100.0
	Total	100	100.0	100.0	

QS4. In what ways was it not very easy?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	2	2.0	20.0	20.0
	(Don't know/Refused)	8	8.0	80.0	100.0
	Total	10	10.0	100.0	
Missing	System	90	90.0		
Total		100	100.0		

QS5. How satisfied were you with the courteousness and professionalism of your contractor?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Very dissatisfied	2	2.0	2.0	2.0
	Neither satisfied nor dissatisfied	1	1.0	1.0	3.0
	Somewhat satisfied	13	13.0	13.0	16.0
	Very satisfied	83	83.0	83.0	99.0
	(Don't know/Refused)	1	1.0	1.0	100.0



QS5. How satisfied were you with the courteousness and professionalism of your contractor?

	Frequency	Percent	Valid Percent	Cumulative Percent
Very dissatisfied	2	2.0	2.0	2.0
Neither satisfied nor dissatisfied	1	1.0	1.0	3.0
Somewhat satisfied	13	13.0	13.0	16.0
Very satisfied	83	83.0	83.0	99.0
(Don't know/Refused)	1	1.0	1.0	100.0
Total	100	100.0	100.0	

QS6. In what ways were you not completely satisfied?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	9	9.0	52.9	52.9
	(Don't know/Refused)	8	8.0	47.1	100.0
	Total	17	17.0	100.0	
Missing	System	83	83.0		
Total		100	100.0		

QS7. How satisfied are you with the performance of your new energy efficiency equipment? Please tell me if you were very satisfied, somewhat satisfied, neither satisfied nor dissatisfied, somewhat dissatisfied, or very dissatisfied.

	-	Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Very dissatisfied	1	1.0	1.0	1.0
	Somewhat dissatisfied	1	1.0	1.0	2.0
	Neither satisfied nor dissatisfied	5	5.0	5.0	7.0
	Somewhat satisfied	10	10.0	10.0	17.0
	Very satisfied	82	82.0	82.0	99.0
	(Don't know/Refused)	1	1.0	1.0	100.0



QS7. How satisfied are you with the performance of your new energy efficiency equipment? Please tell me if you were very satisfied, somewhat satisfied, neither satisfied nor dissatisfied, somewhat dissatisfied, or very dissatisfied.

-	Frequency	Percent	Valid Percent	Cumulative Percent
Very dissatisfied	1	1.0	1.0	1.0
Somewhat dissatisfied	1	1.0	1.0	2.0
Neither satisfied nor dissatisfied	5	5.0	5.0	7.0
Somewhat satisfied	10	10.0	10.0	17.0
Very satisfied	82	82.0	82.0	99.0
(Don't know/Refused)	1	1.0	1.0	100.0
Total	100	100.0	100.0	

QS8. In what ways were you not completely satisfied?

	-	Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	11	11.0	64.7	64.7
	(Don't know/Refused)	6	6.0	35.3	100.0
	Total	17	17.0	100.0	
Missing	System	83	83.0		
Total		100	100.0		



QS9. How satisfied are you with the amount of time your contractor took to install the new equipment?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Very dissatisfied	1	1.0	1.0	1.0
	Somewhat dissatisfied	2	2.0	2.0	3.0
	Somewhat satisfied	16	16.0	16.0	19.0
	Very satisfied	80	80.0	80.0	99.0
	(Don't know/Refused)	1	1.0	1.0	100.0
	Total	100	100.0	100.0	

QS10. In what ways were you not completely satisfied?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	7	7.0	36.8	36.8
	(Don't know/Refused)	12	12.0	63.2	100.0
	Total	19	19.0	100.0	
Missing	System	81	81.0		
Total		100	100.0		

QS10a. Were there costs associated with the installation of the energy efficiency equipment?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	13	13.0	13.0	13.0
	No	82	82.0	82.0	95.0
	(Don't know/Refused)	5	5.0	5.0	100.0
	Total	100	100.0	100.0	



QS10b. What were they?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	10	10.0	76.9	76.9
	(Don't know/Refused)	3	3.0	23.1	100.0
	Total	13	13.0	100.0	
Missing	System	87	87.0		
Total		100	100.0		

QS11. Did a SDG&E representative come to your business to inspect the equipment you had installed?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	67	67.0	67.0	67.0
	No	18	18.0	18.0	85.0
	(Don't know/Refused)	15	15.0	15.0	100.0
	Total	100	100.0	100.0	

QS12. Please rate your satisfaction with the courteousness and professionalism of the inspector who came to your business?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Neither satisfied nor dissatisfied	1	1.0		
	Somewhat satisfied	2	2.0	3.0	4.5
	Very satisfied	63	63.0	94.0	98.5
	(Don't know/Refused)	1	1.0	1.5	100.0
	Total	67	67.0	100.0	
Missing	System	33	33.0		
Total		100	100.0		



QS13. In what ways were you not completely satisfied?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Don't know/Refused)	3	3.0	100.0	100.0
Missing	System	97	97.0		
Total		100	100.0		

QS13a. How satisfied are you with the energy savings you are receiving from your equipment?

	-	Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Somewhat dissatisfied	1	1.0	1.0	1.0
	Neither satisfied nor dissatisfied	6	6.0	6.0	7.0
	Somewhat satisfied	14	14.0	14.0	21.0
	Very satisfied	57	57.0	57.0	78.0
	(Don't know/Refused)	22	22.0	22.0	100.0
	Total	100	100.0	100.0	

QS13b. In what ways were you not completely satisfied?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	13	13.0	61.9	61.9
	(Don't know/Refused)	8	8.0	38.1	100.0
	Total	21	21.0	100.0	
Missing	System	79	79.0		
Total		100	100.0		



QS14. Please rate your overall satisfaction with the Small Business Super Saver Rebate Program?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Somewhat satisfied	11	11.0	11.0	11.0
	Very satisfied	85	85.0	85.0	96.0
	(Don't know/Refused)	4	4.0	4.0	100.0
	Total	100	100.0	100.0	

QS15. In what ways were you not completely satisfied?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	5	5.0	45.5	45.5
	(Don't know/Refused)	6	6.0	54.5	100.0
	Total	11	11.0	100.0	
Missing	System	89	89.0		
Total		100	100.0		

QS16. Have you ever suggested the Small Business Super Saver Rebate Program to someone outside of your business?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	46	46.0	46.0	46.0
	No	53	53.0	53.0	99.0
	(Don't know/Refused)	1	1.0	1.0	100.0
	Total	100	100.0	100.0	



QS17. Were there any energy efficiency upgrades that you wanted to install but were not covered by the Small Business Super Saver Rebate Program?

	-	Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	12	12.0	12.0	12.0
	No	81	81.0	81.0	93.0
	(Don't know/Refused)	7	7.0	7.0	100.0
	Total	100	100.0	100.0	

QS18. What were they?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	11	11.0	91.7	91.7
	(Don't know/Refused)	1	1.0	8.3	100.0
	Total	12	12.0	100.0	
Missing	System	88	88.0		
Total		100	100.0		

QS19. Did you install them anyway?

	-	Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	7	7.0	58.3	58.3
	No	5	5.0	41.7	100.0
	Total	12	12.0	100.0	
Missing	System	88	88.0		
Total		100	100.0		



Case Summary

		Cases						
	Va	lid	Missing		Total			
	N	Percent	N	Percent	N	Percent		
QS19a	5	5.0%	95	95.0%	100	100.0%		

QS19a. Why did you choose not to install the item?

			Responses	
		N	Percent	Percent of Cases
QS19a	(Other)	1	14.3%	20.0%
	(Too expensive)	3	42.9%	60.0%
	(Didn't think they were necessary)	1	14.3%	20.0%
	(Don't believe they will save energy claimed)	1	14.3%	20.0%
	(Don't know/Refused)	1	14.3%	20.0%
	Total	7	100.0%	140.0%



QS20. How clear was the information you received in the Small Business Super Saver Rebate Application that described the Small Business Super Saver Rebate Program? Would you say extremely clear, pretty clear, not very clear or not at all clear?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Pretty clear	21	21.0	35.6	35.6
	Extremely clear	34	34.0	57.6	93.2
	(Don't know/Refused)	4	4.0	6.8	100.0
	Total	59	59.0	100.0	
Missing	System	41	41.0		
Total		100	100.0		

QS21. In what ways was the information not clear?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	5	5.0	22.7	22.7
	(Don't know/Refused)	17	17.0	77.3	100.0
	Total	22	22.0	100.0	
Missing	System	78	78.0		
Total		100	100.0		



QS22. How clear was the information you received on the makes and models of the products listed in the Small Business Super Saver Rebate Application?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Not at all clear	1	1.0	1.7	1.7
	Not very clear	3	3.0	5.1	6.8
	Pretty clear	18	18.0	30.5	37.3
	Extremely clear	30	30.0	50.8	88.1
	(Don't know/Refused)	7	7.0	11.9	100.0
	Total	59	59.0	100.0	
Missing	System	41	41.0		
Total		100	100.0		

QS23. In what ways was the information not clear?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	3	3.0	13.6	13.6
	(Don't know/Refused)	19	19.0	86.4	100.0
	Total	22	22.0	100.0	
Missing	System	78	78.0		
Total	·	100	100.0		



QS24. How helpful was the Small Business Super Saver Rebate Application in helping you with selecting equipment? Would you say it was extremely helpful, pretty helpful, not very helpful, or not at all helpful?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Not at all helpful	4	4.0	6.8	6.8
	Pretty helpful	16	16.0	27.1	33.9
	Extremely helpful	31	31.0	52.5	86.4
	(Don't know/Refused)	8	8.0	13.6	100.0
	Total	59	59.0	100.0	
Missing	System	41	41.0		
Total		100	100.0		

QS25. What would have been more helpful to have in the Rebate Application?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	5	5.0	25.0	25.0
	(Don't know/Refused)	15	15.0	75.0	100.0
	Total	20	20.0	100.0	
Missing	System	80	80.0		
Total	·	100	100.0		



PARTICIPATION BARRIERS

Some people may have doubts or reservations about purchasing energy efficient equipment.

PRIOR to purchasing your equipment, can you tell me if you had any doubts or concerns about the following items?

QP1. Finding a qualified contractor to do the installation?

	•	Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	4	4.0	4.0	4.0
	No	92	92.0	92.0	96.0
	(Don't know/Refused)	4	4.0	4.0	100.0
	Total	100	100.0	100.0	

QP2. Briefly, what happened and how did you overcome this concern?

	-	Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	4	4.0	100.0	100.0
Missing	System	96	96.0		
Total		100	100.0		

QP3. Being able to find parts or a qualified repairman to maintain equipment?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	3	3.0	3.0	3.0
	No	95	95.0	95.0	98.0
	(Don't know/Refused)	2	2.0	2.0	100.0
	Total	100	100.0	100.0	



QP4. Briefly, what happened and how did you overcome this concern?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	3	3.0	100.0	100.0
Missing	System	97	97.0		
Total		100	100.0		

QP5. That the amount of energy your equipment will save may be exaggerated?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	13	13.0	13.0	13.0
	No	78	78.0	78.0	91.0
	(Don't know/Refused)	9	9.0	9.0	100.0
	Total	100	100.0	100.0	

QP6. Briefly, what happened and how did you overcome this concern?

	-	Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	9	9.0	69.2	69.2
	(Don't know/Refused)	4	4.0	30.8	100.0
	Total	13	13.0	100.0	
Missing	System	87	87.0		
Total		100	100.0		



QP7. Energy savings not worth extra price?

	•	Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	2	2.0	2.0	2.0
	No	89	89.0	89.0	91.0
	(Don't know/Refused)	9	9.0	9.0	100.0
	Total	100	100.0	100.0	

QP8. Briefly, what happened and how did you overcome this concern?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	1	1.0	50.0	50.0
	(Don't know/Refused)	1	1.0	50.0	100.0
	Total	2	2.0	100.0	
Missing	System	98	98.0		
Total		100	100.0		

QP9. What is the one thing SDG&E could do to improve the SBSS Program?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	34	34.0	34.0	34.0
	(Don't know/Refused)	66	66.0	66.0	100.0
	Total	100	100.0	100.0	



Case Summary

		Cases					
	Valid		Missing		Total		
	N	Percent	N	Percent	N	Percent	
QP10	100	100.0%	0	.0%	100	100.0%	

QP10. What other programs or services could the utility provide to help you manage your energy use better?

	-	Responses		
		N	Percent	Percent of Cases
QP10	(Other)	9	7.6%	9.0%
	(Email notification of critical usage periods)	13	10.9%	13.0%
	(Email notification of energy trends in my business sector)	20	16.8%	20.0%
	(Web access to energy usage and billing data)	13	10.9%	13.0%
	(Demand Response training classes)	2	1.7%	2.0%
	(Energy Efficiency training classes)	2	1.7%	2.0%
	(Green Energy training classes)	3	2.5%	3.0%
	(Don't know/Refused)	57	47.9%	57.0%
	Total	119	100.0%	119.0%



SDG&E Battery of questions

QDC1a. Have you ever...Visited San Diego Gas and Electric's website?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	13	13.0	39.4	39.4
	No	19	19.0	57.6	97.0
	(Don't know/Refused)	1	1.0	3.0	100.0
	Total	33	33.0	100.0	
Missing	System	67	67.0		
Total		100	100.0		

QDC1a2. Did you see anything on the website about energy efficiency opportunities?

	<u>-</u>	Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	6	6.0	42.9	42.9
	No	8	8.0	57.1	100.0
	Total	14	14.0	100.0	
Missing	System	86	86.0		
Total		100	100.0		



QDC1b. Have you ever...Received information from San Diego Gas and Electric through the mail, such as a bill insert or newsletter with information about energy efficiency opportunities?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	25	25.0	71.4	71.4
	No	8	8.0	22.9	94.3
	(Don't know/Refused)	2	2.0	5.7	100.0
	Total	35	35.0	100.0	
Missing	System	65	65.0		
Total		100	100.0		

QDC1c. Have you ever... Received an email from the San Diego Gas and Electric utility regarding energy efficiency information?

	<u>-</u>	Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	5	5.0	15.6	15.6
	No	27	27.0	84.4	100.0
	Total	32	32.0	100.0	
Missing	System	68	68.0		
Total		100	100.0		



QDC1d. Have you ever... Attended an event, such as a business forum or trade meeting, where information about energy efficiency was distributed?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	5	5.0	15.2	15.2
	No	28	28.0	84.8	100.0
	Total	33	33.0	100.0	
Missing	System	67	67.0		
Total		100	100.0		

QDC1e. Have you ever... Seen advertisements in a newspaper or trade journal regarding energy efficiency?

	<u>-</u>	Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	15	15.0	42.9	42.9
	No	20	20.0	57.1	100.0
	Total	35	35.0	100.0	
Missing	System	65	65.0		
Total		100	100.0		



QDC1f. Have you ever... Heard about energy efficiency opportunities by television or radio specifically for Flex Your Power?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	14	14.0	43.8	43.8
	No	17	17.0	53.1	96.9
	(Don't know/Refused)	1	1.0	3.1	100.0
	Total	32	32.0	100.0	
Missing	System	68	68.0		
Total		100	100.0		

QDC1g. Have you ever... Learned about energy efficiency efforts from a contractor or vendor?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	18	18.0	54.5	54.5
	No	15	15.0	45.5	100.0
	Total	33	33.0	100.0	
Missing	System	67	67.0		
Total		100	100.0		



QDC1h. Have you ever... Been contacted in person by San Diego Gas and Electric, (such as by an Account Executive or Commercial Service Technician) about energy efficiency opportunities?

	-	Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	14	14.0	42.4	42.4
	No	19	19.0	57.6	100.0
	Total	33	33.0	100.0	
Missing	System	67	67.0		
Total		100	100.0		

QDC1i. Have you ever... Called San Diego Gas and Electric and had someone inform you about energy efficiency opportunities?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	4	4.0	12.5	12.5
	No	28	28.0	87.5	100.0
	Total	32	32.0	100.0	
Missing	System	68	68.0		
Total		100	100.0		



QDC1j. Have you ever... Heard about energy efficiency opportunities from your local government or from a non-profit organization in your community?

	-	Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	5	5.0	15.6	15.6
	No	25	25.0	78.1	93.8
	(Don't know/Refused)	2	2.0	6.2	100.0
	Total	32	32.0	100.0	
Missing	System	68	68.0		
Total		100	100.0		

QDC1k. Have you ever... Attended a training seminar provided by San Diego Gas and Electric?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	2	2.0	5.7	5.7
	No	33	33.0	94.3	100.0
	Total	35	35.0	100.0	
Missing	System	65	65.0		
Total		100	100.0		



QDC11. Have you ever... Performed an Internet search for energy efficiency information and/or programs?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	6	6.0	17.1	17.1
	No	29	29.0	82.9	100.0
	Total	35	35.0	100.0	
Missing	System	65	65.0		
Total	-	100	100.0		

QDC2a1. On a scale of 1 to 5 where 1 is not at all useful and 5 is very useful, how useful did you find the information on San Diego Gas and Electric's website?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	-4-	4	4.0	66.7	66.7
	-5- Very useful	2	2.0	33.3	100.0
	Total	6	6.0	100.0	
Missing	System	94	94.0		
Total	•	100	100.0		



QDC2a2. On a scale of 1 to 5 where 1 is not at all useful and 5 is very useful, how useful did you find the information provided by San Diego Gas and Electric through the mail?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	-1- Not at all useful	2	2.0	8.0	8.0
	-2-	1	1.0	4.0	12.0
	-3-	4	4.0	16.0	28.0
	-4-	5	5.0	20.0	48.0
	-5- Very useful	13	13.0	52.0	100.0
	Total	25	25.0	100.0	
Missing	System	75	75.0		
Total		100	100.0		

QDC2a3. On a scale of 1 to 5 where 1 is not at all useful and 5 is very useful, how useful did you find the email information provided by San Diego Gas and Electric?

	•	Frequency	Percent	Valid Percent	Cumulative Percent
Valid	-3-	1	1.0	20.0	20.0
	-4-	3	3.0	60.0	80.0
	-5- Very useful	1	1.0	20.0	100.0
	Total	5	5.0	100.0	
Missing	System	95	95.0		
Total		100	100.0		

Case Summary

		Cases						
	Valid		Missing		Total			
	N	Percent	N	Percent	N	Percent		
QDC3	21	21.0%	79	79.0%	100	100.0%		



QDC3. What would have made this information more useful?

			Responses		
		N	Percent	Percent of Cases	
QDC3	(Other)	5	23.8%	23.8%	
	(Don't know/Refused)	16	76.2%	76.2%	
	Total	21	100.0%	100.0%	

Case Summary

		Cases					
	Valid		Missing		Total		
	N	Percent	N	Percent	N	Percent	
QDC4	100	100.0%	0	.0%	100	100.0%	



QDC4. Based on all of the things that you can think of, what is the best way to provide you with information about energy efficiency opportunities?

			Responses	
		N	Percent	Percent of Cases
QDC4	(Other)	6	4.6%	6.0%
	(Gas or electric utility website)	18	13.7%	18.0%
	(Information from utility received through the mail, such as a bill insert or newsletter)	58	44.3%	58.0%
	(An email from gas or electric utility)	21	16.0%	21.0%
	(An event, such as a business forum or trade meeting)	3	2.3%	3.0%
	(Advertisements in a newspaper or trade journal)	3	2.3%	3.0%
	(Television or radio advertisements specifically for Flex Your Power	5	3.8%	5.0%
	(A contractor)	3	2.3%	3.0%
	(A representative of the gas or electric utility- didn't mention Account Representative)	7	5.3%	7.0%
	(Specifically mentioned Account Executive or Account Representative)	2	1.5%	2.0%
	(Don't know/Refused)	5	3.8%	5.0%
	Total	131	100.0%	131.0%



QF0. Finally, I just have some general questions about your business. What business sector does your firm belong to?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	35	35.0	35.0	35.0
	(Retail or wholesale)	23	23.0	23.0	58.0
	(Manufacturing)	19	19.0	19.0	77.0
	(Agricultural/Mining)	2	2.0	2.0	79.0
	(Financial Services)	3	3.0	3.0	82.0
	(Real Estate)	3	3.0	3.0	85.0
	(Transportation)	1	1.0	1.0	86.0
	(Marketing and Sales)	1	1.0	1.0	87.0
	(Medical)	1	1.0	1.0	88.0
	(Non-Profit)	6	6.0	6.0	94.0
	(Government)	2	2.0	2.0	96.0
	(Don't know/Refused)	4	4.0	4.0	100.0
	Total	100	100.0	100.0	

QF1. Do you lease or own your facility?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	1	1.0	1.0	1.0
	Lease	71	71.0	71.0	72.0
	Own	27	27.0	27.0	99.0
	(Don't know/Refused)	1	1.0	1.0	100.0
	Total	100	100.0	100.0	



QF3a. What is the approximate TOTAL square footage of your facility at this location?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Less than 1,500 sq ft)	18	18.0	18.0	18.0
	(1,500 - 4,999 sq ft)	27	27.0	27.0	45.0
	(5,000 - 9,999 sq ft)	12	12.0	12.0	57.0
	(10,000 - 24,999 sq ft)	22	22.0	22.0	79.0
	(25,000 - 49,999 sq ft)	2	2.0	2.0	81.0
	(50,000 - 74,999 sq ft)	1	1.0	1.0	82.0
	(75,000 - 99,999 sq ft)	1	1.0	1.0	83.0
	(Over 100,000 sq ft)	2	2.0	2.0	85.0
	(Don't know/Refused)	15	15.0	15.0	100.0
	Total	100	100.0	100.0	

QF3b. What is the approximate percentage of your square footage that is AIR- CONDITIONED?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0%	19	19.0	19.0	19.0
	1-50%	33	33.0	33.0	52.0
	51-99%	13	13.0	13.0	65.0
	100%	28	28.0	28.0	93.0
	(Don't know/Refused)	7	7.0	7.0	100.0
	Total	100	100.0	100.0	



QF4a. Is your business in one location, or do you have multiple locations?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	One location	80	80.0	80.0	80.0
	Multiple locations	18	18.0	18.0	98.0
	(Don't know/refused)	2	2.0	2.0	100.0
	Total	100	100.0	100.0	

QF4b. Is your business in its own building, or are you located in a building with multiple businesses?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Own building	50	50.0	50.0	50.0
	Multiple businesses in building	47	47.0	47.0	97.0
	(Don't know/refused)	3	3.0	3.0	100.0
	Total	100	100.0	100.0	

QF5. Do you have anyone devoted full-time as a building engineer or facility manager?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	21	21.0	21.0	21.0
	No	76	76.0	76.0	97.0
	(Don't know/Refused)	3	3.0	3.0	100.0
	Total	100	100.0	100.0	



QF6. Would you say that your gas and electric costs represent a...

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Very small	5	5.0	5.0	5.0
	Small	40	40.0	40.0	45.0
	Medium	28	28.0	28.0	73.0
	Large	14	14.0	14.0	87.0
	Very large part of your operating costs each month	7	7.0	7.0	94.0
	(Don't know/refused)	6	6.0	6.0	100.0
	Total	100	100.0	100.0	

QF7. On average, how many hours a day is your facility in use?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Less than 8 hours	2	2.0	2.0	2.0
	8 to 11 hours	68	68.0	68.0	70.0
	12 to 15 hours	17	17.0	17.0	87.0
	16 to 23 hours	5	5.0	5.0	92.0
	24 hours	6	6.0	6.0	98.0
	(Don't know/refused)	2	2.0	2.0	100.0
	Total	100	100.0	100.0	



QA1a Open-ended Responses. What did you install?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		99	99.0	99.0	99.0
	Energy efficient lights.	1	1.0	1.0	100.0
	Total	100	100.0	100.0	

QA2 Other Responses. How did you first learn about the Small Business Super Saver rebate program?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		72	72.0	72.0	72.0
	A contractor walked in.	1	1.0	1.0	73.0
	A lady walked in and was talking about the program for SDG&E.	1	1.0	1.0	74.0
	A man came into my shop.	1	1.0	1.0	75.0
	A salesman came to the business.	1	1.0	1.0	76.0
	Flyers were sent out by the contractor.	1	1.0	1.0	77.0
	I believe that i received a call.	1	1.0	1.0	78.0
	It was a walk-in.	1	1.0	1.0	79.0
	Landlord	2	2.0	2.0	81.0
	Salesman	1	1.0	1.0	82.0
	SDG&E sent us an e-mail.	1	1.0	1.0	83.0
	Someone came into the office.	1	1.0	1.0	84.0
	The company representing the program came into our business and inspected our lighting and suggested an upgrade. He also informed us that it would be free of cost.	1	1.0	1.0	85.0



The contractor came in and talked to me.	1	1.0	1.0	86.0
The contractor came in to the business and informed us from the program. The contractor was from cal lighting.	1	1.0	1.0	87.0
The contractor came to solicit.	1	1.0	1.0	88.0
The guy next door told me about the program.	1	1.0	1.0	89.0
The installer told me about.	1	1.0	1.0	90.0
Through the installation company.	1	1.0	1.0	91.0
Vendors	1	1.0	1.0	92.0
Walk- in	1	1.0	1.0	93.0
Walk-in	4	4.0	4.0	97.0
Wanted to be more energy efficient so we went to the website to see what was available.	1	1.0	1.0	98.0
We had a contractor that was going door-to-door.	1	1.0	1.0	99.0
We went online to look up information.	1	1.0	1.0	100.0
Total	100	100.0	100.0	



QA3b Open-ended Responses. Concerning your choice of equipment, which was more important to you, your contractor's advice or the information in the Small Business Super Saver rebate application?

	Î	Frequency	Percent	Valid percent	Cumulative percent
Valid		89	89.0	89.0	89.0
	Both	5	5.0	5.0	94.0
	Both, I wouldn't have known about the program.	1	1.0	1.0	95.0
	Both, it's simply the matter of saving money.	1	1.0	1.0	96.0
	Contractors advice and rebate application	1	1.0	1.0	97.0
	Rebate application and contractor's advice	1	1.0	1.0	98.0
	Small Business Super Saver rebate application and contractor's advice.	1	1.0	1.0	99.0
	They both played a big part.	1	1.0	1.0	100.0
	Total	100	100.0	100.0	



QA4a Other Responses. What prompted you to make this decision?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		96	96.0	96.0	96.0
	I was interested in the free installation	1	1.0	1.0	97.0
	The owner thought is was required.	1	1.0	1.0	98.0
	We needed the new bar under the light fixture.	1	1.0	1.0	99.0
	We needed to protect the equipment that we have from the heat from the sun so we needed the tints.		1.0	1.0	100.0
	Total	100	100.0	100.0	

QA5a Other Responses. What prompted you to make this decision?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		97	97.0	97.0	97.0
	The owner thought it was required.	1	1.0	1.0	98.0
	We needed new lights	1	1.0	1.0	99.0
	We needed to protect the equipment.	1	1.0	1.0	100.0
	Total	100	100.0	100.0	



QA6 Open-ended Responses. What changed your mind to go with the energy efficient model?

				Cumulative
	Frequency	Percent	Valid percent	percent
	31	31.0	31.0	31.0
Because it is energy efficient	1	1.0	1.0	32.0
Because we liked the idea of being more energy efficient	1	1.0	1.0	33.0
Better savings	1	1.0	1.0	34.0
Contractor prompted us	1	1.0	1.0	35.0
Contractor samples	1	1.0	1.0	36.0
Contractor's advice	1	1.0	1.0	37.0
Contractors explanation about energy savings and no cost.	1	1.0	1.0	38.0
Contractors explanation of energy efficient.	1	1.0	1.0	39.0
Cost	1	1.0	1.0	40.0
Cost saving.	1	1.0	1.0	41.0
Energy efficiency and better lighting	1	1.0	1.0	42.0
Energy savings	2	2.0	2.0	44.0
Explanation by contractor	1	1.0	1.0	45.0
Explanation of program by contractor	1	1.0	1.0	46.0
Fact that we could save energy and cost.	1	1.0	1.0	47.0
Free	2	2.0	2.0	49.0
I decided it would save me a lot of money.	1	1.0	1.0	50.0



I found out that the program would only cost us a little money.	1	1.0	1.0	51.0
I just started a new position and we were trying to make cut backs where ever we could.	1	1.0	1.0	52.0
I learned i was paying for it on my utility bill.	1	1.0	1.0	53.0
I thought there would be a large decrease in our energy bill and a long life for the new fluorescent bulbs.	1	1.0	1.0	54.0
I wanted to save money on my energy bill each month.	1	1.0	1.0	55.0
It is free	1	1.0	1.0	56.0
It saves a lot of money	1	1.0	1.0	57.0
It saves us money and the long run	1	1.0	1.0	58.0
It was free	4	4.0	4.0	62.0
It will save me a lot of energy	1	1.0	1.0	63.0
Lowering my energy bill	1	1.0	1.0	64.0
More energy efficient and it was free	1	1.0	1.0	65.0
My neighbor told me about the energy savings.	1	1.0	1.0	66.0
Needed light bulbs replaced	1	1.0	1.0	67.0
Needed lights installed.	1	1.0	1.0	68.0
No cost and saving energy	1	1.0	1.0	69.0



	1 ,			
Rebate and saving energy.	1	1.0	1.0	70.0
Saving electricity.	1	1.0	1.0	71.0
The amount of energy savings.	1	1.0	1.0	72.0
The amount of money i would save in energy cost.	1	1.0	1.0	73.0
The contractor	1	1.0	1.0	74.0
The contractor was the deciding factor.	1	1.0	1.0	75.0
The cost savings	1	1.0	1.0	76.0
The fact that it will save money.	1	1.0	1.0	77.0
The points that were made about efficiency.	1	1.0	1.0	78.0
The price and energy efficiency.	1	1.0	1.0	79.0
The program and it seemed like a good deal.	1	1.0	1.0	80.0
The promise of brighter lights, it is free and energy savings.	1	1.0	1.0	81.0
The rebate	1	1.0	1.0	82.0
The rebate program and how it would reduce the utility bill.		1.0	1.0	83.0
The rebate program and thinking green	1	1.0	1.0	84.0
The rebate seemed to be an attractive offer.	1	1.0	1.0	85.0



The rebate will lower the cost of my budget.	1	1.0	1.0	86.0
The salesman convinced me that this would be a service that I would enjoy.	1	1.0	1.0	87.0
The savings	1	1.0	1.0	88.0
They said it would save a little more energy.	1	1.0	1.0	89.0
They save money.	1	1.0	1.0	90.0
To conserve more energy.	1	1.0	1.0	91.0
To cut energy costs	1	1.0	1.0	92.0
To save energy	1	1.0	1.0	93.0
To save energy and better lighting.	1	1.0	1.0	94.0
To save money on energy bill	1	1.0	1.0	95.0
We thought it would be environmental friendly.	1	1.0	1.0	96.0
We wanted brighter lights	1	1.0	1.0	97.0
We wanted save energy.	1	1.0	1.0	98.0
We were going to change the fixtures one bulb at a time but we found that this would be a better way to do it.	1	1.0	1.0	99.0
We were looking for ways to reduce the cost of the electric overhead.	1	1.0	1.0	100.0
Total	100	100.0	100.0	



QA11 Other Responses. What was the most important factor in your decision to purchase energy efficient equipment?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		80	80.0	80.0	80.0
	Brighter lights	1	1.0	1.0	81.0
	Compliance	1	1.0	1.0	82.0
	Conserve energy.	1	1.0	1.0	83.0
	Doing something good for the environment.	1	1.0	1.0	84.0
	Easy	1	1.0	1.0	85.0
	Energy savings	1	1.0	1.0	86.0
	I wanted to save money	1	1.0	1.0	87.0
	Monthly cost savings	1	1.0	1.0	88.0
	Saving of energy.	1	1.0	1.0	89.0
	Saving the equipment that sell from the heat from the sun.		1.0	1.0	90.0
	That it turned out to be free.	1	1.0	1.0	91.0
	The fact that it was energy efficient.	1	1.0	1.0	92.0
	The money savings and helping the environment.	1	1.0	1.0	93.0
	The most important factor was upgrading my equipment to save on my energy cost.	1	1.0	1.0	94.0
	The most important thing was saving money.	1	1.0	1.0	95.0
	The owner thought it was required.	1	1.0	1.0	96.0
	The rebate savings	1	1.0	1.0	97.0



They needed to be done.	1	1.0	1.0	98.0
To save money	1	1.0	1.0	99.0
To save money and energy	1	1.0	1.0	100.0
Total	100	100.0	100.0	

QA11c Open-ended Responses. How did your contractor identify the energy efficient measures for you?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		97	97.0	97.0	97.0
	A comparison of the light bulbs.	1	1.0	1.0	98.0
	Found the old ballasts and told us which were eligible to be replaced.		1.0	1.0	99.0
	He went over a list of measures.	1	1.0	1.0	100.0
	Total	100	100.0	100.0	

QA14 Open-ended Responses. Which equipment?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		99	99.0	99.0	99.0
	That's for the t'8s	1	1.0	1.0	100.0
	Total	100	100.0	100.0	



QA15 Other Responses. Why did you decide not to use it?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		86	86.0	86.0	86.0
	Did not need any work done requiring loan	1	1.0	1.0	87.0
	Didn't need it	1	1.0	1.0	88.0
	I did not have interest in the program.	1	1.0	1.0	89.0
	I get my equipment through someone else that I'm close to.	1	1.0	1.0	90.0
	It wasn't a matter of money it was to make things more efficient.	1	1.0	1.0	91.0
	Lighting covered. No need for anything else.	1	1.0	1.0	92.0
	No need	1	1.0	1.0	93.0
	No need.	1	1.0	1.0	94.0
	No other equipment to upgrade	1	1.0	1.0	95.0
	The fact that the program was designed to cost me nothing.	1	1.0	1.0	96.0
	We are relocating to a different facility and are not making any upgrades.	1	1.0	1.0	97.0
	We do not make long term decisions like loans because we lease the facility.	1	1.0	1.0	98.0
	We had no need.	1	1.0	1.0	99.0
	We thought we were too small of a business to qualify.	1	1.0	1.0	100.0
	Total	100	100.0	100.0	



QS0 Other Responses. How did you find your contractor?

					Cumulative
		Frequency	Percent	Valid percent	percent
Valid		38	38.0	38.0	38.0
	A contractor walked in off the street.	1	1.0	1.0	39.0
	Actually he found me.	1	1.0	1.0	40.0
	Door to door	5	5.0	5.0	45.0
	Flyer sent out by the contractor	1	1.0	1.0	46.0
	He came into my business and told me about the super saver rebate program.	1	1.0	1.0	47.0
	He came to me.	2	2.0	2.0	49.0
	He came to the business.	1	1.0	1.0	50.0
	He found my business, i didn't find him.	1	1.0	1.0	51.0
	He found us.	1	1.0	1.0	52.0
	He walked in the business	1	1.0	1.0	53.0
	He walked in the office.	1	1.0	1.0	54.0
	He walked into business	1	1.0	1.0	55.0
	He walked into my business and informed me of the rebate program.	1	1.0	1.0	56.0
	He walked into our business with information	1	1.0	1.0	57.0
	He was a walk-in.	1	1.0	1.0	58.0
	He was already our contractor	1	1.0	1.0	59.0
	He was doing similar work at another business location and came over to our business.	1	1.0	1.0	60.0



Total	100	100.0	100.0	
We had prior experience with the contractor.	1	1.0	1.0	100
Walked into business.	2	2.0	2.0	99
Walked into business	1	1.0	1.0	97
Walked in	3	3.0	3.0	90
Walk-in	12	12.0	12.0	93
Walk in	7	7.0	7.0	8:
Through SDG&E	1	1.0	1.0	7
restaurants and bars.				
replacing other fans at other	1	1.0	1.0	7.
They were in the neighborhood				
They were in the neighborhood	1	1.0	1.0	7:
They walked in the business	1	1.0	1.0	7
They walked in	1	1.0	1.0	7
They found us.	1	1.0	1.0	6
They came to the business and informed us of this program.	1	1.0	1.0	6
The contractors walking into my business.	1	1.0	1.0	6
The contractor was someone we had used before	1	1.0	1.0	6
SDG&E	1	1.0	1.0	6
San diego gas and electric representative	1	1.0	1.0	6
Referred to us.	1	1.0	1.0	6
Land	1	1.0	1.0	6
I saw him in a store.	1	1.0	1.0	6



QS2 Open-ended Responses. In what ways were you not completely satisfied?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		84	84.0	84.0	84.0
	A month after installation the ballast came out and we still have no lights in one section. We cannot reach anybody to complain.		1.0	1.0	85.0
	It took him two days to complete the work.	1	1.0	1.0	86.0
	It took too long for them to install it.	1	1.0	1.0	87.0
	It wasn't the contractor's fault, but every single light bulb we purchased has gone out, on the average of one every two months.		1.0	1.0	88.0
	Lights were incorrectly installed. He came back more than twice to finish.	1	1.0	1.0	89.0
	One of the fans they installed went bad very quickly and we had to pay out of pocket to replace it.	1	1.0	1.0	90.0
	Promised 4 more efficient and brighter lights. They installed only 2 and they are not brighter. Also promised no out of pocket expenses and we had to pay for disposal of old bulbs.	1	1.0	1.0	91.0
	Some lights didn't work.	1	1.0	1.0	92.0



The crew made a rather large mess.	1	1.0	1.0	93.0
The lights are not as bright as i would like them.	1	1.0	1.0	94.0
The quality of the light does not seem to be as bright.	1	1.0	1.0	95.0
They broke covers on fluorescent lights and part of our bannister.	1	1.0	1.0	96.0
They broke the lights and took all old light bulbs.	1	1.0	1.0	97.0
They had to come back several times.	1	1.0	1.0	98.0
They only installed 2 bulbs when they promised 4 bulbs.	1	1.0	1.0	99.0
When the contractor presented the product he made it out to be a brighter light, when actually they are not. The ballast as well.	1	1.0	1.0	100.0
Total	100	100.0	100.0	

QS4 Open-ended Responses. In what ways was it not very easy?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		98	98.0	98.0	98.0
	No	1	1.0	1.0	99.0
	We found a couple of contractors that didn't do lights and the others did not get back to us		1.0	1.0	100.0
	Total	100	100.0	100.0	



QS6 Open-ended Responses. In what ways were you not completely satisfied?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		91	91.0	91.0	91.0
	Kkkkk	1	1.0	1.0	92.0
	Lights installed incorrectly. He had to come back more than 2 times to finish.		1.0	1.0	93.0
	No	1	1.0	1.0	94.0
	No phone calls returned about complaint.	1	1.0	1.0	95.0
	Not dressed properly and not very professional.	1	1.0	1.0	96.0
	The installation could have been scheduled at a better time.	1	1.0	1.0	97.0
	They broke cover off fluorescent light and part of our bannister.	1	1.0	1.0	98.0
	They broke one of our machines.	1	1.0	1.0	99.0
	They were rude.	1	1.0	1.0	100.0
	Total	100	100.0	100.0	



QS8 Open-ended Responses. In what ways were you not completely satisfied?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		89	89.0	89.0	89.0
	Didn't save as great as thought.	1	1.0	1.0	90.0
	I do not believe bills are lower.	1	1.0	1.0	91.0
	I don't know if it's affecting the bill or not.	1	1.0	1.0	92.0
	I have not checked my bills as of yet, so i need to make the comparison.		1.0	1.0	93.0
	It is just hard to determine how much energy we use.	1	1.0	1.0	94.0
	Lights are not as bright as i would like them.	1	1.0	1.0	95.0
	The fluorescent bulbs are not long life as they were presented to be.	1	1.0	1.0	96.0
	The lamp didn't last as long as we expected it to.	1	1.0	1.0	97.0
	The lights seem a little darker than the old ones.	1	1.0	1.0	98.0
	The new light bulbs did not last as long as the ones they removed.	1	1.0	1.0	99.0
	There is no evidence of energy savings and lights are not any brighter.		1.0	1.0	100.0
	Total	100	100.0	100.0	



QS10 Open-ended Responses. In what ways were you not completely satisfied?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		93	93.0	93.0	93.0
	Again they had to come back several times to complete the job.	1	1.0	1.0	94.0
	He took too long installing.	1	1.0	1.0	95.0
	It took him two days to install light bulbs. That's ridiculous.	1	1.0	1.0	96.0
	Light didn't work at first.	1	1.0	1.0	97.0
	The contractor had to come back more than 2 times to finish job correctly. He then brought his supervisor.	1	1.0	1.0	98.0
	They broke cover off our fluorescent lights during installation.	1	1.0	1.0	99.0
	We had to stop operation for awhile.	1	1.0	1.0	100.0
	Total	100	100.0	100.0	



QS10b Open-ended Responses. What were they?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		90	90.0	90.0	90.0
	\$30 to \$35 per unit for bulbs.	1	1.0	1.0	91.0
	700 dollars.	1	1.0	1.0	92.0
	98	1	1.0	1.0	93.0
	Disposal of old bulbs.	1	1.0	1.0	94.0
	I don't remember, i just remember that i paid 50% of them.	1	1.0	1.0	95.0
	Just about \$10 a light bulb.	1	1.0	1.0	96.0
	Program cost.	1	1.0	1.0	97.0
	The lights	1	1.0	1.0	98.0
	The only cost i endured was sales tax.	1	1.0	1.0	99.0
	We had to put in extras. Other sizes of lights.	1	1.0	1.0	100.0
	Total	100	100.0	100.0	



QS13b Open-ended Responses. In what ways were you not completely satisfied?

		1	D.	37 11 1	Cumulative
	<u> </u>	Frequency	Percent	Valid percent	percent
Valid		87	87.0	87.0	87.0
	Did not notice any changes in my bills and also as a matter of fact my bill has gone up a little. I'm not sure if it is from the rate hike or not.	1	1.0	1.0	88.0
	Do not believe that we are saving money on energy bills.	1	1.0	1.0	89.0
	Haven't seen any changes.	1	1.0	1.0	90.0
	I don't know how much i am saving.	1	1.0	1.0	91.0
	I have not noticed a big difference just yet.	1	1.0	1.0	92.0
	I hoped it would save more.	1	1.0	1.0	93.0
	I just know that it would save more money than that.	1	1.0	1.0	94.0
	It's just hard to determine how much energy i use.	1	1.0	1.0	95.0
	Smaller than expected.	1	1.0	1.0	96.0
	The bill is the same.	1	1.0	1.0	97.0
	The savings were smaller than expected.	1	1.0	1.0	98.0
	We are not getting expected energy savings.	1	1.0	1.0	99.
	You always want to save more.	1	1.0	1.0	100.0
	Total	100	100.0	100.0	



QS15 Open-ended Responses. In what ways were you not completely satisfied?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		95	95.0	95.0	95.0
	Contractors do not return phone calls when we have a problem.	1	1.0	1.0	96.0
	Light bulbs have shorter life than the ones removed and we are not saving the amount of energy expected.		1.0	1.0	97.0
	No proof of energy savings.	1	1.0	1.0	98.0
	They could have made it more easy to read.	1	1.0	1.0	99.0
	We thought we would notice energy savings.	1	1.0	1.0	100.0
	Total	100	100.0	100.0	



QS18 Open-ended Responses. What were they?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		89	89.0	89.0	89.0
	Additional lighting and different types of lighting offered	1	1.0	1.0	90.0
	Compressors not covered.	1	1.0	1.0	91.0
	Energy efficient air conditioning	1	1.0	1.0	92.0
	I really wanted the sensor typed lights but they were not available.	1	1.0	1.0	93.0
	It was one size, so we had to put in other sizes.	1	1.0	1.0	94.0
	Lights for the warehouse	1	1.0	1.0	95.0
	Paid for 2 bulbs	1	1.0	1.0	96.0
	Smaller shorter fluorescent lights	1	1.0	1.0	97.0
	Some inside lighting.	1	1.0	1.0	98.0
	Some lights were not covered under the program and i am not really sure why and no one really explained it to me.	1	1.0	1.0	99.0
	There were some u-shaped fluorescent lights that were not eligible and neither was the ballast.		1.0	1.0	100.0
	Total	100	100.0	100.0	



QS19a Other Responses. Why did you choose not to install them?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		99	99.0	99.0	99.0
	We use mostly outside lighting.	1	1.0	1.0	100.0
	Total	100	100.0	100.0	

QS21 Open-ended Responses. In what ways was the information not clear?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		95	95.0	95.0	95.0
	It was a little long.	1	1.0	1.0	96.0
	Just not clear (neither very clear or clear)	1	1.0	1.0	97.0
	Not too clear about ice machines.	1	1.0	1.0	98.0
	Relied on contractors	1	1.0	1.0	99.0
	The salesman was clear about the information.	1	1.0	1.0	100.0
	Total	100	100.0	100.0	



QS23 Open-ended Responses. In what ways was the information not clear?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		97	97.0	97.0	97.0
	A little fuzzy, but the contractor explained it to us.	1	1.0	1.0	98.0
	Generally what fixture amount	1	1.0	1.0	99.0
	You would have to know about the programs already.	1	1.0	1.0	100.0
	Total	100	100.0	100.0	

QS25 Open-ended Responses. What would have been more helpful to have in the Rebate Application?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		94	94.0	94.0	94.0
	Contacted directly by San Diego Gas and Electric not by contractor walk in		1.0	1.0	95.0
	Did not want to make any upgrades at that time. They talked me into it.	1	1.0	1.0	96.0
	Explanation of out of pocket expenses (disposal of old bulbs).	1	1.0	1.0	97.0
	No	1	1.0	1.0	98.0
	So many people make empty promises on how they are going to do things for you and they never get done.	1	1.0	1.0	99.0
	The person helped more than the printed information.	1	1.0	1.0	100.0
	Total	100	100.0	100.0	



QP2 Open-ended Responses. Briefly, what happened and how did you overcome this concern?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		96	96.0	96.0	96.0
	Called references	1	1.0	1.0	97.0
	Everything was explained to me.	1	1.0	1.0	98.0
	Wasn't really confident.	1	1.0	1.0	99.0
	We just filled it out.	1	1.0	1.0	100.0
	Total	100	100.0	100.0	

QP4 Open-ended Responses. Briefly, what happened and how did you overcome this concern?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		97	97.0	97.0	97.0
	Has not been resolved. Still without ballast and less light.	1	1.0	1.0	98.0
	The lighting was still under warranty so they had to replace broken part.	1	1.0	1.0	99.0
	There is not always quality workers but yet they still are licensed.	1	1.0	1.0	100.0
	Total	100	100.0	100.0	



QP6 Open-ended Responses. Briefly, what happened and how did you overcome this concern?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		91	91.0	91.0	91.0
	I am still concerned.	1	1.0	1.0	92.0
	I don't know.	1	1.0	1.0	93.0
	No one really knows whether they will really save money.	1	1.0	1.0	94.0
	Nothing	1	1.0	1.0	95.0
	Nothing.	2	2.0	2.0	97.0
	Once i received the bill i was happy.	1	1.0	1.0	98.0
	The statements that i heard from the other people who deal with the program.		1.0	1.0	99.0
	We just did it.	1	1.0	1.0	100.0
	Total	100	100.0	100.0	

QP8 Open-ended Responses. Briefly, what happened and how did you overcome this concern?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		99	99.0	99.0	99.0
	They promised lower energy bills	1	1.0	1.0	100.0
	Total	100	100.0	100.0	

QP9 Open-ended Responses. What is the one thing SDG&E could do to improve the SBSS Program?

			Valid	Cumulative
	Frequency	Percent	percent	percent
Valid	66	66.0	66.0	66.0



Advertise more.	1	1.0	1.0	67.0
Advertisement	1	1.0	1.0	68.0
Better notification	1	1.0	1.0	69.0
Do more advertising on websites.	1	1.0	1.0	70.0
Do not have contractor just walk into business. We would prefer notification by website or email that they are coming and should show proper id when arriving.	1	1.0	1.0	71.0
Faster installation. It took 6 months and a ton of paperwork.	1	1.0	1.0	72.0
Give business references for contractors.	1	1.0	1.0	73.0
Have the SDG&E representative doing the solicitation.	1	1.0	1.0	74.0
I believe that there should be more attention to the people that deal with the billing and the employees.		1.0	1.0	75.0
I think maybe to alert the general businesses of the available programs that are for small businesses	1	1.0	1.0	76.0
I would rather have heard about everything from SDG&E.	1	1.0	1.0	77.0
If they could give us a before and after comparison.	1	1.0	1.0	78.0



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If they had a way to compare your energy usage that would be great.	1	1.0	1.0	79.0
Include all types of lights.	1	1.0	1.0	80.
Just do not change anything and keeps things in order	1	1.0	1.0	81.
Make information about out of pocket expenses.	1	1.0	1.0	82.
Make more money available to allow more equipment to be installed into the business.	1	1.0	1.0	83.
Make people aware.	1	1.0	1.0	84.
Make the people aware of the program.	1	1.0	1.0	85
Maybe include more lighting. Right now there is not much lighting included.	1	1.0	1.0	86
More information directly from San Diego Gas and Electric	1	1.0	1.0	87
No contractors. We want to deal directly with SDG&E.	1	1.0	1.0	88
Not have contractors walk into business.	1	1.0	1.0	89
Nothing	1	1.0	1.0	90
Nothing I can think of.	1	1.0	1.0	91
Offer superior lighting.	1	1.0	1.0	92
Personal representative to explain the program. They could also send an e-mail because mail can be easily thrown away.	1	1.0	1.0	93



Total	100	100.0	100.0	
We need more information about program directly from San Diego gas and electric not from a contractor who just walks in the business.	1	1.0	1.0	100.0
They should let businesses know if contractors are walking into businesses and provide references to contact.		1.0	1.0	99.(
They should extend to homes and not just businesses.	1	1.0	1.0	98.
They could make the sensor lights available	1	1.0	1.0	97.0
They could inform all the businesses.	1	1.0	1.0	96.
They could extend rebate to cover more things.	1	1.0	1.0	95.
Provide residential services not just businesses.	1	1.0	1.0	94.



QP10 Other Responses. What other programs or services could the utility provide to help you manage your energy use better?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		90	90.0	90.0	90.0
	L	1	1.0	1.0	91.0
	A live person to explain energy efficiency	1	1.0	1.0	92.0
	Education and more free programs	1	1.0	1.0	93.0
	How to cut refrigeration costs.	1	1.0	1.0	94.0
	In business display.	1	1.0	1.0	95.0
	Make it less costly.	1	1.0	1.0	96.0
	More information about on-demand	1	1.0	1.0	97.0
	More products and information along with the representative.	1	1.0	1.0	98.0
	Regular mail.	1	1.0	1.0	99.0
	Something in writing, similar to a flyer or a door to door visit.	1	1.0	1.0	100.0
	Total	100	100.0	100.0	



QDC3 Other Responses. What would have made this information more useful?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		95	95.0	95.0	95.0
	A larger advertisement.	1	1.0	1.0	96.0
	I just get a bunch of mail and sometimes its hard to read all of them.	1	1.0	1.0	97.0
	It make us aware of it.	1	1.0	1.0	98.0
	More advertisement and literature	1	1.0	1.0	99.0
	No bill inserts I throw them away. Put information directly on bill in bold letters.	1	1.0	1.0	100.0
	Total	100	100.0	100.0	



QDC4 Other Responses. Based on all of the things that you can think of, what is the best way to provide you with information about energy efficiency opportunities?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		92	92.0	92.0	92.0
	A San Diego Gas and Electric representative could come to different businesses instead of hiring independent contractors.	1	1.0	1.0	93.0
	An internet search.	1	1.0	1.0	94.0
	Co	1	1.0	1.0	95.0
	E-mails	1	1.0	1.0	96.0
	Phone	1	1.0	1.0	97.0
	Regular mail	1	1.0	1.0	98.0
	Website.	1	1.0	1.0	99.0
	Word of mouth	1	1.0	1.0	100.0
	Total	100	100.0	100.0	



QF0 Other Responses. Finally, I just have some general questions about your business. What business sector does your firm belong to?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		64	64.0		64.0
	A painting company.	1	1.0	1.0	65.0
	Auto body and painting	1	1.0	1.0	66.0
	Auto body repair shop	1	1.0	1.0	67.0
	Auto collision.	1	1.0	1.0	68.0
	Auto motive repair	1	1.0	1.0	69.0
	Auto repair	2	2.0	2.0	71.0
	Auto repair shop	1	1.0	1.0	72.0
	Auto-body repair shop.	1	1.0	1.0	73.0
	Automotive repair	1	1.0	1.0	74.0
	Bio-technology	1	1.0	1.0	75.0
	Car inspection	1	1.0	1.0	76.0
	Church	1	1.0	1.0	77.0
	Construction	1	1.0	1.0	78.0
	Distribution.	1	1.0	1.0	79.0
	Dry cleaning	1	1.0	1.0	80.0
	Fitness club	1	1.0	1.0	81.0
	Food business	1	1.0	1.0	82.0
	Grower	1	1.0	1.0	83.0
	Hair salon	2	2.0	2.0	85.0
	High-tech	1	1.0	1.0	86.0
	Laundry	1	1.0	1.0	87.0
	Management	1	1.0	1.0	88.0
	Market	1	1.0	1.0	89.0



Medical	1	1.0	1.0	90.0
Private sector	1	1.0	1.0	91.0
Restaurants	1	1.0	1.0	92.0
Retail	1	1.0	1.0	93.0
Retail food	1	1.0	1.0	94.0
Retail shoe business	1	1.0	1.0	95.0
Service	1	1.0	1.0	96.0
Service cleaning	1	1.0	1.0	97.0
Staffing	1	1.0	1.0	98.0
Warehouse	1	1.0	1.0	99.0
Warehouse distribution.	1	1.0	1.0	100.0
Total	100	100.0	100.0	

QF1 Other Responses. Do you lease or own your facility?

		Frequency	Percent	Valid percent	Cumulative percent
Valid		99	99.0	99.0	99.0
	Both	1	1.0	1.0	100.0
	Total	100	100.0	100.0	





7. SDGE 3025: Standard Performance Contract Program (SPC)

Table 7-1 Final Research List

	Final Research List					
Target for Data Collection	Data collection mode	Timing of data collection	Key Research Issues	Sample Size	Number of Data points	From where did you get the sample?
Program Managers	In-depth interview	June - August	Understand how program is operating, key challenges, successes, areas for research	2	2	Identified from initial meetings
EESP Project Sponsors	In-depth interview	December	Contractor satisfaction / suggestions for improvement. Find out marketing strategies employed	74	7	Received list from Hector
Participants	In-depth interview	December	Satisfaction with program, motivating factors. Program awareness	180	38	Received list from Hector



7.1 In-depth Interview Guide: SPC Participants

Customer name			
Site name			
Site address			
Contact name			
Contact phone			
Measure description	(In tracking database as: HV	AC, GAS, LIGHTING, OTHE	R)
Date			
On behalf of San Diego participation in the Standa program to help SDG&E c	Gas & Electric, I am calling		ut your company's
		on most knowledgeable about manager or building operator.)	their participation.
cover your company's pa	articipation and satisfaction	Title: with the SPC program and we me to call back in the next few	will take about 15

(INSTRUCTIONS TO INTERVIEWER ARE IN PARENTHESES ():

- FILL IN THE BLANKS BEFORE BEGINNING INTERVIEW.
- PUT A CHECKMARK IN THE COLUMN NEXT TO THE RESPONSE UNLESS DIRECTED OTHERWISE FOR SPECIFIC QUESTIONS.)



SECTION 1. Measures installed

	ke to clarify the measures installed or replaced at your ace Contract Program. The documentation I received from [HVAC/Gas/Other	rom SDG&E indicates that it was a] measure.
OPEN END		
99	Refused/Don't know	
	eas for the [HVAC/Gas/Other Know, CODE ONE)	_] project come (READ except

1	BEFORE learning about the SPC program?
2	About the SAME TIME as learning about SPC?
3	Or AFTER learning about the SPC program?
99	Don't know/refused

SECTION 2. Participation in SPC Program

2.1. From whom did your company first hear about the SPC program? (DO NOT READ, MARK FIRST ANSWER WITH A "1" AND ALL SUBSEQUENT MENTIONS WITH "X")

1	Project sponsor (contractor)
2	Equipment manufacturer/vendor
3	Trade association
4	Mailing from SDG&E (bill insert, other mailing)
5	SDG&E Website
6	Email from SDG&E
7	Account Executive
8	Other [Specify]
99	Don't know/refused

2.2. In what year did your company first participated in the SPC program?

1	
	(CODE YEAR) (i.e. 2004, etc)
99	Refused/Don't know



2.3. What factors motivated your company to participate in the SPC program? (DO NOT READ, CODE MULTIPLE)

1	Get rebate on equipment / reduce cost of equipment			
2	Save money on utility bills / offset cost of energy			
3	Save energy / reduce energy usage			
4	Environmental issues			
5	Get latest technology			
6	Replace broken equipment			
7	Replace old equipment			
8	Recommendation from SDGE			
9	Recommendation from contractor/vendor/salesperson			
10	Participated in previous year(s)			
11	Other [Specify]			
99	Refused/Don't know			

SECTION 3. Project sponsor involvement

3.1. Did your company have a project sponsor assist you with developing the project?

1	No	(continue to next question, 3.2.)
2	Yes	(SKIP to 3.3)
99	Don't know/refused	(SKIP to SECTION 4)

3.2. Did your company consider involving a project sponsor in your SPC project? Why or why not? (SKIP to SECTION 4)

			(SPECIFY reason for deciding to self-sponsor. Skip to SECTION 4)
1	Yes, consponsor	nsidered a project	Why?;
2	No, di project s	d not consider sponsor	Why not?
99	Don't k	now/refused	(SKIP to SECTION 4)

3.3.	What was the name of the firm that was your compa	any's project sponsor?
[Naı	me:]



3.4. Had your company worked with [name of project sponsor] before this project? (DO NOT READ. CODE ONE)						
1		Yes				
2		No				
10		Other [Specify]				
99		Refused/Don't know				
		ame of project sponsor] become f the project was finalized?(DO NOT READ)	ome involved in the project before or after the			
1		Before project scope finalized	(SKIP TO 3.7)			
2		After scope finalized				
10		Other [Specify]				
99		Refused/Don't know				
sţ		ame of project sponsor] becce equipment was selected?(DO NOT READ)	ome involved in the project before or after the			
1		Before equipment selected				
2		After equipment selected				
10		Other [Specify]				
99		Refused/Don't know				
		ame of project sponsor] appr ch them about participating in the SPC program				
1		Project sponsor approached customer	(Continue to next question, 3.8.)			
2		Customer approached project sponsor	(SKIP to SECTION 3b)			
10		Other [Specify]				
99		Refused/Don't know				
	√hat d b]	id they emphasize about the SPC program to yo	our company? [CONTINUE TO SECTION			
OPEN END	•					
99		Refused/Don't know				



SECTION 3b. Satisfaction with project sponsor

3b.1. On a scale of 1 to 5, with 1 being very dissatisfied and 5 being very satisfied, how dissatisfied or satisfied was your company with [name of project sponsor ______] for this project? (DO NOT READ)
Why?

1	Very dissatisfied	Why?
2	•••	Why?
		•
3		
4	•••	
5	Very satisfied	
99	Refused/Don't know	

SECTION 4. Influence of Program and Satisfaction with program elements

4.1. If the SPC program were not available, would your company have installed the same number of measures or equipment?

1	Fewer units
2	Same number of units
3	More units
4	Would not have done any project
99	Don't know/refused

4.2. If the SPC program were not available, would your company have installed equipment with the same level of energy efficiency?

1	Lower efficiency
2	Same efficiency
3	Higher efficiency
4	Would not have done any project
99	Don't know/refused

4.3. I'd like to know what role, if any, the SPC program had in your company's timing of this project. If the SPC program had NOT been available, would your company have done the project . . . (READ except for Don't know/refused)

1	SOONER than your company did?
2	At about the SAME time?
3	LATER than your company did?
99	Don't know/refused



4.4.	What pa	arts of the	SPC p	rogram h	as vour	compan	v been	most	pleased	with?
------	---------	-------------	-------	----------	---------	--------	--------	------	---------	-------

OPEN	
END	
99	Refused/Don't know

4.5. What did your company find most challenging in participating in the SPC program?

OPEN END	
99	Refused/Don't know

4.6. On a scale of 1 to 5 where 1 is very difficult and 5 is very easy, how would your company rate the following:

	Very	difficul	t	Ver	y easy	If 3 or less, why?
Submitting the required documentation	1	2	3	4	5	
Scheduling the Pre-installation inspection	1	2	3	4	5	
Scheduling the Post-installation inspection	1	2	3	4	5	

4.7. SDG&E staff review all engineering calculations related to SPC projects. Did SDGE determine that this project required measurement and verification (M&V)?

1	Yes	
2	No	
10	Other [Specify]	
99	Refused/Don't know	

4.8. On a scale of 1 to 5 where 1 is very dissatisfied and 5 is very satisfied, how would your company rate the:



	Very dissati	sfied	Ve	ry sati	sfied	Why?
Results of the Pre- Installation Review	1	2	3	4	5	
Results of the Post-Installation Review	1	2	3	4	5	
[If 4.7 = yes] Results of the M&V	1	2	3	4	5	

SECTION 5. Future Participation/Suggestions for Changes

5.1. Does your company plan to participate in the program in the future? Why or why not?

1	Yes	
2	No	If no, ask why
99	Don't	
	know/refused	

5.2. Are there any changes that you can suggest for the SPC program?

OPEN			
END			
99	Refused/Don't know		

[ASK ONLY IF SAMPLE SHOWS A CANCELLED APPLICATION, ALONG WITH ABOVE PROJECTS] 5.3. One last question, my records show that you had a [Other/HVAC/Lighting] ______ project that was cancelled. Can you tell me why it was cancelled? (DO NOT READ, CODE SINGLE)

	tritt.	was cancelled. Early ou tell life willy	it was cancelled. (Bo 1101 HELE)
1		SDG&E cancelled application	Why?
2		Customer cancelled application	Why?
3		Other	Specify
99		Don't know/refused	

That's all of my questions. Thank you for your time. Do you mind if I contact you with any follow-up questions? (Make sure to record phone number or email and name).



7.2 In-depth Interview Guide: SPC EESP Project Sponsors

EESP Name	
Contact Name	
Contact phone	
Contact email	
Types of projects	
Types of customers	
How many projects?	
How many sites?	

Hello, this is _____ calling from KEMA. May I please speak with [Contact Name]?

Basically, I'm calling on behalf of San Diego Gas & Electric. I'd like to ask you some questions about your participation in the Standard Performance Contract Program, in the effort to get feedback and improve the program for the future.

You were listed as the primary contact for your company on the application.

My questions will cover your involvement in and satisfaction with the SPC program. The interview will take about 15-20 minutes. Is this a good time or can I schedule a time to call back in the next few days?

Participation in SPC Program

- 1. How did you first hear about the SPC program?
- 2. When did you first apply to the SPC program? How many applications have you submitted recently ('06-08)?
- 3. What motivated your company to participate in the SPC program?
- 4. What types of issues or concerns did you have in deciding to participate in the program?
- 5. What parts of the SPC program have you been most pleased with?
- 6. What parts of the SPC program have been the most challenging?
- 7. What downsides, if any, have you encountered participating in the SPC program?
- 8. How do you typically hear about changes to the program?
- 9. On a scale of 1 to 5 where 1 is very difficult and 5 is very easy, how would you rate how easy it is to keep up with changes in the program? Why do you say that?
- 10. Have you had any interactions with SPC Program staff? [IF YES] How would you characterize your interactions with them?



11. Have you had any interactions with SDG&E account executives? [IF YES] How would you characterize your interactions with them?

Identifying/Creating Projects and Recruiting Sites

- 12. Do you approach customers to participate in SPC projects or do they contact you to participate?
- 13. How do you identify sites to include in an SPC projects?
- 14. Do you target a specific type of business or organizations for SPC projects? (IF NEEDED: refineries, office buildings, etc)
 What types?
- 15. How do you approach the sites about participating in the SPC program? (What is your marketing approach?)
- 16. What are some of the things that make it easier to get sites to participate in the SPC program?
- 17. What are some of the challenges of getting sites to participate in the SPC program? What is the biggest obstacle?
- 18. What percentage of customers that you approach about the SPC program end up participating?
- 19. What types of projects do you typically do? (Mostly lighting? Air conditioning & refrigeration (AC&R)? Motors and other equipment? Natural gas measures?)

Satisfaction with Program Elements

20. On a scale of 1 to 5 where 1 is not at all satisfied and 5 is extremely satisfied, how would you rate the following for the SPC Program:

Application submission and approval process Why?

Utility Inspection and Review process (pre- and post- inspections) Why?

Timelines for projects (amount of time you have to accomplish milestones) Why?

Payment schedule (60% upon installation, 40% upon verification, M&V, otherwise 100% paid upon final inspection)

Why?

Measurement and verification process (if applicable) Why?



Future Participation/Suggestions for Changes

- 21. Do you plan to participate in the program in the future? Why or why not?
- 22. Are there any changes you would like to see made to the program?

Participation in other SDG&E Programs

23. Have you participated in other SDG&E programs? Which ones?

Do you plan to participate in these programs in the future? Why or why not?

24. What advantages are there to participating in SPC over other programs? Disadvantages?

That's all of my questions. Thank you for your time. If I have any follow-up questions, may I contact you by email? [Confirm email address]



7.3 Frequency Tables: SPC Participant Interviews

Results for Participant In-depth Interviews Sample size = 264 Number of completes = 38

SECTION 1. Measures installed

1.3.	Did the ideas for the	[HVAC/Gas/Other	project come
------	-----------------------	-----------------	--------------

	Number of	Percent
	responses	
BEFORE learning about the SPC program?	25	66%
About the SAME TIME as learning about SPC?	5	14%
Or AFTER learning about the SPC program?	8	22%
Don't know/refused	0	0%
TOTAL	38	100%

SECTION 2. Participation in SPC Program

2.4. From whom did your company first hear about the SPC program? (Multiple answers allowed)

	Number of	Percent
	responses	
Project sponsor (contractor)	3	8%
Equipment manufacturer/vendor	5	13%
Trade association	0	0%
Mailing from SDG&E (bill insert,		
other mailing)	1	3%
SDG&E Website	1	3%
Email from SDG&E	1	3%
Account Executive	7	18%
Other [Specify]		
SDG&E Rep	18	46%
Word of Mouth	3	8%
TOTAL	39	100%

2.5. In what year did your company first participated in the SPC program?

	Number of	percentage
	responses	
1994	1	3%
1996	1	3%



	Number of	percentage
	responses	
1997	1	3%
1998	0	0%
1999	1	3%
2000	0	0%
2001	1	3%
2002	1	3%
2003	4	11%
2004	1	3%
2005	4	11%
2006	12	32%
2007	9	24%
Refused/Don't know	2	5%
TOTAL	36	100%

2.6. What factors motivated your company to participate in the SPC program? (Multiple answers allowed)

	Number of	percentage
	responses	
Get rebate on equipment / reduce cost of equipment	30	29%
Save money on utility bills / offset cost of energy	25	24%
Save energy / reduce energy usage	25	24%
Environmental issues	6	6%
Get latest technology	2	2%
Replace broken equipment	3	3%
Replace old equipment	10	10%
Recommendation from SDGE	1	1%
Recommendation from	0	0%
contractor/vendor/salesperson		
Participated in previous year(s)	1	1%
Other [Specify]	0	0%
Refused/Don't know	0	0%
TOTAL	103	100%

SECTION 3. Project sponsor involvement

3.9. Did your company have a project sponsor assist you with developing the project?

	Number of responses	Percentage
No	20	53%
Yes	18	47%
Don't know/refused		
TOTAL	38	100%



3.10. [If company did not use project sponsor] Did your company consider involving a project sponsor in your SPC project? Why or why not?

	Number of responses	Percentage
Yes, considered a project sponsor	1	3%
No, did not consider project sponsor	18	47%
Don't know/refused	0	0%

Reason for considering a project sponsor and then not using one.

We had a project sponsor give us a bid and then I calculated the in house cost. There bid was roughly \$75,000 and once the rebate was complete they would take of \$20,00. So they priced it at \$50,000. The cost to do the work in house was \$50,000 and after the rebate was \$25,000. I will always keep the work in house to save \$25,000 especially when my staff is extremely capable of doing the job.

Reason for not considering using a project sponsor

Didn't know what a project sponsor was

Have in-house engineering department

Got help from manufacturer and assistance from Terry Spade at SDGE

He basically functioned as the sponsor as he had experience with the program.

Have in house Energy Team and get additional information from our SDG&E rep.

Rebate stays in house. Does not go to the installing company

Easier to keep it in hous. Its a different animal hear. If we keep it in house we provide work in house and the rebate stays fully in house.

We did not want to outsource the jobs.

No money for external contractor. Has internal engineers who can do it.

Because my salaried engineers were qualified to do it. That is the main reason I hire them.

We are a government agency and I have no idea how we could do that

Because we had architects involved and they gave us all of the information that we needed to submit

I am qualified to do all of the work and know all of the technical stuff

This was a none issue

Not then, but we have since. [they are using a sponsor for their lighting and HVAC installations that are still about 80% complete - I asked the questions about the sponsor in order to evaluate their performance, even though they were not involved in the initial HVAC installation that we are concerned with]

11 years ago we did one with some help from SDG&E and we were able to pay it back through our utility bill, but this was not a significant enough investment that we needed any help.

Because my AC guy knew what to do.



-					
Had the abil	ity to do it themselves				
Because I ca	an do the work myself.				
	t was the name of the firm that wa	as your co	ompany's projec	t sponsor?	
[Name:]		
3.12. Had y 3.13.	your company worked with [nam	e of proje	ct sponsor]	before this project
		Number	of responses		
	Yes		11	58%	
	No		8	42%	
	Other [Specify]		0	0%	
	Refused/Don't know		0	0%	
	TOTAL		19	100%	
	[name of project sponsore of the project was finalized?			of percentage	ject before or after
			responses	T T T T T T T T T T T T T T T T T T T	
	Before project scope finalized		1	0	50%
	After scope finalized		1	0	50%
	Other [Specify]			0	0%
	Refused/Don't know			0	0%
	TOTAL		2	0 1	00%
3.15. selected] become involved in the	ne project		[name of pro he specific eq	
		Num		Percentage	

	Number	of	Percentage
	responses		
Before equipment selected		12	75%
After equipment selected		4	25%
Other [Specify]		0	0%
- 1 00 -			
Refused/Don't know		0	0%
TOTAL		16	100%



3.16. Did [name of project sponsor ______] approach your company, or did your company approach them about participating in the SPC program?

	Number	of	percentage
	responses		
Project sponsor approached customer		12	60%
Customer approached project sponsor		7	35%
Other [Specify]		1	5%
Refused/Don't know		0	0%
TOTAL		20	100%

3.17. What did they emphasize about the SPC program to your company?

AEI looked at several rebate programs and other alternatives and recommended SPC.

Install VFD's will put out same cooling, but you don't have to run the Chiller at the full load capacity. You don't have to run it at the full RPM.

Mentioned that rebates where available.

The rebate

Did not emphasize the program, but they were aware that we were aware.

They emphasized that we could pretty much get it done for free.

Are you aware the SDG&E has a rebate program that includes Air Compressors.

Mentioned rebate available for VFD's.

They got a percentage of the rebate so they recommended we participate in the program. They wanted us to get less efficient Chillers, but I went with the more efficient ones. I should have gone with the McQuay Turbo Core which are more efficient than what they recommended. Instead I am using the Evergreen, which is too efficient for my needs. The forecasting by my engineer was to high.

They were aware of the program and suggested it.

Lazzlo Electric recommended the rebate.

rebates and energy savings

Nothing

Just that it is available

The mentioned that we should be able to get a rebate on the fixtures



SECTION 3b. Satisfaction with project sponsor

3b.2. On a scale of 1 to 5, with 1 being very dissatisfied and 5 being very satisfied, how dissatisfied or satisfied was your company with [name of project sponsor _____] for this project?

Average satisfaction = 4.6 out of 5

	Number of responses	percentage
Very dissatisfied	0	0%
	0	0%
	2	10%
	4	20%
Very satisfied	14	70%
Refused/Don't know	0	0%
TOTAL	20	100%

SECTION 4. Influence of Program and Satisfaction with program elements

4.9. If the SPC program were not available, would your company have installed the same number of measures or equipment?

	Number of	Percentage
	responses	
Fewer units	5	14%
Same number of units	28	76%
More units	0	0%
Would not have done any project	4	11%
Don't know/refused	0	0%
TOTAL	37	100%

4.10. If the SPC program were not available, would your company have installed equipment with the same level of energy efficiency?

	Number of	Percentage
	responses	
Lower efficiency	2	5%
Same efficiency	31	82%
Higher efficiency	0	0%
Would not have done any project	5	13%
Don't know/refused	0	0%
TOTAL	38	100%



4.11. I'd like to know what role, if any, the SPC program had in your company's timing of this project. If the SPC program had NOT been available, would your company have done the project...

	Number of responses	Percentage
SOONER than your company did?	0	0%
At about the SAME time?	19	50%
LATER than your company did?	18	47%
Don't know/refused	1	3%
TOTAL	38	100%

4.12. What parts of the SPC program has your company been most pleased with?

n = 38

Program manager was very helpful. Jeff Alexander gave him a lot of information and participation was no problem.

Financial support and also went to seminars to learn about energy efficiency possibilities and then would come back and implement them. Also offered an energy audit by acct. exec.

SDG&E has been very responsive and turned paperwork around quickly

Receiving money for saving energy.

Sherry McRoberts and her staff at SPC were excellent about informing them of other energy rebate programs that were applicable to Veritek.

The money part. The whole process has been very satisfying.

How easy it was.

Whole thing begining to end.

Straight forward to apply for the program and the rebates. Went smoothly and there were no hold ups.

Money back and the VFD's were about half the market price after the rebate.

The return which translates to our customers.

Saving on Energy means saving cost. These retrofits mean 30%-32% reduction in Kwh. Not only are we saving money, but easier to convince when we coupled that with doing our part in terms of being green.

I really appreciate the accountability of SDG&E's Reps and Engineers to come out and do a good job.

I did not have a good experience with the program. Too much to do for \$1200 rebate. Our new system is too loud. The old one was much quieter and no one told me the difference. I have to shut it off when I have customers.

We really like that SDG&E gives 60% of rebate upon the completion and inspection of the system

All of it

Money

SDG&E staff support. Basically, program staff did all engineering calculations and sent them the forms to fill out. Very easy.

Very good information not only about rebates, but the potential savings based on equipment.



The efficiency, timeliness of inspections and professionalism by SDG&E was great.

All parts

It happened! The SDG&E staff were really helpful with the technical details that we needed to fill out the paperwork

Total project was a success.

Very pleased with everything having to do with SDG&E.

The ease in doing it! We provided info like the model number and they did the rest. We had to sign contracts and send them in to be signed a couple times, but that was it

That it is there and available.

The best part was when we recieved the check!

There is financial support for doing these inititives. Some of our divisions have more capital but we aren't as big as them, and as an international company we are trying to reduce our carbon footprint

Getting cash back always helps my numbers. The incentive really makes the upgrade worth it.

the initial rebate

the support from SDG&E. The test guy, when he came out. The assistance with all of the calculations. The post-check. It was good to have SDG&E's support

Money

Money

No

The ease of the application process.

Getting the check quickly.

The inspection process was quick and painless.

Saved a lot of power.

4.13. What did your company find most challenging in participating in the SPC program?

n = 1 (Don't know/Refused)

n = 37

None

Wish process was more expeditious. They still have hundreds of t12 lamps that he wants to replace but his management is unwilling to outlay the capital all at once to replace- even though it's a "no-brainer". Wants to use SDGE financing program which the company will pay off on a monthly basiswants to create a "master contract" for 100 lamps and repeat the process 5 times.

Program requirements had changed. Found out they needed another form filled out to record operating hours. Find out about changes when they submit things and application comes back.

No real challenges

No. The only difficult thing was figuring out the cost per area- production floor vs. offices and how much the offices used their lights.

Measurement and verification on the 400 Hertz power converter

No real problems- sponsor handled most of it.



Passing information onto different people 3 or 4 times. People gone or out of the office. Need more coordination.

The difficulty was all in house and had to do with the logisitics of replacing fixtures around our machinery. That is not really relevent to the program, but has to do with any replacement job we do.

Not really

Challenging to get our product approved by SDG&E

All my problems were internal I had no problem with the SPC program.

The drawn out length of the rebate application process. I kept getting calls telling me my paperwork was incomplete or incorrect. Too much for me to do.

Difficult to sell this to our board of directors. No problem with SDG&E

Not knowing enough of the available rebates that are out there.

Data Collection about the system, but the representative from Ingersoll Rand helped with the data collection making it much easier.

Rebate money was pretty meager.

I have no negative feelings about the program.

Nothing

None

The technical details! We had no clue! Also patience - it took a while to get done

No big problems other than deciphering exactly what we could do.

No

We had to make sure that the info we provided was accurate

When the measuring aspect is so tedious a situation arises where the cost of contracting a consultant to do the measurements is the same amount as the rebate it presents somewhat of a catch 22.

Not much. The paperwork, but not really. It was pretty straight forward (I just don't like paperwork in general)

The biggest hurdle is getting everyone together. The engineers, SDG&E, everyone... Just getting everyone on the same page and moving forward. Also getting a hold of people. When it takes a couple of weeks to get a hold of someone and the plan had for them to be working during those couple of weeks, it really pushes the project back, and the powers to be do not see the energy or energy bill savings for that much longer.

The check took too long to get here.

just trying to work with the sponsor [on the ongoing projects] and the energy company, SDG&E, on actual energy savings. This was a concern because we have multiple projects going on a the same time that have impact on our energy bill, so determining the energy saving from individual measures is complicating.

Paperwork, but even that was not very bad because our AE did most of it.

The amount of time it took to get previous checks and the amount of time it is taking to get current rebate checks is just too long.

No

No



No	
The Application process, filling out the LE1, the data enry was time consuming.	
No challenge.	

4.14. On a scale of 1 to 5 where 1 is very difficult and 5 is very easy, how would your company rate the following:

Submitting the		Number	Percentage
required		of	
documentation		responses	
	1 Very difficult	1	3%
	2	3	8%
	3	3	8%
	4	11	31%
	5 Very easy	18	50%
	Average response $= 4.23$		
Scheduling the		Number	Percentage
Pre-installation		of	
inspection		responses	
	1 Very difficult	2	5%
	2	0	0%
	3	1	3%
	4	13	35%
	5 Very easy	21	57%
	Average response $= 4.38$		
Scheduling the		Number	Percentage
Post-installation		of	
inspection		responses	
	1 Very difficult	1	3%
	2	0	0%
	3	1	3%
	4	11	31%
	5 Very easy	22	61%
	Average response = 4.51		

4.15. SDG&E staff review all engineering calculations related to SPC projects. Did SDGE determine that this project required measurement and verification (M&V)?

	Number of responses	Percentage
Yes	21	55%
No	15	37%
Other [Specify]	1	3%



	Number of responses	Percentage
Refused/Don't	1	3%
know		
TOTAL	38	100%

Other[Specify...] – Only for the 400 Hz power converter

4.16. On a scale of 1 to 5 where 1 is very dissatisfied and 5 is very satisfied, how would your company rate the:

Results of the Pre-		Number of	Percentage
Installation		responses	
Review		•	
	1 Very dissatisfied	1	3%
	2	0	0%
	3	0	0%
	4	9	25%
	5 Very satisfied	26	72%
	Average response $= 4.64$		
Results of the		Number of	Percentage
Post-Installation		responses	
Review			
	1 Very dissatisfied	1	3%
	2	0	0%
	3	0	0%
	4	8	22%
	5 Very satisfied	26	72%
	Average response $= 4.65$		
Results of the		Number of	Percentage
M&V		responses	
	1 Very dissatisfied	0	0%
	2	0	0%
	3	0	0%
	4	3	14%
	5 Very satisfied	19	86%
	Average response $= 4.86$		



SECTION 5. Future Participation/Suggestions for Changes

5.4. Does your company plan to participate in the program in the future? Why or why not?

	Number	of	Percentage
	responses		
Yes		37	97%
No		0	0%
Don't		1	
know/refused			3%
TOTAL		38	100%

5.5. Are there any changes that you can suggest for the SPC program?

5 6

Once someone participates in the program, send a package describing other rebate programs available, as well as upcoming programs and technologies. Send by email best, but regular mail is good too.

The programs work fine but thinks that SDGE needs to do more to promote conservation in peacetime not just in the middle of the summer. Need to promote the habit of saving energy.

Project sponsor AEI had basically set up the whole project and sent him the paper work. Everything was pretty easy. They've been very pleased with the new T5 HO lighting and are trying to standardize their equipment. AEI basically picked SPC as the program to participate in.

Try to be clear to the participants about what they are required to do for the initial application.

Get the word out to the public, commercial and residential, that these programs are available

I was told that smaller projects needed to go through a contractor in order to get a rebate. I have a full energy and engineering staff. A number of reasons including cost and security make me want to keep my work in house. This needs to be addressed.

Can't think of anything to suggest.

Give me just one person to deal with. Who is reliable and will contact before they go out of town.

Can't think of any. No problems that came up from the program.

Not now. I have been to several seminars about lighting improvements and would like to do something when I can cover the upfront costs after rebate.

As an outsider it toook weeks to work through the SDG&E bureaucracy. Spent 2-3 months tryuing to get in touch with the necessary people. After we started working with them they were fantastic to work with.

None whatsoever. SDG&E does a great job of putting the word out about their rebates and their website is extremely clear.

Make paper work more simple and less dragged out. The process is takes too long for what your getting back in the rebate.

The people at SDG&E were excellent. They were phenomenal and made the rebate process a breeze.

Spreading better information about available programs and rebates.



In hindsight I am not as aware as I would like to be about all available rebates and their potential benefits to energy savings and the entire state of energy management in the SDG&E territory. However I do enjoy the emails from my representative and would appreciate it if those listed all products that have rebates.

Need to advertise the program better and let people know they are available. Adbi knew there was rebate money available, but not about the specific programs and did not know where to go for information. Maybe advertise more prominently on website.

No now.

There lack of people able to come out and assist me during my least busy hours. Working at a hotel means I am busy from 7 am until about 10:30. Then I have a slower period when guests are between checking out and checking in and then it picks up again at about 2 pm. It seems like that would be an issue no matter who was running the rebate program. If someone was more available between 10:30 and 2 pm it would have been more accommodating, but that's life.

Don't know, but maybe a step by step bullet sheet for reference. "After you complete this, the next step is this...". Like a sheet that shows the process so that you know what to do next.

Make program information readily available.

Make information readily available about what rebates are going to be coming up in the near future in order to avoid replacements and retro's before rebates are available. This would have an effect on ensuring that the most efficeint equipment is installed. Especially when old units go out. Our only back up is a rental. In some cases it would be more cost effective to use a rental for a few months if it meant that waiting would get me a rebate on a more efficient piece of equipment. The upfront cost would be higher, but over a few years the payback would probably be imense. This is easier for me because I have a personal SDG&E representative, but for others this could make the program more effective.

no, very easy.

Make measurement process less tedious because the process becomes too tedious. Need to make it a situation where someone like myself who is not an engineer can take care of the measurement steps.

More money to the customer - Just Kidding!! It is a great program because it gives companies an incentive for energy efficiency and it is very easy to justify just based on the cost savings

Some kind of newsletter or email describing the current and upcoming rebate programs. Include the financial incentive and the requirements. Also, info about code or compliance changes so that we know when we have to upgrade.

Not really. Maybe they could get my check to me faster next time.

not at this time. It would be nice if the rest of the green efforts such as water and waste issues - like paper waste - were as easy to participate in.

No, not really. Maybe information on qualifying projects. A better vehicle that demonstrates what qualifies. We had no idea that this sort of project could get rebates through SPC because there is only info on HVAC and other stuff like that.

Everyone has been helpful. Only recommendation is to figure out a way to get checks back faster.

No, just keep it going.

No



Set standards to equipment to ensure that efficiency is not the only category. Reliability is key and actually determines long term efficiency. If I am going to be working with contractors I need to be sure that they are going to install high quality equipment and not just put in a fixture that is high efficiency. Sometimes contractors give me a low bid and I know it means they can make more money off installing worse equipment that has equivalent efficiency to a more reliable product.

Don't discontinue to the program.

Streamlining or simplifying the application process. (no specific recommendations came to mind when I asked how to simplify- interviewer)

No the process is pretty straight forward.





8. SDGE 3027: Retro-commissioning Program (RCx)

Table 8-1 Final Research List

	Final Research List					
Target for Data Collection	Data collection mode	Timing of data collection	Key Research Issues	Sample Size	Number of Data points	From where did you get the sample?
Program Manager	In-depth Interview	June - January	Improve understanding of program, identify issues to explore, update of program status	1	1	List of program managers provided by SDG&E
Owner Program Agreement Presentation	Onsite Observation	September	Observe presentation of Owner Program Agreement, note reaction and questions from applicant.	1	1	Program Manager
Participants	In-depth interview	January	Satisfaction, suggestions for ways to facilitate participation	11	4	Program Manager



8.1 In-depth Interview Guide: RCx Participants

Customer name		
Site name		
Site address		
Contact name		
Contact phone		
Date		
Hello, this is	, calling from KEMA. May I please speak with [Contact Name]?	
	Gas & Electric, I am calling to ask a few questions about your compommissioning Program. You are listed as the contact person for this program.	
	your company's participation and satisfaction with the Retrocommission ut 10 minutes. Is this a good time to talk or can I schedule a time to call be	
SECTION 1. Participati	on in RCx Program	
1.1. From whom did you	ur company first hear about the RCx program?	
1.2. In what year did yo	ur company first participated in the RCx program?	
SECTION 2. Qualified C	Commissioning Provider	
2.1. What was the name	of the firm that was your company's commissioning provider?	
2.2. [Name:]	
2.3. Had your company	worked with [name of commissioning provider] before	this
project?		••••
	nissioning provider] approach your company, or did you them about participating in the RCx program?	ur
2.5. What did they empl	hasize about the RCx program to your company?	



2.6.	On a scale of 1 to 5, with 1 being very dissatisfied and 5 being very satisfied, how dissatisfied or satisfied was your company with [name of commissioning provider] for this project?
2.7.	Why?
2.8.	Is your company planning to install other energy efficiency measures not covered by the RCx program? If so, what are you planning to do?

SECTION 3. Satisfaction with Program

- 3.1. What parts of the RCx program has your company been most pleased with?
- 3.2. What did your company find most challenging in participating in the RCx program?
- 3.3. Can you think of any things that would have made it easier for your company to participate?
- 3.4. Are there any changes that you can suggest for the RCx program?
- 3.5. Has your company installed other energy efficient measures before you began participating in RCx?
- 3.6. Has your company participated in other SDG&E programs? Which ones?
- 3.7. Do you have any other comments that you would like to make about the RCx program?

That's all of my questions. Thank you for your time.





9. SDGE 3029: Upstream HVAC/Motors Program

Table 9-1 Final Research List

	Final Research List					
Target for Data Collection	Data collection mode	Timing of data collection	Key Research Issues	Sample Size	Number of Data points	From where did you get the sample?
Program Managers	In-depth Interview	July	Learn about the program	1	1	List of program managers provided by SDG&E
HVAC Contractors	CATI Interview	November	Various hypotheses about why contractors do or do not participate in VSP training.	992	140	Purchased from Dunn & Bradstreet
Residential Customers	Focus Group	December	Obtain a range of perceptions and alternative viewpoints by San Diego area residents towards the purchase of new AC units, the use of HVAC contractors, and refrigerant charge and airflow services.	-	10	Purchased by zip code
Commercial Facility Manager	Focus Group	December	Obtain a range of perceptions and alternative viewpoints by commercial facility managers towards the purchase of new AC units, the use of HVAC contractors, and refrigerant charge and airflow services.	-	10	Purchased by zip code
VSPs	In-depth Interview	August - October	Learn about potential positive and negative parts of the program from the VSP perspective.	4	4	Provided by program implementer



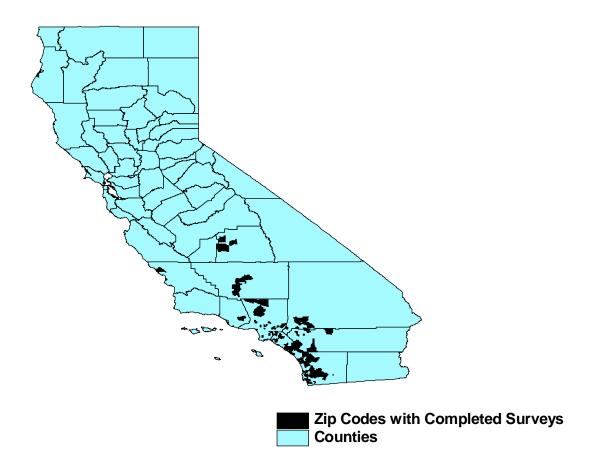
9.1 Sample & Methodology

Because of the use of the same VSPs and targeting similar markets, the data collection and analysis was combined for the AC TIMe (SDGE3043) and Premium Cooling & Motors Programs (SDGE3029). The appendices that provide details about the analysis are written up in one report.

HVAC Contractor Survey

There were 140 completed surveys with responses throughout the SDG&E and SoCalGas service territory (see Figure 9-1).

Figure 9-1
Zip Codes with Completed Surveys





A population of 992 HVAC contractors was purchased from Dunn & Bradstreet. Because it was known that there was insufficient contractors within the SDG&E zip code, contractors with SoCalGas zip codes were also purchased. The contractors with SDG&E zip codes were called until the population was exhausted and then those with SoCalGas zip codes were randomly ordered and called. The survey was fielded throughout November 2007.

Table 9-2 Survey Completion Rate

Sample Size	992
Planned Completes	140
Actual Completed	140
Pool Efficiency Rate	88%
Gross Completion Rate	14%
Eligible Completion Rate	21%

The pool efficiency rate is a measure of how efficient the sample frame was in reaching working numbers. That is, of all the numbers called, what percent were working telephone numbers. There were 12 percent of the sample that were non-working numbers. The gross completion rate is the number of completions divided by the total number of calls attempted. A more relevant number is the eligible completion rate, which is the number of completions divided by the number of businesses reached that were eligible. Ineligible businesses were ones in which there was a language barrier, the business did not perform HVAC services or the company did not do the majority of their work in SoCalGas or SDG&E service territory. The eligible completion rate of 21 percent was average.

The sample was considered a probability sample. The data were analyzed using descriptive (mean, frequency) and inferential (t-test, Chi-Square) statistics.

Focus Group Logistics

The evaluation of the two third-party HVAC programs (AC TIMe and AC Premium Cooling & Motors) originally planned end user surveys to obtain information. This tactic was changed when we thought through the actual exposure of end users to these two programs. Both programs are up-stream or midstream programs with minimal (if any) actual end user contact. Therefore, the decision was made to use two focus groups to gather information relevant to the program. The goal was to obtain a range of perceptions and alternative viewpoints by San Diego area residents and commercial facility managers towards the purchase of new AC units, the use of HVAC contractors, and refrigerant charge and airflow services.

The focus groups took place on December 12, 2007. The commercial facility managers session was first from 5:00 to 6:30 PM. We purchased a list of facility managers in zip codes near San Diego to begin our solicitation. The recruiting requirements were:

- 1. Company pays the utilities
- 2. Must have at least one split unit or packaged unit



- 3. Must be the decision maker about purchase and maintenance of air-conditioning system. (most likely the facility manager)
- 4. Must use AC on a regular basis. At least 60 days during summer.

Fourteen commercial participants were planned to be recruited for the focus group to allow for possible attrition. There were two no-shows, ten participants, and two were thanked and let go. Each participant who showed up for the focus group was paid \$150 regardless of whether they were chosen to stay for the focus group or not.

The residential focus group followed from 7:00 to 8:30 PM. This group had similar recruiting requirements. They were required to:

- 1. Have a central AC unit.
- 2. Be a homeowner
- 3. Be the decision maker about the purchase and maintenance of the AC system.
- 4. Use their AC on a regular basis (for at least part of the day for at least 2 months during the summer).

Again fourteen were recruited. One cancelled the day of the focus group, two did not show, and one was thanked, paid, and let go. Each participant who showed up for the focus group was paid \$75 regardless of whether they were chosen to stay for the focus group or not. The focus group consisted of ten participants.

The focus groups were located in a hotel near Poway, California. There were special filming lights, microphones, and a camera in one room with the participants. A nearby room contained a large screen television with a live feed from the camera. Each focus group was immediately burned onto a DVD with audio and video and a CD with audio only. Back-up video tapes were provided. One of the program implementers involved with AC TIMe and three SDG&E employees attended some or all of the focus groups. Both groups were moderated by Sharyn Barata of Opinion Dynamics Corporation, a member of the evaluation team, although not specifically involved with the HVAC program evaluations.

The information from the focus groups was synthesized by watching the groups in real time, discussing the interactions with a colleague, and watching the focus groups again on the DVD. While watching the DVD, group responses to each of the questions were recorded as the moderator moved the group through the guide.

VSP In-depth Interviews

The AC TIMe and Premium Efficiency Cooling & Motors Program both use the same four Verification Service Providers (VSP) as a conduit for their programs. The VSPs each have different logistics and procedures that an HVAC contractor follows to enable an RCA servicing. In-depth interviews with each of the VSPs took place in the fall of 2007. Data was collected in-person for one interview and via telephone for the other three. An interview guide was created and followed to assure that all relevant topics were covered. The interviews varied from \(^3\)4 to 2 hours in length. Two of the interviews were transcribed and responses of the other two were written up by the interviewer during the discussion.



While the information gained during the interview process is confidential, with only four interviews, it is difficult to provide much specific detail and maintain anonymity. As such, the interviews have been distilled to the main concepts that emerged during the conversations. The information from the interviews was synthesized by reading through the documents associated with each interview and pulling out the relevant information from the questions.

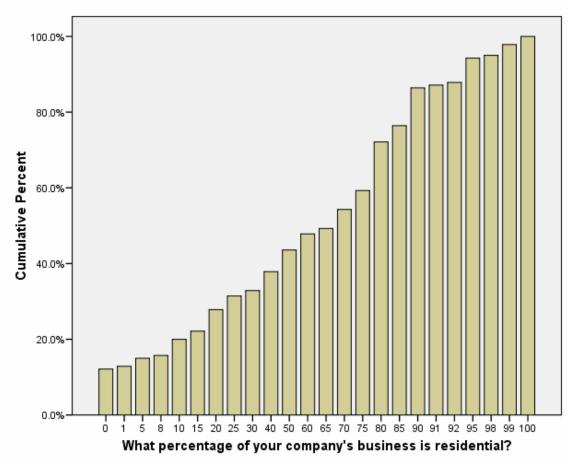
9.2 Detailed Findings

9.2.1 HVAC Contractor Interview Results

Characteristics of the HVAC Contractors

Ninety percent of the businesses serviced residential clients to some degree, with 10 percent indicating that 100 percent of their business was nonresidential. However, the percentage varied as shown below.

Figure 9-2
Percent of Company that Services Residential Clients





The majority of those called self-reported themselves as small companies (compared to other companies like themselves).

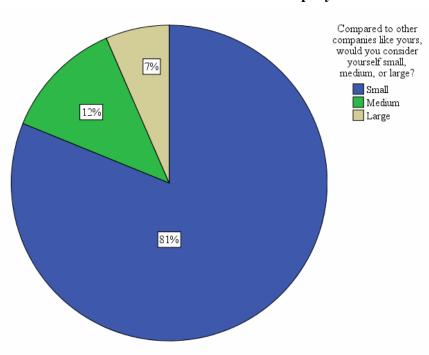


Figure 9-3
Size of HVAC Contractor Company

The self-reported size of the company matched up well with a different question that asked about their annual sales (see Table 9-3).



Table 9-3 Annual Sales by Company Size

When thinking of your annual sales, would you describe your business as: * Compared to other companies like yours, would you consider yourself small,medium, or large? Crosstabulation

	Compared to other companies like yours, would you consider yourself small,medium, or large?					
			Small	Medium	Large	Total
When thinking of your annual sales, would you describe your business as:	Less than \$250,000 in annual sales	Count % within Compared to other companies like yours, would you consider yourself small,medium, or large?	37 34.3%	.0%	.0%	37 27.6%
	\$250,000 to \$1 million in annual sales	Count % within Compared to other companies like yours, would you consider yourself small,medium, or large?	55 50.9%	3 17.6%	11.1%	59 44.0%
	\$1 million to \$5 million in annual sales	Count % within Compared to other companies like yours, would you consider yourself small,medium, or large?	16 14.8%	12 70.6%	22.2%	30 22.4%
	More than \$5 million in annual sales	Count % within Compared to other companies like yours, would you consider yourself small,medium, or large?	.0%	11.8%	66.7%	6.0%
Total		Count % within Compared to other companies like yours, would you consider yourself small,medium, or large?	100.0%	1700.0%	100.0%	134

The sample was not drawn nor fielded to enable analysis by size of company, though, and any statistic that is shown by company size should be considered a tendency. Due to the small sample size of large (9) and medium (17) sized companies, the remainder of the analysis will be by sampled population only. Additionally, there was the belief that HVAC contractors in the SDG&E service territory would not be significantly different from those in the SoCalGas service territory. This was checked for each area analyzed. However, no significant differences (at the 90% level) were found between the contractors in the two service territories. This supports the original idea of no difference between contractors simply because of where they are located.

Twenty-three percent of the firms are one- or two-person operations. The average number of technicians working in the company is 6.07 with a range of 0 (i.e., no technicians, just the owner) to 105. About half of the companies have at least one NATE certified technician. Of those with any NATE certified technician, about one-quarter (27 percent) of the technicians at that company tend to be certified.



More companies state that profit from serving was higher than from equipment. This was a somewhat surprising result as the expectation was that installing equipment provided a higher profit margin than simple servicing.

60.0%—

40.0%—

40.0%—

10.0%—

Higher Lower The same (Don't know) (Refused)

In general, is your profit margin for servicing higher or lower than for installations?

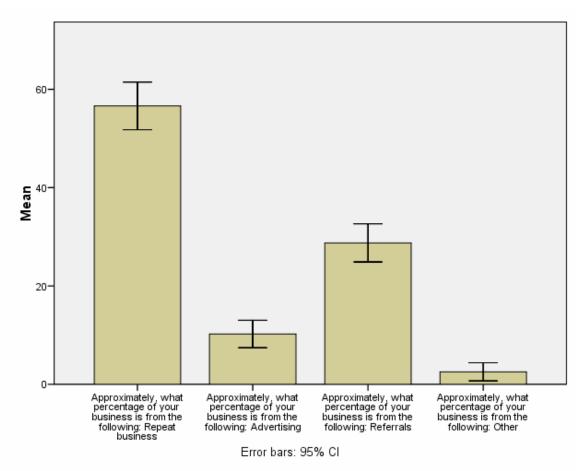
Error bars: 95% CI

Figure 9-4
Percent with Profit from Servicing as Higher or Lower than Installations

The firms tend to receive their business from repeat customers and referrals (Figure 9-5).



Figure 9-5 Where Business is From



The high level of business from repeat business and referrals matches up with the self-reported way the firms compete for business. Seventy-four percent state they attempt to convince the customer their work is of higher quality most of the time or all the time. Twenty-three percent attempt to obtain work through providing a lower price to the prospective customer either most of the time or all of the time.

VSP Information

Several questions were asked about the VSP platforms to determine contractor awareness of the VSP opportunities, their level of participation, and reasons why they do not participate.

Sixty-four percent of companies have heard of at least one of the four VSP platforms (i.e., Check-Me, Enalasys, Field Diagnostics, or Verified-RCA.). Of those 64 percent, 60 percent have had anywhere from 1 to 100 percent of their technicians trained by one of the VSPs. This equates to 35 percent of the HVAC contractors across the surveyed population with at least one technician trained to use a VSP platform.



When a follow up question was asked about how many have actually signed up to use a VSP system, though, only 35 percent of those with any training also were signed up (or about 12 percent of the population). It appears that some of the companies no longer interact with the VSPs, although they have done so in the past. Of those who are signed up, 50 percent are with Check-Me, while 31 percent are with Enalasys, and another 19 percent are with Verified-RCA. This breakdown is shown graphically in Figure 9-6.

No technicians trained in a VSP Platform 46% / **65%** Have heard of at least one VSP 64% / **64%** Not signed with VSP 65% / 88% Some technicians trained in a VSP Platform 54% / 35% Signed with VSP 35% / 12% Signed with Signed with Check-Signed with Verified-RCA Me 50% / 6% Enalasys 31% / 4% 19% / 2% KEY First percentage is for that grouping Second percentage in **bold** is for the population

Figure 9-6
Percent of Contractors Signed with VSPs

Of the 12 percent of contractors who have signed up with a VSP, the number of cooling systems they have tested using the VSP techniques varies widely, from 2 systems to 1,000 systems. (The average number of systems stated to have been tested is 178, with a standard deviation of 258.)

Moving backwards to the 35 percent of contractors with trained technicians, the technicians are indicated to use the VSP-specific procedures when they test a system's refrigerant charge about 66 percent of the time. For that same group, about 1/3 indicate they use QI all the time (Figure 9-7). However, as one can



see from Figure 9-7, the confidence intervals overlap for all the responses, meaning that a different survey could find different percentage results across the categories.

50.0% 40.0% 30.0% 20.0% 10.0% 0.0% (Other) We do AD/QI We do AD/QI We do AD/QI on We do AD/QI Never when requested by only when there is a difficult every service when my techs call we make have the time the customer svstem How would you best describe your company's use of AD/QI within your general service and maintenance jobs? Error bars: 95% CI

Figure 9-7 How Contractors Use AD/QI

Because the VSP procedures also include duct testing and sealing, the contractors who indicated they had trained technicians were asked about their use of this procedure. A little over half (56 percent) stated they do not perform any duct test and seal projects, 30 percent use a Duct Blaster during the procedures, and 14 percent use something similar to a Duct Blaster. This equates to 14 percent of the sampled population of contractors performing duct test and seal projects to some extent.

Moving to the group of contractors who had heard of the VSPs, but have chosen not to participate in a training, the top four reasons were: 1) It doesn't add anything to our business (27 percent) and then a tie for the next three at 20.5 percent each - 2) It is too costly, 3) We didn't know about any training, and 4) Our technicians are too busy to perform the procedures.

There were two areas in which we were particularly interested in getting a response from the contractors and so asked them somewhat duplicative questions. The first area we explored was in regards to whether they already perform refrigerant charge and airflow servicing, just using other procedures. Sixty-four



percent of the contractors who were aware of any VSP platform indicated they agreed with this somewhat or very much (i.e., they do not participate because they already perform this type of service only with other procedures). The second area was whether they felt it would be difficult to perform this type of testing in the summer "…because we are busy handling trouble calls, performing installations and fixing broken air conditioners." The response to this query was similar with 22 percent disagreeing with the statement (and therefore indicating they did not consider this a problem) and 66 percent agreeing with this statement.

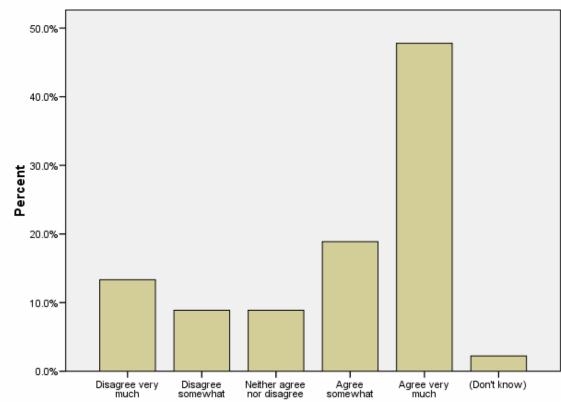


Figure 9-8
Difficulty Performing QI During Summer

Agreement: It would be really hard to perform this type of testing during the summer because we are busy handling trouble calls, performing installations and fixing broken air conditioners.

Market Information

Based on anecdotal evidence, we believed that there was a technician shortage in the HVAC industry and asked the contractors about this issue. Three-quarters of the respondents also indicated there was a technician shortage. Of those who believed there was a shortage, one-third of them felt it made it difficult to expand their business while slightly less than a third felt that they were continually having to hire (24 percent) and train (29 percent) new technicians.



Table 9-4
How Shortage of Technicians has Affected Business

\$Shortage Frequencies

		Respo	Percent of	
		N	Percent	Cases
How Technician	(continually have to hire new technicians)	20	18.7%	23.5%
Shortage Has	(continually have to train new technicians)	25	23.4%	29.4%
Affected a Business	(have to pay my technician well to keep them)	18	16.8%	21.2%
Dusilless	(do not have as much control over technicians as would like	2	1.9%	2.4%
	(Makes it difficult for me to expand my business)	28	26.2%	32.9%
	(Makes it difficult to offer the quality of service I	12	11.2%	14.1%
	(Makes it difficult to offer customers preventati	2	1.9%	2.4%
Total		107	100.0%	125.9%

a. Group

Besides a technician shortage, there were felt to be other obstacles that the contractor could see as they try to sell services to their customers. The respondents were asked to rate nine different possible obstacles from 1 (not a problem) to 5 (extremely significant problem). The results (Table 9-5) show that price/cost issues and lack of customer awareness were thought to be the two largest obstacles followed closely by the customer stating they do not need the service. The contractor found insufficient sales staff and lack of staff training to be the lowest obstacles of those presented.

Table 9-5
Rating of Various Possible Obstacles to Selling Services

How big a problem in selling above code equipment or AD/QI services to your customer is...

	N	Mean		SD
	Statistic	Statistic	Std. Error	Statistic
reaching the decision maker?	103	2.20	.135	1.375
not knowing who the decision maker is?	107	2.12	.137	1.412
customers state they don't need product/service?	103	3.00	.141	1.435
no time to market this type of equipment?	101	2.13	.127	1.278
insufficient sales staff?	105	1.96	.130	1.330
lack of staff training?	106	2.03	.140	1.444
lack of customer awareness or knowledge?	105	3.03	.140	1.431
price/cost issues?	107	3.61	.138	1.426
lack of marketing materials?	104	2.45	.141	1.434
Valid N (listwise)	98			

Rating: 1=Not a problem, 5 = Extremely significant problem

An area of exploration in this survey dealt with the sizing of the residential units being replaced. This was gathered to see what was currently going on the market as it was thought that residential units tend to be oversized and there was a desire to see if any units were being down-sized. Three-quarters of the time, it



is a like-for-like sizing swap out. However, around 15 percent of the time, it can be a larger unit being installed while about 8 percent of the time a smaller unit being installed. (Figure 9-9)

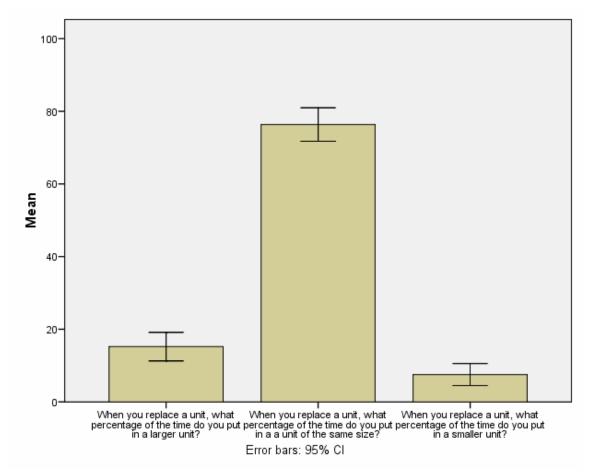


Figure 9-9 Size of HVAC Unit Replaced

Influencers

We asked the respondents about two different types of influencers. The first was about possible ways to influence their customer and the second was about how SDG&E could find and influence them.

We were interested to know if the information gained from the VSP techniques helped to convince customers of the value of additional services such as repairs or system replacements. About half (57 percent) of the contractors who had VSP trained technicians felt that the information helped some of the time while 20 percent thought it helped all time. This was balanced by the 20 percent who thought that this information never helped convince the customer of the need for additional services.

When asked about how the utility could influence them or other contractors to perform quality installation services, over half indicated that incentives and rebates would be an influence.



Table 9-6 Ways to Influence QI Procedure Use

\$Influence Frequencies

		Respo	Percent of	
		N	Percent	Cases
How could the utility influence higher AD/QI use?	(Give incentive/rebate/\$\$)	64	38.8%	54.2%
	(Pay for the equipment)	26	15.8%	22.0%
	(Subsidize the training)	54	32.7%	45.8%
	Provide training	1	.6%	.8%
	Make the customers more aware of the service	2	1.2%	1.7%
	Legislate it (i.e., make is a law)	8	4.8%	6.8%
	Make contractors more aware of the program	5	3.0%	4.2%
	Make it easier to do the program	5	3.0%	4.2%
Total		165	100.0%	139.8%

a. Group

There were a couple comments from the respondents that were so unique that they could not be binned. They are:

- I would have to be ensured business.
- Remove the need for NATE certification to attend the classes. Everyone should be able to attend. [NOTE: this is assumed to reference the training classes.]

One possible way that the program can influence participation is through the incentive level. While the program currently provides an incentive to perform the quality installation (~\$150) services, we asked those 64 contractors who brought this up as a way to influence them what they felt was an appropriate level. Although 3 contractors indicated that no amount of money would influence them and 31 did not know what level could influence them, the average from the other half providing answers was \$133.

Premium AC Cooling

A number of questions were asked of the contractors about high efficiency cooling. Currently, 21 percent (± 4.5 percent) of the equipment the contractors sell were stated to be of SEER rating 15 or higher. (The 21 percent level is likely an over-estimate of high efficiency sales)¹. Of those who sold higher efficiency equipment, there was no difference in the percent installing this equipment who had received rebates and those who had not. Of the contractors who had received rebates from the Premium Efficiency Cooling program, 57 percent indicated the rebates were for locations in SDG&E service territory all the time (52 percent) or most of the time (4 percent). Twenty six percent of the rebates were for locations outside of

¹ California Market Share Tracking HVAC 2005 indicated a market share 16.5% within SDG&E for SEER 13 or higher in 2005. It is highly unlikely that there has been a 5% jump in two years for a higher efficiency unit even though the code is now SEER 13.



SDG&E. About nine percent of the rebates went to SDG&E locations some of the time and for another 9 percent, the service territory location was not known.

The possible obstacles for selling high efficiency equipment were stated previously in Table 9-5. Statements regarding the benefits of the Premium Efficiency Cooling program varied. Thirty percent thought that the primary benefit was receiving the incentive dollars, while another 30 percent felts that premium efficiency better serves the customer. Other benefits stated were competitive pricing (13 percent), increased profitability selling premium efficiency (4 percent), and the remaining 23 percent were unique response.

Working with the Utility

While staff training was not thought to be a big obstacle to selling equipment or AD/QI services, 32 percent of contractors considered subsidized training as a way to influence use of AD/QI procedures. When asked if a free half day sales training for high efficiency equipment were offered in their area, 63 percent indicated they would send their staff. Similarly, 66 percent stated they would send staff to a free whole day technical training on quality installation and services in their area.

SDG&E was interested in how they could help the contractors and asked about both selling quality installation and maintenance specifically. The highest response was to increase the size of the rebates, followed by advertising.

Table 9-7
Ways SDG&E Can Help Contractor Sell Premium Cooling and QI

If SDG&E could do one thing to help your firm sell premium efficiency cooling and quality installation and maintenance what would you choose?

		F	Danasat	Cumulative
		Frequency	Percent	Percent
Valid	Other	4	2.9	2.9
	Increase the size of the rebates	73	52.1	55.0
	Promote ACCA quality installation or Energy Star certification	7	5.0	60.0
	Promote and subsidize HVAC technical training	18	12.9	72.9
	Encourage co-branded advertising	6	4.3	77.1
	Advertise the value of premium efficiency and QI services	28	20.0	97.1
	(Don't know)	4	2.9	100.0
	Total	140	100.0	

The verbatim choices that could not be binned were (i.e., "Other" in Table 9-7):

- Make rebate paperwork simpler.
- Price of the air-conditioning.
- All of the above.
- *Team up with the manufacturer and bring down the cost.*



9.2.2 HVAC Programs Focus Group Results

Commercial Focus Group

<u>Participant Characteristics</u> - The ten participants (9 men and 1 woman) were property managers or facility managers of medium to large companies. The company types varied with three having data centers on the property they managed. They were responsible for anywhere from 2 to 92 HVAC units that varied from 2 to 30 tons. A few had units under 2 years of age, but most were at least 5 years old and one person had units stated to be over 35 years old. Most did not know the monthly cost of operating the AC unit, although a few stated from \$20 to \$4,000. Most of the AC units ran during business hours, although the property managers also had residential units, which ran both day and night. Eight of the sites had regular maintenance, generally on a quarterly basis. The other two had service calls only when they experienced a problem. All changed the filters from monthly to twice a year.

The group interacted well with the moderator. They appeared willing to discuss the topics. A few had more knowledge about the topics than others, but this did not appear to inhibit the others in the group from expressing their opinions and thoughts.

<u>Understanding of AC Equipment</u> – The understanding of the AC equipment went from none to one person having a good sense of what occurred within an AC cycle and being familiar with the different types of AC equipment. The rest ranged in-between these two extremes. About half did not want to deal with fixing their AC units themselves and several could not (even if they had wanted to) due to company policies. All had service contractors when needed. The group expects their AC units to work, provide comfort, and have easy controls. Good operating costs, rebates, and efficiency were all mentioned when asked about what they wanted from an AC unit.

<u>Purchase of New Units</u> – Half of the group had purchased a new AC unit within the past two years. All appeared to look at lifecycle costing during their purchase, although matching the size (in tons) of the old unit, working together with the current control system, and energy efficiency were mentioned as well. A few were required by their company to obtain several bids when purchasing AC equipment. Two knew that could probably obtain incentives or tax credits and another was actively working with SDG&E about incentives for some AC units.

<u>Current Contractor and Maintenance</u> – As stated earlier, all have a contractor they use. Half have quarterly maintenance contracts and a few perform some minimal maintenance with internal staff. Most are satisfied with their contractor and indicate they look for a new person if they are not satisfied. Satisfaction was based on the fact that they want the job to be both done correctly and done correctly the first time. If there are difficulties, though, and the contractor comes back to fix them at no cost, they indicated they would probably remain with that contractor. The group likes or dislikes specific technicians, though, not really the company. They form relationships with specific people based on the work effort and quality of that person. Many of the group receive cold-calls from other contractors (which they tend to not use). A few will check with peers in their company (when the company has multiple sites) or with colleagues performing similar work when they want a new contractor. As a group, they tended to trust their contractors to a certain degree. A few trust them completely (because they have no knowledge of the AC system) and a few check on the work of their contractors and ask for clarification when they don't understand a suggested fix.



Refrigerant Charge & Airflow (RCA) – The moderator read a brief introduction about AC TIMe program based on the brochure. An AC TIMe brochure was also shown and passed around during the focus group. None had heard of the program, but several people wrote down the phone number and address from the brochure. Most of the participants thought that their regular maintenance included this type of testing and adjustment of refrigerant. They believed that the actions were positive and that it could save energy. It was a mixed reaction to learning about the training. Some felt that a two day course did not suffice while others were OK as long as they knew that the technician had been trained by a reputable source. As a group, there was little value seen in a 3rd party verification of the actions taken during an RCA service. However, most wanted their own contractor to provide the service, not bring in an outside contractor. The cost of the service was not an issue for any of the participants. If they were forced to use an outside contractor, the computerized aspect of the program was seen as a benefit. Skepticism was raised, though, about what they were being sold by the program. Some thought they would work with their own contractor to see if they agreed with any findings from an RCA service. Also, there was agreement that SDG&E be part of any program provided.

Residential Focus Group

<u>Participant Characteristics</u> – This group of 10 participants consisted of 4 women and 6 men of various ages. The average age of the AC unit in their home was 10.75 years, with a range from 1 to 22 years. The average square footage of their homes was 2,264 square feet. They estimated that they paid an average of \$108/month to cool their home (although 2 participants were unable to provide an estimate). Seven of the participants indicated they typically did not use their AC unit at night (i.e., after 8 PM). Four used their AC in the early afternoon, and six indicated use in the late afternoon and early evening hours (i.e., 4 PM to 8 PM). Most adjust their temperature settings. When they adjusted the thermostat to make it cooler was unique for each person. They do not have any regular maintenance performed on the AC unit except changing the filter. They change their AC filter once or twice a year. Most indicated they pay close attention to their electric bill, although a few notice it only when there are big changes. One just scans the bill before paying.

The group was lively and talkative. A few had more knowledge about some of the topics than others, but the quiet ones opinions were brought out by the moderator on several occasions. The group dynamics were positive, with people interacting often and continuing to talk among themselves about the topic after the focus group officially ended.

<u>Understanding of AC Equipment</u> – In general, there was little real understanding of AC equipment. The participants want the AC to cool the home in a reasonable amount of time for a reasonable cost. They want the air filtered, especially during fire season. They want the AC to provide a consistent temperature and be reliable. Only one has attempted to do anything other than change the filter in the unit, and that was with an older unit. The current units are viewed as the purview of experts to fix.

<u>Purchase of New Units</u> — Only one participant had purchased a new AC unit within the past two years. This person carefully considered the attributes desired in an AC unit. Energy efficiency was among the things looked at as the person shopped. Interestingly, the AC unit was not a replacement, as there previously had been no AC in the home. When opened up to the group about what would need to be considered when purchasing a new AC unit, several indicated that a digital thermostat was desired. The ability to adequately cool the home was very important. Other considerations mentioned were: energy efficiency, a nice looking condenser unit, longevity of the unit, and if they had been happy with the past



unit then would probably purchase a similar make. The group indicated they would possibly do research on the Internet or read Consumer Reports before buying anything. Some may ask a neighbor.

<u>Current Contractor and Maintenance</u> – The response to this topic was more about what people <u>would do</u> not what they <u>did do</u>. When asked directly, none of the group stated they had a contractor that they used regularly for AC service and repair. Opinions were provided, though, based on the occasionally times they interacted with a repair person. While they all indicated they change their filter, there was no regular maintenance performed by an AC technician. However, nine of the ten gave a rating of 9 or 10 (out of ten) indicating they trust what a service repair person would tell them needs to be fixed in an AC unit (one did not respond due to no experience). Most likely, this response is based on experience with any type of large appliance repair, not just an AC unit. When asked about how they would find a contractor, a couple wanted someone they could trust and would find that person through asking a neighbor or using a list from a trusted source (such as the local Chamber of Commerce).

Refrigerant Charge & Airflow (RCA) – The moderator read a brief introduction about AC TIMe program based on the brochure. An AC TIMe brochure was also shown and passed around during the focus group. None had heard of the program. There was much confusion about what this service provided that was different from what they already received when a technician representing SDG&E came to their home for any reason such as a service check. The group had difficulty separating out what SDG&E technicians could/would do for them on a service check versus what was being provided through this program. There was a belief that the AC units should last a long time without maintenance. As one participant stated: "Our AC has run for 20 years with no problems and it works pretty good!." Another said that if anything was needed in a unit that was still under warranty, they would be upset. However, another participant caught the likeness to a car maintenance as keeping the unit running in top efficiency. None of the group felt that having another 3rd party come in to verify an RCA service performed by a technician was useful. In fact, the group did not want this at all.

The group had several opinions about how to "get the word out" about the program. Among the responses were: advertise on TV, do a free tune-up in a neighborhood, and target the messages based on area and age of unit. All agreed that use of information on a bill stuffer was not useful. One indicated that using HVAC contractors to sell the program may help. Several indicated that actual savings values would help sell them on using the service. A couple indicated they would need pretty good proof that they would obtain savings, especially if they had to pay for the service. If the service were free, though, most indicated they would probably have the service. It was unclear, though, whether they would believe that a contractor offering the service was not simply looking for work. If SDG&E offered the service, though, most indicated they would believe it was not simply a ploy to make more money.

Concepts were explored around what type of message worked in the current brochure and what else could be included. The use of advanced diagnostics did not resonate with this group, nor did the idea of a savings roadmap. The idea of a tune-up was a good one as was attempting to tie in the tune-up with blackout prevention.



9.2.3 HVAC VSP In-depth Interview Results

The AC TIMe and Premium Efficiency Cooling & Motors Program both use the same four Verification Service Providers (VSP) as a conduit for their programs. The VSPs each have different logistics and procedures that an HVAC contractor follows to enable an RCA servicing. Based on the interviews, each of the VSPs appeared to have a good handle on their approach. They were knowledgeable about the market and had run programs in other parts of California and/or the country. They thought that the program managers for both AC TIMe and Premium Cooling & Motors were responsive to them, at least to the extent possible.

At the time of the interviews, all felt fewer RCA services had occurred than what they would have preferred. A late program start was one reason, but the consensus was that both programs are simply too complicated to keep contractors interested and involved. The need to know exactly what climate zone the house resides (and for which an incentive is based) was too much of a hassle for the contractors. When RCA services were performed outside of a specific climate zone and contractors paid less than expected (or not paid at all), then they tended to drop out. According to the VSPs, the programs went through some ramping up difficulties with changes in incentive structure and type of homes that could participate. This caused contractors to take a wait-and-see attitude and further reduced the hoped-for service completions. The incentives were stated to be too low as well. Apparently, SCE has higher incentives for similar services and the contractors are participating at a higher rate, purportedly due to the incentives.

The VSPs try to provide the contractors a way to use their specific services that will work with the contractor's current business model. According to one VSP, there is little to no chance that a contractor will change how they do business to take advantage of an energy efficiency program incentive. According to the VSPs, there are a couple different business models in use by the contractors. One end of the spectrum is based on the contractor having a group of loyal customers. While not always the case, these tend to be smaller firms. A small group tends to be sufficient for their business and they gain new business through word-of-mouth and references. Interestingly, these contractors will use a new service such as RCA for all their customers and then that is it, there are no more customers for the RCA servicing. Thus, while the program may include these types of contractors, there is a relatively finite group of end-users that would be serviced. The other end of the spectrum business model attempts to obtain business through low price, where the customers are not necessarily through referral. According to one VSP, these tend to be larger contractors with many technicians. Both business models will drop any energy efficiency programs if the process becomes too cumbersome. A third type of business model mentioned by one VSP is that of a 'specialty' contractor. This type of business is built around utility programs.

Each of the VSPs are a business that uses incentives to help spur the use of their business product. In the past, each of the VSPs have been the administrator of similar energy efficiency programs, albeit ones that used only their approach. With AC TIMe and Premium Efficiency Cooling, SDG&E chose to use other entities in between the VSPs and the customers. It is unclear whether the added layer of administration provided extra value or efficiency, although it did increase the complexity. It was indicated that one large HVAC contractor simply dropped out of the program to wait to see how things settled out and if the end result was going to be advantageous to their business.



9.3 Focus Group Guide: SDG&E Commercial Customers

Date: Time: Location:

We will be conducting a focus group of SDG&E commercial customers that at least one split unit or packaged unit AC system. Focus group participants should be the person from the company who makes decisions about the purchase and maintenance of the AC system, most likely the facility manager. They should also use their AC on a regular basis (at least for part of the day for at least 2 months during the summer).

Use of Air Conditioner

While we are waiting please fill out the cards in front of you.

These are the questions on the cards

- 1. Do you use split AC units or packaged AC units
- 2. How many units does your facility have?
- 3. The approximate age of your AC unit
- 4. The approximate size (in tons) of units
- 5. Approximately how much does it cost for you to use your AC in the summer?
- 6. What time of day do you use the AC? (is it on all day and night, off at night?)
- 7. Do you adjust the temperature setting? When do you make the home cooler? When do you make it warmer?
- 8. When was the last time your AC unit was serviced by a technician? Do you have regular maintenance service performed on it or just when there is a problem?
- 9. How often do you change the filter?

Introduction

My name is [SB] and I am going to be moderating the discussion today. By a show of hands, how many of you have participated in a focus group before? There are no right or wrong answers. Please feel free to share your opinions and ideas during our discussions tonight.

This focus group will last about 90 minutes, and just to let you know, we are videotaping this discussion to help with our analysis. Behind this mirror is the video camera and our clients who we're doing this research for. Your identity will be confidential – the responses you share today will not be associated with you as an individual.

Let's start by going around the room and having you tell us your name and a little about yourself. Please tell us:

- 1) your first name
- 2) When you think of energy efficiency, what comes to mind? That is, what does energy efficiency mean to you?

Understanding of AC Equipment

1. What do you want from your air conditioning unit? [Probe for importance of comfort, reliability, low initial costs]



- 2. Has anyone ever fixed the AC unit in their facility?
 - a. What did you do? How difficult was it?
- 3. Has anyone ever fixed their own car?

(For those that have fixed a car)

- 4. Would you feel comfortable fixing the AC unit at your facility? Why or why not? (probe for reasons of feeling more comfortable fixing car even though it is more complicated than an AC system)
- 5. Does anyone know if their AC unit has a thermostatic expansion valve (TXV)? Does anyone know what this does?
- 6. How familiar are you with the refrigerant cycle of an AC unit?

Purchase of New Units

- 7. Has anyone bought a new unit in last 2 years?
 - a. What were the considerations involved in deciding what to get?
 - b. How did you make your decision?
 - c. Did you consider the efficiency?

[ASK ALL]

- 8. What considerations would you have if you needed new system? [Probe for duct work and leakage testing]
- 9. Are any of you aware of any tax credits that are available?
- 10. What about incentives from SDG&E?

Current Contractor and Maintenance

- 11. Who has a contractor that that is used regularly for AC service and repair?
 - a. How satisfied are you with the job they do? Why?
 - b. To what degree do you trust in what they may tell you is needed for the unit
- 12. How would you find a contactor if you needed one? What characteristics are important?
- 13. What kind of maintenance have you or have you hired someone to perform on your AC unit?
 - a. Did you watch the technician perform maintenance? What did you see them do?
 - b. Did you see the technician use gauges?
- 14. What kinds of things have the contractors told you are needed to be fixed?



Refrigerant Charge, Airflow, and Duct Sealing

I am going to hand out this brochure for a program called AC Time. The program promotes AC tune ups which are similar to car tune ups. When you get your car tuned up you save gas by improving the miles per gallon. When you get your AC tuned up you save electricity. The first thing the program does it offer advanced diagnostic training to AC contractors. Once these contractors complete the AC Time training they are can then perform tune ups using advanced diagnostics on AC systems. This would include diagnosing your AC system for refrigerant level, air flow through the system, inspecting the economizer and overall AC system condition. All things that effect how well your AC system works. If the refrigerant charge is not at the right level or if the air flow is restricted your AC unit has to work harder therefore using more energy.

In this program after the AC Time contractor tests for these things you are given a "savings roadmap" which verifies that your AC system has been properly tested and adjusted for refrigerant charge and air flow and documents what repairs, if any, are needed. To find a contractor that has completed the training you would call the 1 800 number or go to the AC time website.

- 15. Has anyone ever had an AC tune where the technician tested for refrigerant charge, air flow or adjusted your economizer?
- 16. What do you think of this program that I just described? Would you hire a specially trained contactor to perform a tune up on your AC. Why or why not?

By having your AC tuned up you would experience greater AC efficiency and lower operating costs, fewer repairs, your AC would last longer and would provide more comfort in your home.

- 17. What else would you need to know to want to have this service? How could we make the process easy to explain?
- 18. What is the value of the third-party verification?

San Diego Gas and Electric currently offers the tune up service free of charge to its customers. However, only some AC contractors choose to offer it.

- 19. If the contractor you currently use to service your AC unit did not offer this service how would that affect you? Would you find a contractor that did?
- 20. What should the program add to get more people interested in having the AC tune up? What should be done to get more contractors interested in offering the service?
- 21. What could the program do to make it easier for people to get this service?



9.4 Focus Group Guide: SDG&E Residential Customers

Date: Time: Location:

We will be conducting a focus group of SDG&E homeowners (not renters) that have central AC. Focus group participants should be the household member who makes decisions about the purchase and maintenance of the AC system. They should also use their AC on a regular basis (at least for part of the day for at least 2 months during the summer).

Use of Air Conditioner

While we are waiting please fill out the cards in front of you.

These are the questions on the cards

- 1. The approximate age of your AC unit
- 2. The approximate square footage of your home
- 3. Approximately how much does it cost for you to use your AC in the summer?
- 4. What time of day do you use the AC? (is it on all day, off while at work, off while sleeping?)
- 5. Do you adjust the temperature setting? When do you make the home cooler? When do you make it warmer?
- 6. When was the last time your AC unit was serviced by a technician? Do you have regular maintenance service performed on it or just when there is a problem?
- 7. How often do you change the filter?

Introduction

My name is [SB] and I am going to be moderating the discussion today. By a show of hands, how many of you have participated in a focus group before? There are no right or wrong answers. Please feel free to share your opinions and ideas during our discussions tonight.

This focus group will last about 90 minutes, and just to let you know, we are videotaping this discussion to help with our analysis. Behind this mirror is the video camera and our clients who we're doing this research for. Your identity will be confidential – the responses you share today will not be associated with you as an individual.

Let's start by going around the room and having you tell us your name and a little about yourself. Please tell us:

- 1) Your first name
- 2) Whether you think you pay a lot of attention to your electric or gas bills, some attention to your bill, or whether you just pay the energy bills without thinking too much about it. [And don't worry, there are no wrong answers here.]
- 3) When you think of energy efficiency, what comes to mind? That is, what does energy efficiency mean to you?



Understanding of AC Equipment

- 1. What do you want from your air conditioning unit? [Probe for importance of comfort, reliability, low initial costs]
- 2. Has anyone ever fixed their own AC unit?
 - a. What did you do? How difficult was it?
- 3. Has anyone ever fixed their own car?
- 4. What about your washing machine or another major appliance in your home?

(For those that have fixed a car or appliance)

- 5. Would you feel comfortable fixing your AC unit? Why or why not? (probe for reasons of feeling more comfortable fixing car even though it is more complicated than an AC system)
- 6. If I were to tell you that your unit has two parts, one indoor and one outdoor would you have any idea what the two parts do? (use show of hands with yes no somewhat)

Purchase of New Units

- 7. Has anyone bought a new unit in last 2 years?
 - a. What were the considerations involved in deciding what to get.
 - b. How did you make your decision?
 - c. Did you consider the efficiency?

[ASK ALL]

- 8. What considerations would you have if you needed new system? [Probe for duct work and leakage testing]
- 9. Are any of you aware of any tax credits that are available?
- 10. What about incentives from SDG&E?

Current Contractor and Maintenance

- 11. Who has a contractor that that is used regularly for AC service and repair?
 - a. How satisfied are you with the job they do? Why?
 - b. To what degree do you trust in what they may tell you is needed for the unit
- 12. How would you find a contactor if you needed one? What characteristics are important?
- 13. What kind of maintenance have you or have you hired someone to perform on your AC unit?



- a. Did you watch the technician perform maintenance? What did you see them do?
- b. Did you see the technician use gauges?
- 14. What kinds of things have the contractors told you are needed to be fixed?

Refrigerant Charge, Airflow, and Duct Sealing

I am going to hand out this brochure for a program called AC Time. The program promotes AC tune ups which are similar to car tune ups. When you get your car tuned up you save gas by improving the miles per gallon. When you get your AC tuned up you save electricity. The first thing the program does it offer advanced diagnostic training to AC contractors. Once these contractors complete the AC Time training they are can then perform tune ups using advanced diagnostics on AC systems. This would include diagnosing your AC system for refrigerant level, air flow through the system, duct sealing and overall AC system condition. All things that effect how well your AC system works. If the refrigerant charge is not at the right level or if the air flow is restricted your AC unit has to work harder therefore using more energy.

In this program after the AC Time contractor tests for these things you are given a "savings roadmap" which verifies that your AC system has been properly tested and adjusted for refrigerant charge and air flow and documents what repairs, if any, are needed. To find a contractor that has completed the training you would call the 1 800 number or go to the AC time website.

- 15. Has anyone ever had an AC tune where the technician tested for refrigerant charge, air flow or duct sealing?
- 16. What do you think of this program that I just described? Would you hire a specially trained contactor to perform a tune up on your AC. Why or why not?

By having your AC tuned up you would experience greater AC efficiency and lower operating costs, fewer repairs, your AC would last longer and would provide more comfort in your home.

- 17. What else would you need to know to want to have this service? How could we make the process easy to explain?
- 18. What is the value of the third-party verification? (the verification specialist to ensure the work was done properly)

San Diego Gas and Electric currently offers the tune up service free of charge to its customers. However, only some AC contractors choose to offer it.

- 19. If the contractor you currently use to service your AC unit did not offer this service how would that affect you? Would you find a contractor that did?
- 20. What should the program add to get more people interested in having the AC tune up? What should be done to get more contractors interested in offering the service?
- 21. What could the program do to make it easier for people to get this service?



9.5 In-depth Interview Guide: Verification Service Providers

AC TIMe Program (formerly called HVAC Training, Installation and Maintenance Program)

Please provide a summary of the progress you have made so far in participating in the AC TIMe Program

- 1. We know that KEMA signs up contractors to participate in the overall program. How many contractors have you recruited to use your Refrigerant Charge system?
- 2. Please describe the process you use to recruit contractors.
- 3. Have you seen the tri-fold pamphlet for marketing to contractors? Do you feel it provides the correct information? Do you feel contractors may want to participate after seeing the pamphlet? If not, what would you emphasize more?
- 4. What are the obligations for the contractors with whom you work?
- 5. How do you influence your contractors to provide the services called out by the program?
- 6. How many homes or commercial sites have participated? If several, what services are being offered the most to customers and what is the residential to commercial split?
- 7. Is this about what you expected to achieve at this point in the program?
- 8. Please describe the major issues you have encountered so far.
- 9. What are the goals for your part of the program?
- 10. What is needed to get the program to reach the goals you anticipated? (If no anticipated goals what do you think would increase the level of services by the contractors?)
- 11. Are there other parts of CA or the country where your refrigerant charge & airflow (RCA) system is being more heavily utilized? Why do you think the systems are more utilized there?
- 12. Training: Do you have any opinion on the training provided by the program (i.e. KEMA Services)?
- 13. Have you provided your own training to contractors? How is this done and on what do you train the contractors? How many have been done? How many firms have participated? Do you have a training manual?
- 14. How does one calculate the energy and demand savings resulting from the services rendered by the technician? (what is the algorithm)
- 15. Do you have data that shows actual changes made to the HVAC systems?



- 16. Does your RCA system require a pre-test and post-test reading of system conditions?
- 17. Describe your interaction with KEMA Services. What have been the strengths? What needs to change?
- 18. What data do you send to KEMA Services and what data do you collect, but not pass on?
- 19. What are the different business models you see in the HVAC contractor market?
 - a. How do the different HVAC contractors obtain business?
 - b. How do you think QI services fit into each of the different types of businesses?
- 20. What is the typical technician turnover rate for contractors?
- 21. What do you think are relevant questions to ask contractors regarding the implementation of quality installation services?

Premium Efficiency Cooling Program (formerly named upstream HVAC/motors)

- 22. Please describe the role you play in this program.
- 23. Please describe the cost to contractors to use your services. (Please designate the up-front and/or training costs, required equipment costs, and estimated resources required to participate in training and perform the QI services.)
- 24. Did you participate in the five program orientation workshops in San Diego, El Cajon and Temecula? (If no, how many did you attend?)
- 25. How many contractors in the SDG&E service area had you worked with in prior years, and how many of these did you expect to re-activate for this program?
- 26. Where are you now with respect to that goal?
- 27. The program goal is 3,420 residential systems. Where are you now with respect to that goal?
- 28. Regarding questions 4 and 5, s this about what you expected to achieve at this point in the program?
- 29. Please describe the major contractor enrollment and production issues you have encountered so far.
- 30. Have you seen any of the literature prepared for this program? Do you think that it addresses the needs?
- 31. What activities have you undertaken to recruit residential contractors? (Have you been working with distributors, industry associations, unions? Have you done any direct mailings or telemarketing to contractor lists?



- 32. Have you received any feedback from contractors about the program so far?
- 33. What if any has been your interaction with CSG?. What have been the strengths? What needs to change?
- 34. Are you participating on the SCE AC Quality Program? Is your contractor recruitment and production on the residential early retirement program significantly higher, lower, or about the same?
- 35. Please describe the reasons for differences in contractor participation and production.
- 36. What recommendations do you have for this program?



9.6 CATI Interview Guide: HVAC Contractors

Date	
Utility	SDG&E and SoCalGas
Program Name	AC TIMe Program and Premium Cooling & Motors Program
Target	HVAC Contractors
Sample Size	From D&B
Completed # Desired	140
Quotas (if applicable)	None
Sample File Name	ODC has names from D&B
Contractor Name	Equipoise Consulting Inc
Primary Contact (person	Mary Sutter
who should be contacted	
with any questionnaire	
questions)	
Phone	510-864-8507
Email	Mary@EquipoiseConsulting.com

Hello, my name is ______. San Diego Gas & Electric Company is doing a lot of energy efficiency work through HVAC contractors such as you. They are interested in creating better programs for the HVAC market. Do you have about 12 minutes to help us? Are you one of the people in your company who is knowledgeable about how the business is run?

(If not, ask: Can you direct me to the most appropriate person?)

S1. Would you say that the majority of your work occurs in the SDG&E service territory or the SoCalGas/SCE service territory?

SDG&E	1
SoCalGas/SCE	2
(Neither)	4
(Don't know)	98
(Refused)	99

S2. We are trying to make sure we get responses from companies that service different types of customers. What percentage of your company's business is residential?

(NUMERIC OPEN ENDED 1.00)

[IF S2 = 1.00 SKIP TO **BEGINNING**]

S3. Thinking of the non-residential business that you do, what percentage of your business is packaged or unitary systems with a single compressor/condenser. That is, what percent of your nonresidential business is NOT involved with large centralized chillers with condensing systems.

(NUMERIC OPEN ENDED 1.00)



BEGINNING: Just so you know, all your responses will be kept confidential. Our first set of questions is about what we call Advanced Diagnostics or Quality Installation, or AD/QI for short. We think of QI as occurring when a technician has been specially trained to perform refrigerant charge and air flow diagnostics and duct testing and sealing using either one of four Verification Service Provider (or VSP) platforms or obtaining a NATE certification. The four VSP platforms are Check-Me, Enalasys, Field Diagnostics and Verified-RCA.

1.	Have you heard of any of these four VSP platforms?		
	Yes		
	No	2 [SKIP TO Q11]	
	(Don't know)	98 [SKIP TO Q11]	
	(Refused)	99 [SKIP TO Q11]	
2.	What percent of your technicians have been trained by one o	f the VSPs?	
	NUMERIC OPEN ENDED 1.00	1	
	None	2 [SKIP TO Q12]	
	(Don't know)	98 [SKIP TO Q12]	
	(Refused)	99 [SKIP TO Q12]	
3.	Have you signed up with any of the 4 VSPs to use their syste	em?	
	Yes		
	No	2 [SKIP TO Q6]	
	(Don't know)	98 [SKIP TO Q6]	
	(Refused)	99 [SKIP TO Q6]	
4.	Which system or systems have you signed up with (MULTII	PLE CHOICE, 4 ANSWERS	
	Check-Me,		
	Enalasys	2	
	Field Diagnostics	3	
	Verified-RCA	4	
	(Don't know)		
	(Refused)	99	
5.	Approximately how many cooling systems have you tested u	using that technique?	
	(NUMERIC OPEN ENDED 1,000)		
	(Don't know)	98	
	(Refused)		



6.	How would you best describe your company's use of AD/QI within your general service and maintenance jobs?	
	We do AD/QI on every service call we make	
	We do AD/QI when my techs have the time	
	We do AD/QI when requested by the customer	
	We do AD/QI only when there is a difficult system or one that is not simple to figure out problem	the
	Never4 [SKIP TO Q8]	
	Other (OPEN ENDED SPECIFY)5	
	(Don't know)98	
	(Refused)99	
7.	What percent of the time do you think your technicians service the refrigerant charge level usin the VSP-specific procedures?	g
	(NUMERIC OPEN ENDED, 1.00)	
	(Don't know)98	
	(Refused)99	
8.	What percent of the time do you think your technicians service the refrigerant charge level WITHOUT using the VSP-specific procedure?	
	(NUMERIC OPEN ENDED, 1.00)	
	(Don't know)	
	(Refused)	
9.	Does your company perform Duct Test and Seal projects using an air flow tool such as a Duct Blaster or similar tool?	
	We do not perform duct test and seal projects	
	We use a Duct Blaster when we do duct test and seal projects	
	We use something similar to a Duct Blaster when we do DTS projects	
	Other (OPEN ENDED SPECIFY)5	
	(Don't know)98	
	(Refused)99	
10.	In your opinion, how often does the information gained from the VSP-specific technique help convince customers of the value of additional services such as repairs or system replacement? Would you say it helps always, some of the time, never, or something else?	
	Never	
	Some of the time	
	Always3[SKIP TO Q15]	



Something else (Specify)	4[SKIP TO Q15]
(Don't know)	98 [SKIP TO Q15]
(Refused)	99 [SKIP TO 015]

- 11. While I can't explain each of these VSP platforms in our call, a quick overview is that technicians attend up to 8 hours of training that increases their knowledge about diagnosing of refrigerant charge and air flow problems and how to use the VSP platforms. The training also teaches the technician how to perform AD/OI using the VSPs equipment. Some of the VSP's require the company to buy equipment to help with the diagnosing and some do not. However, all require the technicians to follow specific procedures to obtain the optimal charge and airflow and Duct Testing and Sealing (if the contractor elects to do DTS) in the system and save energy.
- 12. What do you think are some of the reasons why your company has not had any of your technicians trained in one of the VSP platforms? [MULTIPLE CHOICE, 10 choices]

It is too costly	1
The training takes up too much time	2
We have high turnover of technicians and it doesn't make sense to train them	3
We didn't know about any training	4
It doesn't add anything to our business	5
Our technicians are too busy to perform the procedures	6
We already perform this type of work, just not following specific procedures	7
The little amount the customer saves does not justify the expenses	8
I heard too many bad things about the procedures	9
Something else (Specify)	10
(Don't know)	98
(Refused)	99

13. There are a few possible reasons for not doing training that we want to make sure we really understand, so I am going to ask a couple questions that cover reasons you may have already stated. If so, I apologize, but these are quick questions and I hope you don't mind answering them. I would like you to tell me your level of agreement to the following statement: Our company does not participate in VSP AD/QI training because we already do refrigerant charge and airflow servicing using other procedures. Would you say you disagree very much, disagree somewhat, neither agree nor disagree, agree somewhat, or agree very much with the statement?

Disagree very much	
Disagree somewhat	2
Neither agree nor disagree	
Agree somewhat	
Agree very much	5
(Don't know)	98
(Refused)	99



14.	I have another statement for you to consider using the same scale. The statement is really hard to perform this type of testing during the summer because we are busy trouble calls, performing installations and fixing broken air conditioners. (Read sc needed)	handling
	Disagree very much	1
	Disagree somewhat	2
	Neither agree nor disagree	3
	Agree somewhat	4
	Agree very much	5
	(Don't know)	98
	(Refused)	99
15.	My next two questions are about the market in general. Would you say there IS or shortage of HVAC technicians in today's market?	IS NOT a
	Is a shortage	1
	Is not a shortage	O Q17]
	(Don't know)	98
	(Refused)	99
16.	How has the shortage affected your business?	
	(I continually have to hire new technicians)	1
	(I continually have to train new technicians)	2
	(I have to pay my technician well to keep them)	3
	(I do not have as much control over technicians as I would like)	4
	(Makes it difficult for me to expand my business)	5
	(Makes it difficult to offer the quality of service I would like)	6
	(Makes it difficult to offer customers preventative maintenance)	7
	(Other, specify)	00
	(Don't know)	98
	(Refused)	99
17.	Regardless of whether your company has any technicians trained in VSP AD/QI p not, we are interested in your opinion about how to influence contractors such as y utility wanted to have more contractors use AD/QI techniques, what would it take happen? (Give incentive/rebate/\$\$)	rourself. If the to cause this to CO Q19]



(Don't know) (Refused) 18. What do you think is an appropriate incentive level per job that would cause your firm participate and use the VSP system on all jobs? NUMERIC OPEN END (\$000.00) No amount of money (Don't know) (Refused) 19. What percentage of the new equipment you install has SEER rating of 15 or higher? NUMERIC OPEN END, 1.00 number [if 0% SKIP TO (Don't know) (Refused)	99 to 2 98
participate and use the VSP system on all jobs? NUMERIC OPEN END (\$000.00) No amount of money	2
participate and use the VSP system on all jobs? NUMERIC OPEN END (\$000.00) No amount of money	2
No amount of money	.98
(Don't know) (Refused) 19. What percentage of the new equipment you install has SEER rating of 15 or higher? NUMERIC OPEN END, 1.00 number [if 0% SKIP TO (Don't know)	.98
(Refused)	
19. What percentage of the new equipment you install has SEER rating of 15 or higher? NUMERIC OPEN END, 1.00 number [if 0% SKIP TO (Don't know)	99
NUMERIC OPEN END, 1.00 number [if 0% SKIP TO (Don't know)	
(Don't know)	
20. There may be different reasons why it could be difficult to sell above code equipment of services to your customers. I have nine possible obstacles that I would like to you rate a not a problem (with a number 1) to being an extremely significant problem (with a number would you rate[ROTATE]	as being
a. reaching the decision maker	ber
b. not knowing who the decision maker isNUMERIC VALUE, 10 numbers 10 nu	ber
c. customers state they don't need product/serviceNUMERIC VALUE, 10 numbers 10 numbers 11 numbers 12 nu	ber
d. no time to market this type of equipmentNUMERIC VALUE, 10 numbers	ber
e. insufficient sales staff	ber
f. lack of staff trainingNUMERIC VALUE, 10 numl	ber
g. lack of customer awareness or knowledgeNUMERIC VALUE, 10 numl	ber
h. price/cost issues	ber
i. lack of marketing materialsNUMERIC VALUE, 10 num	ber
21. Has your firm received any rebates from the Premium Efficiency Cooling Program for high efficiency air conditioning?	installing
Yes	1
No	24]
(Don't know)98 [SKIP TO Q2	24]
(Refused)99 [SKIP TO Q2	24]
22. Are those rebates for locations serviced by San Diego Gas & Electric?	
Yes	1
No	



	Most of them	3
	Some of them	4
	(Don't know)	98
	(Refused)	99
23.	What is the primary benefit the program provides your company?	
	Receive rebate dollars	1
	Increased profitability selling premium efficiency equipment	2
	Competitive pricing,	
	Premium efficiency equipment better serves customer needs	4
	Other (specify)	5
	(Don't know)	
	(Refused)	99
24.	If a free half day sales training for high efficiency equipment were offered in your you send your staff?	area, would
	Yes	1
	No	2
	Maybe	3
	Probably	4
	(Don't know)	98
	(Refused)	99
25.	If a free whole day technical training on advanced diagnostic and quality installativere offered in your area, would you send your staff?	on and services
	Yes	1
	No	2
	Maybe	3
	Probably	4
	(Don't know)	
	(Refused)	99
26.	If SDG&E could do one thing to help your firm sell premium efficiency cooling and quality installation and maintenance what would you choose? (read list)	
	Increase the size of the rebates	1
	Promote ACCA quality installation or Energy Star certifications	
	Promote and subsidize HVAC technical training	
	Encourage co-branded advertising	
	Advertise the value of premium efficiency and quality installation and maintenance	



	Other, specify	6
	(Don't know)	98
	(Refused)	99
27.	When you replace a unit, what percentage of the time do you put in a larger unit, a usame size, or a smaller unit?	unit of the
	NUMERIC OPEN END, 1.00 – LARGER UNIT	
	NUMERIC OPEN END, 1.00 – UNIT OF SAME SIZE NUMERIC OPEN END, 1.00 – SMALLER UNIT	
	(Don't know)	98
	(Refused)	
	(======)	
28.	My next couple of questions are about your company. Profit margins on installation and servicing of equipment can be different. In general, is your profit margin for ser or lower than for installations? [potential to go away since obvious]	• •
	Higher	1
	Lower	2
	The same	3
	(Don't know)	98
	(Refused)	99
29.	Compared to other companies like yours, would you consider yourself small, medium, or large?	
	Small	1
	Medium	2
	Large	3
	(Don't know)	98
	(Refused)	99
30.	In competing with other companies for business, firms can try to beat a competitor' offering a better price or by convincing the owner that a bid is of higher quality or nefficient than their competitors? Would you say your firm always attempts to offer most of the time offers a lower price, most of the time offers higher quality, or alwahigher quality?	nore energy a lower price,
	Always lower price	1
	Most of the time lower price	2
	Most of the time higher quality	3
	Always higher quality	4
	(Don't know)	98
	(Refused)	



31.	How many technicians work in your company?.
	NUMERIC OPEN END, 1,000
	(Don't know)
	(Refused)
32.	How many of them are NATE certified? (IF NEEDED: NATE stands for North American Technician Excellence certification. It certifies heating, ventilation, and air-conditioning technicians in service and installation.)
	NUMERIC OPEN END, 1,000 or NUMERIC OPEN END, 1.00 (PERCENT)
	(Don't know)
	(Refused)99
33.	When thinking of your annual sales, would you describe your business as: [READ LIST]
	Less than \$250,000 in annual sales
	\$250,000 to \$1 million in annual sales
	\$1 million to \$5million in annual sales
	More than \$5 million in annual sales
	(Don't know)
	(Refused)
33 .	Approximately, what percentage of your business is from the following
	Repeat business
	Advertising2
	Referrals
	Other
	Don't know
	Refused99

END: Those are all my questions. Thank you so much for your time!



9.7 Frequency Table: HVAC Contractor CATI Interviews

Frequency Table HVAC Contractor Survey

October-November 2007

QS1 Would you say that the majority of your work occurs in the SDG&E service territory or the SoCalGas/SCE service territory?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	SDG&E	78	55.7	55.7	55.7
	SoCalGas/SCE	62	44.3	44.3	100.0
	Total	140	100.0	100.0	

QS2 What percentage of your company's business is residential?

			_		Cumulative
		Frequency	Percent	Valid Percent	Percent
Valid	0	17	12.1	12.1	12.1
	1	1	.7	.7	12.9
	5	3	2.1	2.1	15.0
	8	1	.7	.7	15.7
	10	6	4.3	4.3	20.0
	15	3	2.1	2.1	22.1
	20	8	5.7	5.7	27.9
	25	5	3.6	3.6	31.4
	30	2	1.4	1.4	32.9
	40	7	5.0	5.0	37.9
	50	8	5.7	5.7	43.6
	60	6	4.3	4.3	47.9
	65	2	1.4	1.4	49.3
	70	7	5.0	5.0	54.3
	75	7	5.0	5.0	59.3
	80	18	12.9	12.9	72.1
	85	6	4.3	4.3	76.4
	90	14	10.0	10.0	86.4
	91	1	.7	.7	87.1
	92	1	.7	.7	87.9
	95	9	6.4	6.4	94.3
	98	1	.7	.7	95.0
	99	4	2.9	2.9	97.9



	Frequency	Percent	Valid Percent	Cumulative Percent
100	3	2.1	2.1	100.0
Total	140	100.0	100.0	

QS3 Thinking of the non-residential business that you do, what percentage of your business is packaged or unitary systems with a single compressor/condenser?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	8	5.7	6.1	6.1
	1	2	1.4	1.5	7.6
	2	3	2.1	2.3	9.8
	3	1	.7	.8	10.6
	5	7	5.0	5.3	15.9
	10	3	2.1	2.3	18.2
	14	1	.7	.8	18.9
	15	4	2.9	3.0	22.0
	20	12	8.6	9.1	31.1
	25	2	1.4	1.5	32.6
	30	7	5.0	5.3	37.9
	35	1	.7	.8	38.6
	40	3	2.1	2.3	40.9
	45	1	.7	.8	41.7
	50	14	10.0	10.6	52.3
	60	5	3.6	3.8	56.1
	70	6	4.3	4.5	60.6
	75	5	3.6	3.8	64.4
	80	10	7.1	7.6	72.0
	85	1	.7	.8	72.7
	90	13	9.3	9.8	82.6
	95	2	1.4	1.5	84.1
	100	21	15.0	15.9	100.0
	Total	132	94.3	100.0	
Missing	Don't know	5	3.6		
	System	3	2.1		
	Total	8	5.7		
Total		140	100.0		

Q1 Have you heard of any of these four VSP platforms?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	90	64.3	64.3	64.3



	Frequency	Percent	Valid Percent	Cumulative Percent
No	48	34.3	34.3	98.6
(Don't know)	2	1.4	1.4	100.0
Total	140	100.0	100.0	

Q2 What percent of your technicians have been trained by one of the VSPs?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	36	25.7	42.4	42.4
	1	5	3.6	5.9	48.2
	2	1	.7	1.2	49.4
	10	3	2.1	3.5	52.9
	20	4	2.9	4.7	57.6
	30	1	.7	1.2	58.8
	33	1	.7	1.2	60.0
	40	2	1.4	2.4	62.4
	50	7	5.0	8.2	70.6
	75	2	1.4	2.4	72.9
	80	2	1.4	2.4	75.3
	97	1	.7	1.2	76.5
	100	20	14.3	23.5	100.0
	Total	85	60.7	100.0	
Missing	Don't know	5	3.6		
	System	50	35.7		
	Total	55	39.3		
Total		140	100.0		

Q3 Have you signed up with any of the 4 VSPs to use their system?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	17	12.1	35.4	35.4
	No	31	22.1	64.6	100.0
	Total	48	34.3	100.0	
Missing	(Don't know)	1	.7		
	System	91	65.0		
	Total	92	65.7		
Total		140	100.0		



Q4 \$VSP Frequencies

		Responses		Percent of Cases
		N	Percent	N
VSPs(Check-Me,	9	50.0%	56.3%
a)	Enalasys	5	27.8%	31.3%
	Verified-RCA	4	22.2%	25.0%
Total		18	100.0%	112.5%

a Group

Q5 Approximately how many cooling systems have you tested using that technique?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	2	1	.7	7.1	7.1
	6	1	.7	7.1	14.3
	12	1	.7	7.1	21.4
	30	1	.7	7.1	28.6
	50	2	1.4	14.3	42.9
	75	1	.7	7.1	50.0
	100	1	.7	7.1	57.1
	160	1	.7	7.1	64.3
	200	2	1.4	14.3	78.6
	300	2	1.4	14.3	92.9
	1000	1	.7	7.1	100.0
	Total	14	10.0	100.0	
Missing	Don't know	3	2.1		
	System	123	87.9		
	Total	126	90.0		
Total		140	100.0		

Q6 How would you best describe your company's use of AD/QI within your general service and maintenance jobs?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	We do AD/QI on every service call we make	16	11.4	33.3	33.3
	We do AD/QI when my techs have the time	10	7.1	20.8	54.2
	We do AD/QI when requested by the customer	11	7.9	22.9	77.1



		Frequency	Percent	Valid Percent	Cumulative Percent
	We do AD/QI only when there is a difficult system or one that is not simple to figure out the problem	5	3.6	10.4	87.5
	Never	6	4.3	12.5	100.0
	Total	48	34.3	100.0	
Missing	(Other)	1	.7		
	System	91	65.0		
	Total	92	65.7		
Total		140	100.0		

Q7 What percent of the time do you think your technicians service the refrigerant charge level using the VSP-specific procedures?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1	1	.7	2.5	2.5
	5	1	.7	2.5	5.0
	10	3	2.1	7.5	12.5
	25	2	1.4	5.0	17.5
	30	2	1.4	5.0	22.5
	33	1	.7	2.5	25.0
	50	5	3.6	12.5	37.5
	60	3	2.1	7.5	45.0
	70	1	.7	2.5	47.5
	75	3	2.1	7.5	55.0
	80	2	1.4	5.0	60.0
	90	1	.7	2.5	62.5
	100	15	10.7	37.5	100.0
	Total	40	28.6	100.0	
Missing	Don't know	3	2.1		
	System	97	69.3		
	Total	100	71.4		
Total		140	100.0		

Q8 What percent of the time do you think your technicians service the refrigerant charge level WITHOUT using the VSP-specific procedure?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	18	12.9	39.1	39.1
	5	2	1.4	4.3	43.5
	10	1	.7	2.2	45.7



		Frequency	Percent	Valid Percent	Cumulative Percent
	25	2	1.4	4.3	50.0
	30	2	1.4	4.3	54.3
	40	4	2.9	8.7	63.0
	50	5	3.6	10.9	73.9
	67	1	.7	2.2	76.1
	70	2	1.4	4.3	80.4
	75	1	.7	2.2	82.6
	90	2	1.4	4.3	87.0
	100	6	4.3	13.0	100.0
	Total	46	32.9	100.0	
Missing	Don't know	3	2.1		
	System	91	65.0		
	Total	94	67.1		
Total		140	100.0		

Q9 Does your company perform Duct Test and Seal projects using an air flow tool such as a Duct Blaster or similar tool?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	2	1.4	4.1	4.1
	We do not perform duct test and seal projects	24	17.1	49.0	53.1
	We use a Duct Blaster when we do duct test and seal project	13	9.3	26.5	79.6
	We use something similar to a Duct Blaster when we do DTS	6	4.3	12.2	91.8
	(Don't know)	4	2.9	8.2	100.0
	Total	49	35.0	100.0	
Missing	System	91	65.0		
Total		140	100.0		

Q10 In your opinion, how often does the information gained from the VSP- specific technique help convince customers of the value of additional services such as repairs or system replacement?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	1	.7	2.0	2.0
	Never	10	7.1	20.4	22.4
	Some of the time	28	20.0	57.1	79.6
	Always	10	7.1	20.4	100.0



		Frequency	Percent	Valid Percent	Cumulative Percent
	Total	49	35.0	100.0	
Missing	System	91	65.0		
Total		140	100.0		

Q12 \$NP Frequencies

		Respo	onses	Percent of Cases
		N	Percent	N
Reasons why	It is too costly	15	18.1%	20.5%
not participating(a)	The training takes up too much time	9	10.8%	12.3%
a)	We have high turnover of technicians and it doesn't make sense to train them	4	4.8%	5.5%
	We didn't know about any training	15	18.1%	20.5%
	It doesn't add anything to our business	20	24.1%	27.4%
	Our technicians are too busy to perform the procedures	15	18.1%	20.5%
	We already perform this type of work, just not following specific procedures	5	6.0%	6.8%
Total		83	100.0%	113.7%

a Group

Q13 Agreement: Our company does not participate in VSP AD/QI training because we already do refrigerant charge and airflow servicing using other procedures.

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Disagree very much	9	6.4	10.6	10.6
	Disagree somewhat	6	4.3	7.1	17.6
	Neither agree nor disagree	12	8.6	14.1	31.8
	Agree somewhat	17	12.1	20.0	51.8
	Agree very much	41	29.3	48.2	100.0
	Total	85	60.7	100.0	
Missing	(Don't know)	6	4.3		
	System	49	35.0		
	Total	55	39.3		
Total		140	100.0		



Q14 It would be really hard to perform this type of testing during the summer because we are busy handling trouble calls, performing installations and fixing broken air conditioners.

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Disagree very much	12	8.6	13.6	13.6
	Disagree somewhat	8	5.7	9.1	22.7
	Neither agree nor disagree	8	5.7	9.1	31.8
	Agree somewhat	17	12.1	19.3	51.1
	Agree very much	43	30.7	48.9	100.0
	Total	88	62.9	100.0	
Missing	(Don't know)	2	1.4		
	(Refused)	1	.7		
	System	49	35.0		
	Total	52	37.1		
Total		140	100.0		

Q15 Would you say there IS or IS NOT a shortage of HVAC technicians in today's market?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Is a shortage	105	75.0	75.0	75.0
	Is not a shortage	31	22.1	22.1	97.1
	(Don't know)	4	2.9	2.9	100.0
	Total	140	100.0	100.0	

Q16 \$Shortage Frequencies

		Responses		Percent of Cases
		N	Percent	N
How Technician	(continually have to hire new technicians)	20	18.7%	23.5%
Shortage Has Affected Business(a)	(continually have to train new technicians)	25	23.4%	29.4%
Business(a)	(have to pay my technician well to keep them)	18	16.8%	21.2%
	(do not have as much control over technicians as I would like)	2	1.9%	2.4%
	(Makes it difficult for me to expand my business)	28	26.2%	32.9%



		Responses		Percent of Cases
		N	Percent	N
	(Makes it difficult to offer the quality of service I would like)	12	11.2%	14.1%
	(Makes it difficult to offer customers preventative maintenance)	2	1.9%	2.4%
Total	,	107	100.0%	125.9%

a Group

Q17 \$Influence Frequencies

		Responses		Percent of Cases
		N	Percent	N
How could the utility influence higher AD/QI use?(a)	(Give incentive/rebate/\$\$)	63	44.7%	63.0%
	(Pay for the equipment)	25	17.7%	25.0%
	(Subsidize the training)	53	37.6%	53.0%
Total		141	100.0%	141.0%

a Group

Q18 What do you think is an appropriate incentive level per job that would cause your firm to participate and use the VSP system on all jobs?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	15	1	.7	3.4	3.4
	20	1	.7	3.4	6.9
	25	1	.7	3.4	10.3
	30	1	.7	3.4	13.8
	50	4	2.9	13.8	27.6
	80	1	.7	3.4	31.0
	85	1	.7	3.4	34.5
	90	1	.7	3.4	37.9
	100	4	2.9	13.8	51.7
	125	1	.7	3.4	55.2
	150	7	5.0	24.1	79.3
	200	2	1.4	6.9	86.2
	250	1	.7	3.4	89.7
	300	2	1.4	6.9	96.6
	500	1	.7	3.4	100.0
	Total	29	20.7	100.0	
Missing	No amount of money	3	2.1		
	Don't know	31	22.1		
	System	77	55.0		



	Frequency	Percent	Valid Percent	Cumulative Percent
Total	111	79.3		
Total	140	100.0		

Q19 What percentage of the new equipment you install has SEER rating of 15 or higher?

					Cumulative
		Frequency	Percent	Valid Percent	Percent
Valid	None	32	22.9	23.4	23.4
	1	4	2.9	2.9	26.3
	2	5	3.6	3.6	29.9
	3	1	.7	.7	30.7
	5	17	12.1	12.4	43.1
	7	2	1.4	1.5	44.5
	10	18	12.9	13.1	57.7
	13	2	1.4	1.5	59.1
	15	5	3.6	3.6	62.8
	20	10	7.1	7.3	70.1
	25	3	2.1	2.2	72.3
	30	2	1.4	1.5	73.7
	35	2	1.4	1.5	75.2
	40	6	4.3	4.4	79.6
	50	10	7.1	7.3	86.9
	60	4	2.9	2.9	89.8
	70	3	2.1	2.2	92.0
	75	2	1.4	1.5	93.4
	80	5	3.6	3.6	97.1
	90	2	1.4	1.5	98.5
	100	2	1.4	1.5	100.0
	Total	137	97.9	100.0	
Missing	Don't know	3	2.1		
Total		140	100.0		

Q20 Descriptive Statistics

How big a problem in selling above code equipment or AD/QI services to your customers is...

	N	Mean		Std. Deviation
	Statistic	Statistic	Std. Error	Statistic
Q20A reaching the decision maker?	103	2.20	.135	1.375
Q20B not knowing who the decision maker is?	107	2.12	.137	1.412
Q20C customers state they don't need product/service?	103	3.00	.141	1.435
Q20D no time to market this type of equipment?	101	2.13	.127	1.278



	N	Mean		Std. Deviation
	Statistic	Statistic	Std. Error	Statistic
Q20E insufficient sales staff?	105	1.96	.130	1.330
Q20F lack of staff training?	106	2.03	.140	1.444
Q20G lack of customer awareness or knowledge?	105	3.03	.140	1.431
Q20H price/cost issues?	107	3.61	.138	1.426
Q20I lack of marketing materials?	104	2.45	.141	1.434
Valid N (listwise)	98			

¹⁼Not a problem 5=Extremely significant problem

Q21 Has your firm received any rebates from the Premium Efficiency Cooling Program for installing high efficiency air conditioning?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	23	16.4	22.1	22.1
	No	81	57.9	77.9	100.0
	Total	104	74.3	100.0	
Missing	(Don't know)	4	2.9		
	System	32	22.9		
	Total	36	25.7		
Total		140	100.0		

Q22 Are those rebates for locations serviced by San Diego Gas Electric?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	12	8.6	57.1	57.1
	No	6	4.3	28.6	85.7
	Most of them	1	.7	4.8	90.5
	Some of them	2	1.4	9.5	100.0
	Total	21	15.0	100.0	
Missing	(Don't know)	2	1.4		
	System	117	83.6		
	Total	119	85.0		
Total		140	100.0		

Q23 What is the primary benefit the program provides your company?

	Frequency	Percent	Valid Percent	Cumulative Percent
Valid Other	4	2.9	17.4	17.4



		Frequency	Percent	Valid Percent	Cumulative Percent
	Receive rebate dollars	7	5.0	30.4	47.8
	Increased profitability selling premium efficiency	1	.7	4.3	52.2
	Competitive pricing,	3	2.1	13.0	65.2
	Premium efficiency equipment better serves customer	7	5.0	30.4	95.7
	(Don't know)	1	.7	4.3	100.0
	Total	23	16.4	100.0	
Missing	System	117	83.6		
Total		140	100.0		

Q24 If a free half day sales training for high efficiency equipment were offered in your area, would you send your staff?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	89	63.6	63.6	63.6
	No	23	16.4	16.4	80.0
	Maybe	22	15.7	15.7	95.7
	Probably	6	4.3	4.3	100.0
	Total	140	100.0	100.0	

Q25 If a free whole day technical training on advanced diagnostic and quality installation and services were offered in your area, would you send your staff?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	93	66.4	66.4	66.4
	No	19	13.6	13.6	80.0
	Maybe	23	16.4	16.4	96.4
	Probably	5	3.6	3.6	100.0
	Total	140	100.0	100.0	

Q26 If SDG&E could do one thing to help your firm sell premium efficiency cooling and quality installation and maintenance what would you choose?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Other	4	2.9	2.9	2.9
	Increase the size of the rebates	73	52.1	52.1	55.0



	Frequency	Percent	Valid Percent	Cumulative Percent
Promote ACCA quality installation or Energy Star certifications	7	5.0	5.0	60.0
Promote and subsidize HVAC technical training	18	12.9	12.9	72.9
Encourage co-branded advertising	6	4.3	4.3	77.1
Advertise the value of premium efficiency and quality installation and maintenance	28	20.0	20.0	97.1
(Don't know)	4	2.9	2.9	100.0
Total	140	100.0	100.0	

Q27A When you replace a unit, what percentage of the time do you put in a larger unit?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	44	31.4	33.6	33.6
	1	2	1.4	1.5	35.1
	2	3	2.1	2.3	37.4
	5	18	12.9	13.7	51.1
	10	20	14.3	15.3	66.4
	15	3	2.1	2.3	68.7
	20	17	12.1	13.0	81.7
	25	4	2.9	3.1	84.7
	30	2	1.4	1.5	86.3
	40	3	2.1	2.3	88.5
	50	8	5.7	6.1	94.7
	65	2	1.4	1.5	96.2
	100	5	3.6	3.8	100.0
	Total	131	93.6	100.0	
Missing	Don't know	9	6.4		
Total		140	100.0		

Q27B When you replace a unit, what percentage of the time do you put in a unit of the same size?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	5	3.6	3.8	3.8
	1	1	.7	.8	4.5
	2	1	.7	.8	5.3
	10	1	.7	.8	6.1
	25	1	.7	.8	6.8



		Frequency	Percent	Valid Percent	Cumulative Percent
	35	2	1.4	1.5	8.3
	40	2	1.4	1.5	9.8
	50	15	10.7	11.4	21.2
	60	7	5.0	5.3	26.5
	70	9	6.4	6.8	33.3
	75	3	2.1	2.3	35.6
	80	16	11.4	12.1	47.7
	85	4	2.9	3.0	50.8
	90	20	14.3	15.2	65.9
	95	13	9.3	9.8	75.8
	98	2	1.4	1.5	77.3
	99	1	.7	.8	78.0
	100	29	20.7	22.0	100.0
	Total	132	94.3	100.0	
Missing	Don't know	8	5.7		
Total		140	100.0		

Q27C When you replace a unit, what percentage of the time do you put in a smaller unit?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	86	61.4	65.2	65.2
	1	1	.7	.8	65.9
	2	1	.7	.8	66.7
	3	1	.7	.8	67.4
	5	11	7.9	8.3	75.8
	10	15	10.7	11.4	87.1
	15	1	.7	.8	87.9
	20	2	1.4	1.5	89.4
	30	2	1.4	1.5	90.9
	35	1	.7	.8	91.7
	40	2	1.4	1.5	93.2
	50	6	4.3	4.5	97.7
	75	1	.7	.8	98.5
	90	1	.7	.8	99.2
	99	1	.7	.8	100.0
	Total	132	94.3	100.0	
Missing	Don't know	8	5.7		
Total		140	100.0		



Q28 In general, is your profit margin for servicing higher or lower than for installations?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Higher	63	45.0	46.0	46.0
	Lower	36	25.7	26.3	72.3
	The same	26	18.6	19.0	91.2
	(Don't know)	12	8.6	8.8	100.0
	Total	137	97.9	100.0	
Missing	(Refused)	3	2.1		
Total		140	100.0		

Q29 Compared to other companies like yours, would you consider yourself small, medium, or large?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Small	112	80.0	80.0	80.0
	Medium	17	12.1	12.1	92.1
	Large	9	6.4	6.4	98.6
	(Don't know)	1	.7	.7	99.3
	(Refused)	1	.7	.7	100.0
	Total	140	100.0	100.0	

Q30 Would you say your firm always attempts to offer a lower price, most of the time offers a lower price, most of the time offers higher quality, or always offers higher quality?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Always lower price	14	10.0	10.3	10.3
	Most of the time lower price	18	12.9	13.2	23.5
	Most of the time higher quality	28	20.0	20.6	44.1
	Always higher quality	76	54.3	55.9	100.0
	Total	136	97.1	100.0	
Missing	(Don't know)	3	2.1		
	(Refused)	1	.7		
	Total	4	2.9		
Total		140	100.0		

Q31 How many technicians work in your company?

	Frequency	Percent	Valid Percent	Cumulative Percent
Valid 0	6	4.3	4.3	4.3



					Cumulative
		Frequency	Percent	Valid Percent	Percent
	1	26	18.6	18.7	23.0
	2	29	20.7	20.9	43.9
	3	20	14.3	14.4	58.3
	4	12	8.6	8.6	66.9
	5	15	10.7	10.8	77.7
(6	4	2.9	2.9	80.6
1	7	5	3.6	3.6	84.2
8	8	2	1.4	1.4	85.6
(9	1	.7	.7	86.3
·	10	2	1.4	1.4	87.8
·	11	1	.7	.7	88.5
·	12	1	.7	.7	89.2
•	13	2	1.4	1.4	90.6
•	15	2	1.4	1.4	92.1
•	17	2	1.4	1.4	93.5
•	19	1	.7	.7	94.2
2	20	1	.7	.7	95.0
2	24	1	.7	.7	95.7
2	25	2	1.4	1.4	97.1
	35	2	1.4	1.4	98.6
7	72	1	.7	.7	99.3
•	105	1	.7	.7	100.0
-	Total	139	99.3	100.0	
Missing I	Refused	1	.7		
Total		140	100.0		

Q32 How many of them are NATE certified?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Number	137	97.9	97.9	97.9
	Percent	3	2.1	2.1	100.0
	Total	140	100.0	100.0	

Q32A How many of them are NATE certified? - number

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	75	53.6	57.3	57.3
	1	28	20.0	21.4	78.6
	2	9	6.4	6.9	85.5
	3	9	6.4	6.9	92.4



		Frequency	Percent	Valid Percent	Cumulative Percent
	4	3	2.1	2.3	94.7
	5	4	2.9	3.1	97.7
	7	1	.7	.8	98.5
	8	2	1.4	1.5	100.0
	Total	131	93.6	100.0	
Missing	Don't know	5	3.6		
	Refused	1	.7		
	System	3	2.1		
	Total	9	6.4		
Total		140	100.0		

Q32B How many of them are NATE certified? - percent

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	50	1	.7	33.3	33.3
	75	2	1.4	66.7	100.0
	Total	3	2.1	100.0	
Missing	System	137	97.9		
Total		140	100.0		

Q33 When thinking of your annual sales, would you describe your business as:

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Less than \$250,000 in annual sales	37	26.4	26.4	26.4
	\$250,000 to \$1 million in annual sales	60	42.9	42.9	69.3
	\$1 million to \$5 million in annual sales	30	21.4	21.4	90.7
	More than \$5 million in annual sales	8	5.7	5.7	96.4
	(Don't know)	1	.7	.7	97.1
	(Refused)	4	2.9	2.9	100.0
	Total	140	100.0	100.0	

Q33A Approximately, what percentage of your business is from the following: Repeat business

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	6	4.3	4.3	4.3



	Frequency	Percent	Valid Percent	Cumulative Percent
5	2	1.4	1.4	5.7
10	6	4.3	4.3	10.0
15	1	.7	.7	10.7
20	10	7.1	7.1	17.9
25	5	3.6	3.6	21.4
30	7	5.0	5.0	26.4
33	2	1.4	1.4	27.9
40	3	2.1	2.1	30.0
50	22	15.7	15.7	45.7
60	16	11.4	11.4	57.1
65	1	.7	.7	57.9
70	4	2.9	2.9	60.7
75	8	5.7	5.7	66.4
80	21	15.0	15.0	81.4
85	1	.7	.7	82.1
90	14	10.0	10.0	92.1
95	2	1.4	1.4	93.6
100	9	6.4	6.4	100.0
Total	140	100.0	100.0	

Q33B Approximately, what percentage of your business is from the following: Advertising

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	76	54.3	54.3	54.3
	1	1	.7	.7	55.0
	5	12	8.6	8.6	63.6
	10	14	10.0	10.0	73.6
	15	2	1.4	1.4	75.0
	18	1	.7	.7	75.7
	20	10	7.1	7.1	82.9
	25	8	5.7	5.7	88.6
	30	4	2.9	2.9	91.4
	33	1	.7	.7	92.1
	50	7	5.0	5.0	97.1
	60	1	.7	.7	97.9
	70	2	1.4	1.4	99.3
	80	1	.7	.7	100.0
	Total	140	100.0	100.0	



Q33C Approximately, what percentage of your business is from the following: Referrals

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	21	15.0	15.0	15.0
	2	1	.7	.7	15.7
	5	5	3.6	3.6	19.3
	9	1	.7	.7	20.0
	10	16	11.4	11.4	31.4
	15	7	5.0	5.0	36.4
	20	18	12.9	12.9	49.3
	25	12	8.6	8.6	57.9
	27	1	.7	.7	58.6
	30	6	4.3	4.3	62.9
	34	1	.7	.7	63.6
	35	2	1.4	1.4	65.0
	40	8	5.7	5.7	70.7
	45	2	1.4	1.4	72.1
	50	20	14.3	14.3	86.4
	60	5	3.6	3.6	90.0
	70	6	4.3	4.3	94.3
	75	3	2.1	2.1	96.4
	80	5	3.6	3.6	100.0
	Total	140	100.0	100.0	

Q33D Approximately, what percentage of your business is from the following: Other

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	124	88.6	88.6	88.6
	5	3	2.1	2.1	90.7
	10	7	5.0	5.0	95.7
	20	2	1.4	1.4	97.1
	25	1	.7	.7	97.9
	50	1	.7	.7	98.6
	55	1	.7	.7	99.3
	100	1	.7	.7	100.0
	Total	140	100.0	100.0	

Q33E Approximately, what percentage of your business is from the following: Don't know

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	139	99.3	99.3	99.3



	Frequency	Percent	Valid Percent	Cumulative Percent
100	1	.7	.7	100.0
Total	140	100.0	100.0	



10. SDGE 3030: California Preschool Energy Efficiency Program (CPEEP)

Table 10-1 Final Research List

	Final Research List							
Target for Data Collection	Data collection mode	Timing of data collection	Key Research Issues	Sample Size	Number of Data points	From where did you get the sample?		
Program Managers	E-mail survey with potential in- depth follow-up	August	Determine level of understanding about the program.	1	1	List of program managers provided by SDG&E		
Participants	In-depth interview	January	Satisfaction, ease of installation	13	7	Program Manager		



10.1 Sample & Methodology

The telephone survey population consisted of the directors or site teachers that had had an audit by the end of November 2007. There were 15 director level contacts and 17 site level contacts in the population. A census was attempted of this population. It was a difficult population to survey. Contacts had left, we were told to talk to others in the corporation even though it was their name we had been provided, people did not remember the program, and sites indicated we needed to talk with corporate. We completed 13 surveys before ending the survey effort. There were nine director level people interviewed and four site teachers. While we may have been able to obtain a few more response, we choose to end the survey to enable completion of this report. There were different modules in the survey. Interviewees had the chance to answer one or more of the modules depending on their interaction throughout the participation process. Table 10-2 shows the total completed surveys and the number of completes of each module type.

Table 10-2 CPEEP Completed Surveys

Sample Size	32
Completed Surveys	13
Module Type	
Involved with the decision to not participate	0
Involved with the decision to participate	4
Involved with the audits at the site	7
Involved with the decision to implement measures	4
Involved with the actual installation of measures at the site	7
At a site where measures installed	5
Open ended program comments	8

10.2 Detailed Findings

As stated before, there were several modules of questions asked. The responses for each of the modules is provided next.

Involved with the Participation Decision

Participants learned about possible participation through word of mouth (n=1), from an email (n=1), from a newsletter (n=1), and from a California Head Start brochure (n=1). The possibility of saving money on utilities was a unanimous choice for participation. This was closely followed by people indicating that the potential for energy efficient measures to be installed (n=3) was a driver for their participation. One person thought it sounded like a good thing to do.



Involved with the Site Audits

The satisfaction level with the audits was very high. If there was an opinion, it was that the person was "very satisfied" with the timing of the audit, the professionalism of the auditor, and the ease of how the audit took place. (One or two people chose "Don't Know" as the option during this set of questions.) One of the outputs of the audit was a written report. Of the seven people answering this module, three had seen the report. There was a little less satisfaction with the report. Two of the three were "somewhat satisfied" with the ease of reading the report, the information provided in the report, and the speed at which the report was provided. The other person was "very satisfied" with these three attributes.

Involved with the Implementation Decision

The audit positively influenced half of the four people who were involved in the decision to implement. One knew what was needed, but lacked funding before the program. Another mentioned costs as part of the reason to implement when they stated "As a non-profit organization we are interested in anything that will save us money." This stance was reiterated by another person who stated "Of course the potential energy savings was very important but also the quick return on the cost was a major factor."

Involved with Measure Installation or at a Site with Measures Installed

As mentioned earlier in the report, there was some dissatisfaction with the timing of when the implementation occurred. This was shown in the module asking about implementation. While four of the seven people asked about timing were "very satisfied", there were two who were "somewhat dissatisfied" (the seventh person was "somewhat satisfied"). The interviewees were asked to think about the actual days and times of when the measures were installed and indicate a value between one and ten to provide us with feedback about how the implementation went. The results are shown in Figure 10-1.



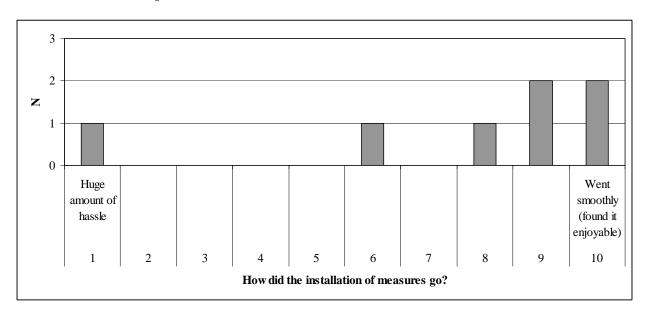


Figure 10-1
Opinion on How Installation of Measures Went at the Site

However, once there, six of the seven were very satisfied with the professionalism of the installers and the quality of the measures installed. The seventh person was "somewhat satisfied" with these two attributes of the installation.

Program Comments and Suggestions

The interviewees were asked to provide open ended thoughts on what they liked most and least about the program as well as any suggestions they felt could improve the program. In general, their comments reiterated responses from previous questions. There were two new concepts raised when asked about positive parts of the program: 1) the use of local people in the installation and 2) the lighting was found to be "very easy on the eye" and was liked very much by the site. The professionalism was appreciated by many of the interviewees. The least liked areas brought out comments such as "I have absolutely no complaints" and "There was nothing I did not like". However, there were two comments that were somewhat negative, although both had been mentioned before: 1) the available timing for the implementation and 2) the lag between application and actual work being done. Only one suggestion for the program was made: "More care should be taken to find a time to do the implementation at a time that fits well with the site's program schedule."

The synthesis of the findings provided here, along with conclusions and recommendations are provided in the main body of the report.



10.3 In-depth Interview Guide: CPEEP Participants

Date	11/30/07
Utility	SDG&E
Program Name	California Pre-school Energy Efficiency Program (CPEEP)
Target	Director and Site Teacher Participants
Sample Size	From program manager
Completed # Desired	Census
Quotas (if applicable)	None
Sample File Name	
Contractor Name	Equipoise Consulting Inc
Primary Contact (person	Mary Sutter
who should be contacted	
with any questionnaire	
questions)	
Phone	510-864-8507
Email	Mary@EquipoiseConsulting.com

BEGINNING: We are asking you these questions to provide feedback to the program manager on your experience with the CPEEP program in order to help improve it in the future. Just so you know, all your responses will be kept confidential. That is, data will be presented as frequencies and percentages. Who provided the information will not be known by the program manager.

O1. If you were to categorize your level of involvement with the California Pre-School Energy Efficiency Program, what would it be? Were you [read choices]:

involved with the decision to NOT participate	2 [ASK NP MODULE]
[IF a NP, skip rest of question and go to NP Module]	
involved with the decision to participate1 [A	ASK DECISION MODULE]
involved with the audits at the sites	.3 [ASK AUDIT MODULE]
involved with the decision to implement measures	
4 [ASK IMPL	
involved with the actual installation of measures at the site	
5	[ASK INSTALL MODULE]
at a site in which measures were installed6 [ASK AUDI	T and INSTALL MODULE]
involved in none of these areas	7 [ASK OTHER MODULE]

DECISION MODULE

D1. How did you hear about the opportunities included in the California Pre-School Energy Efficiency Program (CPEEP)? [Multiple Choice]

Saw it on a website	1
Heard about it from our regular contact at the Low Income Investment Fund	(LIIF) agency
	. ,



Heard Terry Espinoza Baumgart talk about it	3
Our facility manager let me know that we would be participating	4
I heard about it from a colleague who also is involved with pre-schools	5
I received a flyer about the program	6
I saw information about the program in a newsletter	7
I received an email about the program	8
I heard about it at a California Head Start Association (CHSA) meeting	9
I don't remember	10
I heard about it a different way. [Specify]	11
D2. What was it about the program that caused you to want to participate? [Multiple choi	ce]
The free audit	1
The potential for energy efficient measures to installed	
The possibility of savings money on utilities	
It sounded like a good thing to do	
I don't remember	
Other: Specify	
[GO TO NEXT CHOSEN MODULE OR LD MODULE]	
NP MODULE	
NP1. How did you hear about the opportunities included in the California Pre-Sc Efficiency Program (CPEEP)?	hool Energy
Saw it on a website	1
Heard about it from our regular contact at the Low Income Investment Fund (I	, ,
Heard Terry Espinoza Baumgart talk about it	3
I heard about it from a colleague who also is involved with pre-schools	5
I received a flyer about the program	6
I saw information about the program in a newsletter	7
I received an email about the program	8
I heard about it at a California Head Start Association (CHSA) meeting	9
I don't remember	10
I heard about it a different way. Specify.	11
NP2. We would like to understand why you chose not to participate.	
We were too busy and did not have the time to deal with the program	1
The landlord pays the utilities at the pre-school site, not us	
We did not feel we could afford to pay for any energy efficient measures	
We did not feel it would be a good use of our money to install energy efficient measure.	
I don't remember	
Other: Specify	
- ·	



AUDIT MODULE

You indicated that you were involved in an audit at your site <u>or</u> had measures installed. Thinking about when the audit took place at the site, how satisfied were you with [insert A1, A2 and A30]? Would you say you were very dissatisfied, dissatisfied, neither dissatisfied nor satisfied, satisfied or very satisfied?:

very dissatisfied (score as 1) somewhat dissatisfied (score as 2) neither dissatisfied nor satisfied (score as 3) somewhat satisfied (score as 4) very satisfied (score as 5) A1. The timing of when the audit occurred A2. The professionalism of the auditor A3. The ease of how the audit took place A4. One of the outputs of the audit was a written report from the audit. Did you see the report? I don't remember-7 As you think about the report, how satisfied were you with: A5. The ease of reading the report [put Sat_Likert scale] A6. The information provided in the report......[put Sat_Likert scale] A7. The speed in which you received the report after the audit occurred [put Sat_Likert scale] [GO TO NEXT CHOSEN MODULE OR LD MODULE] IMPLEMENTATION MODULE IM1. Did your site choose to install any measures as recommended from the audit? IM2. What were the areas that influenced your decision to implement the measures? [Multiple Choicel I knew what was needed, but had little to no funding prior to the program2 The turn-key aspect of the program _______3 Other (specify) 6 [GO TO NEXT CHOSEN MODULE OR LD MODULE]

NO INSTALL MODULE



NO1. Did the audit recommend energy saving behaviors th	at you could implement at no charge?
Yes	1
No	2 [SKIP TO NO3]
I don't know	7
NO2. Did your site begin implementing these energy savin	g behaviors?
Definitely not	1
I don't think we did	2
I don't know	3
I think we did	4
Definitely did	5
NO3. Why did you choose to not install any measures that Choice]	were recommended by the audit? [Multiple
We did not have the funds	1
The choices from the audit did not work for us	2
Other (Specify)	3
[GO TO NEXT CHOSEN MODULE OR LD MODULE]	
INSTALL MODULE	
Thinking about when measures were implemented at the following areas.	he site, how satisfied were you with the
I1. The timing of when the implementation occurred	[put Sat_Likert scale]
I2. The professionalism of the implementer	[put Sat_Likert scale]
I3. The quality of the measures installed	[put Sat_Likert scale]
I4. Now, thinking about the actual days and times when the 1 represents the concept that the implementation actions on the number 10 represents the concept that the implementation of the implementation actions of the number 10 represents the concept that the implementation of the imple	reated a huge amount of hassle for you and ntation actions went so smoothly that you
Site value OR	
I was involved with implementation at multiple sites th	nat averaged
I can't put a value to this activity as I was not around d	luring the implementation activities.
[GO TO NEXT CHOSEN MODULE OR LD MODULE]	
OTHER MODULE	
You indicated that you were not involved with the program in	n any of the ways outlined. Can you tell us
how you were involved? [Open end]	
[GO TO T&T]	
LD MODULE	
LD1. Please let us know what you liked best about the program	ı. [Open end]
LD2. Please let us know what you liked least about the program	n. [Open end]
LD3. Do you have any suggestions for change that you feel wo	ould improve the program? [Open end]
[GO TO T&T]	



LD2 MODULE

LD4. What do you think could have been changed about the program that would have caused you to participate? [Open end]

LD5. Outside of your previous comment, do you have any suggestions for change that you feel would improve the program? [Open end]

[GO TO T&T]

LIKERT SCALES

Sat_Likert Scale

very dissatisfied (score as 1) somewhat dissatisfied (score as 2) neither dissatisfied nor satisfied (score as 3) somewhat satisfied (score as 4) very satisfied (score as 5)

T&T: Those are all my questions. Thank you so much for your time!





11. SDGE 3033: Industrial Energy Efficiency Acceleration Program (IEEA)

Table 11-1 Final Research List

	Final Research List							
Target for Data Data collection Collection mode		Timing of data collection	Key Research Issues	Sample Size	Number of Data points	From where did you get the sample?		
Utility Program Manager	In-depth interview	June - January	General understanding of program including goals, roles and responsibilities, marketing and recruitment, program implementation, interaction with other programs and third parties, and satisfaction and recommendations. Specific follow-up as needed.	NA	1	Program Information		
Implementer Program Manager	In-depth interview	June - January	General understanding of program including goals, roles and responsibilities, marketing and recruitment, program implementation, interaction with other programs and third parties, and satisfaction and recommendations. Specific follow-up as needed.	NA	1	Program Information		
Participants	Informal Interview	December - January	Understand reasons for participating, satisfaction with program and SDG&E, likelihood to recommend program to others, suggestions for improvement/ new ideas. As part of case study, we will also talk to the sub-contractors.	4	2	EnVINTA		





12. SDGE 3034: EDC Domestic Hot Water Control Program (DHWC)

Table 12-1 Final Research List

	Final Research List								
Target for Data Data collection Collection mode		Timing of data collection	Key Research Issues	Sample Size	Number of Data points	From where did you get the sample?			
Utility Program Manager	In-depth interview	June - December	How is the program implemented? What are barriers to implementation?	1	1	SDG&E			
Implementer Program Manager	In-depth interview	June - November	How is the program implemented? What are barriers to implementation?	1	1	SDG&E			
Hotels / Lodging Participants, on-site hotel managers	In-depth interview	December	Experiences with technology? Use of web-based software 27 10 capabilit?		EDC				
Hotels / Lodging Participants, off-site hotel managers	In-depth interview	December	Experiences with technology? Use of web-based software capabilit?	of web-based software 5 2		EDC/ Participating Hotel Managers			
Hotels / Lodging Nor	In-depth interview	December	Reasons for not installing technology?	1 1 EDC		EDC			
SDG&E Training Workshop for Hotels	Onsite Observation	November	Is the utility aligned with program outreach efforts?	1	1	SDG&E			



12.1 In-depth Interview Guide: DHWC Participants

Introduction

Hello, my name is Hannah Carmalt and I am calling on behalf of San Diego Gas & Electric and EDC Technologies regarding the Hot Water Control Program offered by SDG&E. We are conducting an evaluation study of hotels and motels that have had the opportunity to participate in the Hot Water Control program. The objective of this study is to better understand the decision-making process regarding energy efficiency and overall satisfaction in order to improve the delivery and effectiveness of the program.

Our understanding is that this hotel/motel has participated in the program.

- 1. Are you aware of the program?
 - a. Yes
 - b. No [Stop and ask for the contact information of someone who would know about the program.]
- 2. Are you the one that decided to participate in the program?
 - a. Yes [go on to SCHEDULING]
 - b. I was part of a group of decision makers.

[PROBE: If part of a group of decision makers- were you the one that decided to participate? If not, who made the decision to participate? If you were not the lead, how familiar are you with the program?]

c. No [when conducting the interview, ask the "Role of interviewee questions and then skip to #14: Website]

SCHEDULING:

I	would	like	to	schedule	a	30-minute	interview	where	we	could	discuss	your	experience	s and
pei	spectiv	ves.	Is th	nis a good	tin	ne to talk or	would you	ı prefer	to so	chedule	a more	conver	nient time?	If no,
sch	neduled	call	bac	k time:										

Please be aware that any information you provide will be kept anonymous and confidential.

Role of interviewee: I'd like to start by learning about your duties at the hotel.

- 3. What is your title and role?
- 4. Are you in charge of making facility maintenance decisions?
 - a Yes
 - b. I am part of a group of decision makers. [PROBE: What is your role? Is there someone else that takes the lead?]
 - c. No, all decisions are made by someone else.
- 5. Are you in charge of making financial decisions?
 - a. Yes



- b. I am part of a group of decision makers. [PROBE: What is your role? Is there someone else that takes the lead?]
- c. No, all decisions are made by someone else.

Participation/ Marketing:

- 6. How did you first learn about the program?
 - a. An EDC representative contacted me directly.
 - b. An EDC representative contacted someone in my office who directed the call to me. [PROBE: who?]
 - c. Someone in the lodging industry (external to my corporation) told me about the program. [PROBE: who? where?]
 - d. At a tradeshow. [PROBE: which one?]
 - e. From SDGE marketing material [PROBE: which material?]

f.	Other:	

[PROBE: Does the hotel have an SDGE Account Executive that works with the hotel on their energy use? If yes, did the Account Executive mention anything about the program? Do they ever talk to you about energy efficiency?]

- 7. Did you receive any marketing materials?
 - a. Yes [PROBE: what were they? what was the quality on a scale of 1-5 with 5 being the best quality and 1 being the worst quality?
 - b. No
- 8. Did you get to see the website before you decided to participate? [PROBE: did you need to see it or were you sure you wanted to participate after the initial briefing?]
- 9. What questions did you have about the service that you needed to have answered before you decided to participate in the program?
- 10. Was the EDC representative able to address your concerns?
- 11. What was your *primary* motivation that made you decide to participate?
 - a. Free
 - b. Save money
 - c. Save energy
 - d. Would be alerted to maintenance issues
 - e. Found the online data helpful
 - f. Other:
- 12. Did you have any other motivations to participate?
 - a. Yes [PROBE: list each factor and ask on a scale of 1-5, how important was each factor with 5 being most important and 1 being least important]
 - b. No
- 13. How would you rate your overall satisfaction with the program on a scale of 1-5 with 5 being highly satisfied and 1 being not at all? [PROBE: why that rating?]



Website:

- 14. My understanding is that there is a website that tracks the hotel's energy use and savings and identifies any problems with the boiler system. Is this correct?
 - a. Yes
 - b. No [PROBE: have you ever looked at EDC's website? Do you receive tracking data in another form? Move onto #26]
 - c. Doesn't know. [Move onto #26]
- 15. Have you spent any time looking at the online data for your website?
 - a. Yes [skip to #17]
 - b. No
- 16. Why is it that you aren't using it [clarify based on above question: Why have you not looked at the website? Knowing the website's capabilities, why do you not look at the site?]
 - a. No time
 - b. Not useful
 - c. I don't like the interface
 - d. Website is too complicated
 - e. Someone else does it [PROBE: ask for their contact info]
 - f. I was not trained on the website.
 - g. I don't think the data is accurate.
 - f. Other: ______ [Skip to 26]
- 17. Can you please describe your experience with the website and how you use it?
- 18. How often do you use the site?
- 19. What data do you pay attention to?
- 20. Is the website easy to use?
- 21. Do you have experience with the website identifying any problems in the hot water system?
 - a. Yes
 - b. No [skip to #24]
- 22. Do you address the problems identified on the website?
 - a. Yes [PROBE: What's the process? Do you look at the system yourself? Do you call a maintenance guy? Do you contact EDC?]
 - b. No
- 23. Are there any other features on the website that I might not be familiar with? [skip to email notifications]
- 24. Do you find the website useful?
- 25. How would you describe your satisfaction with the website on a scale of 1-5 with 5 being highly satisfied and 1 being none? [PROBE: why that rating?]



Email notification

- 26. My understanding is that EDC sends an email when there are problems with the boiler system. Is this correct?
 - a. Yes
 - b. No [skip to #30]
 - c. Does not know [skip to #30]
- 27. Are you the person that receives the emails?
 - a. Yes [PROBE: is anyone else cc'ed on the email?]
 - b. No [PROBE: is there somebody else that receives the emails? Then skip next question]
- 28. What do you do when you receive an email alerting you to a problem with the boiler system? [PROBE: What is the process? Do you fix it? Do you call someone else? Do you contact EDC?)
- 29. How would you rate your satisfaction with the email notification process on a scale of 1-5 with 5 being highly satisfied and 1 being not at all? [PROBE: why that rating?]

Relationship

- 30. Can you please describe the amount of contact you have with EDC?
 - a. A lot. [PROBE: What's it about? How does it come about? What are you getting out of it? What results have come out of it?]
 - b. Very little. [PROBE: Would you want more contact? If so, what would you be looking for? If not, why not?]
- 31. Has EDC ever been on site after they installed the equipment?
- 32. Have you ever tried to contact EDC?
 - a. Yes [PROBE: if yes, do they return your calls/ emails?]
 - b. No
- 33. How would you rate your interaction with EDC staff on a scale of 1-5? [PROBE: why that rating?]

Tracking data:

- 34. My understanding is that the website can track the hotel's energy consumption and savings data. Is this your understanding?
 - a. Yes
 - b. No
- 35. Do you use this feature?
 - a. Yes [PROBE: what do you look at? Why do you look at it? Is it helpful? Is it easy to understand? Would you want the information to be displayed differently?]
 - b. No
- 36. Do you believe the system provides an accurate representation of what's going on in your facility?



- a. Yes
- b. No [PROBE: Why not? Please describe]
- 37. How would you rate your overall satisfaction with the tracking features of this technology on a scale of 1-5? [PROBE: why that rating?]

Impacts on Operating cost?

- 38. As a result of your participation in this program, have you seen decreases in your operating costs?
 - a. Yes
 - b. No [Skip to 41]
 - c. Not sure [Skip to 41]
- 39. What do you attribute the savings to?
 - a. Equipment
 - b. Website
 - c. Email notification
 - d. Other:____
- 40. How would you rate your overall satisfaction with how the program impacts on your operating costs on a scale of 1-5? [PROBE: why that rating?]

Rebate appropriateness:

- 41. My understanding is that this program is free to SDG&E hotel & motel customers. Would you pay for the installation of this technology on your own? [PROBE: how much would you pay?]
- 42. Would you pay for the ongoing service? [PROBE: how much would you pay?]
- 43. Would you have participated initially in the program if you had to pay for it? [PROBE: why or why not?]

Energy efficiency questions:

- 44. Have you recommended this program to other hotel maintenance persons?
 - a. Yes [Who?]
 - b. No [Any reason why you would not?]
- 45. Have you installed the technology in any of your other hotels?
 - a. Yes [Probe: Did the other hotels have the same incentives?]
 - b. No [Any reason you would not?]
- 46. As a result of participating in this program, have you taken any other steps to conserve energy?
 - a. Yes [PROBE: Please describe]
 - b. No
- 47. Is energy efficiency a factor in your decision making process?
 - a. Yes



b. No

[PROBE: why or why not?]

- 48. Does the hotel participate in other energy efficiency programs sponsored by SDGE?
 - a. Yes [PROBE: which ones?)
 - b. No
- 49. Does the hotel participate in the Good Earth Keeping program sponsored by the American Hotel and Lodging Association?

Yes

No

- 50. Does the hotel participate in Energy Star's Portfolio Manager for the lodging industry?
 - a. Yes
 - b. No
- 51. Do you have any recommendations on how the program or the marketing of the program could be improved?

FIRMOGRAPHICS

Finally, I just have some general questions about your business.

- 52. Do you lease or own your facility?
 - 1. Lease
 - 2. Own
 - 3. (Other, specify)
 - 4. (Don't know/refused)
- 53. Would you say that your SDG&E costs represent a . . . (READ LIST)
 - 7. Very small
 - 8. Small
 - 9. Medium
 - 10. Large, or
 - 11. Very large part of your operating costs each month?
 - 12. (Don't know/refused)
- 54. Are decisions regarding energy usage being made from a corporate office offsite or at the facility?
 - 1. (Corporate office)
 - 2. (At the facility)
 - 00. (Other, specify)
 - 98. (Don't know/Refused)
- 55. Approximately, how many customer rooms are in the hotel?
 - 1. (0-25)
 - 2. (25-50)
 - 3. (50-100)
 - 4. (100-150)
 - 5. (150-300)



- 6. (Over 300)
- 7. (Don't know)
- 8. (Refused)
- 56. What is the average occupancy rate?
 - 1. (0-25%)
 - 2. (25-50%)
 - 3. (50-75%)
 - 4. (75-100%)
 - 5. (Don't know)
 - 6. (Refused)
- 57. How long has the hotel been operating under the current management?
 - 1. (less than one year)
 - 2. (1-5 years)
 - 3. (5-10 years)
 - 4. (10+ years)
 - 5. (Don't know)
 - 6. (Refused)

END:

Those are all of my questions.

58. Do you have any other comments about the program?

Thank you so much for your time!



13. SDGE 3037: Sweetwater Schools Demonstration Program

Table 13-1 Final Research List

	Final Research List									
1		Timing of data collection	Key Research Issues	Sample Size	Number of Data points	From where did you get the sample?				
Program Managers	In-depth interview	August	Determine level of understanding about the program.	1	1	List of program managers provided by SDG&E				
Open house	Onsite Observation	September and November	Observe open house dissemination of information, how set up open house, what data provided to people attending open house.	2	2	Program Manager				



13.1 Event Data Collection Form: Sweetwater Open House

UTILITY/PROGRAM:	SDG&E Sweetwater Schools Demonstration Program
Event Title:	
Event Description:	Open House Demonstration of Two Technologies
Location:	
Date and Time:	
Total Participants and/or	(for events, also include description of the percentage or number
Approximate Number of People	that came into contact with the program, e.g., 1000 people at
at the Overall Event	event, 10% touched)
Did You Get Lists of Attendees	☐ Yes
or People Touched by the	□ No
Event:	☐ No list available
Utility or 3P Contact Name(s)	
and Title/Company:	
Contact Info/Phone:	
Instructor Name and	
Title/Company, if applicable:	
Instructor Info/Phone	

- **I. Description of the Target Market** (e.g., who attended, market segment or business type, job titles)
- **II. Description of the Education Approach or How They Educated the Target Market** (e.g., what occurred during the event that would increase others knowledge?)
- III. Observations on the Applicability of this Approach for the Target Market, and the Value of this Approach (refer to actual observations or comments from participants if possible)
- **IV. Description of All Materials or Information Used During the Event** (e.g., brochures, booths, presentations, handouts etc.)

List all materials or hard copy information used:

Type of Material	Description of Material Content	Number Handed Out or Used	Was This Material "Taken Away" by Participants?	Received Copy or Picture



- V. Description of the Specific Concepts Taught to the Target Market
- VIa. Did they Promote Any Utility or Other 3P Programs (and if so, which ones and to whom)
- VIb. Did they Promote Any Other Parts of Their Own Program (e.g., outreach event promoting one-on-one counseling or a hotline or website) (and if so, what and to whom)
- VII. If Event Was At Customer Facility, Describe Actual Energy Saving Actions That Were Implemented at Time of Observation
- VIII. Observations Made By "Participants" (include comments made during events and comments you might gather in your interactions after the event)
- **IX.** Observations Made by Instructors or Implementers (include comments made during events and comments you might gather in your interactions after the event)
- **X.** Recommendations for Improvements to Approach (please indicate whether these are recommendations made specifically by the target market, or recommendations from the evaluator based on observations.)

Recommendations / Issues / Observations:





14. SDGE 3039: Mobile Energy Clinic Program (MEC)

Table 14-1 Final Research List

Final Research List							
Target for Data Collection	Data collection mode	Timing of data collection	Key Research Issues	Sample Size	Number of Data points	From where did you get the sample?	
Program Managers	In-depth interview	July	Determine level of understanding about the program.	2	2	List of program managers provided by SDG&E	
Participants	CATI Interview	Novenber	Satisfaction, ease of installation, suggestions for program improvement	687	100	Program Manager	



14.1 CATI Interview Guide: Participants

Date	October 1, 2007
Utility	SDG&E
Program Name	Mobile Energy Clinic, SDGE 3039
Target	Commercial
Sample Size	700 Non-Participants
Quotas (if applicable)	70 Completes
Sample File Name	MEC Customer Information.xls
Contractor Name	ECONorthwest
Primary Contact (person who	Christian Miner
should be contacted with any	
questionnaire questions)	
Phone	503-222-6060
Email	miner@portland.econw.com

May I please speak to [CONTACT NAME]?

Hello, my name is _____ and I'm calling from Opinion Dynamics, an independent research firm. We are conducting research on behalf of San Diego Gas and Electric to help them develop programs to better serve their commercial customers. Our records indicate that you have received a free visit in <MONTH FROM SAMPLE> <YEAR FROM SAMPLE> from the Mobile Energy Clinic.

The Mobile Energy Clinic is a mobile repair van that provides insight, maintenance and on occasion, equipment to enhance the energy efficiency of businesses.

I'd like to ask you a few questions regarding the initial free walk-through inspection performed by the Mobile Energy Clinic staff, where they identified various things that could be done to save energy at your business.

Walk-Through Audit

First, I'd like to ask you a few questions regarding the initial walk-through audit performed by the Mobile Energy Clinic staff, where they identified various things that could be done to save energy at your business.

W1. Why did you decide to participate in the Mobile Energy Clinic program?

[MULTIPLE RESPONSE – ACCEPT UP TO 6 RESPONSES]

- 1. Want to save money on my energy bill
- 2. It was free
- 3. Want my equipment to function more efficiently
- 4. Concern for the environment
- 5. Service was recommended by others
- 6. (Other, specify)
- 7. (Don't know)

W2. What recommendations were made during the walk-through audit?

[MULTIPLE RESPONSE – ACCEPT UP TO 23 RESPONSES]

- 1. (Turn off all office equipment and lights every night and weekend)
- 2. (Install ENERGY STAR equipment)
- 3. (Replace incandescent light lamps with compact fluorescent lamps)



- 4. (Install motion detectors to control lighting in frequently unoccupied areas)
- **5.** (Clean dusty diffusers and lamps every 6-12 months)
- 6. (Set thermostats at 78 degrees F for cooling in the summer and 68 degrees F for heating in the winter)
- 7. (Install locking covers on your thermostats)
- 8. (Regularly clean condenser coils and replace air filters)
- 9. (Check ducts and pipe insulation for damage)
- 10. (Consider installing an air conditioning economizer to bring in outside air when cool outside)
- 11. (Consider replacing old HVAC systems with new energy-efficient systems)
- 12. (Install ceiling fans)
- 13. (Install blinds or solar screen shades)
- 14. (Use reflective window film or awnings on all south-facing windows)
- 15. (Install ceiling and wall insulation)
- 16. (Insulate water heaters and supply pipes)
- 17. (Perform scheduled maintenance on refrigeration units)
- 18. (Add strip curtains to walk-in doors)
- 19. (Keep refrigerators full)
- 20. (Replace some or all electric cooking equipment with gas-fired equipment)
- 21. (Purchase insulated cooking equipment whenever possible)
- 22. (Turn off unused and backup equipment during low production periods)
- 23. (Other, specify)
- 24. (Do know) [SKIP TO W6]

W3. Did you implement any of these recommendations?

- 1. Yes
- 2. No [SKIP TO W6]
- 3. (Don't know) [SKIP TO W6]

W4. Which ones?

[MULTIPLE RESPONSE – ACCEPT UP TO 23 RESPONSES]

- 1. (Turn off all office equipment and lights every night and weekend)
- 2. (Install ENERGY STAR equipment)
- 3. (Replace incandescent light lamps with compact fluorescent lamps)
- 4. (Install motion detectors to control lighting in frequently unoccupied areas)
- 5. (Clean dusty diffusers and lamps every 6-12 months)
- 6. (Set thermostats at 78 degrees F for cooling in the summer and 68 degrees F for heating in the winter)
- 7. (Install locking covers on your thermostats)
- 8. (Regularly clean condenser coils and replace air filters)
- 9. (Check ducts and pipe insulation for damage)
- 10. (Consider installing an air conditioning economizer to bring in outside air when cool outside)
- 11. (Consider replacing old HVAC systems with new energy-efficient systems)
- 12. (Install ceiling fans)
- 13. (Install blinds or solar screen shades)
- 14. (Use reflective window film or awnings on all south-facing windows)
- 15. (Install ceiling and wall insulation)
- 16. (Insulate water heaters and supply pipes)
- 17. (Perform scheduled maintenance on refrigeration units)
- 18. (Add strip curtains to walk-in doors)
- 19. (Keep refrigerators full)
- 20. (Replace some or all electric cooking equipment with gas-fired equipment)
- 21. (Purchase insulated cooking equipment whenever possible)
- 22. (Turn off unused and backup equipment during low production periods)
- 23. (Other, specify)
- 24. (Don't know)



W5. What do you consider the primary benefit of implementing these changes?

[MULTIPLE RESPONSE – ACCEPT UP TO 5 RESPONSES]

- 1. (Save money on energy bills)
- 2. (Improve equipment life)
- 3. (Improve equipment performance)
- 4. (Help the environment)
- 5. (Other, specify)
- 6. (Don't know)

W6. Did you purchase any new equipment as a result of the audit recommendations?

- 2. No [SKIP TO W12]
- 3. (Don't know) [SKIP TO W12]

W7. What did you purchase?

[MULTIPLE RESPONSE – ACCEPT UP TO 5 RESPONSES]

- 1. (CFLs)
- 2. (Programmable Thermostat)
- 3. (Lighting Fixtures)
- 4. (Air Conditioning)
- 5. (Other, specify)
- 6. (Don't know)

W8. Did you receive a rebate or financial incentive for this purchase?

- 1. Yes
- 2. No [SKIP TO W12]
- 3. (Don't know) [SKIP TO W12]

W9. Who provided the rebate?

- 1. (SDG&E)
- 2. (Contractor)
- 3. (Store where equipment was purchased)
- 4. (Equipment manufacturer)
- 5. (Other, specify)
- 6. (Don't know)

[ASK IF QW9=2,3,4,5]

W10. Was the rebate sponsored by SDG&E?

- 1. Yes
- 2. No [SKIP TO W12]
- 3. (Don't know) [SKIP TO W12]

W11. What was the name of the program that provided the rebate?

- 1. (Express Efficiency)
- 2. (Small Business Super Saver)
- 3. (Other, specify)
- 4. (Don't know)

W12. For the audit recommendations that you didn't do, what prevented you from implementing these

[MULTIPLE RESPONSE - ACCEPT UP TO 8 RESPONSES]

1. (Too expensive)



- 2. (Didn't think they were necessary)
- 3. (Need permission from landlord)
- 4. (Need approval from corporate office)
- 5. (Don't have time)
- 6. (Don't believe they will save energy claimed)
- 7. (Concerned about customer comfort)
- 8. (Other, specify)
- 9. (Don't know)

W13. Do you have plans for doing them in the upcoming year?

- 1. Yes
- 2. No
- 3. (Don't know)

W14. Did you receive any information about any other energy efficiency programs during your walk through audit?

- 1. Yes
- 2. No [SKIP to W16]
- 3. (Don't know) [SKIP to W16]

W15. Which programs?

[MULTIPLE RESPONSE - ACCEPT UP TO 4 RESPONSES]

- 1. (Express Efficiency)
- 2. (Small Business Super Saver)
- 3. (Standard Performance Contract (SPC))
- 4. (Other, specify)
- 5. (Don't know)

W16. Did you do anything on your own to learn more about these programs after the audit?

- 1. Yes
- 2. No [SKIP TO W18]
- 3. (Don't know) [SKIP TO W18]

W17. What did you do?

[MULTIPLE RESPONSE - ACCEPT UP TO 5 RESPONSES]

- 1. (Called utility about programs)
- 2. (Asked contractor about programs)
- 3. (Visited utility website to get more information)
- 4. (Applied for a program rebate)
- 5. (Other, specify)
- 6. (Don't know)

W18. Did you participate in any of these programs?

- 1. Yes
- 2. No
- 3. (Don't know)



W19. What time of day did the Mobile Energy Clinic Staff start their walk-through audit?

- 1. (7 AM)
- 2. (8 AM)
- 3. (9 AM)
- 4. (10 AM)
- 5. (11 AM)
- 6. (12 PM)
- 7. (1 PM)
- 8. (2 PM)
- 9. (3 PM)
- 10. (4 PM)
- 11. (5 PM)
- 12. (6 PM)
- 13. (7 PM)
- 14. (8 PM)
- 15. (Other, specify)

W20. Did it take them more than one visit to complete the walk-through audit and complete the maintenance services?

- 1. Yes
- 2. No [SKIP TO MAINTENANCE SECTION]
- 3. (Don't know) [SKIP TO MAINTENANCE SECTION]

W21. How many visits did it take?

[NUMERIC OPEN END]

W22. Why were multiple visits required?

[MULTIPLE RESPONSE – ACCEPT UP TO 4 RESPONSES]

- 1. (My business was too busy at the time for any kind of servicing)
- 2. (The Mobile Energy Clinic team did not have the necessary equipment on-site)
- 3. (The Mobile Energy Clinic team had another engagement and had to leave)
- 4. (Other, specify)
- 5. (Don't know)

W23 Did you have any difficulties in scheduling these visits?

- 1. Yes
- 2. No [SKIP TO MAINTENANCE SECTION]
- 3. (Don't know) [SKIP TO MAINTENANCE SECTION]

W24. What difficulties did you have?

[OPEN END]

Maintenance

I'd now like to ask you a few questions regarding any maintenance that was done on your equipment by the Mobile Energy Clinic staff.

M1. Which on-site maintenance services did you receive from the Mobile Energy Clinic after the initial walk-through audit? (IF LIGHTS, PROBE WITH: WERE THEY ENERGY EFFICIENT LIGHTS CALLED COMPACT FLUORESCENT LIGHTS OR CFLs?)

[MULTIPLE RESPONSE – ACCEPT UP TO 14 RESPONSES]

- 1. (Diagnostics and maintenance of HVAC equipment)
- 2. (Refrigerant charge added or removed)



- 3. (Airflow obstruction in ducts cleared)
- 4. (Dirty filters replaced)
- 5. (Condensing coil cleaned)
- 6. (Evaporating oil cleansed)
- 7. (Programmable thermostat installed)
- 8. (Small boiler tube cleaned)
- 9. (Refrigerant line (insulation) replaced on stand-alone freezers or refrigerators)
- 10. (Refrigerant condenser coil cleaned)
- 11. (Water heater temperature re-set)
- 12. (Hot water pipes insulated)
- 13. (CFLs installed)
- 14. (Other, specify)
- 15. (Don't know)

M2. Were you aware that you could save energy by doing this equipment maintenance prior to being visited by the Mobile Energy Clinic?

- 1. Yes
- 2. No [SKIP to M4]
- 3. (Don't know) [SKIP to M4]

M3. Why hadn't you done this maintenance in the past?

[OPEN END]

M4. Did you decline to receive any particular maintenance services after the initial walk-through audit?

- 1. Yes
- 2. No [SKIP TO M7]
- 3. (Don't know) [SKIP TO M7]

M5. Which Ones?

[OPEN END]

M6. Why did you decline?

[MULTIPLE RESPONSE – ACCEPT UP TO 9 RESPONSES]

- 1. (Too expensive)
- 2. (Didn't think they were necessary)
- 4. (Need permission from landlord)
- 5. (Need approval from corporate office)
- 6. (Don't have time)
- 7. (Don't believe they will save energy claimed)
- 8. (Concerned about customer comfort)
- 9. (Other, specify)
- 10. (Don't know)

M7. Have you changed your routine equipment maintenance as a result of your experience with the Mobile Energy Clinic?

- 1. Yes
- 2. No [SKIP TO SATISFACTION SECTION]
- 3. (Don't know) [SKIP TO SATISFACTION SECTION]

M8. How have your maintenance practices changed?

[OPEN END]



Satisfaction

- S1. How satisfied are you with the time of day that the walk-through audit and maintenance services were conducted?
 - 1. Very dissatisfied
 - 2. Somewhat dissatisfied
 - 3. Neither satisfied nor dissatisfied
 - 4. Somewhat satisfied
 - 5. Very satisfied
 - 6. (Don't know)

[ASK IF OS1=1-4]

S2. In what ways were you not completely satisfied?

[OPEN END]

- S3. How satisfied are you with the clarity and usefulness of the information you received from the Mobile Energy Clinic?
 - 1. Very dissatisfied
 - 2. Somewhat dissatisfied
 - 3. Neither satisfied nor dissatisfied
 - 4. Somewhat satisfied
 - 5. Very satisfied
 - 6. (Don't know)

[ASK IF QS3=1-4]

S4. In what ways were you not completely satisfied?

[OPEN END]

- S5. How satisfied are you with the amount of time taken to complete the walk-through audit and maintenance services?
 - 1. Very dissatisfied
 - 2. Somewhat dissatisfied
 - 3. Neither satisfied nor dissatisfied
 - 4. Somewhat satisfied
 - 5. Very satisfied
 - 6. (Don't know)

[ASK IF QS5=1-4]

S6. In what ways were you not completely satisfied?

[OPEN END]

- S7. How satisfied were you with the courteousness and professionalism of the Mobile Energy Clinic staff?
 - 1. Very dissatisfied
 - 2. Somewhat dissatisfied
 - 3. Neither satisfied nor dissatisfied
 - 4. Somewhat satisfied
 - 5. Very satisfied
 - 6. (Don't know)

[ASK IF QS7=1-4]

S8. In what ways were you not completely satisfied?

[OPEN END]



- S9. Overall, what is your level of satisfaction with the Mobile Energy Clinic?
 - 1. Very dissatisfied
 - 2. Somewhat dissatisfied
 - 3. Neither satisfied nor dissatisfied
 - 4. Somewhat satisfied
 - 5. Very satisfied
 - 6. (Don't know)

[ASK IF OS9=1-4]

S10. In what ways were you not completely satisfied?

[OPEN END]

- S11. If you could add or change one thing about the Mobile Energy Clinic program, what would it be? [OPEN END]
- S12. Based on your company's business practices, what is the best day of the week for the Mobile Energy Clinic to visit your business to provide free maintenance services and the energy efficiency walk-through audits?

[MULTIPLE RESPONSE - ACCEPT UP TO 7 RESPONSES]

- 1. (Monday)
- 2. (Tuesday)
- 3. (Wednesday)
- 4. (Thursday)
- 5. (Friday)
- 6. (Saturday)
- 7. (Sunday)
- 8. (Don't know)

S13. What is the best time of day?

[MULTIPLE RESPONSE - ACCEPT UP TO 8 RESPONSES]

- 1. 6 A.M. TO 8 A.M.
- 2. 8 A.M. TO 10 A.M.
- 3. 10 A.M. TO 12 P.M.
- 4. 12 P.M. TO 2 P.M.
- 5. 2 P.M. TO 4 P.M.
- 6. 4 P.M. TO 6 P.M.
- 7. 6 P.M. TO 8 P.M.
- 8. (Other, specify)
- 9. (Don't know)
- S14. Some people may have initial doubts or reservations about receiving the FREE services of the Mobile Energy clinic. Prior to Mobile Energy Clinic visit, can you tell me if you had any doubts or concerns about the program?
 - 1. Yes
 - 2. No [SKIP TO QDC1]
 - 3. (Don't know) [SKIP TO QDC1]

S15. What were they?

[MULTIPLE RESPONSE - ACCEPT UP TO 5 RESPONSES]

- 1. (Did not believe that the services were free)
- 2. (Did not understand how the Mobile Energy Clinic team was associated with SDG&E)
- 3. (Thought it might disturb my customers)
- 4. (Thought it would worry customers and be bad for business)



- 5. (Other, specify)
- 6. (Don't know)

S16. How did you overcome those concerns?

[OPEN END]

Delivery Channel Innovation Questions

DC1. In addition to the Mobile Energy Clinic audit, SDG&E provides information on energy efficiency in other ways. Have you ever... (1=Yes, 2=No, 3=Other, specify, 98=DK) [READ AND ROTATE]

- M. Visited San Diego Gas and Electric's website?
 - A2.[IF A=1] Did you see anything on the website about energy efficiency opportunities?
- N. Received information from San Diego Gas and Electric through the mail, such as a bill insert or newsletter with information about energy efficiency opportunities?
- O. Received an email from San Diego Gas and Electric utility regarding energy efficiency information?
- P. Attended an event, such as a business forum or trade meeting, where information about energy efficiency was distributed?
- Q. Seen advertisements in a newspaper or trade journal regarding energy efficiency?
- R. Heard about energy efficiency opportunities by television or radio specifically for Flex Your Power?
- S. Learned about energy efficiency efforts from a contractor?
- T. Been contacted by San Diego Gas and Electric, (such as by an Account Executive or Commercial Service Technician) about energy efficiency opportunities?
- U. Called San Diego Gas and Electric and had someone inform you about energy efficiency opportunities?
- V. Heard about energy efficiency opportunities from your local government or from a non-profit agency in your community?

[IF YES TO DC1A=1, or B=1, or C=1]

DC2a. On a scale of 1 to 5 where 1 is not at all useful and 5 is very useful, how useful did you find the information provided by San Diego Gas and Electric?

[SKIP IF DC2=5]

DC3. What would have made this information more useful?

DC4. Based on all of the things that you can think of, what is the best way to provide you with information about energy efficiency opportunities? [OPEN END, MULTIPLE RESPONSES]

- 12. (Gas or electric utility website)
- 13. (Information from utility received through the mail, such as a bill insert or newsletter)
- 14. (An email from gas or electric utility)
- 15. (An event, such as a business forum or trade meeting)
- 16. (Advertisements in a newspaper or trade journal)
- 17. (Television or radio advertisements specifically for Flex Your Power)
- 18. (Other television or radio advertisements)
- 19. (A contractor)
- 20. (A representative of the gas or electric utility—didn't mention Account Representative)
- 21. (Specifically mentioned Account Executive or Account Representative)
- 22. (A local government or non-profit agency in the community)
- 23. (Other, specify)
- 24. (Don't know)



Marketing

MK1. Would you like to learn about other programs that can save your company energy?

- 1. Yes
- 2. No
- 3. (Don't know)

Firmographics

F1. Do you lease or own your facility?

- 5. Lease
- 6. Own
- 7. (Other, specify)
- 8. (Don't know/refused)

F2. Would you describe your business as...

- 5. A small business
- 6. A medium-sized business
- 7. A large business
- 8. (Don't know/refused)

F3. What is the approximate percentage of your square footage that is AIR-CONDITIONED?

- 6. 0%
- 7. 1-50%
- 8. 51-99%
- 9. 100%
- 10. (Don't know/Refused)

F4a. Is your business in one location, or do you have multiple locations?

- 4. One location
- 5. Multiple locations
- 6. (Don't know/refused)

F4b. Is your business in its own building, or are you located in a building with multiple businesses?

- 7. Own building
- 8. Multiple businesses in building
- 9. (Don't know/refused)

F5. Do you have anyone devoted full-time as a building engineer or facility manager?

- 3. Yes
- 4. No
- 01. (Other, specify)
- 99. (Don't know/Refused)

F6. Would you say that your gas and electric costs represent a . . . (READ LIST)

- 13. Very small
- 14. Small
- 15. Medium
- 16. Large, or
- 17. Very large part of your operating costs each month?
- 18. (Don't know/refused)



F7. On average, how many hours a day is your facility in use?

- 7. Less than 8 hours
- 8. 8 to 11 hours
- 9. 12 to 15 hours
- 10. 16 to 23 hours
- 11. 24 hours
- 12. (Don't know/refused)

Your responses will remain confidential, but may I get/confirm your name and title in case I need to call you back? (RECORD NAME AND TITLE, REFUSED=WOULD NOT GIVE NAME AND/OR TITLE)



15. SDGE 3040: Business Energy Assessment Program (BEA)

Table 15-1 Final Research List

Final Research List								
Target for Data Collection Collec		Sample Size	Number of Data points	From where did you get the sample?				
Program Managers	In-depth interview	July / August	Determine level of understanding about the program.	2	2	List of program managers provided by SDG&E		
Participants	On-line Survey	December	Satisfaction, ease of installation, er suggestions for program improvement		51	Program Manager		



15.1 Online Survey Instrument: BEA Participants

Date	September 25, 2007
Utility	SDG&E
Program Name	Business Energy Assessment Program, SDGE3040
Target	Industrial/Commercial
Sample Size	
Quotas (if applicable)	
Sample File Name	
Contractor Name	ECONorthwest
Primary Contact (person who	Christian Miner
should be contacted with any	
questionnaire questions)	
Phone	503-222-6060
Email	miner@portland.econw.com

Energy Challenger Assessment Customer Evaluation

Welcome. Thank you for giving us a few minutes of your time to tell us about your experience of completing the SDG&E Energy Challenger assessment tool for your business. Your feedback will help us improve the energy efficiency programs we offer to help customers save energy, money, and help the environment.

This survey has 4 parts: Process questions, Recommendations questions, Satisfaction questions, and Demographics questions. The survey should only take about 5 minutes to complete.

1. Please provide your e-mail address (the one through which you received this survey link).

Your e-mail address will be kept confidential.

It is only used to confirm that you have completed this survey so we do not send you a reminder e-mail. You will not be contacted again for this survey.

E-mail:

2. Why did you take the Energy Challenger?

(Check all that apply)

- Contacted by the Energy Challenger call center
- Contacted by our firm's SDG&E account representative
- Supervisor suggested it
- Co-worker suggested it
- Learned about it from a SDG&E sponsored education and training event
- Received a brochure about it
- Received an e-mail from SDG&E about it
- Found it on the SDG&E website
- Don't know
- Other (please specify)

3. How many minutes did it take for you to complete the Energy Challenger? (Provide numeric answer)

- Less than 5 minutes
- 5-10 minutes
- 10-15 minutes
- 15-20 minutes
- More than 20 minutes
- Don't know



This section asks you about the energy efficiency recommendations that the Energy Challenger provided for your business.

- 4. Did your Energy Challenger results include any recommendations to change your business's LIGHTING? (Check one)
 - Yes
 - No
 - Don't Know
- 5. Below is a possible list of recommendations that came out of the Energy Challenger for LIGHTING.

What have you DONE as a RESULT of the Energy Challenger?

(Please DO NOT mark energy efficiency measures you adopted BEFORE the assessment) (Check all that apply)

- Replace incandescent lights with compact fluorescent lights (CFLs)
- Upgrade INTERIOR fluorescent lighting to energy efficient lamps and fixtures
- Upgrade EXTERIOR lighting to energy efficient lamps and fixtures
- Upgrade Exit sign lighting with energy efficient LED lamps
- Install controls on lighting to turn off when not required (timers, occupancy sensors in offices and meeting rooms, photocells on exterior lighting)
- None
- 6. Please check any LIGHTING measures you were doing BEFORE you took the Energy Challenger: (Check all that apply)
 - Replace incandescent lights with compact fluorescent lights (CFLs)
 - Upgrade INTERIOR fluorescent lighting to energy efficient lamps and fixtures
 - Upgrade EXTERIOR lighting to energy efficient lamps and fixtures
 - Upgrade Exit sign lighting with energy efficient LED lamps
 - Install controls on lighting to turn off when not required (timers, occupancy sensors in offices and meeting rooms, photocells on
 - exterior lighting)
 - None
- 7. Did your Energy Challenger results include any recommendations to change your business's HVAC SYSTEM? (Check one)
 - Yes
 - No
 - Don't Know
- 8. Below is a possible list of recommendations that came out of the Energy Challenger for your HVAC system. What have you DONE as a RESULT of the Energy Challenger?

(Please DO NOT mark energy efficiency measures you adopted BEFORE the assessment) (Check all that apply)

- Have HVAC economizer checked for correct operation
- Install a programmable thermostat, timer, or building management system to turn off HVAC during non-business hours
- Install variable frequency drives on HVAC fans
- Set your air conditioning thermostats no lower than 71° F
- Improve the air-tightness of air-conditioned spaces by closing doors, windows, installing air curtains
- None
- Other (please specify



9. Please check any HVAC measures you were doing BEFORE you took the Energy Challenger:

(Check all that apply)

- Have HVAC economizer checked for correct operation
- Install a programmable thermostat, timer, or building management system to turn off HVAC during non-business hours
- Install variable frequency drives on HVAC fans
- Set your air conditioning thermostats no lower than 71° F
- · Improve the air-tightness of air-conditioned spaces by closing doors, windows, installing air curtains
- None

10. Did your Energy Challenger results include any recommendations to join DEMAND RESPONSE programs? (Check one)

- Yes
- No
- Don't know

11. Below is a possible list of recommendations that came out of the Energy Challenger for DEMAND RESPONSE programs.

What have you DONE as a RESULT of the Energy Challenger?

(Please DO NOT mark demand response programs you joined BEFORE the assessment) (Check all that apply)

- Join the Peak Day Credit Program -- Receive monthly energy bill credits for reducing your consumption by 10-20% on 'critical'
- day periods
- Join the Summer Saver Program -- Receive a financial incentive to cycle your central HVAC during peak periods
- Join a Demand Bidding program (Day-Ahead or Day-Of) -- Receive monthly energy bill credits by voluntarily offering to reduce
- · your energy consumption in advance
- Reduce your energy cost throughout the year, by accepting a higher rate during 'critical alert' periods
- None
- Other (please specify)

12. Please check any DEMAND RESPONSE programs you joined BEFORE you took the Energy Challenger: (Check all that apply)

- Join the Peak Day Credit Program -- Receive monthly energy bill credits for reducing your consumption by 10-20% on 'critical'
- day periods
- Join the Summer Saver Program -- Receive a financial incentive to cycle your central HVAC during peak periods
- Join a Demand Bidding program (Day-Ahead or Day-Of) -- Receive monthly energy bill credits by voluntarily offering to reduce
- your energy consumption in advance
- Reduce your energy cost throughout the year, by accepting a higher rate during 'critical alert' periods
- None

13. Below is a possible list of OTHER measures that came out of the Energy Challenger.

What have you DONE as a RESULT of the Energy Challenger?

(Please DO NOT mark energy efficiency measures you adopted BEFORE the assessment) (Check all that apply)

- Install occupancy sensor controllers on vending machines
- Reduce your hot water temperature
- Install reflective window film on windows
- Enable the Energy Saver mode on your office equipment (computers, copiers, printers)
- Introduce procedures to encourage staff to turn off equipment when not needed (such as after hours and on weekends)
- Modify your maintenance procedures to include regular energy-efficiency checks (such as cleaning filters on HVAC systems).
- Develop a process for managing energy bills and consumption, and track how they are trending



- Tell staff about ways they can reduce energy costs at work
- Regularly advise staff of company changes in energy use
- Develop a plan to reduce energy costs for the next year
- Take a free SDG&E energy audit
- None

14. Please check any OTHER measures you were doing BEFORE you took the Energy Challenger: (Check all that apply)

- Install occupancy sensor controllers on vending machines
- Reduce your hot water temperature
- Install reflective window film on windows
- Enable the Energy Saver mode on your office equipment (computers, copiers, printers)
- Introduce procedures to encourage staff to turn off equipment when not needed (such as after hours and on weekends)
- Modify your maintenance procedures to include regular energy-efficiency checks (such as cleaning filters on HVAC systems).
- Develop a process for managing energy bills and consumption, and track how they are trending
- Tell staff about ways they can reduce energy costs at work
- Regularly advise staff of company changes in energy use
- Develop a plan to reduce energy costs for the next year
- Take a free SDG&E energy audit
- None

15. Were there any other Energy Challenger recommendations that you DID that were not covered in the previous categories (LIGHTING, HVAC, DEMAND RESPONSE, or OTHER)? (Check one)

- No
- Yes (please specify)

16. Did you purchase any new equipment as a result of the Energy Challenger recommendations? (Check one)

- Yes
- No
- Don't Know

17. What did you purchase?

(Check all that apply)

- CFLs
- T8 or T5 lamps
- T1 lamps or electronic ballast lamps
- LED Exit lighting
- Controls for lighting (timers, occupancy sensors in offices and meeting rooms, photocells on exterior lighting)
- Programmable thermostat, timer, or building management system for HVAC equipment
- Reflective window film
- Variable frequency drives for HVAC fans
- Occupancy sensor controllers for vending machines
- Don't know
- Other (please specify)

18. Did you receive a rebate for any of these purchases?

(Check one)

- Yes
- No
- Don't know



19. Who provided the rebate?

(Check one)

- SDG&E
- Contractor
- Store where equipment was purchased
- Equipment manufacturer
- Don't know
- Other (please specify)

20. What was the name of the SDG&E program that provided the rebate? (Check one)

- **Express Efficiency Program**
- Small Business Super Saver Program
- I received a rebate but I don't remember the program name
- Other (please specify)

21. For all of the Energy Challenger recommendations that you DID NOT do, what prevented you from implementing these measures?

(Check all that apply)

- Too expensive
- Didn't think they were necessary
- Interfered with daily business practices
- Needed permission from landlord
- Needed approval from corporate office
- Didn't have time
- Didn't believe they will save the amount of energy claimed
- Concerned about customer comfort
- Already doing the recommended actions
- Don't know
- Other (please specify)

22. Do you have plans for doing them in the upcoming year?

(Check one)

- Yes
- No
- Don't know

23. Which Energy Efficiency programs did you receive information about from the Energy Challenger? (Check all that apply)

- **Express Efficiency**
- Small Business Super Saver
- Standard Performance Contract
- On-Bill Financing
- None
- Don't know
- Other (please specify)

24. AS A RESULT of using the Energy Challenger, did you:

(Check all that apply)

- CALL SDG&E (Energy Information Center) to learn more about energy efficiency opportunities
- VISIT THE SDG&E WEBSITE to learn more about energy efficiency opportunities
- ASK A CONTRACTOR about other energy efficiency programs
- APPLY FOR a SDG&E rebate
- Other (please specify)



25. AS A RESULT of taking the Energy Challenger, did you participate in any of these programs? (Check one)

- Express Efficiency
- Small Business Super Saver
- Standard Performance Contract
- On-Bill Financing
- None
- Other (please specify)

26. Did you receive a FOLLOW-UP PHONE CALL to review your assessment results? (Check one)

- Yes
- No
- Don't know

27. Did the follow-up phone call motivate you to implement any of the assessment recommendations? (Check one)

- Yes
- No
- Don't know

28. Which recommendations did you do AS A RESULT of the follow-up call?

- 1.
- 2.
- 3.
- 4.
- 5.
- 6
- 7.
- 8
- 9.10.
- This part of the survey asks about your satisfaction with the Energy Challenger.

29. Please indicate your level of satisfaction regarding the following:

(Very satisfied, Somewhat satisfied, Neither satisfied nor dissatisfied, Somewhat dissatisfied, Very dissatisfied, Don't know)

- A. The AMOUNT OF TIME it takes to complete the Energy Challenger?
- B. The Energy Challenger's EASE OF USE?
- C. The HELPFULNESS of the action plan in increasing your awareness of how to make your business more energy efficient?
- D. The USEFULNESS of the results that benchmarked your business with similar businesses?
- E. The CLARITY of the information provided in the results?
- F. OVERALL SATISFACTION with the Energy Challenger?

30. If you could add or change one thing about the Energy Challenger, what would it be?

Almost done...Now just a few firmographic questions.



This final part of the survey asks for some firmographic information.

31. What business sector does your firm belong to?

- (Check one)
 - Retail or wholesale
 - Manufacturing
 - Agricultural/Mining
 - Financial Services
 - Real Estate
 - Transportation
 - Marketing and Sales
 - Medical
 - Non-Profit
 - Research
 - Government
 - Law
 - Media/Entertainment
 - Other (please specify)

32. Do you lease or own your facility?

(Check one)

- Lease
- Own
- Don't know
- Other (please specify)

33. What is the approximate TOTAL square footage of your facility at this location? (Check one)

- Less than 1,500 sq ft
- 1,500 4,999 sq ft
- 5,000 9,999 sq ft
- 10,000 24,999 sq ft
- 25,000 49,999 sq ft
- 50,000 74,999 sq ft
- 75,000 99,999 sq ft
- Over 100,000 sq ft
- Don't know

34. How many employees do you have at this location?

(Check one)

- 1 to 5
- 6 to 10
- 11 to 20
- 21 to 50
- 51 to 100
- Over 100
- Don't know

35. Please enter in your full name and address so we can send you a \$10 Coffee Gift Card as a thank you.

- Name:
- Address:
- City/Town:
- State/Province:
- ZIP/Postal Code:



15.2 Frequency Tables: BEA Participants

January 2008

Case Summary								
	Cases							
	Valid		Missing		Total			
	N	Percent	N	Percent	N	Percent		
Q2	46	90.2%	5	9.8%	51	100.0%		

	Q2. Why did you take the Energy Challer	nger? (Ch	eck all that	apply)
			Respo	onses
		N	Percent	Percent of Cases
Q2	Contacted by the Energy Challenger call center	9	16.7%	19.6%
	Contacted by our firms SDG&E account representative	5	9.3%	10.9%
	Co-worker suggested it	2	3.7%	4.3%
	Learned about it from a SDG&E sponsored education and training event	2	3.7%	4.3%
	Received a brochure about it	8	14.8%	17.4%
	Received an e-mail from SDG&E about it	18	33.3%	39.1%
	Found it on the SDG&E website	6	11.1%	13.0%
	Dont know	4	7.4%	8.7%
	Total	54	100.0%	117.4%



Q2 Other Responses. Why did you take the Energy Challenger? (Check all that apply)

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid		46	90.2	90.2	90.2
	Del Mar Fair Representatives	1	2.0	2.0	92.2
	Exploring becoming energy efficient.	1	2.0	2.0	94.1
	Part of City's energy assessment	1	2.0	2.0	96.1
	Part of process in installing photovoltaic panels.	1	2.0	2.0	98.0
	Suggested by Vendor	1	2.0	2.0	100.0
	Total	51	100.0	100.0	

Q3. How many minutes did it take for you to complete the Energy Challenger? (Provide numeric answer)

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Less than 5 minutes	6	11.8	12.2	12.2
	5-10 minutes	20	39.2	40.8	53.1
	10-15 minutes	11	21.6	22.4	75.5
	15-20 minutes	1	2.0	2.0	77.6
	More than 20 minutes	1	2.0	2.0	79.6
	Don't know	10	19.6	20.4	100.0
	Total	49	96.1	100.0	
Missing	System	2	3.9		
Total		51	100.0		



Q4. Did your Energy Challenger results include any recommendations to change your business LIGHTING? (Check one)

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	36	70.6	73.5	73.5
	No	9	17.6	18.4	91.8
	Don't know	4	7.8	8.2	100.0
	Total	49	96.1	100.0	
Missing	System	2	3.9		
Total		51	100.0		

Case Summary								
		Cases						
	Va	alid	Missing		Total			
	N	Percent	N	Percent	N	Percent		
Q5	36	70.6%	15	29.4%	51	100.0%		



	Q5. LIGHTING: What have you DONE as a RI					
			Respon	ses		
		N	Percent	Percent of Cases		
Q5	Replace incandescent lights with compact fluorescent lights (CFLs)	18	33.3%	50.0%		
	Upgrade INTERIOR fluorescent lighting to energy efficient lamps and fixtures	15	27.8%	41.7%		
	Upgrade EXTERIOR lighting to energy efficient lamps and fixtures	3	5.6%	8.3%		
	Upgrade Exit sign lighting with energy efficient LED lamps	2	3.7%	5.6%		
	Install controls on lighting to turn off when not required (timers, occupancy sensors in offices and meeting rooms, photocells on exterior lighting)	10	18.5%	27.8%		
	None	3	5.6%	8.3%		
	In process of upgrading fluorescent lighting	1	1.9%	2.8%		
	Installing in new facility in 60-90 days	1	1.9%	2.8%		
	Turned off 1/3 of lights in offices and warehouse	1	1.9%	2.8%		
	Total	54	100.0%	150.0%		

Case Summary									
		Cases							
	Valid		Mi	ssing	Total				
	N	Percent	N	N Percent		Percent			
Q6	48	94.1%	3	5.9%	51	100.0%			



Q6. Please check any LIGHTING measures you were doing BEFORE you took the Energy Challenger: (Check all that apply)

			Responses		
		N	Percent	Percent of Cases	
Q6	Replace incandescent lights with compact flourescent lights (CFLs)	16	23.9%	33.3%	
	Upgrade INTERIOR flourescent lighting to energy efficient lamps and fixtures	16	23.9%	33.3%	
	Upgrade EXTERIOR lighting to energy efficient lamps and fixtures	4	6.0%	8.3%	
	Upgrade Exit sign lighting with energy efficient LED lamps	8	11.9%	16.7%	
	Install controls on lighting to turn off when not required (timers, occupancy sensors in offices and meeting rooms, photocells on exterior lighting)	8	11.9%	16.7%	
	None	15	22.4%	31.2%	
	Total	67	100.0%	139.6%	

Q7. Did your Energy Challenger results include any recommendations to change your business HVAC SYSTEM? (Check one)

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	12	23.5	25.0	25.0
	No	27	52.9	56.2	81.2
	Don't Know	9	17.6	18.8	100.0
	Total	48	94.1	100.0	
Missing	System	3	5.9		
Total		51	100.0		



	Case Summary									
	Cases									
	,	Valid Missing Total								
	N	Percent	N Percent N Percent							
Q8	12	23.5%	39 76.5% 51 100.0%							

	Q8. HVAC: What have you DONE as a RESULT of the Energy Challenger?							
			Response	S				
		N	Percent	Percent of Cases				
Q8	Have HVAC economizer checked for correct operation	3	16.7%	25.0%				
	Install a programmable thermostat, timer, or building management system to turn off HVAC during non-business hours	4	22.2%	33.3%				
	Install variable frequency drives on HVAC fans	2	11.1%	16.7%				
	Set your air conditioning thermostats no lower than 71 F	4	22.2%	33.3%				
	Improve the air-tightness of air- conditioned spaces by closing doors, windows, installing air curtains	3	16.7%	25.0%				
	None	2	11.1%	16.7%				
	Total	18	100.0%	150.0%				

	Case Summary										
	Cases										
	7	Valid Missing Total									
	N	Percent	N	Percent	N	Percent					
Q9	48	94.1%	3	5.9%	51	100.0%					



Q9. Please check any HVAC measures you were doing BEFORE you took the Energy Challenger: (Check all that apply)

E			Responses				
		N	Percent	Percent of Cases			
Q9	Have HVAC economizer checked for correct operation	5	7.6%	10.4%			
	Install a programmable thermostat, timer, or building management system to turn off HVAC during non-business hours	11	16.7%	22.9%			
	Install variable frequency drives on HVAC fans	2	3.0%	4.2%			
	Set your air conditioning thermostats no lower than 71 F	15	22.7%	31.2%			
	Improve the air-tightness of air- conditioned spaces by closing doors, windows, installing air curtains	12	18.2%	25.0%			
	None	21	31.8%	43.8%			
	Total	66	100.0%	137.5%			

Q10. Did your Energy Challenger results include any recommendations to join DEMAND RESPONSE programs?

(Check one)

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	12	23.5	25.5	25.5
	No	16	31.4	34.0	59.6
	Dont Know	19	37.3	40.4	100.0
	Total	47	92.2	100.0	
Missing	System	4	7.8		
Total		51	100.0		



Case Summary										
Cases										
	V	Valid Missing Total								
	N	Percent	N	Percent	N	Percent				
Q11	12	23.5%	39	76.5%	51	100.0%				

Q11. DEMAND RESPONSE PROGRAMS: What have you DONE as a RESULT of the Energy Challenger? (Check all that apply)

Responses Percent of Cases N Percent Q11 Join the Peak Day Credit Program --Receive monthly energy bill credits for 4 30.8% 33.3% reducing your consumption by 10-20% on "critical" day periods Join the Summer Saver Program --Receive a financial incentive to cycle 2 15.4% 16.7% your central HVAC during peak periods Reduce your energy cost throughout the year, by accepting a higher rate during 1 7.7% 8.3% 'critical alert" periods 5 None 38.5% 41.7% ac monitor installed 1 7.7% 8.3%

	Case Summary									
Cases										
	V	Valid Missing Total								
	N	Percent	N Percent N Percent							
Q12	45									

13

100.0%

Total

108.3%



Q12. Please check any DEMAND RESPONSE programs you joined BEFORE you took the Energy Challenger: (Check all that apply)

		Responses			
		N	Percent	Percent of Cases	
Q12	Join the Peak Day Credit Program Receive monthly energy bill credits for reducing your consumption by 10-20% on "critical" day periods	5	10.6%	11.1%	
	Join the Summer Saver Program Receive a financial incentive to cycle your central HVAC during peak periods	5	10.6%	11.1%	
	Reduce your energy cost throughout the year, by accepting a higher rate during "critical alert" periods	3	6.4%	6.7%	
	None	34	72.3%	75.6%	
	Total	47	100.0%	104.4%	

	Case Summary										
	Cases										
	V	alid	Mis	sing	To	tal					
	N	Percent	N Percent N Percen								
Q13	45	88.2%	6	11.8%	51	100.0%					



Q13. OTHER measures: What have you DONE as a RESULT of the Energy Challenger?

		Responses			
		N	Percent	Percent of Cases	
Q13	Install occupancy sensor controllers on vending machines	1	.8%	2.2%	
	Reduce your hot water temperature	9	7.3%	20.0%	
	Install reflective window film on windows	6	4.9%	13.3%	
	Enable the Energy Saver mode on your office equipment (computers, copiers, printers)	14	11.4%	31.1%	
	Introduce procedures to encourage staff to turn off equipment when not needed (such as after hours and on weekends)	22	17.9%	48.9%	
	Modify your maintenance procedures to include regular energy-efficiency checks (such as cleaning filters on HVAC systems	8	6.5%	17.8%	
	Develop a process for managing energy bills and consumption, and track how they are trending	7	5.7%	15.6%	
	Tell staff about ways they can reduce energy costs at work	19	15.4%	42.2%	
	Regularly advise staff of company changes in energy use	10	8.1%	22.2%	
	Develop a plan to reduce energy costs for the next year	9	7.3%	20.0%	
	Take a free SDG&E energy audit	10	8.1%	22.2%	
	None	8	6.5%	17.8%	
	Total	123	100.0%	273.3%	



Q13_Other Responses. OTHER measures: What have you DONE as a RESULT of the Energy Challenger?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid		50	98.0	98.0	98.0
	Never received my assessment Unfortunately, poor response from SDG&E	1	2.0	2.0	100.0
	Total	51	100.0	100.0	

	Case Summary									
Cases										
	Valid Missing Total									
	N	Percent	N	Percent	N	Percent				
Q14	45	88.2%	6	11.8%	51	100.0%				



Q14. Please check any OTHER measures you were doing BEFORE you took the Energy Challenger:

(Check all that apply)

			Responses		
		N	Percent	Percent of Cases	
Q14	Install occupancy sensor controllers on vending machines	2	1.7%	4.4%	
	Reduce your hot water temperature	10	8.4%	22.2%	
	Install reflective window film on windows	11	9.2%	24.4%	
	Enable the Energy Saver mode on your office equipment (computers, copiers, printers)	15	12.6%	33.3%	
	Introduce procedures to encourage staff to turn off equipment when not needed (such as after hours and on weekends)	16	13.4%	35.6%	
	Modify your maintenance procedures to include regular energy-efficiency checks (such as cleaning filters on HVAC systems	13	10.9%	28.9%	
	Develop a process for managing energy bills and consumption, and track how they are trending	6	5.0%	13.3%	
	Tell staff about ways they can reduce energy costs at work	15	12.6%	33.3%	
	Regularly advise staff of company changes in energy use	7	5.9%	15.6%	
	Develop a plan to reduce energy costs for the next year	7	5.9%	15.6%	
	Take a free SDG&E energy audit	6	5.0%	13.3%	
	None	11	9.2%	24.4%	
	Total	119	100.0%	264.4%	



Q15. Were there any other Energy Challenger recommendations that you DID that were not covered in the previous categories (LIGHTING, HVAC, DEMAND RESPONSE, or OTHER)? (Check one)

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	5	9.8	10.6	10.6
	No	42	82.4	89.4	100.0
	Total	47	92.2	100.0	
Missing	System	4	7.8		
Total		51	100.0		

	Q15 Other Responses.							
		Frequency	Percent	Valid Percent	Cumulative Percent			
Valid		46	90.2	90.2	90.2			
	Currently in process of developing a load shedding plan using Building Management System.	1	2.0	2.0	92.2			
	Never received a response from SDG&E Unfortunately - more often than, we don't ever receive valuable information from SDG&E. We search and locate it ourselves. Respectfully, Thomas Mackey Clarion Del Mar Inn	1	2.0	2.0	94.1			
	Off peak meters	1	2.0	2.0	96.1			
	Replace central heating and air conditioning system to individual room units	1	2.0	2.0	98.0			
	We installed a variable-speed air compressor.	1	2.0	2.0	100.0			
	Total	51	100.0	100.0				



Q16. Did you purchase any new equipment as a result of the Energy Challenger recommendations? (Check one)

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	13	25.5	27.7	27.7
	No	33	64.7	70.2	97.9
	Dont Know	1	2.0	2.1	100.0
	Total	47	92.2	100.0	
Missing	System	4	7.8		
Total		51	100.0		

Case Summary								
	Cases							
	Valid		Mi	ssing	Total			
	N	Percent	N	Percent	N	Percent		
Q17	13	25.5%	38	74.5%	51	100.0%		



	Q17. What did you purchase? (Ch	neck all th	at apply)	
			Responses	
		N	Percent	Percent of Cases
Q17	CFLs	5	21.7%	38.5%
	T8 or T5 lamps	4	17.4%	30.8%
	T1 lamps or electronic ballast lamps	1	4.3%	7.7%
	LED Exit lighting	1	4.3%	7.7%
C	Controls for lighting (timers, occupancy sensors in offices and meeting rooms, photocells on exterior lighting)	4	17.4%	30.8%
	Programmable thermostat, timer, or building management system for HVAC equipment	3	13.0%	23.1%
	Reflective window film	1	4.3%	7.7%
	Variable frequency drives for HVAC fans	1	4.3%	7.7%
	Don't know	1	4.3%	7.7%
	Photovoltaic array	1	4.3%	7.7%
	Upgraded BMS	1	4.3%	7.7%
	Total	23	100.0%	176.9%

Q18. Did you receive a rebate for any of these purchases? (Check one)								
		Frequency	Percent	Valid Percent	Cumulative Percent			
Valid	Yes	4	7.8	30.8	30.8			
	No	9	17.6	69.2	100.0			
	Total	13	25.5	100.0				
Missing	System	38	74.5					
Total		51	100.0					



Case Summary									
	Cases								
	Valid		Missing		Total				
	N	Percent	N	Percent	N	Percent			
Q19	3	5.9%	48	94.1%	51	100.0%			

Q19. Who provided the rebate? (Check one)								
		Responses						
		N	Percent	Percent of Cases				
Q19	SDG&E	3	100.0%	100.0%				
	Total	3	100.0%	100.0%				

Q19 Other Responses. Who provided the rebate? (Check one)									
-		Frequency	Percent	Valid Percent	Cumulative Percent				
Valid		50	98.0	98.0	98.0				
	CEC	1	2.0	2.0	100.0				
	Total	51	100.0	100.0					

Case Summary								
	Cases							
	Valid		Missing		Total			
	N	Percent	N	Percent	N	Percent		
Q20	3	5.9%	48	94.1%	51	100.0%		



Q	Q20. What was the name of the SDG&E program that provided the rebate? (Check one)								
			Responses						
		N	Percent	Percent of Cases					
Q20	Express Efficiency Program	1	33.3%	33.3%					
	I received a rebate but I don't remember the program name	2	66.7%	66.7%					
	Total	3	100.0%	100.0%					

Case Summary							
	Cases						
	Valid		Missing		Total		
	N	Percent	N	Percent	N	Percent	
Q21	46	90.2%	5	9.8%	51	100.0%	



Q21. For all of the Energy Challenger recommendations that you DID NOT do, what prevented you from implementing these measures? (Check all that apply)

			Respons	es
		N	Percent	Percent of Cases
Q21	Too expensive	15	23.1%	32.6%
	Didn't think they were necessary	6	9.2%	13.0%
	Interfered with daily business practices	2	3.1%	4.3%
	Needed permission from landlord	13	20.0%	28.3%
	Needed approval from corporate office	6	9.2%	13.0%
	Didn't have time	3	4.6%	6.5%
	Didn't believe they will save the amount of energy claimed	2	3.1%	4.3%
	Concerned about customer comfort	1	1.5%	2.2%
	Already doing the recommended actions	9	13.8%	19.6%
	Don't know	2	3.1%	4.3%
	no budget allowance	1	1.5%	2.2%
	Did not qualify for On-Bill Financing	1	1.5%	2.2%
	the company did the evaluation is suppose to install motion sensor light switch for the business. But, they have not don	1	1.5%	2.2%
	waiting to implement in new facility	1	1.5%	2.2%
	Are under consideration but have not yet implemented	1	1.5%	2.2%
	na	1	1.5%	2.2%
	Total	65	100.0%	141.3%



	Q22. Do you have plans for doing them in the upcoming year? (Check one)							
		Frequency	Percent	Valid Percent	Cumulative Percent			
Valid	Yes	14	27.5	31.1	31.1			
	No	17	33.3	37.8	68.9			
	Dont Know	14	27.5	31.1	100.0			
	Total	45	88.2	100.0				
Missing	System	6	11.8					
Total	Total		100.0					

Case Summary								
	Cases							
	Valid		Missing		Total			
	N	Percent	N	Percent	N	Percent		
Q23	45	88.2%	6	11.8%	51	100.0%		

Q23. Which Energy Efficiency programs did you receive information about from the Energy Challenger? (Check all that apply)							
			Response	s			
		N Percent Perc					
Q23	Express Efficiency	6	12.0%	13.3%			
	Small Business Super Saver	10	20.0%	22.2%			
	Standard Performance Contract	2	4.0%	4.4%			
	On-Bill Financing	2	4.0%	4.4%			
	None	10	20.0%	22.2%			
	Dont know	20	40.0%	44.4%			
	Total	50	100.0%	111.1%			



Q23 Other Responses. Which Energy Efficiency programs did you receive information about from the Energy Challenger? (Check all that apply)

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid		50	98.0	98.0	98.0
	none	1	2.0	2.0	100.0
	Total	51	100.0	100.0	_

Case Summary							
	Cases						
	Valid		Missing		Total		
	N	Percent	N	Percent	N	Percent	
Q24	38	74.5%	13	25.5%	51	100.0%	

	Q24. AS A RESULT of using the Energy Challenger, did you: (Check all that apply)							
			Responses					
		N	Percent	Percent of Cases				
Q24	CALL SDG&E (Energy Information Center) to learn more about energy efficiency opportunities	6	12.2%	15.8%				
	VISIT THE SDG&E WEBSITE to learn more about energy efficiency opportunities	29	59.2%	76.3%				
	ASK A CONTRACTOR about other energy efficiency programs	6	12.2%	15.8%				
	APPLY FOR a SDG&E rebate	8	16.3%	21.1%				
	Total	49	100.0%	128.9%				



Q24 O	ther Responses. AS A RESULT of using the Energy Challenger, did you:
	(Check all that apply)

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid		49	96.1	96.1	96.1
	none	2	3.9	3.9	100.0
	Total	51	100.0	100.0	

Case Summary							
Cases							
	Valid		M	lissing	Total		
	N	Percent	N	Percent	N	Percent	
Q25	41	80.4%	10	19.6%	51	100.0%	

Q25. AS A RESULT of taking the Energy Challenger, did you participate in any of these programs? (Check one)

			Responses			
		N	Percent	Percent of Cases		
Q25	Express Efficiency	2	4.9%	4.9%		
	Small Business Super Saver Standard Performance Contract		12.2%	12.2%		
			2.4%	2.4%		
	None	33	80.5%	80.5%		
	Total	41	100.0%	100.0%		



Q25 Other Responses. AS A RESULT of taking the Energy Challenger, did you participate in any of these programs?

(Check one)

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid		47	92.2	92.2	92.2
	Did not qualify.	1	2.0	2.0	94.1
	Don't know	1	2.0	2.0	96.1
	in process of making changes	1	2.0	2.0	98.0
	none	1	2.0	2.0	100.0
	Total	51	100.0	100.0	

Q26. Did you receive a FOLLOW-UP PHONE CALL to review your assessment results? (Check one)

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	17	33.3	37.0	37.0
	No	22	43.1	47.8	84.8
	Dont Know	7	13.7	15.2	100.0
	Total	46	90.2	100.0	
Missing	System	5	9.8		
Total		51	100.0		



Q27. Did the follow-up phone call motivate you to implement any of the assessment recommendations? (Check one)									
	Frequency Percent Valid Percent Cumulative Percent								
Valid	Yes	6	11.8	35.3	35.3				
	No	7	13.7	41.2	76.5				
	Don't Know	4	7.8	23.5	100.0				
	Total	17	33.3	100.0					
Missing	System	34	66.7						
Total		51	100.0						

	Q28_1. Which recommendations did you do AS A RESULT of the follow-up call?					
		Frequency	Percent	Valid Percent	Cumulative Percent	
Valid		47	92.2	92.2	92.2	
	Looked into energy efficient lighting and fixtures	1	2.0	2.0	94.1	
	none	1	2.0	2.0	96.1	
	note to self: upgrade lighting in Suite A112	1	2.0	2.0	98.0	
	Timers	1	2.0	2.0	100.0	
	Total	51	100.0	100.0		



	Q28_2. Which recommendations did you do AS A RESULT of the follow-up call?						
		Frequency	Percent	Valid Percent	Cumulative Percent		
Valid		49	96.1	96.1	96.1		
	bulbs	1	2.0	2.0	98.0		
	note to self: contact SDG&E re: energy efficient exits	1	2.0	2.0	100.0		
	Total	51	100.0	100.0			

	Q28 3. Which recommendations did you do AS A RESULT of the follow-up call?						
		Valid Percent	Cumulative Percent				
Valid		50	98.0	98.0	98.0		
	note to self: evaluate other new methods to save energy	1	2.0	2.0	100.0		
	Total	51	100.0	100.0			

Q29 A. Please indicate your level of satisfaction regarding the following: The AMOUNT OF TIME it takes to complete the Energy Challenger?								
		Frequency	Percent	Valid Percent	Cumulative Percent			
Valid	Very satisfied	14	27.5	30.4	30.4			
	Somewhat satisfied	19	37.3	41.3	71.7			
	Neither satisfied nor dissatisfied	10	19.6	21.7	93.5			
	Somewhat dissatisfied	1	2.0	2.2	95.7			
	Very dissatisfied	1	2.0	2.2	97.8			
	Dont know	1	2.0	2.2	100.0			
	Total	46	90.2	100.0				
Missing	System	5	9.8					



Q29 A. Please indicate your level of satisfaction regarding the following: The AMOUNT OF TIME it takes to complete the Energy Challenger?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Very satisfied	14	27.5	30.4	30.4
	Somewhat satisfied	19	37.3	41.3	71.7
	Neither satisfied nor dissatisfied	10	19.6	21.7	93.5
	Somewhat dissatisfied	1	2.0	2.2	95.7
	Very dissatisfied	1	2.0	2.2	97.8
	Dont know	1	2.0	2.2	100.0
	Total	46	90.2	100.0	
Missing	System	5	9.8		
Total		51	100.0		

Q29_B. Please indicate your level of satisfaction regarding the following: The Energy Challenger EASE OF USE?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Very satisfied	15	29.4	33.3	33.3
	Somewhat satisfied	20	39.2	44.4	77.8
	Neither satisfied nor dissatisfied	7	13.7	15.6	93.3
	Very dissatisfied	2	3.9	4.4	97.8
	Dont know	1	2.0	2.2	100.0
	Total	45	88.2	100.0	
Missing	System	6	11.8		
Total	Total		100.0		



Q29 C. Please indicate your level of satisfaction regarding the following: The HELPFULNESS of the action plan in increasing your awareness of how to make your business more energy efficient?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Very satisfied	14	27.5	30.4	30.4
	Somewhat satisfied	19	37.3	41.3	71.7
	Neither satisfied nor dissatisfied	10	19.6	21.7	93.5
	Very dissatisfied	2	3.9	4.3	97.8
	Dont know	1	2.0	2.2	100.0
	Total	46	90.2	100.0	
Missing	System	5	9.8		
Total		51	100.0		

Q29 D. Please indicate your level of satisfaction regarding the following: The USEFULNESS of the results that benchmarked your business with similar businesses?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Very satisfied	10	19.6	22.7	22.7
	Somewhat satisfied	17	33.3	38.6	61.4
	Neither satisfied nor dissatisfied	12	23.5	27.3	88.6
	Very dissatisfied	2	3.9	4.5	93.2
	Don't know	3	5.9	6.8	100.0
	Total	44	86.3	100.0	
Missing	System	7	13.7		
Total		51	100.0		



Q29 E. Please indicate your level of satisfaction regarding the following:
The CLARITY of the information provided in the results?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Very satisfied	13	25.5	28.9	28.9
	Somewhat satisfied	16	31.4	35.6	64.4
	Neither satisfied nor dissatisfied	12	23.5	26.7	91.1
	Somewhat dissatisfied	1	2.0	2.2	93.3
	Very dissatisfied	2	3.9	4.4	97.8
	Don't know	1	2.0	2.2	100.0
	Total	45	88.2	100.0	
Missing	System	6	11.8		
Total		51	100.0		

Q29 F. Please indicate your level of satisfaction regarding the following: OVERALL SATISFACTION with the Energy Challenger?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Very satisfied	14	27.5	31.1	31.1
	Somewhat satisfied	18	35.3	40.0	71.1
	Neither satisfied nor dissatisfied	7	13.7	15.6	86.7
	Somewhat dissatisfied	2	3.9	4.4	91.1
	Very dissatisfied	3	5.9	6.7	97.8
	Don't know	1	2.0	2.2	100.0
	Total	45	88.2	100.0	
Missing	System	6	11.8		
Total	Total		100.0		



		Frequency	Percent	Valid Percent	Cumulative Percent
Valid		36	70.6	70.6	70.6
	Don't know.	1	2.0	2.0	72.5
	I believe it's was a well thought out process and is high level enough to encompass a wide variety of businesses.	1	2.0	2.0	74.5
	I SEEMS TO BE MORE FOR LARGER COMPANIES AND STRUCTURES	1	2.0	2.0	76.5
	N/A	1	2.0	2.0	78.4
	None	1	2.0	2.0	80.4
	Not directly related but I wanted to install seventeen programmable T-stats and found, to my amazement, that they were not on the rebate programs offered. In the past, T-stats have prooved their value.	1	2.0	2.0	82.4
	Not many recommendations for change since we were already doing them.	1	2.0	2.0	84.3
	Not sure.	1	2.0	2.0	86.3
	nothing	1	2.0	2.0	88.2
	Nothing	1	2.0	2.0	90.2
	Nothing.	1	2.0	2.0	92.2
	Pay me for the rebate requested	1	2.0	2.0	94.1
	Probably have it presented electronically more than once a year.	1	2.0	2.0	96.1



SDG&E be more efficient	1	2.0	2.0	98.0
we did not feel it accomplished any thing	1	2.0	2.0	100.0
Total	51	100.0	100.0	

	Q31. What business sector does your firm belong to? (Check one)								
		Frequency	Percent	Valid Percent	Cumulative Percent				
Valid	Other (please specify)	7	13.7	15.9	15.9				
	Retail or wholesale	8	15.7	18.2	34.1				
	Manufacturing	17	33.3	38.6	72.7				
	Agricultural/Mining	2	3.9	4.5	77.3				
	Financial Services	2	3.9	4.5	81.8				
	Real Estate	1	2.0	2.3	84.1				
	Transportation	1	2.0	2.3	86.4				
	Marketing and Sales	3	5.9	6.8	93.2				
	Non-Profit	1	2.0	2.3	95.5				
	Research	1	2.0	2.3	97.7				
	Government	1	2.0	2.3	100.0				
	Total	44	86.3	100.0					
Missing	System	7	13.7						
Total		51	100.0						



	Q31 Other Responses. What business sector does your firm belong to? (Check one)						
		Frequency	Percent	Valid Percent	Cumulative Percent		
Valid		44	86.3	86.3	86.3		
	educational software	1	2.0	2.0	88.2		
	Engineering	1	2.0	2.0	90.2		
	Hospitality	1	2.0	2.0	92.2		
	hotel/motel	1	2.0	2.0	94.1		
	hotels	1	2.0	2.0	96.1		
	Motel	1	2.0	2.0	98.0		
ı	services- landscape architecture	1	2.0	2.0	100.0		
	Total	51	100.0	100.0			

Q32. Do you lease or own your facility? (Check one)							
		Frequency	Percent	Valid Percent	Cumulative Percent		
Valid	Lease	26	51.0	61.9	61.9		
	Own	16	31.4	38.1	100.0		
	Total	42	82.4	100.0			
Missing	System	9	17.6				
Total		51	100.0				

Q32 Other Responses. Do you lease or own your facility? (Check one)					
		Frequency	Percent		
Missing	System	51	100.0		



Q33. Wh	Q33. What is the approximate TOTAL square footage of your facility at this location (Check one)							
		Frequency	Percent	Valid Percent	Cumulative Percent			
Valid	Less than 1,500 sq ft	5	9.8	11.4	11.4			
	1,500 - 4,999 sq ft	8	15.7	18.2	29.5			
	5,000 - 9,999 sq ft	6	11.8	13.6	43.2			
	10,000 - 24,999 sq ft	10	19.6	22.7	65.9			
	25,000 - 49,999 sq ft	7	13.7	15.9	81.8			
	50,000 - 74,999 sq ft	4	7.8	9.1	90.9			
	Over 100,000 sq ft	3	5.9	6.8	97.7			
	Dont know	1	2.0	2.3	100.0			
	Total	44	86.3	100.0				
Missing	System	7	13.7					
Total		51	100.0					

	Q34. How many employees do you have at this location? (Check one)								
		Frequency	Percent	Valid Percent	Cumulative Percent				
Valid	1 to 5	11	21.6	25.0	25.0				
6 to 10	6 to 10	7	13.7	15.9	40.9				
	11 to 20	10	19.6	22.7	63.6				
	21 to 50	9	17.6	20.5	84.1				
	51 to 100	3	5.9	6.8	90.9				
	Over 100	4	7.8	9.1	100.0				
	Total	44	86.3	100.0					
Missing	System	7	13.7						
Total		51	100.0						



Descriptive Statistics		
	N	Mean
Q29 A. Please indicate your level of satisfaction regarding the following: The AMOUNT OF TIME it takes to complete the Energy Challenger?	46	2.11
Q29 B. Please indicate your level of satisfaction regarding the following: The Energy Challenger EASE OF USE?	45	2.04
Q29 C. Please indicate your level of satisfaction regarding the following: The HELPFULNESS of the action plan in increasing your awareness of how to make your business more energy efficient?	46	2.13
Q29 D. Please indicate your level of satisfaction regarding the following: The USEFULNESS of the results that benchmarked your business with similar businesses?	44	2.45
Q29 E. Please indicate your level of satisfaction regarding the following: The CLARITY of the information provided in the results?	45	2.24
Q29 F. Please indicate your level of satisfaction regarding the following: OVERALL SATISFACTION with the Energy Challenger?	45	2.22
Valid N (listwise)	44	



16. SDGE 3042: Commercial Laundry Program

Table 16-1 Final Research List

	Final Research List								
Target for Data Collection	Data collection mode	Timing of data collection	Key Research Issues	Sample Size	Number of Data points	From where did you get the sample?			
Program Managers	In-depth interview	August	Determine level of understanding about the program.	3	2	List of program managers provided by SDG&E			
Apartment Managers (participants or NP)	CATI Interview	November	Willingness to Pay (i.e., optimal incentive for washers), penetration of high efficiency front loader washers	1,600 140		Purchased from Dunn & Bradstreet			
Coin Op Laundry Sites (participants or NP)	Onsite Observation	November	Willingness to Pay (i.e., optimal incentive for washers), penetration of high efficiency front loader washers	166	28	Purchased from Dunn & Bradstreet			



16.1 Sample & Methodology

There were two sampling techniques used for this analysis – one for the on-site audits of Laundromats and one for the telephone survey of multifamily sites. The on-site audits used a cluster sampling of sites to enable cost-effective data collection. A population of sites was purchased from Dun & Bradstreet as shown in Table 16-2. Sites were removed which were not coin-operated Laundromats such as coin collecting businesses and dog groomers. The population was supplemented using telephone directories and Laundromats were mapped to make sure that they fell in the SoCalGas and SDG&E service territories. The Census tract and Utility variables were appended to the sample list.

Table 16-2 On-site Audit Laundromat Population

IOU	8-Digit SIC	SIC Description	Dun &	Final
	Code		Bradstreet	N
SDG&E	7215-9903	Laundry coin-operated	108	86
SDG&E	7215-0000	Coin-operated laundries and cleaning	55	35
SDG&E	7215-9901	Dry cleaning coin-operated	5	2
Supplement	Supplemented using telephone directories			
	S	Subtotal SDG&E	168	166
SoCalGas	7215-9903	Laundry coin-operated	527	497
SoCalGas	7215-0000	Coin-operated laundries and cleaning	358	319
SoCalGas	7215-9901	Dry cleaning coin-operated	19	5
SoCalGas	7215-9902	Laundry machine routes coin-operated	4	1
Supplement	ed using teleph	one directories		435
	Sı	ubtotal SoCalGas	908	1,257
	Total Sites	1,076	1,423	

The unit of analysis was a clothes washer, with sampling by site/Laundromat. The sampling was done by Census tracts. There were a total of 253 Census tracts (232 in SoCalGas & 21 in SDG&E) at the 8-digit level. We initially identified a sample of 4 tracts in SDG&E territory to sample (including 31 Laundromats) and 16 tracts in SoCalGas territory (including 124 Laundromats). We estimated that the average Laundromat has 20 washers and then identified every 1600th washer in SoCalGas territory and every 800th washer in SDG&E territory and sampled in that census tract. This resulted in an estimated 3,100 washers (or about 11 percent) being sampled at 155 Laundromats. The sample included as many Laundromats in each census tract as possible.

Data in the field was collected at a census of those sites chosen through the sampling procedure. The onsite data was collected throughout November 2007. After the first round of data collection, the variance in the sample was calculated. The SDG&E service territory did not have sufficient variance to allow for at least a 90 percent certainty in the results. We repeated the sampling strategy described above to identify a sample of 4 more tracts in SDG&E territory to sample (including 35 Laundromats). We went back in the field and collected data for eight more sites. The final error in SDG&E service territory was calculated as 9.09% and 5.47% in SoCalGas territory.



Table 16-3 On-site Audit Completions

IOU	Sample Size	Completes
SDG&E	166	28
SoCalGas	1,257	56
Total	1,423	84

The disposition of the on-site audits is shown in Table 16-4.

Table 16-4 On-site Audit Disposition

Disposition	SoCalGas	SDG&E	Total
Completed	56	28	84
Incomplete Data	1	0	1
Refused Audit	6	3	9
Site did not exist	6	0	6
Site not a Laundromat/ couldn't confirm through calls	45	26	71
Not in Manpower territory	10	0	10
Error target threshold was already met	0	9	9
Total	124	66	190

For the telephone survey, a population of multifamily sites was purchased from Dun & Bradstreet. The telephone survey used random assignment of sites to make the calls to create a probability sample for each service utility. The survey was fielded throughout November 2007.

Table 16-5 Survey Completion Rate

IOU	Sample Size	Planned	Actual
		Completes	Completes
SDG&E	1,600	140	140
SoCalGas	6,279	140	140
Total	7,879	280	280

The data was analyzed using descriptive (mean, frequency) and inferential (t-value, Chi-square) statistics.

16.2 Detailed Findings

The Commercial Laundry program evaluation consisted of two research efforts. These were determined based on reading the program implementation plan and conversations with the program manager about



the information that would be of most benefit. The penetration of commercial clothes washers was desired with a secondary interest in learning about attitudes towards front-loading washers (the only kind now available for rebates). While there was also an interest in figuring out an "optimal" rebate level, it was acknowledged that this could be difficult and may not reflect actions taken even with changed rebates. As such, the evaluation effort was not implementation based, but aimed at providing data that the program felt would enhance their ability to run the program. Data to support the research came from two sources — on-site audits of Laundromats and telephone survey of multi-family sites. Findings from each group are provided next with a summary afterwards.

Multi-family Sites

Of the 280 multi-family sites reached during our telephone survey, 96 percent were apartment complexes, 3 percent were condo or townhouse complexes, and 1 percent was something else. There was an average of 96 living units per site. Forty-one percent of the sites owned their own washers, 55 percent leased them, and 1 percent did both. Four percent did not know if their washers were leased or owned.

Thirty percent of the sites indicated their washers had been replaced in the last year, 23 percent had replacements in the last three years, and 29 percent indicated replacement had occurred longer than three years ago. Eighteen percent did not know when the last time the washers had been replaced. There was no statistical difference between whether the washers were owned or leased and when the self-reported replacement took place.² Of those who leased their machines, 19 percent had been given the option of front loading machines the last time the washers were replaced, 42 percent had not been given that option and 40 percent did not know if they were given the option. There was no statistical difference between whether they were given the option of front loading machines and when they had last replaced their washers.³

Eleven percent of the multi-family sites had heard of this program. Of that 11 percent, 13 percent were actually participants in the program, 25 percent did not know if they would participant and about half appeared unlikely to participate (i.e., 51 percent were somewhat or very unlikely to participate in the next 12 months).

Efficient Clothes Washer Penetration

The two data collection efforts obtained information about clothes washers at a site in different ways. The multi-family sites used a telephone survey. For the telephone survey, we were simply asking about the number of washers total, separating them into large/small, and then top loaders versus front loaders. Due to our skip pattern we then asked about the number of front-loading washers only that were labeled Energy Star. We did not perform any on-site checks on the multi-family site information. It is possible that the number of energy efficient machines is under-represented in our analysis.

The analysis of the clothes washers that could be retrofit in the future meant that these washers needed to be in communal space. There were several sites in which the number of units and the number of washers

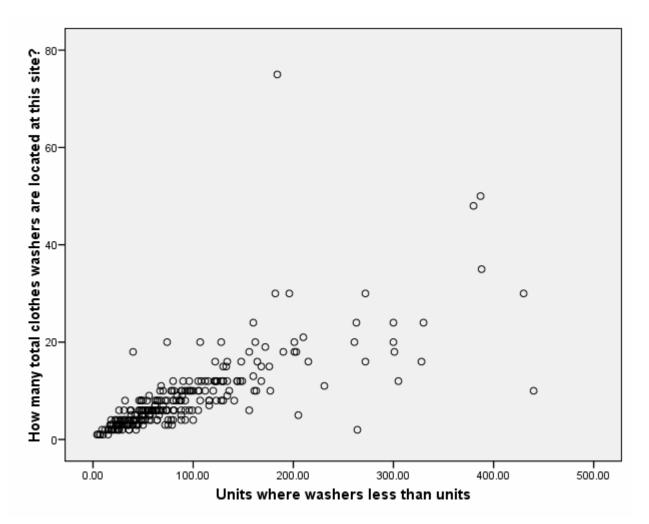
² Chi-square significance of 0.717.

³ Chi-square significance of 0.422.



were identical. These 15 sites were dropped from the washers per site analysis. As seen in Figure 16-1, multi-family sites have about a 1:10 ratio of washers to units.

Figure 16-1 Scatterplot of number of washers versus number of multi-family units



This relationship is shown numerically in Table 16-6 where the average washers per unit is 0.1062.



Table 16-6 Statistics of Sites and Washers Across Service Territory

Descriptive Statistics

	N	Minimum	Maximum	Mean	Std. Deviation
How many living units are located at this site?	280	1	562	96.38	86.343
How many total clothes washers are located at this site?	275	1	256	16.09	35.977
Updated_Washers_ per_unit	256	.01	.45	.1062	.04908
Valid N (listwise)	256				

However, the average number of units and total clothes washers were different by service territory (Table 16-7) while the average values for the updated washers per unit were not.

Table 16-7
Statistics of Sites and Washers by Service Territory

Group Statistics

	COMPI	N	Mean	Std. Deviation	Std. Error Mean
How many living units	SoCalGas	140	85.51	80.209	6.779
are located at this site?	SDG&E	140	107.26	91.061	7.696
How many total clothes washers are located at	SoCalGas SDG&E	137	8.42	13.101	1.119
this site?		138	23.70	47.970	4.083
Updated_Washers_	SoCalGas	133	.1059	.05121	.00444
per_unit	SDG&E	123	.1065	.04689	.00423



Independent Samples Test

Levene's Test for Equality of Variances			t-test for Equality of Means							
							Mean	Std. Error	95% Cor Interva Differ	l of the
		F	Sig.	t	df	Sig. (2-tailed)	Difference	Difference	Lower	Upper
How many living units are located at this site?	Equal variances assumed	2.709	.101	-2.121	278	.035	-21.750	10.256	-41.939	-1.561
	Equal variances not assumed			-2.121	273.641	.035	-21.750	10.256	-41.941	-1.559
How many total clothes washers are located at	Equal variances assumed	35.488	.000	-3.599	273	.000	-15.287	4.247	-23.649	-6.925
this site?	Equal variances not assumed			-3.610	157.465	.000	-15.287	4.234	-23.650	-6.924
Updated_Washers_ per_unit	Equal variances assumed	.255	.614	101	254	.920	00062	.00615	01274	.01149
	Equal variances not assumed			101	253.976	.919	00062	.00613	01269	.01145

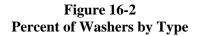
As such, the calculation of total washers in multi-family sites used different averages for number of units, but the same value for washers per unit. The calculation for population of all washers is shown in Table 16-8.

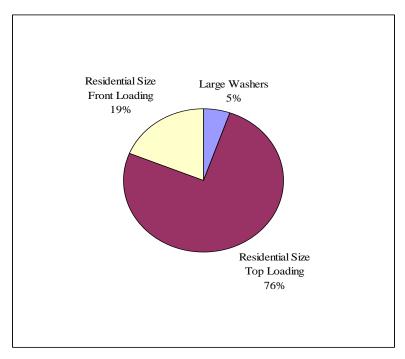
Table 16-8 Number of Washers by Service Territory

Variable	SoCalGas	SDG&E	Source
Number of Sites	6,279	1,600	Population
Average units / site	85.51	107.26	From sample
Average washers / unit	0.1062	0.1062	From sample
Calculated washers per site	9.08	11.39	Calculated
Calculated washers all sites	57,021	18,226	Calculated

To determine the possible washers available for rebates, we queried whether any of the washers were the very large kind found in Laundromats. Sixteen percent of the sites indicated that some of there washers were of this larger type. However, when looking at the total number of different washer sizes and types, the majority were residential sized top loading washers (Figure 16-2).







These percentages were not different by service utility, so the percentages were used for both. Of those who had front loading residential washers, 62 percent were indicated to have an Energy Star label. Therefore, of all the washers possible at a site, 12 percent are considered to be Energy Star (i.e., 62 percent of the 19 percent) and thought to be poor candidates for retrofits through the program. Removing the 5 percent of large washers which are not eligible for retrofits, there is 83 percent of multi-family washers that could be retrofit. The actual numbers by service territory are shown in Table 16-9.

Table 16-9
Possible Number of Washers by Service Territory for Retrofit

Variable	SoCalGas	SDG&E
Calculated washers all sites	57,021	18,226
Number not eligible due to size	(3,076)	(983)
Number not eligible due to Energy Star	(6,659)	(2,128)
Number eligible for Retrofit	47,286	15,114

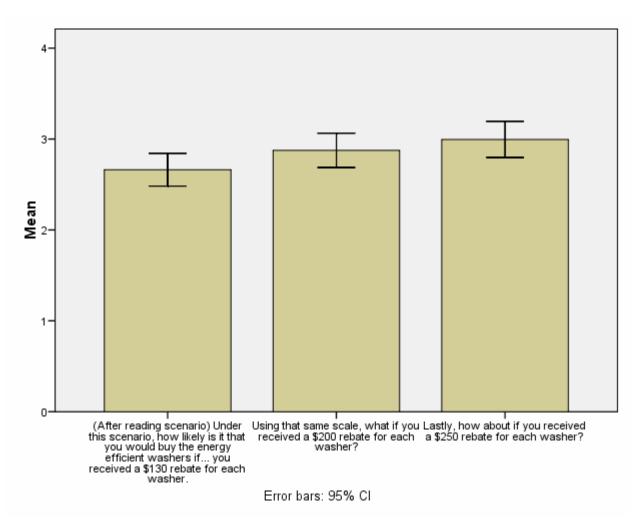
These eligible retrofit values are thought to be on the high side because there is the possibility that some of the top loading washers were Energy Star and less likely to be changed out for a more efficient washers.



Effect of Size of Rebate

The interviewees were provided a short scenario about the number of washers to be purchased and the costs associated with the purchase and operation of the washers and then requested to ask about the likeliness of buying the energy efficient washers with three different rebate levels. These levels were \$130 (the current program level), \$200, and \$250 per installed washer. While the trend was to become more likely as the rebate level went up, there was no statistical different in the responses by rebate level (See Figure 16-3). At least using the three levels here, the rebate value did not make a difference in the purchase decision.

Figure 16-3 Multi-family Likelihood of Purchase with Different Rebate Levels



Key: 1=Very Unlikely, 2=Somewhat Unlikely, 3=Neither Likely nor Unlikely, 4=Somewhat likely, 5=Very Likely



Opinion of Front Loading Washers

There were several attributes about front loading washers that those surveyed were asked to give their opinion. They were asked using a Likert scale from 1 (dislike very much) to 5 (like very much) about:

- Size of the tub
- Size of the tub door
- Maintenance of the washer
- How much water it uses
- How well the mechanical parts hold up
- How well the tub door holds up
- The amount of soap needed by the washer
- The type of soap needed by the washer
- The cycle options of the washer
- The length of wash time
- The fact that there is no agitator

There were no attributes that were significantly different from the others. However, all were somewhat favorable as responses averaged from 3.61 to 3.85 across the attributes.

Of more interest were the 18 open ended responses to aspects about the front loading machines they disliked. About half indicated difficulties with the how one uses the machine. The fact that they tend to be lower made it difficult for people to bend down and use. The inability to open the tub door to add more laundry was a concern. These types of machines were thought to be cumbersome for Seniors and created problems when people (especially Seniors) tried to open the tub door before the cycles were completed. Lastly, one person felt that front loaders did not hold as many clothes, did not wash them as well, and had lint build up. About half indicated that the size of the machine was an issue. The laundry rooms were too small for the units, especially when attempting to open the doors. One person thought that this style of washer leaked and had maintenance problems.

Laundromat Site Statistics

There were two levels of data collection for the Laundromat sites. The counting of washers was performed by trained auditors while much of the information about front-loading attributes or rebate levels were gathered at the site where possible (i.e., there was an attendant who could answer our questions). We left behind the survey for the owner to complete and send back when needed. As expected, though, our completion rate of the survey type questions was low. We obtained washer counts from 84 sites, but survey data from 25 (or 30 percent of our sample). As such, the information for all but the efficient clothes washer penetration should not be considered to be representative of the entire population.

Of those answering our survey, 32 percent had heard of the program and it sounded familiar to another 4 percent. Forty percent had not heard of the program and 24 percent did not know. Of those with



knowledge of the program (i.e., those who indicated Yes or No to the question), forty percent did not know if it was likely that they would participate in the 12 months and 22 percent thought it was very likely. For those who stated they were not likely to participate, the reasons given were:

- I don't have the needed cash (n=1)
- The current machines are relatively new (n=2)
- I wasn't sure it would be worth the extra money (n=2)
- I don't have enough information (n=1)
- *I'm not the owner* (n=1)
- I don't think that the savings would really be there (n=2)

Efficient Clothes Washer Penetration

The on-site data collection for Laundromats was performed by trained auditors who went to the sampled sites and counted washers of various sizes. Energy efficiency was attempted to be determined based on the presence of an Energy Star label on the washers. When it appeared likely that this label was not present on washers that could be considered efficient, we collected a convenience sample of washer make and model numbers to provide a spot check. Of the 19 different make/model number combinations (representing over 125 washers), none were on the CEE qualifying list of washers (i.e., the list that the program uses to determine if the washer can be rebated). The presence of an Energy Star label was most likely a reasonable proxy for an energy efficient machine, but there is the possibility that the number of energy efficient machines is under-represented in our analysis.

Table 16-10 shows that there are about 30,000 washers that wash less than 20 pounds of laundry (item 8 in Table 16-10). Of those, most are top loaders (87 percent, shown in item 10). The number of Energy Star washers seems low (item 9). The auditors stated they had some difficulty in the field verifying which units were considered Energy Star. While we obtained make and model number for some of the units, and those we obtained were not Energy Star, this is a weakness of the data collection effort and the data in item 4 should be viewed as a low value. While not all front loading washers are Energy Star compliant, even using the known number of front loading machines as a proxy for an Energy Star machine indicates that there is a low penetration of Energy Star machines in the Laundromat sector in SoCalGas and SDG&E service territory.⁴

⁴ The average number of Energy Star top loaders and Energy Star front loaders were not used separately as neither met the criteria of having a 95% confidence interval around the mean value that did not include zero.



Table 16-10 Number of Washers In SoCalGas and SDG&E Laundromats

Item	Variable	SoCalGas & SDG&E	Lower Bound*	Upper Bound*	Source of Data
1					Purchased
	Number of Sites	1,423	-	-	Population
2	Average washers / site	44.68	41.19	48.17	From sample
3	Average washers LT20 / site	20.69	18.44	22.94	From sample
4	Average washers All_ES / site	0.561	0.046	1.076	From sample
5	Average washers LT20TL / site	18.04	15.67	20.4	From sample
6	Average washers LT20FL / site	2.65	1.00	4.31	From sample
7	Calculated washers all sites	63,580	58,613	68,546	Calculated
8	Calculated washers LT20 all sites	29,442	26,240	32,644	Calculated
9	Calculated washers LT20ES all sites	798	66	1,530	Calculated
10	Calculated washers LT20TL all sites	25,671	22,298	29,029	Calculated
11	Calculated washers LT20FL all sites	3,771	1,423	6,133	Calculated

LT20 = Less than 20 lb; ES=Energy Star; TL=Top Loader; FL=Front Loader

Effect of Size of Rebate

Within the on-site survey was a short scenario about the number of washers to be purchased and the costs associated with the purchase and operation of the washers and then requested to ask about the likeliness of buying the energy efficient washers with three different rebate levels. These levels were \$130 (the current program level), \$200, and \$250 per installed washer. Figure 16-4 shows the averages obtained from the few respondents when queried about the different rebate levels. There were not sufficient responses to obtain statistical comparisons for the possible effect of the rebate size.

^{*}at a 95% confidence interval around the mean value



How likely to buy EE washers with a \$130 rebate per washer?

How likely to buy EE washers with a \$250 rebate per washer?

Error bars: 95% CI

Figure 16-4 Laundromat - Likelihood of Purchase with Different Rebate Levels

Key: 1=Very Unlikely, 2=Somewhat Unlikely, 3=Neither Likely nor Unlikely, 4=Somewhat likely, 5=Very Likely

Opinion of Front Loading Washers

There were several attributes about front loading washers that those surveyed were asked to give their opinion. They were asked using a Likert scale from 1 (dislike very much) to 5 (like very much) about:

- Size of the tub
- Size of the tub door
- Maintenance of the washer
- How much water it uses



- How well the mechanical parts hold up
- How well the tub door holds up
- The amount of soap needed by the washer
- The type of soap needed by the washer
- The cycle options of the washer
- The length of wash time
- The fact that there is no agitator

There were no attributes that were significantly different from the others. However, all were somewhat favorable as responses averaged from 3.36 to 4.48 across the attributes.

Comparison between Laundromats and Multi-family Sites

Information regarding the opinion of front loading washers was compared between the two sources (Laundromats and Multi-family sites) to determine if there was a difference between the two groups. There were no statistical differences found between the two groups.



Table 16-11 Comparison of Washer Attributes – Laundromat versus Multi-family Sites

Group Statistics

				Std.	Std. Error
	Source TYpe	N	Mean	Deviation	Mean
Like or dislike this attribute: The size of the	Laundromat	23	3.78	1.476	.308
tub?	Multi-family	184	3.61	1.214	.089
Like or dislike this attribute: The size of the tub	Laundromat	25	3.84	1.143	.229
DOOR?	Multi-family	176	3.66	1.018	.077
Like or dislike this attribute: Maintenance of the	Laundromat	24	3.58	1.381	.282
washer?	Multi-family	170	3.63	1.098	.084
Like or dislike this attribute: How much water it	Laundromat	23	3.22	1.506	.314
uses?	Multi-family	149	3.67	1.068	.088
Like or dislike this attribute: How well the	Laundromat	25	3.40	1.555	.311
mechanical parts hold up?	Multi-family	154	3.78	1.056	.085
Like or dislike this attribute: How well the tub	Laundromat	26	3.73	1.373	.269
door holds up?	Multi-family	165	3.84	1.000	.078
Like or dislike this attribute: The amount of	Laundromat	25	4.20	1.155	.231
soap needed by the washer?	Multi-family	159	3.78	.925	.073
Like or dislike this attribute: The type of soap	Laundromat	23	3.70	1.185	.247
needed by the washer?	Multi-family	156	3.73	.904	.072
Like or dislike this attribute: The cycle options	Laundromat	24	4.17	1.239	.253
of the washer?	Multi-family	171	3.85	.994	.076
Like or dislike this attribute: The length of	Laundromat	24	3.96	1.301	.266
wash time?	Multi-family	172	3.83	.970	.074
Like or dislike this attribute: The fact that there	Laundromat	21	3.67	1.238	.270
is no agitator?	Multi-family	154	3.62	1.126	.091



Independent Samples Test

		Levene's	Test for							
		Equality of	Variances			t-test fo	r Equality of M	eans		
							Mean	Std. Error	95% Co Interva Differ	
		F	Sig.	t	df	Sig. (2-tailed)	Difference	Difference	Lower	Upper
Like or dislike this attribute: The size of the tub?	Equal variances assumed Equal variances	1.750	.187	.612	205	.541	.168	.275	374	.711
	not assumed			.526	25.856	.604	.168	.320	490	.827
Like or dislike this attribute: The size of the tub DOOR?	Equal variances assumed Equal variances	.002	.966	.793	199	.429	.175	.221	260	.611
tub DOOR?	not assumed			.727	29.656	.473	.175	.241	317	.668
Like or dislike this attribute: Maintenance of	Equal variances assumed	1.028	.312	186	192	.853	046	.248	534	.442
the washer?	Equal variances not assumed			157	27.260	.877	046	.294	649	.557
Like or dislike this attribute: How much water it uses?	Equal variances assumed	5.060	.026	-1.785	170	.076	454	.254	955	.048
	Equal variances not assumed			-1.392	25.526	.176	454	.326	-1.125	.217
Like or dislike this attribute: How well the	Equal variances assumed	11.787	.001	-1.548	177	.123	379	.245	863	.104
mechanical parts hold up?	Equal variances not assumed			-1.176	27.703	.249	379	.322	-1.040	.281
Like or dislike this attribute: How well the tub	Equal variances assumed	2.616	.107	501	189	.617	112	.223	551	.328
door holds up?	Equal variances not assumed			398	29.321	.693	112	.280	685	.461
Like or dislike this attribute: The amount of	Equal variances assumed	.358	.551	2.037	182	.043	.420	.206	.013	.827
soap needed by the washer?	Equal variances not assumed			1.734	29.047	.094	.420	.242	075	.916
Like or dislike this attribute: The type of soap	Equal variances assumed	1.894	.170	167	177	.868	035	.211	451	.381
needed by the washer?	Equal variances not assumed			136	25.914	.893	035	.257	564	.494
Like or dislike this attribute: The cycle	Equal variances assumed	.694	.406	1.424	193	.156	.319	.224	123	.760
options of the washer?	Equal variances not assumed			1.206	27.312	.238	.319	.264	223	.860
Like or dislike this attribute: The length of	Equal variances assumed	2.364	.126	.600	194	.549	.133	.221	303	.569
wash time?	Equal variances not assumed			.481	26.679	.634	.133	.276	433	.699
Like or dislike this attribute: The fact that	Equal variances assumed	.043	.835	.163	173	.871	.043	.265	480	.567
there is no agitator?	Equal variances not assumed			.152	24.728	.881	.043	.285	544	.631

There also were no statistical differences between the likeliness to participate.⁵ However, there was a statistical difference between those who had heard of the program based on the type of source (Table 16-12). Laundromat sites were more aware of the program than multi-family respondents.

⁵ Chi-square=0.072. To be significant, this value would be less than 0.050.



Table 16-12 Comparison of Program Awareness – Laundromat versus Multi-family Sites

Heard of Program * Source Type Crosstabulation

			Source		
			Laundromat	Multi-family	Total
Heard of	Yes	Count	8	30	38
Program		% within Source TYpe	44.4%	11.0%	13.1%
	No	Count	10	243	253
		% within Source TYpe	55.6%	89.0%	86.9%
Total		Count	18	273	291
		% within Source TYpe	100.0%	100.0%	100.0%

Chi-Square Tests

	Value	df	Asymp. Sig. (2-sided)	Exact Sig. (2-sided)	Exact Sig. (1-sided)
Pearson Chi-Square	16.648 ^b	1	.000		
Continuity Correction ^a	13.831	1	.000		
Likelihood Ratio	11.720	1	.001		
Fisher's Exact Test				.001	.001
Linear-by-Linear Association	16.591	1	.000		
N of Valid Cases	291				

a. Computed only for a 2x2 table

There were no other comparisons made between the two groups.

b. 1 cells (25.0%) have expected count less than 5. The minimum expected count is 2. 35.



16.3 CATI Interview Guide: MF Facility Managers

Date	
Utility	SDG&E and SoCalGas
Program Name	Coin-Op Laundries
Target	MF Facility Managers
Sample Size	~20,000 (minus already called in Res survey)
Quotas (if applicable)	140 in SDG&E and 140 in SoCalGas
Sample File Name	ODC has
Contractor Name	Equipoise Consulting Inc
Primary Contact (person who	Mary Sutter
should be contacted with any	
questionnaire questions)	
Phone	510996499507
Email	Mary@EquipoiseConsulting.com

Hello, my name is ______. Southern California Gas Company <San Diego Gas & Electric Company> is interested in finding out more about clothes washers in multi-family sites. Do you have about 10 minutes to help us figure out how many washers there are and give us your opinion about possible rebates and a certain type of washer?

SCREENER FOR CORRECT SITE TYPE and PERSON:

Does your site have centrally located and probably coin-operated clothes washers for the people living there to use? That is, the complex purchases and maintains the clothes washers, not individuals in each unit.

Yes	
No	2 [T&T]
(Don't Know)	98 [T&T]
(Refused)	99 [T&T]

Are you the person who is responsible for the clothes washers at your site or works with a route operator?

Yes	1 [GO TO BEGINNING]
No	2
(Don't Know)	98
(Refused)	99

Can you direct me to the most appropriate person? [OBTAIN NEW NAME AND PHONE NUMBER OR T&T]

BEGINNING: Just so you know, all your responses will be kept confidential. Our first set of questions are about figuring out how many washers are in multi-family sites.

1. How would you characterize your site? Would you say it is... (READ LIST)



an apartment complex	1
a condo or townhouse complex	2
something else (Specify)	3
(Don't Know)	98
(Refused)	99
2. How many living units are located at this site?	
NUMERIC OPEN END [up to 9,999]	
(Don't Know)	9998
(Refused)	9999
3. How many total clothes washers are located at this site?	
NUMERIC OPEN END [up to 999]	
(Don't Know)	998
· · · · · · · · · · · · · · · · · · ·	
4. Are any of these washers the very large kind that you fir larger than a typical residential size washer. Yes	d in Laundromats? That is, the war
4. Are any of these washers the very large kind that you fir larger than a typical residential size washer. Yes No	d in Laundromats? That is, the wards in Laundromats?
4. Are any of these washers the very large kind that you fir larger than a typical residential size washer. Yes No	d in Laundromats? That is, the ward in Laundromats? That is, the ward
4. Are any of these washers the very large kind that you fir larger than a typical residential size washer. Yes	d in Laundromats? That is, the ward in Laundromats? That is, the ward
4. Are any of these washers the very large kind that you fir larger than a typical residential size washer. Yes No	d in Laundromats? That is, the ward in Laundromats? That is, the ward
4. Are any of these washers the very large kind that you fir larger than a typical residential size washer. Yes	1
4. Are any of these washers the very large kind that you fir larger than a typical residential size washer. Yes	1
4. Are any of these washers the very large kind that you fir larger than a typical residential size washer. Yes	1
4. Are any of these washers the very large kind that you fir larger than a typical residential size washer. Yes	1
4. Are any of these washers the very large kind that you fir larger than a typical residential size washer. Yes	1
4. Are any of these washers the very large kind that you fir larger than a typical residential size washer. Yes	1



7. H	ow many of the residential size washers are front loading?	
	NUMERIC OPEN END [up to 999]	
	(Don't Know)	3
	(Refused)999)

[A check on the total number or percents is needed here. The sum of questions 5, 6 and 7 must equal the number of washers in Q3 or the percents must equal 100%. If these do not, ask q8.]

- 8. Just to do a double check, it seems that you told me that there were [Q3] washers at the site, but when I add up the numbers [percentages] you just gave me, it adds up to [less than / more than] the total. This is a very important part of our research, can we go through these numbers again?
- 9. [SKIP IF Q7=0 OR 0%] I know that this next question may be difficult to answer, but please do the best you can. Just thinking about the <u>front loading residential type</u> washers, how many are labeled Energy Star?

```
NUMERIC OPEN END [up to 999] ______

(Don't Know) ______ 998

(Refused) ______ 999
```

Our next set of questions are attempting to figure out the best rebate value if an energy efficiency program were to offer clothes washers.

I am going to read you a scenario to consider: New energy efficient clothes washers often cost more upfront than less energy efficient washers. However, they also can pay back that additional first cost through reduced utility (energy and water) costs. Let say that...

- Your site can handle 10 washers and you are purchasing 10 new washers.
- The cost of a standard washer is \$500.
- The cost of an energy efficient washer is \$1,000.
- The energy efficient washer is stated to save you at least \$225/year in utility bills.
- The washers last 7 years before needing replacement.

Under this scenario, how likely is it that you would buy the energy efficient washers if...

10. ...you received a \$130 rebate for each washer. Would you say you would be very unlikely, somewhat unlikely, neither likely nor unlikely, somewhat likely, or very likely?

Very Unlikely	1
Somewhat Unlikely	
Neither likely nor unlikely	3
Somewhat Likely	4
Very Likely	5
(Don't Know)	
(Refused)	



11.	Using that	same sca	le, what if y	ou received	a \$200	rebate for	or each	washer?	(Go over	scale	again if
need	ded.)										

Very Unlikely	
Somewhat Unlikely	2
Neither likely nor unlikely	
Somewhat Likely	
Very Likely	5
(Don't Know)	98
(Refused)	99

12. Lastly, how about if you received a \$250 rebate for each washer?

Very Unlikely	
Somewhat Unlikely	
Neither likely nor unlikely	
Somewhat Likely	
Very Likely	5
(Don't Know)	
(Refused)	99

Our next set of questions are about front loading washers only. Many of the new energy efficient washers are front loading washers. We know there are different opinions about this type of washer. I'm going to list a number of different attributes about front-loading washers and I would like you to tell me if you dislike or like that attribute. I am going to ask you to answer in a similar scale as the questions just asked.

13. What do you think about the size of the tub? Do you dislike it very much, dislike it somewhat, neither like nor dislike, like it somewhat, or like it very much?

Dislike very much	1
Dislike somewhat	
Neither like nor dislike	3
Like somewhat	4
Like very much	5
(Don't Know)	98
(Refused)	99



14. I	How about the size of the tub <u>DOOR</u> ? (Go over scale again if needed.)	
	Dislike very much	1
	Dislike somewhat	2
	Neither like nor dislike	3
	Like somewhat	4
	Like very much	5
	(Don't Know)	98
	(Refused)	99
15. N	Maintenance of the washer? (Go over scale again if needed.)	
	Dislike very much	1
	Dislike somewhat	
	Neither like nor dislike	
	Like somewhat	4
	Like very much	5
	(Don't Know)	98
	(Refused)	99
16. I	How much water it uses? (Go over scale again if needed.)	
	Dislike very much	1
	Dislike somewhat	2
	Neither like nor dislike	3
	Like somewhat	4
	Like very much	5
	(Don't Know)	98
	(Refused)	99
17. I	How well the mechanical parts hold up? (Go over scale again if needed.)	
	Dislike very much	1
	Dislike somewhat	
	Neither like nor dislike	
	Like somewhat	
	Like very much	
	(Don't Know)	
	(Refused)	



18. l	How well the tub door holds up? (Go over scale again if needed.)	
	Dislike very much	1
	Dislike somewhat	2
	Neither like nor dislike	3
	Like somewhat	4
	Like very much	5
	(Don't Know)	98
	(Refused)	99
19. 7	The amount of soap needed by the washer? (Go over scale again if needed.)	
	Dislike very much	1
	Dislike somewhat	
	Neither like nor dislike	
	Like somewhat	
	Like very much	
	(Don't Know)	
	(Refused)	
20.5	The type of soap needed by the washer? (Go over scale again if needed.)	
20.		1
	Dislike very much	
	Dislike somewhat	
	Neither like nor dislike	
	Like somewhat	
	Like very much	
	(Don't Know)	
	(Refused)	99
21. 7	The cycle options of the washer? (Go over scale again if needed.)	
	Dislike very much	1
	Dislike somewhat	2
	Neither like nor dislike	3
	Like somewhat	4
	Like very much	5
	(Don't Know)	
	(Refused)	99



22. T	he length of wash time? (Go over scale again if needed.)	
	Dislike very much	
	Dislike somewhat	2
	Neither like nor dislike	3
	Like somewhat	4
	Like very much	5
	(Don't Know)	98
	(Refused)	99
23. T	The fact that there is no agitator? (Go over scale again if needed.))
	Dislike very much	1
	Dislike somewhat	2
	Neither like nor dislike	3
	Like somewhat	4
	Like very much	5
	(Don't Know)	98
	(Refused)	99
24. Is	s there anything about front-loading washers that you find do no	•
	No	2 [SKIP TO 25]
	(Don't Know)	98 [SKIP TO 25]
	(Refused)	99 [SKIP TO 25]
24a. '	What are those?	
	OPEN END	
	(Don't Know)	98
	(Refused)	99
25. N	My next couple questions are about your washers. Do you own o	
	Lease	
	(Don't Know)	98
	(Refused)	99



earlier than that? Last year	last year, within the last three years, o	1
Last three years		
Before three years ago		
(Don't Know)		
(Refused)		
27. [SKIP if Q25=1] The last time machines were replaced on y give you the option of front loading machines? Yes		y
No		
(Don't Know)		
(Refused)		
No	2 [SKIP TO END]	
No	2 [SKIP TO END]	
(Don't Know)	98	
(Don't Know)(Refused)		
(Refused)	thin the next 12 months? Do you think ity likely?	
(Refused)	thin the next 12 months? Do you think it y likely?	
(Refused)	thin the next 12 months? Do you think it y likely?	
(Refused)	thin the next 12 months? Do you think it y likely?	
(Refused)	thin the next 12 months? Do you think it y likely?	
(Refused)	thin the next 12 months? Do you think it y likely?	
(Refused)	thin the next 12 months? Do you think it y likely?	
(Refused)		
(Refused)		



[ASK IF Q29=1,2]	
30. Why do you think it is unlikely that you would not participate?	
(I don't have the needed cash.)	1
(The current machines are relatively new.)	2
(I wasn't sure it would be worth the extra money.)	3
(I don't think that the savings would really be there.)	4
(We don't buy our machines.)	5
(I don't like front loading machines.)	
(Other, Specify)	
(Don't Know)	
(Refused)	

END: Those are all my questions. Thank you so much for your time!



16.4 Frequency Tables: MF Survey

Q1 How would you characterize your site? Would you say it is...

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	something else	2	.7	.7	.7
	an apartment complex	269	96.1	96.1	96.8
	a condo or townhouse complex	8	2.9	2.9	99.6
	(Don't know)	1	.4	.4	100.0
	Total	280	100.0	100.0	

Q2 How many living units are located at this site?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1	2	.7	.7	.7
	4	2	.7	.7	1.4
	5	1	.4	.4	1.8
	7	2	.7	.7	2.5
	9	1	.4	.4	2.9
	10	2	.7	.7	3.6
	12	1	.4	.4	3.9
	15	3	1.1	1.1	5.0
	16	2	.7	.7	5.7
	17	1	.4	.4	6.1
	18	5	1.8	1.8	7.9
	19	1	.4	.4	8.2
	20	2	.7	.7	8.9
	22	2	.7	.7	9.6
	23	3	1.1	1.1	10.7
	24	3	1.1	1.1	11.8
	25	3	1.1	1.1	12.9
	26	5	1.8	1.8	14.6
	27	2	.7	.7	15.4
	28	2	.7	.7	16.1
	29	2	.7	.7	16.8
	30	1	.4	.4	17.1
	31	3	1.1	1.1	18.2
	32	3	1.1	1.1	19.3
	34	1	.4	.4	19.6
	35	3	1.1	1.1	20.7



	Frequency	Percent	Valid Percent	Cumulative Percent
36	4	1.4	1.4	22.1
37	1	.4	.4	22.5
38	2	.7	.7	23.2
39	1	.4	.4	23.6
40	5	1.8	1.8	25.4
42	2	.7	.7	26.1
43	3	1.1	1.1	27.1
44	3	1.1	1.1	28.2
45	1	.4	.4	28.6
46	3	1.1	1.1	29.6
47	1	.4	.4	30.0
48	8	2.9	2.9	32.9
49	2	.7	.7	33.6
50	8	2.9	2.9	36.4
52	5	1.8	1.8	38.2
54	1	.4	.4	38.6
55	2	.7	.7	39.3
56	5	1.8	1.8	41.1
57	1	.4	.4	41.4
58	1	.4	.4	41.8
59	2	.7	.7	42.5
60	2	.7	.7	43.2
62	3	1.1	1.1	44.3
63	1	.4	.4	44.6
64	6	2.1	2.1	46.8
66	3	1.1	1.1	47.9
67	1	.4	.4	48.2
68	3	1.1	1.1	49.3
70	3	1.1	1.1	50.4
72	2	.7	.7	51.1
73	2	.7	.7	51.8
74	4	1.4	1.4	53.2
75	2	.7	.7	53.9
78	2	.7	.7	54.6
79	2	.7	.7	55.4
80	5	1.8	1.8	57.1
81	2	.7	.7	57.9
82	1	.4	.4	58.2
83	1	.4	.4	58.6
84	1	.4	.4	58.9
86	1	.4	.4	59.3
87	1	.4	.4	59.6



	Frequency	Percent	Valid Percent	Cumulative Percent
88	5	1.8	1.8	61.4
89	2	.7	.7	62.1
90	1	.4	.4	62.5
92	4	1.4	1.4	63.9
94	1	.4	.4	64.3
96	3	1.1	1.1	65.4
97	2	.7	.7	66.1
98	1	.4	.4	66.4
99	1	.4	.4	66.8
100	2	.7	.7	67.5
105	3	1.1	1.1	68.6
106	1	.4	.4	68.9
107	2	.7	.7	69.6
108	1	.4	.4	70.0
112	2	.7	.7	70.7
114	1	.4	.4	71.1
115	1	.4	.4	71.4
116	3	1.1	1.1	72.5
120	1	.4	.4	72.9
121	1	.4	.4	73.2
122	2	.7	.7	73.9
123	2	.7	.7	74.6
124	1	.4	.4	75.0
128	3	1.1	1.1	76.1
130	4	1.4	1.4	77.5
133	1	.4	.4	77.9
134	3	1.1	1.1	78.9
136	1	.4	.4	79.3
141	1	.4	.4	79.6
144	2	.7	.7	80.4
147	1	.4	.4	80.7
148	2	.7	.7	81.4
149	1	.4	.4	81.8
150	1	.4	.4	82.1
156	2	.7	.7	82.9
160	2	.7	.7	83.6
161	2	.7	.7	84.3
162	1	.4	.4	84.6
163	1	.4	.4	85.0
164	1	.4	.4	85.4
168	2	.7	.7	86.1
169	1	.4	.4	86.4



				Cumulative
	Frequency	Percent	Valid Percent	Percent
172	1	.4	.4	86.8
176	1	.4	.4	87.1
177	1	.4	.4	87.5
180	1	.4	.4	87.9
182	1	.4	.4	88.2
184	1	.4	.4	88.6
190	1	.4	.4	88.9
196	1	.4	.4	89.3
200	1	.4	.4	89.6
201	3	1.1	1.1	90.7
203	1	.4	.4	91.1
205	1	.4	.4	91.4
210	1	.4	.4	91.8
215	1	.4	.4	92.1
216	1	.4	.4	92.5
229	1	.4	.4	92.9
231	1	.4	.4	93.2
256	1	.4	.4	93.6
261	1	.4	.4	93.9
263	1	.4	.4	94.3
264	1	.4	.4	94.6
272	2	.7	.7	95.4
300	2	.7	.7	96.1
301	1	.4	.4	96.4
305	1	.4	.4	96.8
328	1	.4	.4	97.1
330	1	.4	.4	97.5
380	1	.4	.4	97.9
387	1	.4	.4	98.2
388	1	.4	.4	98.6
430	1	.4	.4	98.9
440	1	.4	.4	99.3
452	1	.4	.4	99.6
562	1	.4	.4	100.0
Total	280	100.0	100.0	

Q3 How many total clothes washers are located at this site?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1	8	2.9	2.9	2.9
	2	18	6.4	6.5	9.5



		Frequency	Percent	Valid Percent	Cumulative Percent
	3	27	9.6	9.8	19.3
	4	35	12.5	12.7	32.0
	5	12	4.3	4.4	36.4
	6	39	13.9	14.2	50.5
	7	4	1.4	1.5	52.0
	8	28	10.0	10.2	62.2
	9	4	1.4	1.5	63.6
	10	22	7.9	8.0	71.6
	11	2	.7	.7	72.4
	12	21	7.5	7.6	80.0
	13	1	.4	.4	80.4
	15	5	1.8	1.8	82.2
	16	8	2.9	2.9	85.1
	18	6	2.1	2.2	87.3
	19	1	.4	.4	87.6
	20	7	2.5	2.5	90.2
	21	1	.4	.4	90.5
	24	4	1.4	1.5	92.0
	29	1	.4	.4	92.4
	30	4	1.4	1.5	93.8
	35	1	.4	.4	94.2
	47	1	.4	.4	94.5
	48	1	.4	.4	94.9
	50	1	.4	.4	95.3
	75	1	.4	.4	95.6
	82	1	.4	.4	96.0
	114	1	.4	.4	96.4
	148	1	.4	.4	96.7
	150	1	.4	.4	97.1
	161	1	.4	.4	97.5
	169	1	.4	.4	97.8
	173	1	.4	.4	98.2
	180	1	.4	.4	98.5
	201	1	.4	.4	98.9
	216	1	.4	.4	99.3
	229	1	.4	.4	99.6
	256	1	.4	.4	100.0
]	Total	275	98.2	100.0	
Missing	(Don't know)	4	1.4		
	(Refused)	1	.4		
T-4-1	Total	5	1.8		
Total		280	100.0		



Q4 Are any of these washers the very large kind that you find in Laundromats?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	44	15.7	15.7	15.7
	No	233	83.2	83.2	98.9
	(Don't know)	3	1.1	1.1	100.0
	Total	280	100.0	100.0	

Q5 How many of your washers are these very large kind?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	10	3.6	22.7	22.7
	1	4	1.4	9.1	31.8
	2	3	1.1	6.8	38.6
	3	5	1.8	11.4	50.0
	4	3	1.1	6.8	56.8
	6	4	1.4	9.1	65.9
	8	7	2.5	15.9	81.8
	10	2	.7	4.5	86.4
	11	1	.4	2.3	88.6
	12	2	.7	4.5	93.2
	15	1	.4	2.3	95.5
	20	1	.4	2.3	97.7
	30	1	.4	2.3	100.0
	Total	44	15.7	100.0	
Missing	(Don't know)	8	2.9		
	System	228	81.4		
	Total	236	84.3		
Total		280	100.0		

Q6 How many of the residential size washers are top loading?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	63	22.5	23.1	23.1
	1	9	3.2	3.3	26.4
	2	19	6.8	7.0	33.3
	3	23	8.2	8.4	41.8
	4	25	8.9	9.2	50.9
	5	9	3.2	3.3	54.2
	6	33	11.8	12.1	66.3
	7	3	1.1	1.1	67.4



	Frequency	Percent	Valid Percent	Cumulative Percent
8	20	7.1	7.3	74.7
9	3	1.1	1.1	75.8
10	11	3.9	4.0	79.9
11	2	.7	.7	80.6
12	13	4.6	4.8	85.3
13	1	.4	.4	85.7
15	3	1.1	1.1	86.8
16	8	2.9	2.9	89.7
18	3	1.1	1.1	90.8
19	2	.7	.7	91.6
20	3	1.1	1.1	92.7
21	1	.4	.4	93.0
24	3	1.1	1.1	94.1
30	2	.7	.7	94.9
35	1	.4	.4	95.2
47	1	.4	.4	95.6
48	1	.4	.4	96.0
75	1	.4	.4	96.3
82	1	.4	.4	96.7
114	1	.4	.4	97.1
148	1	.4	.4	97.4
150	1	.4	.4	97.8
161	1	.4	.4	98.2
169	1	.4	.4	98.5
173	1	.4	.4	98.9
201	1	.4	.4	99.3
216	1	.4	.4	99.6
256	1	.4	.4	100.0
Total	273	97.5	100.0	
Missing (Don't kno	w) 7	2.5		
Total	280	100.0		

Q7 How many of the residential size washers are front loading?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	221	78.9	80.4	80.4
	1	9	3.2	3.3	83.6
	2	5	1.8	1.8	85.5
	3	7	2.5	2.5	88.0
	4	4	1.4	1.5	89.5
	5	2	.7	.7	90.2



		Frequency	Percent	Valid Percent	Cumulative Percent
	6	3	1.1	1.1	91.3
	8	3	1.1	1.1	92.4
	9	1	.4	.4	92.7
	10	4	1.4	1.5	94.2
	12	5	1.8	1.8	96.0
	15	1	.4	.4	96.4
	16	1	.4	.4	96.7
	18	3	1.1	1.1	97.8
	20	1	.4	.4	98.2
	24	1	.4	.4	98.5
	30	1	.4	.4	98.9
	50	1	.4	.4	99.3
	180	1	.4	.4	99.6
	229	1	.4	.4	100.0
	Total	275	98.2	100.0	
Missing	(Don't know)	5	1.8		
Total		280	100.0		

Q9 Thinking about the front loading residential type washers, how many are labeled Energy Star?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	4	1.4	12.1	12.1
	1	3	1.1	9.1	21.2
	2	3	1.1	9.1	30.3
	3	5	1.8	15.2	45.5
	4	1	.4	3.0	48.5
	5				
	6	1	.4	3.0	51.5
	8	1	.4	3.0	54.5
		2	.7	6.1	60.6
	9	1	.4	3.0	63.6
	10	2	.7	6.1	69.7
	12	2	.7	6.1	75.8
	16	1	.4	3.0	78.8
	18	2	.7	6.1	84.8
	20	1	.4	3.0	87.9
	24	1	.4	3.0	90.9
	30	1	.4	3.0	93.9
	50	1	.4	3.0	97.0
	229	1	.4	3.0	100.0
	Total	33	11.8	100.0	
Missing	(Don't know)	25	8.9		



		Frequency	Percent	Valid Percent	Cumulative Percent
	(Refused)	1	.4		
	System	221	78.9		
	Total	247	88.2		
Total		280	100.0		

Q10 (After reading scenario) Under this scenario, how likely is it that you would buy the energy efficient washers if... you received a \$130 rebate for each washer.

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Very Unlikely	67	23.9	30.6	30.6
	Somewhat Unlikely	27	9.6	12.3	42.9
	Neither likely nor unlikely	62	22.1	28.3	71.2
	Somewhat Likely	42	15.0	19.2	90.4
	Very Likely	21	7.5	9.6	100.0
	Total	219	78.2	100.0	
Missing	(Don't know)	61	21.8		
Total		280	100.0		

Q11 Using that same scale, what if you received a \$200 rebate for each washer?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Very Unlikely	56	20.0	25.3	25.3
	Somewhat Unlikely	27	9.6	12.2	37.6
	Neither likely nor unlikely	55	19.6	24.9	62.4
	Somewhat Likely	51	18.2	23.1	85.5
	Very Likely	32	11.4	14.5	100.0
	Total	221	78.9	100.0	
Missing	(Don't know)	59	21.1		
Total		280	100.0		

Q12 Lastly, how about if you received a \$250 rebate for each washer?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Very Unlikely	56	20.0	25.3	25.3
	Somewhat Unlikely	21	7.5	9.5	34.8
	Neither likely nor unlikely	57	20.4	25.8	60.6
	Somewhat Likely	38	13.6	17.2	77.8
	Very Likely	49	17.5	22.2	100.0
	Total	221	78.9	100.0	



	Frequency	Percent	Valid Percent	Cumulative Percent
Missing (Don't know)	59	21.1		
Total	280	100.0		

Q13 Like or dislike this attribute: The size of the tub?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Dislike very much	12	4.3	6.5	6.5
	Dislike somewhat	24	8.6	13.0	19.6
	Neither like nor dislike	40	14.3	21.7	41.3
	Like somewhat	55	19.6	29.9	71.2
	Like very much	53	18.9	28.8	100.0
	Total	184	65.7	100.0	
Missing	(Don't know)	96	34.3		
Total		280	100.0		

Q14 Like or dislike this attribute: The size of the tub DOOR?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Dislike very much	6	2.1	3.4	3.4
	Dislike somewhat	14	5.0	8.0	11.4
	Neither like nor dislike	52	18.6	29.5	40.9
	Like somewhat	65	23.2	36.9	77.8
	Like very much	39	13.9	22.2	100.0
	Total	176	62.9	100.0	
Missing	(Don't know)	103	36.8		
	(Refused)	1	.4		
	Total	104	37.1		
Total		280	100.0		

Q15 Like or dislike this attribute: Maintenance of the washer?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Dislike very much	8	2.9	4.7	4.7
	Dislike somewhat	17	6.1	10.0	14.7
	Neither like nor dislike	46	16.4	27.1	41.8
	Like somewhat	58	20.7	34.1	75.9
	Like very much	41	14.6	24.1	100.0
	Total	170	60.7	100.0	
Missing	(Don't know)	110	39.3		

16-36



	Frequency	Percent	Valid Percent	Cumulative Percent
Total	280	100.0		

Q16 Like or dislike this attribute: How much water it uses?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Dislike very much	8	2.9	5.4	5.4
	Dislike somewhat	7	2.5	4.7	10.1
	Neither like nor dislike	48	17.1	32.2	42.3
	Like somewhat	49	17.5	32.9	75.2
	Like very much	37	13.2	24.8	100.0
	Total	149	53.2	100.0	
Missing	(Don't know)	130	46.4		
	(Refused)	1	.4		
	Total	131	46.8		
Total		280	100.0		

Q17 Like or dislike this attribute: How well the mechanical parts hold up?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Dislike very much	6	2.1	3.9	3.9
	Dislike somewhat	8	2.9	5.2	9.1
	Neither like nor dislike	46	16.4	29.9	39.0
	Like somewhat	48	17.1	31.2	70.1
	Like very much	46	16.4	29.9	100.0
	Total	154	55.0	100.0	
Missing	(Don't know)	125	44.6		
	(Refused)	1	.4		
	Total	126	45.0		
Total		280	100.0		

Q18 Like or dislike this attribute: How well the tub door holds up?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Dislike very much	5	1.8	3.0	3.0
	Dislike somewhat	9	3.2	5.5	8.5
	Neither like nor dislike	40	14.3	24.2	32.7
	Like somewhat	64	22.9	38.8	71.5
	Like very much	47	16.8	28.5	100.0
	Total	165	58.9	100.0	



		Frequency	Percent	Valid Percent	Cumulative Percent
Missing	(Don't know)	114	40.7		
	(Refused)	1	.4		
	Total	115	41.1		
Total		280	100.0		

Q19 Like or dislike this attribute: The amount of soap needed by the washer?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Dislike very much	3	1.1	1.9	1.9
	Dislike somewhat	6	2.1	3.8	5.7
	Neither like nor dislike	53	18.9	33.3	39.0
	Like somewhat	58	20.7	36.5	75.5
	Like very much	39	13.9	24.5	100.0
	Total	159	56.8	100.0	
Missing	(Don't know)	120	42.9		
	(Refused)	1	.4		
	Total	121	43.2		
Total		280	100.0		

Q20 Like or dislike this attribute: The type of soap needed by the washer?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Dislike very much	2	.7	1.3	1.3
	Dislike somewhat	5	1.8	3.2	4.5
	Neither like nor dislike	63	22.5	40.4	44.9
	Like somewhat	49	17.5	31.4	76.3
	Like very much	37	13.2	23.7	100.0
	Total	156	55.7	100.0	
Missing	(Don't know)	124	44.3		
Total		280	100.0		

Q21 Like or dislike this attribute: The cycle options of the washer?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Dislike very much	4	1.4	2.3	2.3
	Dislike somewhat	11	3.9	6.4	8.8
	Neither like nor dislike	42	15.0	24.6	33.3
	Like somewhat	64	22.9	37.4	70.8
	Like very much	50	17.9	29.2	100.0



		Frequency	Percent	Valid Percent	Cumulative Percent
	Total	171	61.1	100.0	
Missing	(Don't know)	108	38.6		
	(Refused)	1	.4		
	Total	109	38.9		
Total		280	100.0		

Q22 Like or dislike this attribute: The length of wash time?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Dislike very much	4	1.4	2.3	2.3
	Dislike somewhat	10	3.6	5.8	8.1
	Neither like nor dislike	44	15.7	25.6	33.7
	Like somewhat	68	24.3	39.5	73.3
	Like very much	46	16.4	26.7	100.0
	Total	172	61.4	100.0	
Missing	(Don't know)	108	38.6		
Total		280	100.0		

Q23 Like or dislike this attribute: The fact that there is no agitator?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Dislike very much	8	2.9	5.2	5.2
	Dislike somewhat	12	4.3	7.8	13.0
	Neither like nor dislike	53	18.9	34.4	47.4
	Like somewhat	38	13.6	24.7	72.1
	Like very much	43	15.4	27.9	100.0
	Total	154	55.0	100.0	
Missing	(Don't know)	126	45.0		
Total		280	100.0		

Q24 Is there anything about front-loading washers that you find do not work in your situation?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	20	7.1	9.3	9.3
	No	194	69.3	90.7	100.0
	Total	214	76.4	100.0	
Missing	(Don't know)	66	23.6		
Total		280	100.0		



Q24A What are those? (Mult. Resp.)

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	17	6.1	100.0	100.0
Missing	(Don't know)	3	1.1		
	System	260	92.9		
	Total	263	93.9		
Total		280	100.0		

Q25 Do you own or lease your washers?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Own	114	40.7	42.2	42.2
	Lease	153	54.6	56.7	98.9
	Both	3	1.1	1.1	100.0
	Total	270	96.4	100.0	
Missing	(Don't know)	10	3.6		
Total		280	100.0		

Q26 Was the last time that the washers were replaced within the last year, within the last three years, or earlier than that?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Last year	85	30.4	37.1	37.1
	Last three years	64	22.9	27.9	65.1
	Before three years ago	80	28.6	34.9	100.0
	Total	229	81.8	100.0	
Missing	(Don't know)	51	18.2		
Total		280	100.0		

Q27 The last time machines were replaced on your property, did your leasing company give you the option of front loading machines?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	31	11.1	31.0	31.0
	No	69	24.6	69.0	100.0
	Total	100	35.7	100.0	
Missing	(Don't know)	66	23.6		
	System	114	40.7		
	Total	180	64.3		



Total	280	100.0		

Q28 (Southern California Gas Compnay/San Diego Gas & Electric Company) has an energy efficiency program that provides a rebate when you purchase new efficient clothes washers. It is called the Commercial Laundry Program. Have you heard of this program?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	30	10.7	11.0	11.0
	No	243	86.8	89.0	100.0
	Total	273	97.5	100.0	
Missing	(Don't know)	7	2.5		
Total		280	100.0		

Q29 How likely is it that you would participate in this program within the next 12 months?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Very Unlikely	13	4.6	48.1	48.1
	Somewhat Unlikely	6	2.1	22.2	70.4
	Somewhat Likely	1	.4	3.7	74.1
	Very Likely	2	.7	7.4	81.5
	I am a participant	5	1.8	18.5	100.0
	Total	27	9.6	100.0	
Missing	(Don't know)	9	3.2		
	(Refused)	1	.4		
	System	243	86.8		
	Total	253	90.4		
Total		280	100.0		

Q30 \$Why_Not Frequencies

		Resp	onses	Percent of Cases
		N	Percent	N
\$Why_Not(a)	(I don't have the needed cash)	2	14.3%	14.3%
	(The current machines are relatively new)	8	57.1%	57.1%
	(We don't buy our machines)	4	28.6%	28.6%
Total		14	100.0%	100.0%

a Group



16.5 Training Manual for On-site Audits of Laundromats

SDG&E and SoCalGas Service Territory October 15, 2007

This is the training manual put together to help create a systematic data collection effort in the SDG&E and SoCalGas service territory. Data are collected to facilitate four different analysis tasks:

- 1. Determine the number of washers that an energy efficiency program could still change out by seeing the current type of washers in place in Laundromats.
- 2. Figure out how owners of the Laundromats view incentives in helping make a decision to replace their washers.
- 3. Get the opinion of owners or those working at the Laundromat of front loading washers.
- 4. Get some idea of the likelihood of the site participating in the program in the future.

Introductory Information

When you enter the site, try to figure out if there is an attendant. That person may be behind a counter or simply in the Laundromat. If there is someone there, introduce yourself with a statement such as:

"Hi my name is ______. I am performing research for San Diego Gas and Electric (SoCalGas). Your Laundromat was randomly chosen as one for me to count washers and ask you to answer a couple questions. Are you the owner or an employee?"

[If they are the <u>owner</u>, ask them] "Can you please fill answer the questions on these three sheets of paper [hand them all the survey questions] while I count washers? I'll need to take them with me when I leave."

[If they are an <u>employee</u>, ask them] "Can you please fill answer the questions on the first two sheets of paper [hand them the survey questions] while I count washers? You don't need to worry about the last page. I'll need to take them with me when I leave. Also, we would like the owner to answer these same questions as well as the questions on the last page. I have the survey and a self-addressed envelope that I would like to leave with you to give to the owner. Is that possible?"

The person may be concerned about the information you are gathering. You can show them any part of the data collection instrument that you are being asked to fill out. You can let them know the four different analysis tasks that we are going to do using the data you collect. You can also state:

"Any of the information I gather will be confidential, that is, the utility will not know where I collected any data."

If there is no attendant or owner, fill out parts 1 and 2 of the audit and return it. If the attendant or owner becomes insistent that you not count machines, please make a note of that on the survey and return it. We will keep track of that type of information for the write up of our analysis.



When you complete your counts, make sure you collect up any surveys from the attendant/owner and tell them thank you for their time. If they haven't filled the survey out completely when you are ready to leave, wait for it.

The onsite audit contains five sections. The things to be aware of during the audits by section are:

Part 1 – General Site Information

ODC has provided the general site information that should be included here. Make sure you put the date of the audit, your initials, and the ODC Site Number on each page of the audit. The ODC site number is key to have on each page so we can put together the pages if they get separated.

Part 2 – Clothes Washer Details

This part is very important to collect correctly. This is the suggested way to collect the data. When you go into the Laundromat, begin counting on either your left or your right and move the other direction as you count. Count all washers in the place. Dryers are NOT included in any counts. Place that number on the "Total" line. Count twice to make sure you didn't miss any the first time. I have found that simple tally marks can help. You can use the sides of the pages if needed to make any marks needed to keep track of the numbers as you count.

Now you need to separate out the total washers into two groups – those that are bigger than a typical residential washer and those that are not. The energy efficiency programs do not provide incentives for anything that holds more than 20 pounds of clothes at a single time. There is nothing on the washers that tell you how much they hold, so you will have to see what the washers look like and make a choice. There are very large washers that can hold rugs, comforters, and the like that are obviously in the greater than 20 pound category (>20). Generally any washer that is taller than average, or doesn't look like something you would have in a house will hold greater than 20 pounds of clothing (See Figure 16-5). In Figure 16-6, you see two different types of washers. The white washers on the left of the picture are 20 pound or less washers while the silver washers on the right are washers that are greater than 20 pounds.

Figure 16-5 Heavy Duty washer (> 20 pounds)



(Picture from www.allaundromats.com)



Figure 16-6
Two different types of washers



(Picture from www.allaundromats.com)

Another way to divide washers is as follows. Top loading machines typically hold 15-18 pounds of clothing (Figure 16-7) and are counted in the less than or equal to 20 pound group (<=20).

Figure 16-7
Single load machine (<=20 pounds clothing)



(Picture from www.libertylaundryok.com/Machines.htm)

"Double-load" machines hold more than 20 pounds of clothing (Figure 16-8) and are counted in the greater than 20 pound group.



Figure 16-8
Double-load machines (>20 pounds clothing)



(Picture from www.libertylaundryok.com/Machines.htm)

"Triple load" machines also hold greater than 20 pounds of laundry (Figure 16-9).

Figure 16-9
Large machine (>20 pounds clothing)



(Picture from www.libertylaundryok.com/Machines.htm)

You can see the difference between a double-load and triple-load machine in Figure 16-9. However, it doesn't matter whether it is a double or triple load machine for you as they both go into the greater than 20 pound counts.

Once you have determined how many of the total machines are less than or equal to 20 pounds (LT20) or greater than 20 pounds (GT20), you should add those two numbers to double-check yourself. They should add to the total number of washes in the site (Total).

Next, you need to provide the count of the top loaders (LT20TL=less than 20 pounds top loader) and front loaders (LT20FL=less than 20 pounds front loading) that are <=20 pounds. Double check your numbers



as the sum of these two numbers should match the number you provided earlier (LT20 – washers that are less than to 20 pounds).

The last part of this is to figure out which washers could possibly be replaced for a more energy efficient washer. The program has no rebates for anything over 20 pounds, so now you are looking only at those washers included in your less than 20 pound washer counts (<=20). If a washer has an "Energy Star" logo (Figure 16-10 or Figure 16-11), then it is included in your count of washers that could be replaced (LT20FLES or LT20TLES).

Figure 16-10 Typical Energy Star Label



Figure 16-11 Typical Energy Star Label



This part can be somewhat tricky as not all washers have an Energy Star logo readily apparent. Sometimes you need to open up that door and look at the door area. Obviously, some washers will be in use, but if all washers look to be the same type, you can look at one that isn't being used and make generalizations about any others that are the same type. You need to provide counts for both top loading washers and front loading washers (that are less than or equal to 20 pounds) with Energy Star labels. If there are no Energy Star washers, put a zero (0) in those spots so we know that it is really zero and not just a forgotten line.

Part 3 – Opinion on Front Loading Washers

This section can be answered by any attendant at the site – it does not have to be the owner (although it could be). Please ask the person to fill out the survey while you do your counts. You do not need to read it to them, but you do need to take it with you when you leave. Please check that at least one and only one mark is made for each of questions A1 through A11 and that you can read any comments they put in A12.

Part 4 – Program Questions

This section can be answered by any attendant at the site – it does not have to be the owner (although it could be). Please ask the person to fill out the survey while you do your counts. You do not need to read it to them, but you do need to take it with you when you leave. Please check that they have answered P3 if they chose the first or second choice for P2. Also, if they wrote something under P3, make sure you can read their writing. Ask for clarification if needed.



Part 5 – New Washers

Completing this section during your audit should only happen if the owner is present. If the owner is not present, but there is an attendant, please leave the hardcopy of the questions and an envelope at the site for the owner to get from the attendant. If there is no attendant, then this will be noted in Part 1 and you cannot leave anything at the site.

Please ask the owner to read part 5 and answer the questions below the scenario as you do your counts. You do not need to read it to them. However, you need to take the completed survey with you when you leave. When they hand it to you, check to make sure that an X or check mark is provided in only one box for R1, R2, and R3. (That is, R1 cannot have two marks in that line.) If they have not answered R1, R2, and R3, please ask them about the ones that have not been marked or to clarify anything with more than a single mark for the question.



16.6 Onsite Data Collection Form: Audit of Coin-Op Laundromats

Audit Date:	_(date) Auditor:	(auditor)
Part 1 - General Site Inforr	nation	
Name of Site:		(site name)
Address:		(site address)
Phone:	(site phor	ne)
This site is: (site type) ☐ Coin-operated I	aundry Only (1)	
☐ Coin-operated I	aundry with Drop Off Lau	ndry/Drycleaner (2)
		(contact person)
Part 2 – Clothes Washer Do	etails	
How many total washers a	re located at the address al	pove?(Total)
Of those total washers, bre		(1044)
>20 pound washers	·	(GT20)
<=20 pound washe	rs (residential size washers	(LT20)
	[The sum of GT	20 and LT20 should equal Total]
For washers <=20 pounds Top Loading :		

How many Top Loaders have an Energy Star Label? _____(LT20TLES)



Front Loading: ____(LT20FL)

LT20TL plus LT20FL should be equal to LT20



(LT20TLES) should be less than or equal to LT20TL

How many Front Loaders have an Energy Star Label? _____(LT20FLES)



IF ATTENDED BY EITHER THE OWNER OR AN EMPLOYEE, ASK THEM TO FILL IN PARTS 3 & 4

Part 3 - Opinion on Front Loading Washers

Many of the new energy efficient washers are front loading washers. We know there are different opinions about this type of washer. Please answer the following set of questions to help us understand things you like and don't like about front-loading washers.

Front-Loading Washer Attribute	Dislike Very Much (1)	Dislike Somewhat (2)	Neither like nor dislike (3)	Like Somewhat (4)	Like Very Much (5)
A1. The size of tub.					
A2. Size of the tub					
door. A3. Maintenance of					
the washer					
A4. How much water it uses.					
A5. How well the mechanical parts hold up.					
A6. How well the door holds up.					
A7. Amount of soap needed by the washer.					
A8. Type of soap needed by the washer.					
A9. Cycle options for customers.					
A10. Length of wash time.					
A11. No agitator.					

A12. Your opinion is important. If there are things about front-loading washers that you find do not work in your situation, please tell us here.



Part 4 - Program Questions

new heard	SoCalGas and SDG&E have an energy efficiency program that provides a rebate for efficient clothes washers. It is called the Commercial Laundry Program. Have you of this program? Yes
	No [SKIP TO P3]
	Sounds Familiar
	Don't know
	likely is it that you would participate in this program within the next 12 months? Very unlikely [PLEASE GO TO P3]
	Somewhat unlikely [PLEASE GO TO P3]
	Somewhat likely [THANKS - this is the end of this part of the survey]
	Very likely [THANKS - This is the end of this part of the survey]
	I already am a participant. I have already received an incentive for putting in energy
	efficient machines since January 2006. [THANKS - This is the end of this part of
	the survey]
	Don't know [THANKS - This is the end of this part of the survey]
	do you think it is unlikely that you would not participate? I don't have the needed cash.
	The current machines are relatively new.
	I wasn't sure it would be worth the extra money.
	I don't think that the savings would really be there.
	We don't buy our machines.
	I don't like front loading machines.
	Something else (please tell us what:
)



IF ATTENDED BY THE OWNER, ASK THEM TO FILL IN PART 5.

Part 5 - New Washers

New energy efficient clothes washers often cost more up-front than less energy efficient washers. However, they also can pay back that additional first cost through reduced utility (energy and water) costs. Please tell me if you think you would purchase new energy efficiency washers for your coin-op Laundromat under the following scenario:

- Your site can handle 10 washers and you are purchasing 10 new washers.
- The cost of a standard washer is \$500 (\$5,000 total cost).
- The cost of an energy efficient washer is \$1,000 (\$10,000 total cost).
- The energy efficient washer is stated to save you at least \$225/year in utility bills. (\$2,250 utility savings per year.)
- The washers last 7 years before needing replacement. (Total of \$10,500 utility savings over the 7 years.)

How likely is it that you would buy the energy efficient washers if...(put an X in the appropriate box for each line)

	Very Unlikely (1)	Somewhat Unlikely (2)	Neither likely nor unlikely (3)	Somewhat Likely (4)	Very Likely (5)
R1you received a					
\$130 rebate for each					
washer					
(\$1,300 check)					
R2you received a					
\$200 rebate for each					
washer					
(\$2,000 check)					
R3you received a					
\$250 rebate for each					
washer					
(\$2,500 check)					



Audit Date:(date) Auditor: _	(auditor)
Part 1 – General Site Information	
Name of Site:	(site name)
Address:	(site address)
Phone:(s:	ite phone)
This site is: (site type) ☐ Coin-operated Laundry Only (1)	
☐ Coin-operated Laundry with Drop	Off Laundry/Drycleaner (2)
At the time of the audit, this site was: (site atte	,
☐ Not attended (2)	
Part 2 – Clothes Washer Details	
How many total washers are located at the ad-	dress above? (Total)
Of those total washers, break them down by si	,
>20 pound washers	(GT20)
<=20 pound washers (residential size v	
[The sun	n of GT20 and LT20 should equal Total]
For washers <=20 pounds <u>ONLY</u> , how many a Top Loading :(LT20TL)	are:
How many Top Loaders have an Energ	y Star Label?(LT20TLES)
Front Loading:(LT20FL)	





How many Front Loaders have an Energy Star Label? _____(LT20FLES)

IF ATTENDED BY THE OWNER, ASK PART 3.

Part 3 - New Washers

New energy efficient clothes washers often cost more up-front than less energy efficient washers. However, they also can pay back that additional first cost through reduced utility (energy and water) costs. Please tell me if you think you would purchase new energy efficiency washers for your coin-op Laundromat under the following scenario:

- Your site can handle 10 washers and you are purchasing 10 new washers.
- The cost of a standard washer is \$500 (\$5,000 total cost).
- The cost of an energy efficient washer is \$1,000 (\$10,000 total cost).
- The energy efficient washer is stated to save you at least \$225/year in utility bills. (\$2,250 utility savings per year.)
- The washers last 7 years before needing replacement. (Total of \$10,500 utility savings over the 7 years.)

How likely is it that you would buy the energy efficient washers if...(put an X in the appropriate box for each line)

	Very Unlikely	Somewhat Unlikely (2)	Neither likely nor	Somewhat Likely (4)	Very Likely
	(1)		unlikely (3)		(5)
R1you received a					
\$130 rebate for each					
washer					
(\$1,300 check)					
R2you received a					
\$200 rebate for each					
washer					
(\$2,000 check)					
R3you received a					
\$250 rebate for each					



washer			
(\$2,500 check)			

IF ATTENDED BY EITHER THE OWNER OR AN EMPLOYEE, ASK PART 4 & 5

Part 4 - Opinion on Front Loading Washers

Many of the new energy efficient washers are front loading washers. We know there are different opinions about this type of washer. Please answer the following set of questions to help us understand things you like and don't like about front-loading washers.

Front-Loading Washer Attribute	Dislike Very Much (1)	Dislike Somewhat (2)	Neither like nor dislike (3)	Like Somewhat (4)	Like Very Much
A 1 TT					(5)
A1. The size of tub.					
A2. Size of the tub door.					
A3. Maintenance of					
the washer					
A4. How much					
water it uses.					
A5. How well the					
mechanical parts					
hold up.					
A6. How well the					
door holds up.					
A7. Amount of soap					
needed by the					
washer.					
A8. Type of soap					
needed by the					
washer.					
A9. Cycle options					
for customers.					
A10. Length of wash					
time.					
A11. No agitator.					

A12. Your opinion is important. If there are things about front-loading washers that you find do not work in your situation, please tell us here.



Part 5 - Program Questions

	new e heard	SoCalGas and SDG&E have an energy efficiency program that provides a rebate for fficient clothes washers. It is called the Commercial Laundry Program. Have you of this program? Yes
		No [SKIP TO P3]
		Sounds Familiar
		Don't know
P2.		ikely is it that you would participate in this program within the next 12 months? Very unlikely [PLEASE GO TO P3]
		Somewhat unlikely [PLEASE GO TO P3]
		Somewhat likely [THANKS - THIS IS THE END OF THE SURVEY]
		Very likely [THANKS – THIS IS THE END OF THE SURVEY]
		I already am a participant [THANKS - THIS IS THE END OF THE SURVEY]
		Don't know [THANKS - THIS IS THE END OF THE SURVEY]
P3.	-	o you think it is unlikely that you would not participate? I don't have the needed cash.
		The current machines are relatively new.
		I wasn't sure it would be worth the extra money.
		I don't think that the savings would really be there.
		We don't buy our machines.
		I don't like front loading machines.
		Something else (please tell us what:
)



16.7 Frequency Tables: Onsite Audit of Coin Operated Laundromats

November 2007

Frequency Table

A1. Size of the tub.

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Dislike Very Much	1	1.2	4.5	4.5
	Dislike Somewhat	2	2.3	9.1	13.6
	Neither Like nor Dislike	5	5.8	22.7	36.4
	Like Somewhat	3	3.5	13.6	50.0
	Like Very Much	11	12.8	50.0	100.0
	Total	22	25.6	100.0	
Missing	0	1	1.2		
	System	63	73.3		
	Total	64	74.4		
Total		86	100.0		

A2. Size of the tub door.

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Neither Like nor Dislike	8	9.3	33.3	33.3
	Like Somewhat	8	9.3	33.3	66.7
	Like Very Much	8	9.3	33.3	100.0
	Total	24	27.9	100.0	
Missing	0	1	1.2		
	System	61	70.9		
	Total	62	72.1		
Total		86	100.0		

A3. The maintenance of the washer.

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Dislike Very Much	2	2.3	8.7	8.7
	Dislike Somewhat	1	1.2	4.3	13.0
	Neither Like nor Dislike	4	4.7	17.4	30.4
	Like Somewhat	10	11.6	43.5	73.9



		Frequency	Percent	Valid Percent	Cumulative Percent
	Like Very Much	6	7.0	26.1	100.0
	Total	23	26.7	100.0	
Missing	0	1	1.2		
	System	62	72.1		
	Total	63	73.3		
Total		86	100.0		

A4. How much water it uses.

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Dislike Very Much	3	3.5	13.6	13.6
	Dislike Somewhat	2	2.3	9.1	22.7
	Neither Like nor Dislike	7	8.1	31.8	54.5
	Like Somewhat	4	4.7	18.2	72.7
	Like Very Much	6	7.0	27.3	100.0
	Total	22	25.6	100.0	
Missing	0	1	1.2		
	System	63	73.3		
	Total	64	74.4		
Total		86	100.0		

A5. How well the mechanical parts hold up.

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Dislike Very Much	3	3.5	12.5	12.5
	Dislike Somewhat	4	4.7	16.7	29.2
	Neither Like nor Dislike	1	1.2	4.2	33.3
	Like Somewhat	9	10.5	37.5	70.8
	Like Very Much	7	8.1	29.2	100.0
	Total	24	27.9	100.0	
Missing	0	1	1.2		
	System	61	70.9		
	Total	62	72.1		
Total		86	100.0		

A6. How well the door holds up.

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Dislike Very Much	2	2.3	8.0	8.0



		Frequency	Percent	Valid Percent	Cumulative Percent
	Dislike Somewhat	1	1.2	4.0	12.0
	Neither Like nor Dislike	3	3.5	12.0	24.0
	Like Somewhat	11	12.8	44.0	68.0
	Like Very Much	8	9.3	32.0	100.0
	Total	25	29.1	100.0	
Missing	0	1	1.2		
	System	60	69.8		
	Total	61	70.9		
Total		86	100.0		

A7. Amount of soap needed by the washer.

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Neither Like nor Dislike	4	4.7	16.7	16.7
	Like Somewhat	7	8.1	29.2	45.8
	Like Very Much	13	15.1	54.2	100.0
	Total	24	27.9	100.0	
Missing	0	1	1.2		
	System	61	70.9		
	Total	62	72.1		
Total		86	100.0		

A8. Type of soap needed by the washer.

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Neither Like nor Dislike	10	11.6	45.5	45.5
	Like Somewhat	5	5.8	22.7	68.2
	Like Very Much	7	8.1	31.8	100.0
	Total	22	25.6	100.0	
Missing	0	1	1.2		
	System	63	73.3		
	Total	64	74.4		
Total		86	100.0		

A9. Cycle options for customers.

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Dislike Somewhat	1	1.2	4.3	4.3
	Neither Like nor Dislike	3	3.5	13.0	17.4



		Frequency	Percent	Valid Percent	Cumulative Percent
	Like Somewhat	6	7.0	26.1	43.5
	Like Very Much	13	15.1	56.5	100.0
	Total	23	26.7	100.0	
Missing	0	1	1.2		
	System	62	72.1		
	Total	63	73.3		
Total		86	100.0		

A10. Length of wash time.

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Dislike Somewhat	2	2.3	8.7	8.7
	Neither Like nor Dislike	4	4.7	17.4	26.1
	Like Somewhat	6	7.0	26.1	52.2
	Like Very Much	11	12.8	47.8	100.0
	Total	23	26.7	100.0	
Missing	0	1	1.2		
	System	62	72.1		
	Total	63	73.3		
Total		86	100.0		

A11. No agitator.

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Neither Like nor Dislike	10	11.6	50.0	50.0
	Like Somewhat	3	3.5	15.0	65.0
	Like Very Much	7	8.1	35.0	100.0
	Total	20	23.3	100.0	
Missing	0	1	1.2		
	System	65	75.6		
	Total	66	76.7		
Total		86	100.0		

A12

	Frequency	Percent	Valid Percent	Cumulative Percent
Valid	79	91.9	91.9	91.9
	1	1.2	1.2	93.0



	Frequency	Percent	Valid Percent	Cumulative Percent
A1: 35/50 lbs, A2: 21/24 lbs, A3: Very Little, A4: 35/45 Gal, A7: 1 3/4 cup, A8, Any, A9: Temp Options, A10: 28/32 min	1	1.2	1.2	94.2
Note on A10. On some machines, dislike very much, on others, like very much, depends on the size of the machines. Large machines wash time is too short for how much it costs.	1	1.2	1.2	95.3
O.K. all functions	1	1.2	1.2	96.5
They are expensive, there's the need for rebates	1	1.2	1.2	97.7
They wash better	1	1.2	1.2	98.8
Water level sensor doesn't last long, it is hard to clean drain valve when there is something stuck.	1	1.2	1.2	100.0
Total	86	100.0	100.0	

P1. Have you heard of the Commercial Laundry program?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	8	9.3	32.0	32.0
	No	10	11.6	40.0	72.0
	Sounds Familiar	1	1.2	4.0	76.0
	Don't Know	6	7.0	24.0	100.0
	Total	25	29.1	100.0	
Missing	System	61	70.9		
Total		86	100.0		

P2. How likely is it that you would participate in the program in the next 12 months?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Very Unlikely	4	4.7	22.2	22.2
	Somewhat Unlikely	1	1.2	5.6	27.8
	Somewhat Likely	4	4.7	22.2	50.0
	Very Likely	1	1.2	5.6	55.6



		Frequency	Percent	Valid Percent	Cumulative Percent
	I already am a participant.	1	1.2	5.6	61.1
	Don't Know	7	8.1	38.9	100.0
	Total	18	20.9	100.0	
Missing	System	68	79.1		
Total		86	100.0		

P3. Unlikely not to participate because...

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	I don't have the needed cash.	1	1.2	11.1	11.1
	The current machines are relatively new.	2	2.3	22.2	33.3
	I wasn't sure it would be worth the extra money.	2	2.3	22.2	55.6
	I don't think that the savings would really be there.	2	2.3	22.2	77.8
	Something else	2	2.3	22.2	100.0
	Total	9	10.5	100.0	
Missing	0	1	1.2		
	System	76	88.4		
	Total	77	89.5		
Total		86	100.0		

P3M7OTH

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid		80	93.0	93.0	93.0
		1	1.2	1.2	94.2
	Don't have enough information	1	1.2	1.2	95.3
	I'm not the owner	1	1.2	1.2	96.5
	N/A	1	1.2	1.2	97.7
	No Comment	1	1.2	1.2	98.8
	unsure	1	1.2	1.2	100.0
	Total	86	100.0	100.0	



R1. How likely to buy EE washers with a \$130 rebate per washer?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Very Unlikely	4	4.7	40.0	40.0
	Somewhat Unlikely	2	2.3	20.0	60.0
	Neither Likely nor Unlikely	1	1.2	10.0	70.0
	Somewhat Likely	1	1.2	10.0	80.0
	Very Likely	2	2.3	20.0	100.0
	Total	10	11.6	100.0	
Missing	0	1	1.2		
	System	75	87.2		
	Total	76	88.4		
Total		86	100.0		

R2. How likely to buy EE washers with a \$200 rebate per washer?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Very Unlikely	2	2.3	22.2	22.2
	Somewhat Unlikely	2	2.3	22.2	44.4
	Neither Likely nor Unlikely	1	1.2	11.1	55.6
	Somewhat Likely	3	3.5	33.3	88.9
	Very Likely	1	1.2	11.1	100.0
	Total	9	10.5	100.0	
Missing	0	1	1.2		
	System	76	88.4		
	Total	77	89.5		
Total		86	100.0		

R3. How likely to buy EE washers with a \$250 rebate per washer?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Very Unlikely	2	2.3	20.0	20.0
	Somewhat Unlikely	1	1.2	10.0	30.0
	Neither Likely nor Unlikely	1	1.2	10.0	40.0
	Somewhat Likely	2	2.3	20.0	60.0
	Very Likely	4	4.7	40.0	100.0
	Total	10	11.6	100.0	
Missing	0	1	1.2		
	System	75	87.2		
	Total	76	88.4		
Total		86	100.0		





17. SDGE 3043: HVAC Training, Installation, and Maintenance

Table 17-1 Final Research List

	Final Research List						
Target for Data Collection	The variable of the variable o		Sample Size	Number of Data points	From where did you get the sample?		
Program Managers	In-depth Interview	July	Determine level of understanding about the program.	1	1	List of program managers provided by SDG&E	
HVAC Contractors	CATI Interview	November	Various hypotheses about why contractors do or do not participate in VSP training.	992	140	Purchased from Dunn & Bradstreet	
Residential Focus Group	Focus Group	December	Obtain a range of perceptions and alternative viewpoints by San Diego area residents towards the purchase of new AC units, the use of HVAC contractors, and refrigerant charge and airflow services.	-	10	Purchased by zip code	
Commercial Facility Manager Focus Group	Focus Group	December	Obtain a range of perceptions and alternative viewpoints by commercial facility managers towards the purchase of new AC units, the use of HVAC contractors, and refrigerant charge and airflow services.	-	10	Purchased by zip code	
VSP In-depth Interviews	In-depth Interview	August - October	Learn about potential positive and negative parts of the program from the VSP perspective.	4	4	Provided by program implementer	



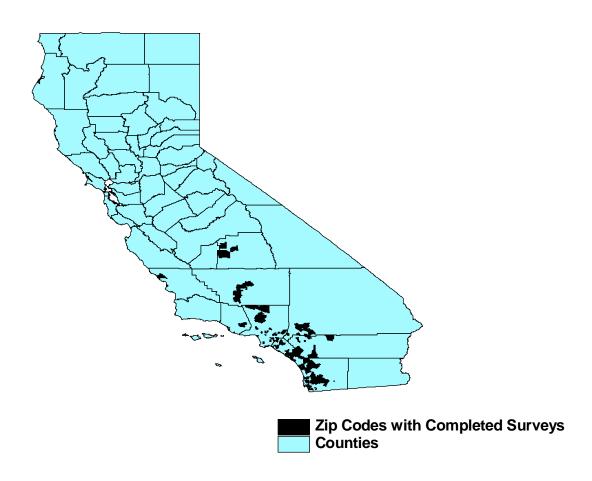
17.1 Sample & Methodology

Because of the use of the same VSPs and targeting similar markets, the data collection and analysis was combined for the AC TIMe (SDGE3043) and Premium Cooling & Motors Programs (SDGE3029).

HVAC Contractor Survey

There were 140 completed surveys with responses throughout the SDG&E and SoCalGas service territory (see Figure 17-1).

Figure 17-1
Zip Codes with Completed Surveys



A population of 992 HVAC contractors was purchased from Dunn & Bradstreet. Because it was known that there was insufficient contractors within the SDG&E zip code, contractors with SoCalGas zip codes were also purchased. The contractors with SDG&E zip codes were called until the population was



exhausted and then those with SoCalGas zip codes were randomly ordered and called. The survey was fielded throughout November 2007.

Table 17-2 Survey Completion Rate

Sample Size	992
Planned Completes	140
Actual Completed	140
Pool Efficiency Rate	88%
Gross Completion Rate	14%
Eligible Completion Rate	21%

The pool efficiency rate is a measure of how efficient the sample frame was in reaching working numbers. That is, of all the numbers called, what percent were working telephone numbers. There were 12 percent of the sample that were non-working numbers. The gross completion rate is the number of completions divided by the total number of calls attempted. A more relevant number is the eligible completion rate, which is the number of completions divided by the number of businesses reached that were eligible. Ineligible businesses were ones in which there was a language barrier, the business did not perform HVAC services or the company did not do the majority of their work in SoCalGas or SDG&E service territory. The eligible completion rate of 21 percent was average.

The sample was considered a probability sample. The data were analyzed using descriptive (mean, frequency) and inferential (t-test, Chi-Square) statistics.

Focus Group Logistics

The evaluation of the two third-party HVAC programs (AC TIMe and AC Premium Cooling & Motors) originally planned end user surveys to obtain information. This tactic was changed when we thought through the actual exposure of end users to these two programs. Both programs are up-stream or midstream programs with minimal (if any) actual end user contact. Therefore, the decision was made to use two focus groups to gather information relevant to the program. The goal was to obtain a range of perceptions and alternative viewpoints by San Diego area residents and commercial facility managers towards the purchase of new AC units, the use of HVAC contractors, and refrigerant charge and airflow services.

The focus groups took place on December 12, 2007. The commercial facility managers session was first from 5:00 to 6:30 PM. We purchased a list of facility managers in zip codes near San Diego to begin our solicitation. The recruiting requirements were:

- 1. Company pays the utilities
- 2. Must have at least one split unit or packaged unit
- 3. Must be the decision maker about purchase and maintenance of air-conditioning system. (most likely the facility manager)
- 4. Must use AC on a regular basis. At least 60 days during summer.

Fourteen commercial participants were planned to be recruited for the focus group to allow for possible attrition. There were two no-shows, ten participants, and two were thanked and let go. Each participant



who showed up for the focus group was paid \$150 regardless of whether they were chosen to stay for the focus group or not.

The residential focus group followed from 7:00 to 8:30 PM. This group had similar recruiting requirements. They were required to:

- 1. Have a central AC unit.
- 2. Be a homeowner
- 3. Be the decision maker about the purchase and maintenance of the AC system.
- 4. Use their AC on a regular basis (for at least part of the day for at least 2 months during the summer).

Again fourteen were recruited. One cancelled the day of the focus group, two did not show, and one was thanked, paid, and let go. Each participant who showed up for the focus group was paid \$75 regardless of whether they were chosen to stay for the focus group or not. The focus group consisted of ten participants.

The focus groups were located in a hotel near Poway, California. There were special filming lights, microphones, and a camera in one room with the participants. A nearby room contained a large screen television with a live feed from the camera. Each focus group was immediately burned onto a DVD with audio and video and a CD with audio only. Back-up video tapes were provided. One of the program implementers involved with AC TIMe and three SDG&E employees attended some or all of the focus groups. Both groups were moderated by Sharyn Barata of Opinion Dynamics Corporation, a member of the evaluation team, although not specifically involved with the HVAC program evaluations.

The information from the focus groups was synthesized by watching the groups in real time, discussing the interactions with a colleague, and watching the focus groups again on the DVD. While watching the DVD, group responses to each of the questions were recorded as the moderator moved the group through the guide.

VSP In-depth Interviews

The AC TIMe and Premium Efficiency Cooling & Motors Program both use the same four Verification Service Providers (VSP) as a conduit for their programs. The VSPs each have different logistics and procedures that an HVAC contractor follows to enable an RCA servicing. In-depth interviews with each of the VSPs took place in the fall of 2007. Data was collected in-person for one interview and via telephone for the other three. An interview guide was created and followed to assure that all relevant topics were covered. The interviews varied from ¾ to 2 hours in length. Two of the interviews were transcribed and responses of the other two were written up by the interviewer during the discussion.

While the information gained during the interview process is confidential, with only four interviews, it is difficult to provide much specific detail and maintain anonymity. As such, the interviews have been distilled to the main concepts that emerged during the conversations. The information from the interviews was synthesized by reading through the documents associated with each interview and pulling out the relevant information from the questions.



17.2 Detailed Findings

17.2.1 HVAC Contractor Interview Results

Characteristics of the HVAC Contractors

Ninety percent of the businesses serviced residential clients to some degree, with 10 percent indicating that 100 percent of their business was nonresidential. However, the percentage varied as shown below.

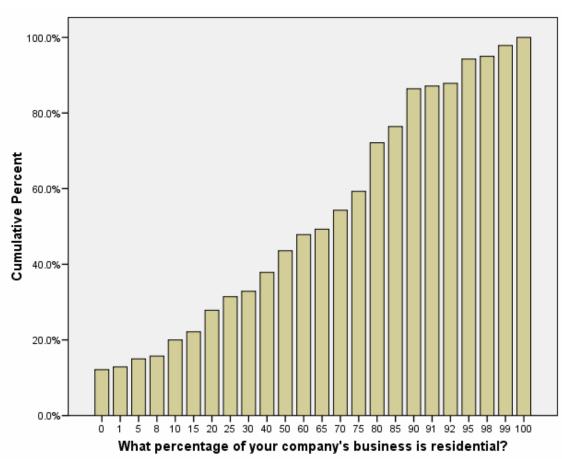
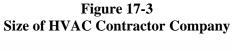
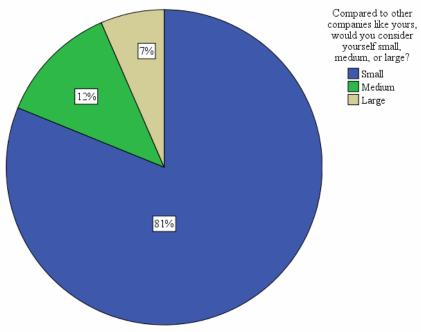


Figure 17-2
Percent of Company that Services Residential Clients

The majority of those called self-reported themselves as small companies (compared to other companies like themselves).







The self-reported size of the company matched up well with a different question that asked about their annual sales. (See Table 17-3).



Table 17-3 Annual Sales by Company Size

When thinking of your annual sales, would you describe your business as: * Compared to other companies like yours, would you consider yourself small,medium, or large? Crosstabulation

			yours, wou	to other comp ld you conside medium, or la	er yourself	
			Small	Medium	Large	Total
When thinking of your annual sales, would you describe your business	Less than \$250,000 in annual sales	Count % within Compared to other companies like yours, would you consider yourself small,medium, or	37 34.3%	.0%	.0%	37 27.6%
as:		large?				
	\$250,000 to \$1 million in annual sales	Count % within Compared to other companies like	55	3	1	59
		yours, would you consider yourself small,medium, or large?	50.9%	17.6%	11.1%	44.0%
	\$1 million to \$5 million in annual sales	Count % within Compared to other companies like yours, would you consider yourself small,medium, or	16 14.8%	12 70.6%	2 22.2%	30 22.4%
	More than \$5 million in	large?		0		
	wore than \$5 million in annual sales	Count % within Compared to other companies like yours, would you consider yourself small,medium, or large?	.0%	11.8%	6 66.7%	6.0%
Total		Count % within Compared to other companies like yours, would you consider yourself small,medium, or large?	100.0%	170.0%	100.0%	134 100.0%

The sample was not drawn nor fielded to enable analysis by size of company, though, and any statistic that is shown by company size should be considered a tendency. Due to the small sample size of large (9) and medium (17) sized companies, the remainder of the analysis will be by sampled population only. Additionally, there was the belief that HVAC contractors in the SDG&E service territory would not be significantly different from those in the SoCalGas service territory. This was checked for each area analyzed. However, no significant differences (at the 90% level) were found between the contractors in the two service territories. This supports the original idea of no difference between contractors simply because of where they are located.

Twenty-three percent of the firms are one- or two-person operations. The average number of technicians working in the company is 6.07 with a range of 0 (i.e., no technicians, just the owner) to 105. About half of the companies have at least one NATE certified technician. Of those with any NATE certified technician, about one-quarter (27 percent) of the technicians at that company tend to be certified.



More companies state that profit from serving was higher than from equipment. This was a somewhat surprising result as the expectation was that installing equipment provided a higher profit margin than simple servicing.

60.0%—

40.0%—

40.0%—

10.0%—

In general, is your profit margin for servicing higher or lower than for installations?

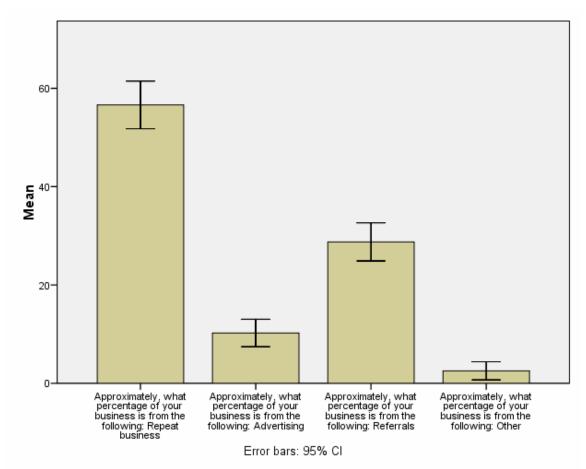
Error bars: 95% CI

Figure 17-4
Percent with Profit from Servicing as Higher or Lower than Installations

The firms tend to receive their business from repeat customers and referrals (Figure 17-5).



Figure 17-5 Where Business is From



The high level of business from repeat business and referrals matches up with the self-reported way the firms compete for business. Seventy-four percent state they attempt to convince the customer their work is of higher quality most of the time or all the time. Twenty-three percent attempt to obtain work through providing a lower price to the prospective customer either most of the time or all of the time.

VSP Information

Several questions were asked about the VSP platforms to determine contractor awareness of the VSP opportunities, their level of participation, and reasons why they do not participate.

Sixty-four percent of companies have heard of at least one of the four VSP platforms (i.e., Check-Me, Enalasys, Field Diagnostics, or Verified-RCA.). Of those 64 percent, 60 percent have had anywhere from 1 to 100 percent of their technicians trained by one of the VSPs. This equates to 35 percent of the HVAC contractors across the surveyed population with at least one technician trained to use a VSP platform.

When a follow up question was asked about how many have actually signed up to use a VSP system, though, only 35 percent of those with any training also were signed up (or about 12 percent of the



population). It appears that some of the companies no longer interact with the VSPs, although they have done so in the past. Of those who are signed up, 50 percent are with Check-Me, while 31 percent are with Enalasys, and another 19 percent are with Verified-RCA. This breakdown is shown graphically in Figure 17-6.

No technicians trained in a VSP Platform 46% / **65%** Have heard of at least one VSP 64% / 64% Not signed with VSP 65% / 88% Some technicians trained in a VSP Platform 54% / 35% Signed with VSP 35% / 12% Signed with Signed with Check-Signed with Verified-RCA Enalasys 31% / 4% Me 50% / 6% 19% / 2% KEY First percentage is for that grouping Second percentage in **bold** is for the population

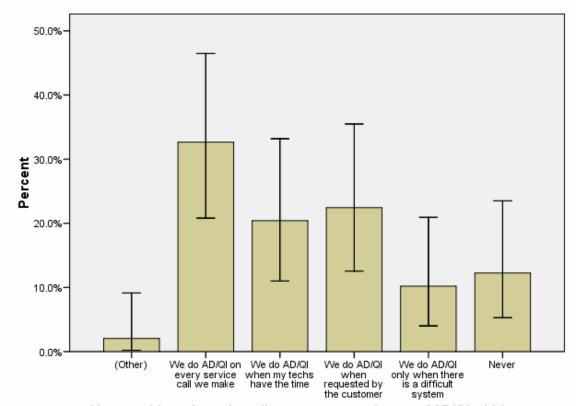
Figure 17-6
Percent of Contractors Signed with VSPs

Of the 12 percent of contractors who have signed up with a VSP, the number of cooling systems they have tested using the VSP techniques varies widely, from 2 systems to 1,000 systems. (The average number of systems stated to have been tested is 178, with a standard deviation of 258.)

Moving backwards to the 35 percent of contractors with trained technicians, the technicians are indicated to use the VSP-specific procedures when they test a system's refrigerant charge about 66 percent of the time. For that same group, about 1/3 indicate they use QI all the time (Figure 17-7). However, as one can see from Figure 17-7, the confidence intervals overlap for all the responses, meaning that a different survey could find different percentage results across the categories.



Figure 17-7 How Contractors Use AD/QI



How would you best describe your company's use of AD/QI within your general service and maintenance jobs?

Error bars: 95% CI

Because the VSP procedures also include duct testing and sealing, the contractors who indicated they had trained technicians were asked about their use of this procedure. A little over half (56 percent) stated they do not perform any duct test and seal projects, 30 percent use a Duct Blaster during the procedures, and 14 percent use something similar to a Duct Blaster. This equates to 14 percent of the sampled population of contractors performing duct test and seal projects to some extent.

Moving to the group of contractors who had heard of the VSPs, but have chosen not to participate in a training, the top four reasons were: 1) It doesn't add anything to our business (27 percent) and then a tie for the next three at 20.5 percent each - 2) It is too costly, 3) We didn't know about any training, and 4) Our technicians are too busy to perform the procedures.

There were two areas in which we were particularly interested in getting a response from the contractors and so asked them somewhat duplicative questions. The first area we explored was in regards to whether they already perform refrigerant charge and airflow servicing, just using other procedures. Sixty-four percent of the contractors who were aware of any VSP platform indicated they agreed with this somewhat or very much (i.e., they do not participate because they already perform this type of service only with other procedures). The second area was whether they felt it would be difficult to perform this type of



testing in the summer "...because we are busy handling trouble calls, performing installations and fixing broken air conditioners." The response to this query was similar with 22 percent disagreeing with the statement (and therefore indicating they did not consider this a problem) and 66 percent agreeing with this statement.

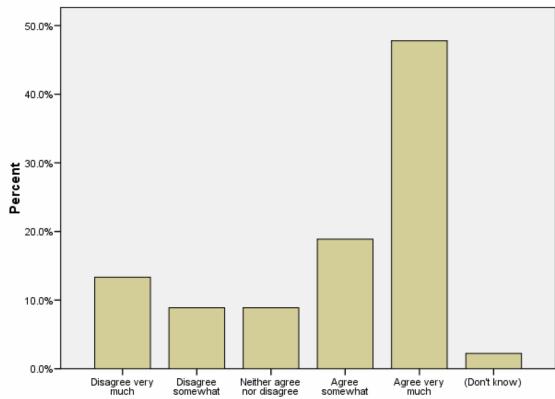


Figure 17-8
Difficulty Performing QI During Summer

Agreement: It would be really hard to perform this type of testing during the summer because we are busy handling trouble calls, performing installations and fixing broken air conditioners.

Market Information

Based on anecdotal evidence, we believed that there was a technician shortage in the HVAC industry and asked the contractors about this issue. Three-quarters of the respondents also indicated there was a technician shortage. Of those who believed there was a shortage, one-third of them felt it made it difficult to expand their business while slightly less than a third felt that they were continually having to hire (24 percent) and train (29 percent) new technicians.



Table 17-4 How Shortage of Technicians has Affected Business

\$Shortage Frequencies

		Respo	onses	Percent of
		N	Percent	Cases
How Technician	(continually have to hire new technicians)	20	18.7%	23.5%
Shortage Has	(continually have to train new technicians)	25	23.4%	29.4%
Affected a Business	(have to pay my technician well to keep them)	18	16.8%	21.2%
Dusiness	(do not have as much control over technicians as would like	2	1.9%	2.4%
	(Makes it difficult for me to expand my business)	28	26.2%	32.9%
	(Makes it difficult to offer the quality of service I	12	11.2%	14.1%
	(Makes it difficult to offer customers preventati	2	1.9%	2.4%
Total		107	100.0%	125.9%

a. Group

Besides a technician shortage, there were felt to be other obstacles that the contractor could see as they try to sell services to their customers. The respondents were asked to rate nine different possible obstacles from 1 (not a problem) to 5 (extremely significant problem). The results (Table 17-5) show that price/cost issues and lack of customer awareness were thought to be the two largest obstacles followed closely by the customer stating they do not need the service. The contractor found insufficient sales staff and lack of staff training to be the lowest obstacles of those presented.

Table 17-5
Rating of Various Possible Obstacles to Selling Services

How big a problem in selling above code equipment or AD/QI services to your customer is...

	N	M	Mean	
	Statistic	Statistic	Std. Error	Statistic
reaching the decision maker?	103	2.20	.135	1.375
not knowing who the decision maker is?	107	2.12	.137	1.412
customers state they don't need product/service?	103	3.00	.141	1.435
no time to market this type of equipment?	101	2.13	.127	1.278
insufficient sales staff?	105	1.96	.130	1.330
lack of staff training?	106	2.03	.140	1.444
lack of customer awareness or knowledge?	105	3.03	.140	1.431
price/cost issues?	107	3.61	.138	1.426
lack of marketing materials?	104	2.45	.141	1.434
Valid N (listwise)	98			

Rating: 1=Not a problem, 5 = Extremely significant problem

An area of exploration in this survey dealt with the sizing of the residential units being replaced. This was gathered to see what was currently going on the market as it was thought that residential units tend to be oversized and there was a desire to see if any units were being down-sized. Three-quarters of the time, it



is a like-for-like sizing swap out. However, around 15 percent of the time, it can be a larger unit being installed while about 8 percent of the time a smaller unit being installed. (Figure 17-9)

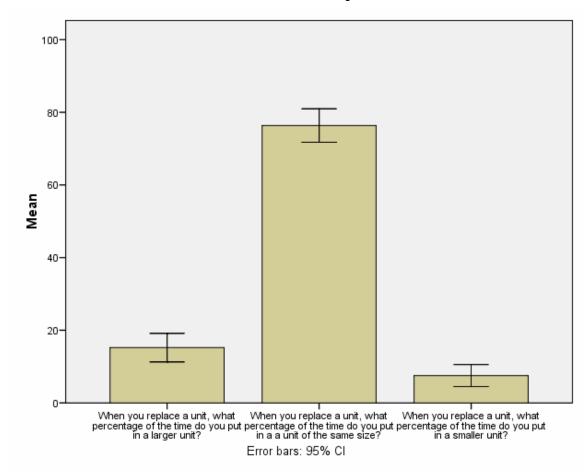


Figure 17-9 Size of HVAC Unit Replaced

Influencers

We asked the respondents about two different types of influencers. The first was about possible ways to influence their customer and the second was about how SDG&E could find and influence them.

We were interested to know if the information gained from the VSP techniques helped to convince customers of the value of additional services such as repairs or system replacements. About half (57 percent) of the contractors who had VSP trained technicians felt that the information helped some of the time while 20 percent thought it helped all time. This was balanced by the 20 percent who thought that this information never helped convince the customer of the need for additional services.

When asked about how the utility could influence them or other contractors to perform quality installation services, over half indicated that incentives and rebates would be an influence.



Table 17-6 Ways to Influence QI Procedure Use

\$Influence Frequencies

		Respo	onses	Percent of
		N	Percent	Cases
How	(Give incentive/rebate/\$\$)	64	38.8%	54.2%
could the	(Pay for the equipment)	26	15.8%	22.0%
utility influence	(Subsidize the training)	54	32.7%	45.8%
higher	Provide training	1	.6%	.8%
AD/QI use?	Make the customers more aware of the service	2	1.2%	1.7%
	Legislate it (i.e., make is a law)	8	4.8%	6.8%
	Make contractors more aware of the program	5	3.0%	4.2%
	Make it easier to do the program	5	3.0%	4.2%
Total		165	100.0%	139.8%

a. Group

There were a couple comments from the respondents that were so unique that they could not be binned. They are:

- I would have to be ensured business.
- Remove the need for NATE certification to attend the classes. Everyone should be able to attend. [NOTE: this is assumed to reference the training classes.]

One possible way that the program can influence participation is through the incentive level. While the program currently provides an incentive to perform the quality installation (~\$150) services, we asked those 64 contractors who brought this up as a way to influence them what they felt was an appropriate level. Although 3 contractors indicated that no amount of money would influence them and 31 did not know what level could influence them, the average from the other half providing answers was \$133.

Premium AC Cooling

A number of questions were asked of the contractors about high efficiency cooling. Currently, 21 percent (± 4.5 percent) of the equipment the contractors sell were stated to be of SEER rating 15 or higher. (The 21 percent level is likely an over-estimate of high efficiency sales)⁶. Of those who sold higher efficiency equipment, there was no difference in the percent installing this equipment who had received rebates and those who had not. Of the contractors who had received rebates from the Premium Efficiency Cooling program, 57 percent indicated the rebates were for locations in SDG&E service territory all the time (52 percent) or most of the time (4 percent). Twenty six percent of the rebates were for locations outside of

⁶ California Market Share Tracking HVAC 2005 indicated a market share 16.5% within SDG&E for SEER 13 or higher in 2005. It is highly unlikely that there has been a 5% jump in two years for a higher efficiency unit even though the code is now SEER 13.



SDG&E. About nine percent of the rebates went to SDG&E locations some of the time and for another 9 percent, the service territory location was not known.

The possible obstacles for selling high efficiency equipment were stated previously in Table 9-5. Statements regarding the benefits of the Premium Efficiency Cooling program varied. Thirty percent thought that the primary benefit was receiving the incentive dollars, while another 30 percent felts that premium efficiency better serves the customer. Other benefits stated were competitive pricing (13 percent), increased profitability selling premium efficiency (4 percent), and the remaining 23 percent were unique response.

Working with the Utility

While staff training was not thought to be a big obstacle to selling equipment or AD/QI services, 32 percent of contractors considered subsidized training as a way to influence use of AD/QI procedures. When asked if a free half day sales training for high efficiency equipment were offered in their area, 63 percent indicated they would send their staff. Similarly, 66 percent stated they would send staff to a free whole day technical training on quality installation and services in their area.

SDG&E was interested in how they could help the contractors and asked about both selling quality installation and maintenance specifically. The highest response was to increase the size of the rebates, followed by advertising.

Table 17-7
Ways SDG&E Can Help Contractor Sell Premium Cooling and QI

If SDG&E could do one thing to help your firm sell premium efficiency cooling and quality installation and maintenance what would you choose?

		F	Danasat	Cumulative
		Frequency	Percent	Percent
Valid	Other	4	2.9	2.9
	Increase the size of the rebates	73	52.1	55.0
	Promote ACCA quality installation or Energy Star certification	7	5.0	60.0
	Promote and subsidize HVAC technical training	18	12.9	72.9
	Encourage co-branded advertising	6	4.3	77.1
	Advertise the value of premium efficiency and QI services	28	20.0	97.1
	(Don't know)	4	2.9	100.0
	Total	140	100.0	

The verbatim choices that could not be binned were (i.e., "Other" in Table 17-7):

- Make rebate paperwork simpler.
- Price of the air-conditioning.
- All of the above.
- *Team up with the manufacturer and bring down the cost.*



17.2.2 HVAC Programs' Focus Group Results

Commercial Focus Group

<u>Participant Characteristics</u> - The ten participants (9 men and 1 woman) were property managers or facility managers of medium to large companies. The company types varied with three having data centers on the property they managed. They were responsible for anywhere from 2 to 92 HVAC units that varied from 2 to 30 tons. A few had units under 2 years of age, but most were at least 5 years old and one person had units stated to be over 35 years old. Most did not know the monthly cost of operating the AC unit, although a few stated from \$20 to \$4,000. Most of the AC units ran during business hours, although the property managers also had residential units, which ran both day and night. Eight of the sites had regular maintenance, generally on a quarterly basis. The other two had service calls only when they experienced a problem. All changed the filters from monthly to twice a year.

The group interacted well with the moderator. They appeared willing to discuss the topics. A few had more knowledge about the topics than others, but this did not appear to inhibit the others in the group from expressing their opinions and thoughts.

<u>Understanding of AC Equipment</u> – The understanding of the AC equipment went from none to one person having a good sense of what occurred within an AC cycle and being familiar with the different types of AC equipment. The rest ranged in-between these two extremes. About half did not want to deal with fixing their AC units themselves and several could not (even if they had wanted to) due to company policies. All had service contractors when needed. The group expects their AC units to work, provide comfort, and have easy controls. Good operating costs, rebates, and efficiency were all mentioned when asked about what they wanted from an AC unit.

<u>Purchase of New Units</u> – Half of the group had purchased a new AC unit within the past two years. All appeared to look at lifecycle costing during their purchase, although matching the size (in tons) of the old unit, working together with the current control system, and energy efficiency were mentioned as well. A few were required by their company to obtain several bids when purchasing AC equipment. Two knew that could probably obtain incentives or tax credits and another was actively working with SDG&E about incentives for some AC units.

<u>Current Contractor and Maintenance</u> – As stated earlier, all have a contractor they use. Half have quarterly maintenance contracts and a few perform some minimal maintenance with internal staff. Most are satisfied with their contractor and indicate they look for a new person if they are not satisfied. Satisfaction was based on the fact that they want the job to be both done correctly and done correctly the first time. If there are difficulties, though, and the contractor comes back to fix them at no cost, they indicated they would probably remain with that contractor. The group likes or dislikes specific technicians, though, not really the company. They form relationships with specific people based on the work effort and quality of that person. Many of the group receive cold-calls from other contractors (which they tend to not use). A few will check with peers in their company (when the company has multiple sites) or with colleagues performing similar work when they want a new contractor. As a group, they tended to trust their contractors to a certain degree. A few trust them completely (because they have no knowledge of the AC system) and a few check on the work of their contractors and ask for clarification when they don't understand a suggested fix.



Refrigerant Charge & Airflow (RCA) – The moderator read a brief introduction about AC TIMe program based on the brochure. An AC TIMe brochure was also shown and passed around during the focus group. None had heard of the program, but several people wrote down the phone number and address from the brochure. Most of the participants thought that their regular maintenance included this type of testing and adjustment of refrigerant. They believed that the actions were positive and that it could save energy. It was a mixed reaction to learning about the training. Some felt that a two day course did not suffice while others were OK as long as they knew that the technician had been trained by a reputable source. As a group, there was little value seen in a 3rd party verification of the actions taken during an RCA service. However, most wanted their own contractor to provide the service, not bring in an outside contractor. The cost of the service was not an issue for any of the participants. If they were forced to use an outside contractor, the computerized aspect of the program was seen as a benefit. Skepticism was raised, though, about what they were being sold by the program. Some thought they would work with their own contractor to see if they agreed with any findings from an RCA service. Also, there was agreement that SDG&E be part of any program provided.

Residential Focus Group

<u>Participant Characteristics</u> – This group of 10 participants consisted of 4 women and 6 men of various ages. The average age of the AC unit in their home was 10.75 years, with a range from 1 to 22 years. The average square footage of their homes was 2,264 square feet. They estimated that they paid an average of \$108/month to cool their home (although 2 participants were unable to provide an estimate). Seven of the participants indicated they typically did not use their AC unit at night (i.e., after 8 PM). Four used their AC in the early afternoon, and six indicated use in the late afternoon and early evening hours (i.e., 4 PM to 8 PM). Most adjust their temperature settings. When they adjusted the thermostat to make it cooler was unique for each person. They do not have any regular maintenance performed on the AC unit except changing the filter. They change their AC filter once or twice a year. Most indicated they pay close attention to their electric bill, although a few notice it only when there are big changes. One just scans the bill before paying.

The group was lively and talkative. A few had more knowledge about some of the topics than others, but the quiet ones opinions were brought out by the moderator on several occasions. The group dynamics were positive, with people interacting often and continuing to talk among themselves about the topic after the focus group officially ended.

<u>Understanding of AC Equipment</u> – In general, there was little real understanding of AC equipment. The participants want the AC to cool the home in a reasonable amount of time for a reasonable cost. They want the air filtered, especially during fire season. They want the AC to provide a consistent temperature and be reliable. Only one has attempted to do anything other than change the filter in the unit, and that was with an older unit. The current units are viewed as the purview of experts to fix.

<u>Purchase of New Units</u> — Only one participant had purchased a new AC unit within the past two years. This person carefully considered the attributes desired in an AC unit. Energy efficiency was among the things looked at as the person shopped. Interestingly, the AC unit was not a replacement, as there previously had been no AC in the home. When opened up to the group about what would need to be considered when purchasing a new AC unit, several indicated that a digital thermostat was desired. The ability to adequately cool the home was very important. Other considerations mentioned were: energy efficiency, a nice looking condenser unit, longevity of the unit, and if they had been happy with the past



unit then would probably purchase a similar make. The group indicated they would possibly do research on the Internet or read Consumer Reports before buying anything. Some may ask a neighbor.

<u>Current Contractor and Maintenance</u> – The response to this topic was more about what people <u>would do</u> not what they <u>did do</u>. When asked directly, none of the group stated they had a contractor that they used regularly for AC service and repair. Opinions were provided, though, based on the occasionally times they interacted with a repair person. While they all indicated they change their filter, there was no regular maintenance performed by an AC technician. However, nine of the ten gave a rating of 9 or 10 (out of ten) indicating they trust what a service repair person would tell them needs to be fixed in an AC unit (one did not respond due to no experience). Most likely, this response is based on experience with any type of large appliance repair, not just an AC unit. When asked about how they would find a contractor, a couple wanted someone they could trust and would find that person through asking a neighbor or using a list from a trusted source (such as the local Chamber of Commerce).

Refrigerant Charge & Airflow (RCA) – The moderator read a brief introduction about AC TIMe program based on the brochure. An AC TIMe brochure was also shown and passed around during the focus group. None had heard of the program. There was much confusion about what this service provided that was different from what they already received when a technician representing SDG&E came to their home for any reason such as a service check. The group had difficulty separating out what SDG&E technicians could/would do for them on a service check versus what was being provided through this program. There was a belief that the AC units should last a long time without maintenance. As one participant stated: "Our AC has run for 20 years with no problems and it works pretty good!." Another said that if anything was needed in a unit that was still under warranty, they would be upset. However, another participant caught the likeness to a car maintenance as keeping the unit running in top efficiency. None of the group felt that having another 3rd party come in to verify an RCA service performed by a technician was useful. In fact, the group did not want this at all.

The group had several opinions about how to "get the word out" about the program. Among the responses were: advertise on TV, do a free tune-up in a neighborhood, and target the messages based on area and age of unit. All agreed that use of information on a bill stuffer was not useful. One indicated that using HVAC contractors to sell the program may help. Several indicated that actual savings values would help sell them on using the service. A couple indicated they would need pretty good proof that they would obtain savings, especially if they had to pay for the service. If the service were free, though, most indicated they would probably have the service. It was unclear, though, whether they would believe that a contractor offering the service was not simply looking for work. If SDG&E offered the service, though, most indicated they would believe it was not simply a ploy to make more money.

Concepts were explored around what type of message worked in the current brochure and what else could be included. The use of advanced diagnostics did not resonate with this group, nor did the idea of a savings roadmap. The idea of a tune-up was a good one as was attempting to tie in the tune-up with blackout prevention.



17.2.3 HVAC VSP In-depth Interview Results

The AC TIMe and Premium Efficiency Cooling & Motors Program both use the same four Verification Service Providers (VSP) as a conduit for their programs. The VSPs each have different logistics and procedures that an HVAC contractor follows to enable an RCA servicing. Based on the interviews, each of the VSPs appeared to have a good handle on their approach. They were knowledgeable about the market and had run programs in other parts of California and/or the country. They thought that the program managers for both AC TIMe and Premium Cooling & Motors were responsive to them, at least to the extent possible.

At the time of the interviews, all felt fewer RCA services had occurred than what they would have preferred. A late program start was one reason, but the consensus was that both programs are simply too complicated to keep contractors interested and involved. The need to know exactly what climate zone the house resides (and for which an incentive is based) was too much of a hassle for the contractors. When RCA services were performed outside of a specific climate zone and contractors paid less than expected (or not paid at all), then they tended to drop out. According to the VSPs, the programs went through some ramping up difficulties with changes in incentive structure and type of homes that could participate. This caused contractors to take a wait-and-see attitude and further reduced the hoped-for service completions. The incentives were stated to be too low as well. Apparently, SCE has higher incentives for similar services and the contractors are participating at a higher rate, purportedly due to the incentives.

The VSPs try to provide the contractors a way to use their specific services that will work with the contractor's current business model. According to one VSP, there is little to no chance that a contractor will change how they do business to take advantage of an energy efficiency program incentive. According to the VSPs, there are a couple different business models in use by the contractors. One end of the spectrum is based on the contractor having a group of loyal customers. While not always the case, these tend to be smaller firms. A small group tends to be sufficient for their business and they gain new business through word-of-mouth and references. Interestingly, these contractors will use a new service such as RCA for all their customers and then that is it, there are no more customers for the RCA servicing. Thus, while the program may include these types of contractors, there is a relatively finite group of end-users that would be serviced. The other end of the spectrum business model attempts to obtain business through low price, where the customers are not necessarily through referral. According to one VSP, these tend to be larger contractors with many technicians. Both business models will drop any energy efficiency programs if the process becomes too cumbersome. A third type of business model mentioned by one VSP is that of a 'specialty' contractor. This type of business is built around utility programs.

Each of the VSPs are a business that uses incentives to help spur the use of their business product. In the past, each of the VSPs have been the administrator of similar energy efficiency programs, albeit ones that used only their approach. With AC TIMe and Premium Efficiency Cooling, SDG&E chose to use other entities in between the VSPs and the customers. It is unclear whether the added layer of administration provided extra value or efficiency, although it did increase the complexity. It was indicated that one large HVAC contractor simply dropped out of the program to wait to see how things settled out and if the end result was going to be advantageous to their business.



17.3 Focus Group Guide: SDG&E Commercial Customers

Date: Time: Location:

We will be conducting a focus group of SDG&E commercial customers that at least one split unit or packaged unit AC system. Focus group participants should be the person from the company who makes decisions about the purchase and maintenance of the AC system, most likely the facility manager. They should also use their AC on a regular basis (at least for part of the day for at least 2 months during the summer).

Use of Air Conditioner

While we are waiting please fill out the cards in front of you.

These are the questions on the cards

- 1. Do you use split AC units or packaged AC units
- 2. How many units does your facility have?
- 3. The approximate age of your AC unit
- 4. The approximate size (in tons) of units
- 5. Approximately how much does it cost for you to use your AC in the summer?
- 6. What time of day do you use the AC? (is it on all day and night, off at night?)
- 7. Do you adjust the temperature setting? When do you make the home cooler? When do you make it warmer?
- 8. When was the last time your AC unit was serviced by a technician? Do you have regular maintenance service performed on it or just when there is a problem?
- 9. How often do you change the filter?

Introduction

My name is [SB] and I am going to be moderating the discussion today. By a show of hands, how many of you have participated in a focus group before? There are no right or wrong answers. Please feel free to share your opinions and ideas during our discussions tonight.

This focus group will last about 90 minutes, and just to let you know, we are videotaping this discussion to help with our analysis. Behind this mirror is the video camera and our clients who we're doing this research for. Your identity will be confidential – the responses you share today will not be associated with you as an individual.

Let's start by going around the room and having you tell us your name and a little about yourself. Please tell us:

- 1) your first name
- 2) When you think of energy efficiency, what comes to mind? That is, what does energy efficiency mean to you?

Understanding of AC Equipment



- 1. What do you want from your air conditioning unit? [Probe for importance of comfort, reliability, low initial costs]
- 2. Has anyone ever fixed the AC unit in their facility?
 - b. What did you do? How difficult was it?
- 3. Has anyone ever fixed their own car?

(For those that have fixed a car)

- 4. Would you feel comfortable fixing the AC unit at your facility? Why or why not? (probe for reasons of feeling more comfortable fixing car even though it is more complicated than an AC system)
- 5. Does anyone know if their AC unit has a thermostatic expansion valve (TXV)? Does anyone know what this does?
- 6. How familiar are you with the refrigerant cycle of an AC unit?

Purchase of New Units

- 7. Has anyone bought a new unit in last 2 years?
 - d. What were the considerations involved in deciding what to get?
 - e. How did you make your decision?
 - f. Did you consider the efficiency?

[ASK ALL]

- 8. What considerations would you have if you needed new system? [Probe for duct work and leakage testing]
- 9. Are any of you aware of any tax credits that are available?
- 10. What about incentives from SDG&E?

Current Contractor and Maintenance

- 11. Who has a contractor that that is used regularly for AC service and repair?
 - c. How satisfied are you with the job they do? Why?
 - d. To what degree do you trust in what they may tell you is needed for the unit
- 12. How would you find a contactor if you needed one? What characteristics are important?
- 13. What kind of maintenance have you or have you hired someone to perform on your AC unit?
 - e. Did you watch the technician perform maintenance? What did you see them do?



- f. Did you see the technician use gauges?
- 14. What kinds of things have the contractors told you are needed to be fixed?

Refrigerant Charge, Airflow, and Duct Sealing

I am going to hand out this brochure for a program called AC Time. The program promotes AC tune ups which are similar to car tune ups. When you get your car tuned up you save gas by improving the miles per gallon. When you get your AC tuned up you save electricity. The first thing the program does it offer advanced diagnostic training to AC contractors. Once these contractors complete the AC Time training they are can then perform tune ups using advanced diagnostics on AC systems. This would include diagnosing your AC system for refrigerant level, air flow through the system, inspecting the economizer and overall AC system condition. All things that effect how well your AC system works. If the refrigerant charge is not at the right level or if the air flow is restricted your AC unit has to work harder therefore using more energy.

In this program after the AC Time contractor tests for these things you are given a "savings roadmap" which verifies that your AC system has been properly tested and adjusted for refrigerant charge and air flow and documents what repairs, if any, are needed. To find a contractor that has completed the training you would call the 1 800 number or go to the AC time website.

- 15. Has anyone ever had an AC tune where the technician tested for refrigerant charge, air flow or adjusted your economizer?
- 16. What do you think of this program that I just described? Would you hire a specially trained contactor to perform a tune up on your AC. Why or why not?

By having your AC tuned up you would experience greater AC efficiency and lower operating costs, fewer repairs, your AC would last longer and would provide more comfort in your home.

- 17. What else would you need to know to want to have this service? How could we make the process easy to explain?
- 18. What is the value of the third-party verification?

San Diego Gas and Electric currently offers the tune up service free of charge to its customers. However, only some AC contractors choose to offer it.

- 19. If the contractor you currently use to service your AC unit did not offer this service how would that affect you? Would you find a contractor that did?
- 20. What should the program add to get more people interested in having the AC tune up? What should be done to get more contractors interested in offering the service?
- 21. What could the program do to make it easier for people to get this service?



17.4 Focus Group Guide: SDG&E Residential Customers

Date:
Time:
Location:

We will be conducting a focus group of SDG&E homeowners (not renters) that have central AC. Focus group participants should be the household member who makes decisions about the purchase and maintenance of the AC system. They should also use their AC on a regular basis (at least for part of the day for at least 2 months during the summer).

Use of Air Conditioner

While we are waiting please fill out the cards in front of you.

These are the questions on the cards

- 1. The approximate age of your AC unit
- 2. The approximate square footage of your home
- 3. Approximately how much does it cost for you to use your AC in the summer?
- 4. What time of day do you use the AC? (is it on all day, off while at work, off while sleeping?)
- 5. Do you adjust the temperature setting? When do you make the home cooler? When do you make it warmer?
- 6. When was the last time your AC unit was serviced by a technician? Do you have regular maintenance service performed on it or just when there is a problem?
- 7. How often do you change the filter?

Introduction

My name is [SB] and I am going to be moderating the discussion today. By a show of hands, how many of you have participated in a focus group before? There are no right or wrong answers. Please feel free to share your opinions and ideas during our discussions tonight.

This focus group will last about 90 minutes, and just to let you know, we are videotaping this discussion to help with our analysis. Behind this mirror is the video camera and our clients who we're doing this research for. Your identity will be confidential – the responses you share today will not be associated with you as an individual.

Let's start by going around the room and having you tell us your name and a little about yourself. Please tell us:

- 1) Your first name
- 2) Whether you think you pay a lot of attention to your electric or gas bills, some attention to your bill, or whether you just pay the energy bills without thinking too much about it. [And don't worry, there are no wrong answers here.]
- 3) When you think of energy efficiency, what comes to mind? That is, what does energy efficiency mean to you?

Understanding of AC Equipment



- 1. What do you want from your air conditioning unit? [Probe for importance of comfort, reliability, low initial costs]
- 2. Has anyone ever fixed their own AC unit?
 - c. What did you do? How difficult was it?
- 3. Has anyone ever fixed their own car?
- 4. What about your washing machine or another major appliance in your home?

(For those that have fixed a car or appliance)

- 5. Would you feel comfortable fixing your AC unit? Why or why not? (probe for reasons of feeling more comfortable fixing car even though it is more complicated than an AC system)
- 6. If I were to tell you that your unit has two parts, one indoor and one outdoor would you have any idea what the two parts do? (use show of hands with yes no somewhat)

Purchase of New Units

- 7. Has anyone bought a new unit in last 2 years?
 - g. What were the considerations involved in deciding what to get.
 - h. How did you make your decision?
 - i. Did you consider the efficiency?

[ASK ALL]

- 8. What considerations would you have if you needed new system? [Probe for duct work and leakage testing]
- 9. Are any of you aware of any tax credits that are available?
- 10. What about incentives from SDG&E?

Current Contractor and Maintenance

- 11. Who has a contractor that that is used regularly for AC service and repair?
 - g. How satisfied are you with the job they do? Why?
 - h. To what degree do you trust in what they may tell you is needed for the unit
- 12. How would you find a contactor if you needed one? What characteristics are important?
- 13. What kind of maintenance have you or have you hired someone to perform on your AC unit?



- i. Did you watch the technician perform maintenance? What did you see them do?
- j. Did you see the technician use gauges?
- 14. What kinds of things have the contractors told you are needed to be fixed?

Refrigerant Charge, Airflow, and Duct Sealing

I am going to hand out this brochure for a program called AC Time. The program promotes AC tune ups which are similar to car tune ups. When you get your car tuned up you save gas by improving the miles per gallon. When you get your AC tuned up you save electricity. The first thing the program does it offer advanced diagnostic training to AC contractors. Once these contractors complete the AC Time training they are can then perform tune ups using advanced diagnostics on AC systems. This would include diagnosing your AC system for refrigerant level, air flow through the system, duct sealing and overall AC system condition. All things that effect how well your AC system works. If the refrigerant charge is not at the right level or if the air flow is restricted your AC unit has to work harder therefore using more energy.

In this program after the AC Time contractor tests for these things you are given a "savings roadmap" which verifies that your AC system has been properly tested and adjusted for refrigerant charge and air flow and documents what repairs, if any, are needed. To find a contractor that has completed the training you would call the 1 800 number or go to the AC time website.

- 15. Has anyone ever had an AC tune where the technician tested for refrigerant charge, air flow or duct sealing?
- 16. What do you think of this program that I just described? Would you hire a specially trained contactor to perform a tune up on your AC. Why or why not?

By having your AC tuned up you would experience greater AC efficiency and lower operating costs, fewer repairs, your AC would last longer and would provide more comfort in your home.

- 17. What else would you need to know to want to have this service? How could we make the process easy to explain?
- 18. What is the value of the third-party verification? (the verification specialist to ensure the work was done properly)

San Diego Gas and Electric currently offers the tune up service free of charge to its customers. However, only some AC contractors choose to offer it.

19. If the contractor you currently use to service your AC unit did not offer this service how would that affect you? Would you find a contractor that did?



- 20. What should the program add to get more people interested in having the AC tune up? What should be done to get more contractors interested in offering the service?
- 21. What could the program do to make it easier for people to get this service?



17.5 In-depth Interview Guide: Verification Service Providers

AC TIMe Program (formerly called HVAC Training, Installation and Maintenance Program)

Please provide a summary of the progress you have made so far in participating in the AC TIMe Program

- 1. We know that KEMA signs up contractors to participate in the overall program. How many contractors have you recruited to use your Refrigerant Charge system?
- 2. Please describe the process you use to recruit contractors.
- 3. Have you seen the tri-fold pamphlet for marketing to contractors? Do you feel it provides the correct information? Do you feel contractors may want to participate after seeing the pamphlet? If not, what would you emphasize more?
- 4. What are the obligations for the contractors with whom you work?
- 5. How do you influence your contractors to provide the services called out by the program?
- 6. How many homes or commercial sites have participated? If several, what services are being offered the most to customers and what is the residential to commercial split?
- 7. Is this about what you expected to achieve at this point in the program?
- 8. Please describe the major issues you have encountered so far.
- 9. What are the goals for your part of the program?
- 10. What is needed to get the program to reach the goals you anticipated? (If no anticipated goals what do you think would increase the level of services by the contractors?)
- 11. Are there other parts of CA or the country where your refrigerant charge & airflow (RCA) system is being more heavily utilized? Why do you think the systems are more utilized there?



- 12. Training: Do you have any opinion on the training provided by the program (i.e. KEMA Services)?
- 13. Have you provided your own training to contractors? How is this done and on what do you train the contractors? How many have been done? How many firms have participated? Do you have a training manual?
- 14. How does one calculate the energy and demand savings resulting from the services rendered by the technician? (what is the algorithm)
- 15. Do you have data that shows actual changes made to the HVAC systems?
- 16. Does your RCA system require a pre-test and post-test reading of system conditions?
- 17. Describe your interaction with KEMA Services. What have been the strengths? What needs to change?
- 18. What data do you send to KEMA Services and what data do you collect, but not pass on?
- 19. What are the different business models you see in the HVAC contractor market?
 - a. How do the different HVAC contractors obtain business?
 - b. How do you think QI services fit into each of the different types of businesses?
- 20. What is the typical technician turnover rate for contractors?
- 21. What do you think are relevant questions to ask contractors regarding the implementation of quality installation services?

Premium Efficiency Cooling Program (formerly named upstream HVAC/motors)

- 22. Please describe the role you play in this program.
- 23. Please describe the cost to contractors to use your services. (Please designate the up-front and/or training costs, required equipment costs, and estimated resources required to participate in training and perform the QI services.)



- 24. Did you participate in the five program orientation workshops in San Diego, El Cajon and Temecula? (If no, how many did you attend?)
- 25. How many contractors in the SDG&E service area had you worked with in prior years, and how many of these did you expect to re-activate for this program?
- 26. Where are you now with respect to that goal?
- 27. The program goal is 3,420 residential systems. Where are you now with respect to that goal?
- 28. Regarding questions 4 and 5, s this about what you expected to achieve at this point in the program?
- 29. Please describe the major contractor enrollment and production issues you have encountered so far.
- 30. Have you seen any of the literature prepared for this program? Do you think that it addresses the needs?
- 31. What activities have you undertaken to recruit residential contractors? (Have you been working with distributors, industry associations, unions? Have you done any direct mailings or telemarketing to contractor lists?
- 32. Have you received any feedback from contractors about the program so far?
- 33. What if any has been your interaction with CSG?. What have been the strengths? What needs to change?
- 34. Are you participating on the SCE AC Quality Program? Is your contractor recruitment and production on the residential early retirement program significantly higher, lower, or about the same?
- 35. Please describe the reasons for differences in contractor participation and production.
- 36. What recommendations do you have for this program?



17.6 CATI Interview Guide: HVAC Contractors

Date	
Utility	SDG&E and SoCalGas
Program Name	AC TIMe Program and Premium Cooling & Motors Program
Target	HVAC Contractors
Sample Size	From D&B
Completed # Desired	140
Quotas (if applicable)	None
Sample File Name	ODC has names from D&B
Contractor Name	Equipoise Consulting Inc
Primary Contact (person	Mary Sutter
who should be contacted	
with any questionnaire	
questions)	
Phone	
Email	Mary@EquipoiseConsulting.com

Hello, my name is Sa	an Diego C	Gas & Electr	ric Company i	is doing a	lot of
energy efficiency work through HVAC co	ontractors s	such as you.	They are inter	ested in co	eating
better programs for the HVAC market. Do	you have a	about 12 min	utes to help us	? Are you	one of
the people in your company who is knowled	edgeable ab	out how the	business is run	n?	

(If not, ask: Can you direct me to the most appropriate person?)

S1. Would you say that the majority of your work occurs in the SDG&E service territory or the SoCalGas/SCE service territory?

SDG&E	1
SoCalGas/SCE	
(Neither)	4
(Don't know)	
(Refused)	

S2. We are trying to make sure we get responses from companies that service different types of customers. What percentage of your company's business is residential?

(NUMERIC OPEN ENDED 1.00)

[IF S2 = 1.00 SKIP TO **BEGINNING**]

S3. Thinking of the non-residential business that you do, what percentage of your business is packaged or unitary systems with a single compressor/condenser. That is, what percent of your nonresidential business is NOT involved with large centralized chillers with condensing systems.

(NUMERIC OPEN ENDED 1.00)



BEGINNING: Just so you know, all your responses will be kept confidential. Our first set of questions is about what we call Advanced Diagnostics or Quality Installation, or AD/QI for short. We think of QI as occurring when a technician has been specially trained to perform refrigerant charge and air flow diagnostics and duct testing and sealing using either one of four Verification Service Provider (or VSP) platforms or obtaining a NATE certification. The four VSP platforms are Check-Me, Enalasys, Field Diagnostics and Verified-RCA.

1.	Have you heard of any of these four VSP platforms?					
	Yes	1				
	No	2 [SKIP TO Q11]				
	(Don't know)	98 [SKIP TO Q11]				
	(Refused)	99 [SKIP TO Q11]				
2.	What percent of your technicians have been trained by one	of the VSPs?				
	NUMERIC OPEN ENDED 1.00	1				
	None	2 [SKIP TO Q12]				
	(Don't know)	98 [SKIP TO Q12]				
	(Refused)	99 [SKIP TO Q12]				
3.	Have you signed up with any of the 4 VSPs to use their syst	em?				
	Yes	1				
	No	2 [SKIP TO Q6]				
	(Don't know)	98 [SKIP TO Q6]				
	(Refused)	99 [SKIP TO Q6]				
4.	Which system or systems have you signed up with (MULTIPLE CHOICE, 4 ANSWERS)					
	Check-Me,	1				
	Enalasys	2				
	Field Diagnostics	3				
	Verified-RCA	4				
	(Don't know)	98				
	(Refused)	99				
5.	Approximately how many cooling systems have you tested	using that technique?				
	(NUMERIC OPEN ENDED 1,000)					
	(Don't know)	98				
	(Refused)	99				
6.	How would you best describe your company's use of AD/Q maintenance jobs?	I within your general service and				
	We do AD/QI on every service call we make	1				
	We do AD/QI when my techs have the time	2				
	We do AD/QI when requested by the customer	3				



	We do AD/QI only when there is a difficult system or one the problem	at is not simple to figure out th	
	Never	4 [SKIP TO O8]	
	Other (OPEN ENDED SPECIFY)		
	(Don't know)		
	(Refused)		
7.	What percent of the time do you think your technicians service the VSP-specific procedures?		
	(NUMERIC OPEN ENDED, 1.00)		
	(Don't know)	98	
	(Refused)	99	
8.	What percent of the time do you think your technicians service the refrigerant charge level WITHOUT using the VSP-specific procedure?		
	(NUMERIC OPEN ENDED, 1.00)		
	(Don't know)	98	
	(Refused)	99	
9.	Does your company perform Duct Test and Seal projects using a Blaster or similar tool?	an air flow tool such as a Duct	
	We do not perform duct test and seal projects	1	
	We use a Duct Blaster when we do duct test and seal projects	2	
	We use something similar to a Duct Blaster when we do DTS pr	rojects3	
	Other (OPEN ENDED SPECIFY)	5	
	(Don't know)	98	
	(Refused)	99	
10. In your opinion, how often does the information gained from the VSP-specific technique convince customers of the value of additional services such as repairs or system replaced Would you say it helps always, some of the time, never, or something else?			
	Never	1 [SKIP TO Q15]	
	Some of the time	2[SKIP TO Q15]	
	Always	3[SKIP TO Q15]	
	Something else (Specify)	4[SKIP TO Q15]	
	(Don't know)	98 [SKIP TO Q15]	
	(Refused)		
11.	While I can't explain each of these VSP platforms in our call, a attend up to 8 hours of training that increases their knowledge a charge and air flow problems and how to use the VSP platforms technician how to perform AD/QI using the VSPs equipment. So company to buy equipment to help with the diagnosing and some technicians to follow specific procedures to obtain the optimal of Testing and Sealing (if the contractor elects to do DTS) in the system.	cout diagnosing of refrigerant. The training also teaches the tome of the VSP's require the e do not. However, all require the harge and airflow and Duct	
	<i>5</i>		



12.	technicians trained in one of the VSP platforms? [MULTIPLE CHOICE, 10 choices]		
	It is too costly	1	
	The training takes up too much time	2	
	We have high turnover of technicians and it doesn't make sense to train them	3	
	We didn't know about any training	4	
	It doesn't add anything to our business	5	
	Our technicians are too busy to perform the procedures	6	
	We already perform this type of work, just not following specific procedures	7	
	The little amount the customer saves does not justify the expenses	8	
	I heard too many bad things about the procedures	9	
	Something else (Specify)	.0	
	(Don't know)9	8	
	(Refused)9	19	
13.	There are a few possible reasons for not doing training that we want to make sure we reason understand, so I am going to ask a couple questions that cover reasons you may have alrestated. If so, I apologize, but these are quick questions and I hope you don't mind answer them. I would like you to tell me your level of agreement to the following statement: Out company does not participate in VSP AD/QI training because we already do refrigerant and airflow servicing using other procedures. Would you say you disagree very much, do somewhat, neither agree nor disagree, agree somewhat, or agree very much with the statestant.	eady ring ur charge lisagree	
	Disagree very much	1	
	Disagree somewhat	2	
	Neither agree nor disagree	3	
	Agree somewhat	4	
	Agree very much	5	
	(Don't know)9	8	
	(Refused)9	19	
14.	I have another statement for you to consider using the same scale. The statement is: It we really hard to perform this type of testing during the summer because we are busy handli trouble calls, performing installations and fixing broken air conditioners. (Read scale againeeded)	ing	
	Disagree very much	1	
	Disagree somewhat	2	
	Neither agree nor disagree	3	
	Agree somewhat	4	
	Agree very much		
	(Don't know)9	8	
	(Refused)9)9	



15.	My next two questions are about the market in general. Would you say there IS or IS NOT shortage of HVAC technicians in today's market?		
	Is a shortage	1	
	Is not a shortage		
	(Don't know)		
	(Refused)		
16.	How has the shortage affected your business?		
	(I continually have to hire new technicians)		
	(I continually have to train new technicians)	2	
	(I have to pay my technician well to keep them)	3	
	(I do not have as much control over technicians as I would like)	4	
	(Makes it difficult for me to expand my business)	5	
	(Makes it difficult to offer the quality of service I would like)	6	
	(Makes it difficult to offer customers preventative maintenance)	7	
	(Other, specify)	00	
	(Don't know)	98	
	(Refused)	99	
	not, we are interested in your opinion about how to influence contractors such as your utility wanted to have more contractors use AD/QI techniques, what would it take to chappen?	cause this to	
	(Give incentive/rebate/\$\$)) 19]	
	(Pay for the equipment)	2	
	(Subsidize the training)	3	
	(Other, specify)	00	
	(Don't know)	98	
	(Refused)	99	
18.	What do you think is an appropriate incentive level per job that would cause your firm participate and use the VSP system on all jobs?	ı to	
	NUMERIC OPEN END (\$000.00)		
	No amount of money	2	
	(Don't know)	98	
	(Refused)		
19.	What percentage of the new equipment you install has SEER rating of 15 or higher?		
	NUMERIC OPEN END, 1.00 number [if 0% SKIP TO		
	(Don't know)		
20.	(Refused)	or AD/QI	



not a problem (with a number 1) to being an extremely significant problem (with a number 5). How would you rate...[ROTATE] b. not knowing who the decision maker is......NUMERIC VALUE, 10 number c. customers state they don't need product/service........... NUMERIC VALUE, 10 number d. no time to market this type of equipmentNUMERIC VALUE, 10 number e. insufficient sales staff.................................NUMERIC VALUE, 10 number g. lack of customer awareness or knowledge......NUMERIC VALUE, 10 number 21. Has your firm received any rebates from the Premium Efficiency Cooling Program for installing high efficiency air conditioning? 22. Are those rebates for locations serviced by San Diego Gas & Electric? Most of them _______3 23. What is the primary benefit the program provides your company? Receive rebate dollars _______1 Competitive pricing, 3 24. If a free half day sales training for high efficiency equipment were offered in your area, would you send your staff? Probably4



	(Refused)	99
25.	If a free whole day technical training on advanced diagnostic and quality installation were offered in your area, would you send your staff?	n and services
	Yes	1
	No	2
	Maybe	3
	Probably	4
	(Don't know)	98
	(Refused)	99
26.	If SDG&E could do one thing to help your firm sell premium efficiency cooling an installation and maintenance what would you choose? (read list)	d quality
	Increase the size of the rebates	1
	Promote ACCA quality installation or Energy Star certifications	2
	Promote and subsidize HVAC technical training	3
	Encourage co-branded advertising	4
	Advertise the value of premium efficiency and quality installation and maintenance	25
	Other, specify	6
	(Don't know)	98
	(Refused)	99
27.	When you replace a unit, what percentage of the time do you put in a larger unit, a same size, or a smaller unit?	unit of the
	NUMERIC OPEN END, 1.00 – LARGER UNIT NUMERIC OPEN END, 1.00 – UNIT OF SAME SIZE NUMERIC OPEN END, 1.00 – SMALLER UNIT	
	(Don't know)	98
	(Refused)	99
28.	My next couple of questions are about your company. Profit margins on installation and servicing of equipment can be different. In general, is your profit margin for se or lower than for installations? [potential to go away since obvious]	
	Higher	1
	Lower	2
	The same	3
	(Don't know)	98
	(Refused)	99
29.	Compared to other companies like yours, would you consider yourself small, media	ım, or large?
	Small	1
	Medium	
	Large	3
	(Don't know)	



	99
30. In competing with other companies for business, firms can try to beat a competitor's of offering a better price or by convincing the owner that a bid is of higher quality or more efficient than their competitors? Would you say your firm always attempts to offer a lo most of the time offers a lower price, most of the time offers higher quality, or always of higher quality?	e energy ower price,
Always lower price	1
Most of the time lower price	2
Most of the time higher quality	3
Always higher quality	4
(Don't know)	98
(Refused)	99
31. How many technicians work in your company?.	
NUMERIC OPEN END, 1,000	
(Don't know)	98
(Refused)	99
32. How many of them are NATE certified? (IF NEEDED: NATE stands for North Ameri Technician Excellence certification. It certifies heating, ventilation, and air-conditioning technicians in service and installation.)	
NUMERIC OPEN END, 1,000 or NUMERIC OPEN END, 1.00 (PERCENT) (Don't know)	98
(Refused)	99
33. When thinking of your annual sales, would you describe your business as: [READ LIST	Γ]
Less than \$250,000 in annual sales	1
\$250,000 to \$1 million in annual sales	2
\$1 million to \$5million in annual sales	3
More than \$5 million in annual sales	4
(Don't know)	98
(Refused)	99
33 Approximately, what percentage of your business is from the following	
Repeat business	1
Advertising	
Referrals	
Other	
Don't know	
Refused	99

END: Those are all my questions. Thank you so much for your time!



17.7 Frequency Table: HVAC Contractor Survey

Frequency Table HVAC Contractor Survey

October-November 2007

QS1 Would you say that the majority of your work occurs in the SDG&E service territory or the SoCalGas/SCE service territory?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	SDG&E	78	55.7	55.7	55.7
	SoCalGas/SCE	62	44.3	44.3	100.0
	Total	140	100.0	100.0	

QS2 What percentage of your company's business is residential?

		_			Cumulative
	_	Frequency	Percent	Valid Percent	Percent
Valid	0	17	12.1	12.1	12.1
	1	1	.7	.7	12.9
	5	3	2.1	2.1	15.0
	8	1	.7	.7	15.7
	10	6	4.3	4.3	20.0
	15	3	2.1	2.1	22.1
	20	8	5.7	5.7	27.9
	25	5	3.6	3.6	31.4
	30	2	1.4	1.4	32.9
	40	7	5.0	5.0	37.9
	50	8	5.7	5.7	43.6
	60	6	4.3	4.3	47.9
	65	2	1.4	1.4	49.3
	70	7	5.0	5.0	54.3
	75	7	5.0	5.0	59.3
	80	18	12.9	12.9	72.1
	85	6	4.3	4.3	76.4
	90	14	10.0	10.0	86.4
	91	1	.7	.7	87.1
	92	1	.7	.7	87.9
	95	9	6.4	6.4	94.3
	98	1	.7	.7	95.0
	99	4	2.9	2.9	97.9



	Frequency	Percent	Valid Percent	Cumulative Percent
100	3	2.1	2.1	100.0
Total	140	100.0	100.0	

QS3 Thinking of the non-residential business that you do, what percentage of your business is packaged or unitary systems with a single compressor/condenser?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	8	5.7	6.1	6.1
	1	2	1.4	1.5	7.6
	2	3	2.1	2.3	9.8
	3	1	.7	.8	10.6
	5	7	5.0	5.3	15.9
	10	3	2.1	2.3	18.2
	14	1	.7	.8	18.9
	15	4	2.9	3.0	22.0
	20	12	8.6	9.1	31.1
	25	2	1.4	1.5	32.6
	30	7	5.0	5.3	37.9
	35	1	.7	.8	38.6
	40	3	2.1	2.3	40.9
	45	1	.7	.8	41.7
	50	14	10.0	10.6	52.3
	60	5	3.6	3.8	56.1
	70	6	4.3	4.5	60.6
	75	5	3.6	3.8	64.4
	80	10	7.1	7.6	72.0
	85	1	.7	.8	72.7
	90	13	9.3	9.8	82.6
	95	2	1.4	1.5	84.1
	100	21	15.0	15.9	100.0
	Total	132	94.3	100.0	
Missing	Don't know	5	3.6		
	System	3	2.1		
	Total	8	5.7		
Total		140	100.0		

Q1 Have you heard of any of these four VSP platforms?

	Frequency	Percent	Valid Percent	Cumulative Percent
Valid Yes	90	64.3	64.3	64.3



	Frequency	Percent	Valid Percent	Cumulative Percent
No	48	34.3	34.3	98.6
(Don't know)	2	1.4	1.4	100.0
Total	140	100.0	100.0	

Q2 What percent of your technicians have been trained by one of the VSPs?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	36	25.7	42.4	42.4
	1	5	3.6	5.9	48.2
	2	1	.7	1.2	49.4
	10	3	2.1	3.5	52.9
	20	4	2.9	4.7	57.6
	30	1	.7	1.2	58.8
	33	1	.7	1.2	60.0
	40	2	1.4	2.4	62.4
	50	7	5.0	8.2	70.6
	75	2	1.4	2.4	72.9
	80	2	1.4	2.4	75.3
	97	1	.7	1.2	76.5
	100	20	14.3	23.5	100.0
	Total	85	60.7	100.0	
Missing	Don't know	5	3.6		
	System	50	35.7		
	Total	55	39.3		
Total		140	100.0		

Q3 Have you signed up with any of the 4 VSPs to use their system?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	17	12.1	35.4	35.4
	No	31	22.1	64.6	100.0
	Total	48	34.3	100.0	
Missing	(Don't know)	1	.7		
	System	91	65.0		
	Total	92	65.7		
Total		140	100.0		



Q4 \$VSP Frequencies

		Resp	Percent of Cases	
		N	Percent	N
VSPs(Check-Me,	9	50.0%	56.3%
a)	Enalasys	5	27.8%	31.3%
	Verified-RCA	4	22.2%	25.0%
Total		18	100.0%	112.5%

a Group

Q5 Approximately how many cooling systems have you tested using that technique?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	2	1	.7	7.1	7.1
	6	1	.7	7.1	14.3
	12	1	.7	7.1	21.4
	30	1	.7	7.1	28.6
	50	2	1.4	14.3	42.9
	75	1	.7	7.1	50.0
	100	1	.7	7.1	57.1
	160	1	.7	7.1	64.3
	200	2	1.4	14.3	78.6
	300	2	1.4	14.3	92.9
	1000	1	.7	7.1	100.0
	Total	14	10.0	100.0	
Missing	Don't know	3	2.1		
	System	123	87.9		
	Total	126	90.0		
Total		140	100.0		

Q6 How would you best describe your company's use of AD/QI within your general service and maintenance jobs?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	We do AD/QI on every service call we make	16	11.4	33.3	33.3
	We do AD/QI when my techs have the time	10	7.1	20.8	54.2
	We do AD/QI when requested by the customer	11	7.9	22.9	77.1



		Frequency	Percent	Valid Percent	Cumulative Percent
	We do AD/QI only when there is a difficult system or one that is not simple to figure out the problem	5	3.6	10.4	87.5
	Never	6	4.3	12.5	100.0
	Total	48	34.3	100.0	
Missing	(Other)	1	.7		
	System	91	65.0		
	Total	92	65.7		
Total		140	100.0		

Q7 What percent of the time do you think your technicians service the refrigerant charge level using the VSP-specific procedures?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1	1	.7	2.5	2.5
	5	1	.7	2.5	5.0
	10	3	2.1	7.5	12.5
	25	2	1.4	5.0	17.5
	30	2	1.4	5.0	22.5
	33	1	.7	2.5	25.0
	50	5	3.6	12.5	37.5
	60	3	2.1	7.5	45.0
	70	1	.7	2.5	47.5
	75	3	2.1	7.5	55.0
	80	2	1.4	5.0	60.0
	90	1	.7	2.5	62.5
	100	15	10.7	37.5	100.0
	Total	40	28.6	100.0	
Missing	Don't know	3	2.1		
	System	97	69.3		
	Total	100	71.4		
Total		140	100.0		

Q8 What percent of the time do you think your technicians service the refrigerant charge level WITHOUT using the VSP-specific procedure?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	18	12.9	39.1	39.1
	5	2	1.4	4.3	43.5
	10	1	.7	2.2	45.7



		Frequency	Percent	Valid Percent	Cumulative Percent
	25	2	1.4	4.3	50.0
	30	2	1.4	4.3	54.3
	40	4	2.9	8.7	63.0
	50	5	3.6	10.9	73.9
	67	1	.7	2.2	76.1
	70	2	1.4	4.3	80.4
	75	1	.7	2.2	82.6
	90	2	1.4	4.3	87.0
	100	6	4.3	13.0	100.0
	Total	46	32.9	100.0	
Missing	Don't know	3	2.1		
	System	91	65.0		
	Total	94	67.1		
Total		140	100.0		

Q9 Does your company perform Duct Test and Seal projects using an air flow tool such as a Duct Blaster or similar tool?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	2	1.4	4.1	4.1
	We do not perform duct test and seal projects	24	17.1	49.0	53.1
	We use a Duct Blaster when we do duct test and seal project	13	9.3	26.5	79.6
	We use something similar to a Duct Blaster when we do DTS	6	4.3	12.2	91.8
	(Don't know)	4	2.9	8.2	100.0
	Total	49	35.0	100.0	
Missing	System	91	65.0		
Total		140	100.0		

Q10 In your opinion, how often does the information gained from the VSP- specific technique help convince customers of the value of additional services such as repairs or system replacement?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(Other)	1	.7	2.0	2.0
	Never	10	7.1	20.4	22.4
	Some of the time	28	20.0	57.1	79.6
	Always	10	7.1	20.4	100.0



	Frequency	Percent	Valid Percent	Cumulative Percent
Total	49	35.0	100.0	
Missing System	91	65.0		
Total	140	100.0		

Q12 \$NP Frequencies

		Resp	onses	Percent of Cases
		N	Percent	N
Reasons why	It is too costly	15	18.1%	20.5%
not participating(a)	The training takes up too much time	9	10.8%	12.3%
a)	We have high turnover of technicians and it doesn't make sense to train them	4	4.8%	5.5%
	We didn't know about any training	15	18.1%	20.5%
	It doesn't add anything to our business	20	24.1%	27.4%
	Our technicians are too busy to perform the procedures	15	18.1%	20.5%
	We already perform this type of work, just not following specific procedures	5	6.0%	6.8%
Total		83	100.0%	113.7%

a Group

Q13 Agreement: Our company does not participate in VSP AD/QI training because we already do refrigerant charge and airflow servicing using other procedures.

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Disagree very much	9	6.4	10.6	10.6
	Disagree somewhat	6	4.3	7.1	17.6
	Neither agree nor disagree	12	8.6	14.1	31.8
	Agree somewhat	17	12.1	20.0	51.8
	Agree very much	41	29.3	48.2	100.0
	Total	85	60.7	100.0	
Missing	(Don't know)	6	4.3		
	System	49	35.0		
	Total	55	39.3		
Total		140	100.0		



Q14 It would be really hard to perform this type of testing during the summer because we are busy handling trouble calls, performing installations and fixing broken air conditioners.

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Disagree very much	12	8.6	13.6	13.6
	Disagree somewhat	8	5.7	9.1	22.7
	Neither agree nor disagree	8	5.7	9.1	31.8
	Agree somewhat	17	12.1	19.3	51.1
	Agree very much	43	30.7	48.9	100.0
	Total	88	62.9	100.0	
Missing	(Don't know)	2	1.4		
	(Refused)	1	.7		
	System	49	35.0		
	Total	52	37.1		
Total		140	100.0		

Q15 Would you say there IS or IS NOT a shortage of HVAC technicians in today's market?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Is a shortage	105	75.0	75.0	75.0
	Is not a shortage	31	22.1	22.1	97.1
	(Don't know)	4	2.9	2.9	100.0
	Total	140	100.0	100.0	

Q16 \$Shortage Frequencies

		Responses		Percent of Cases
		N	Percent	N
How Technician	(continually have to hire new technicians)	20	18.7%	23.5%
Shortage Has Affected Business(a)	(continually have to train new technicians)	25	23.4%	29.4%
	(have to pay my technician well to keep them)	18	16.8%	21.2%
	(do not have as much control over technicians as I would like)	2	1.9%	2.4%
	(Makes it difficult for me to expand my business)	28	26.2%	32.9%



		Responses		Percent of Cases
		N	Percent	N
	(Makes it difficult to offer the quality of service I would like)	12	11.2%	14.1%
	(Makes it difficult to offer customers preventative maintenance)	2	1.9%	2.4%
Total	,	107	100.0%	125.9%

a Group

Q17 \$Influence Frequencies

		Responses		Percent of Cases
		N	Percent	N
How could the utility influence higher AD/QI use?(a)	(Give incentive/rebate/\$\$)	63	44.7%	63.0%
	(Pay for the equipment)	25	17.7%	25.0%
	(Subsidize the training)	53	37.6%	53.0%
Total		141	100.0%	141.0%

a Group

Q18 What do you think is an appropriate incentive level per job that would cause your firm to participate and use the VSP system on all jobs?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	15	1	.7	3.4	3.4
	20	1	.7	3.4	6.9
	25	1	.7	3.4	10.3
	30	1	.7	3.4	13.8
	50	4	2.9	13.8	27.6
	80	1	.7	3.4	31.0
	85	1	.7	3.4	34.5
	90	1	.7	3.4	37.9
	100	4	2.9	13.8	51.7
	125	1	.7	3.4	55.2
	150	7	5.0	24.1	79.3
	200	2	1.4	6.9	86.2
	250	1	.7	3.4	89.7
	300	2	1.4	6.9	96.6
	500	1	.7	3.4	100.0
	Total	29	20.7	100.0	
Missing	No amount of money	3	2.1		
	Don't know	31	22.1		
	System	77	55.0		



	Frequency	Percent	Valid Percent	Cumulative Percent
Total	111	79.3		
Total	140	100.0		

Q19 What percentage of the new equipment you install has SEER rating of 15 or higher?

					Cumulative
		Frequency	Percent	Valid Percent	Percent
Valid	None	32	22.9	23.4	23.4
	1	4	2.9	2.9	26.3
	2	5	3.6	3.6	29.9
	3	1	.7	.7	30.7
	5	17	12.1	12.4	43.1
	7	2	1.4	1.5	44.5
	10	18	12.9	13.1	57.7
	13	2	1.4	1.5	59.1
	15	5	3.6	3.6	62.8
	20	10	7.1	7.3	70.1
	25	3	2.1	2.2	72.3
	30	2	1.4	1.5	73.7
	35	2	1.4	1.5	75.2
	40	6	4.3	4.4	79.6
	50	10	7.1	7.3	86.9
	60	4	2.9	2.9	89.8
	70	3	2.1	2.2	92.0
	75	2	1.4	1.5	93.4
	80	5	3.6	3.6	97.1
	90	2	1.4	1.5	98.5
	100	2	1.4	1.5	100.0
	Total	137	97.9	100.0	
Missing	Don't know	3	2.1		
Total		140	100.0		

Q20 Descriptive Statistics

How big a problem in selling above code equipment or AD/QI services to your customers is...

	N	Mean		Std. Deviation	
	Statistic	Statistic	Std. Error	Statistic	
Q20A reaching the decision maker?	103	2.20	.135	1.375	
Q20B not knowing who the decision maker is?	107	2.12	.137	1.412	
Q20C customers state they don't need product/service?	103	3.00	.141	1.435	
Q20D no time to market this type of equipment?	101	2.13	.127	1.278	



	N	Mean		Std. Deviation
	Statistic	Statistic	Std. Error	Statistic
Q20E insufficient sales staff?	105	1.96	.130	1.330
Q20F lack of staff training?	106	2.03	.140	1.444
Q20G lack of customer awareness or knowledge?	105	3.03	.140	1.431
Q20H price/cost issues?	107	3.61	.138	1.426
Q20I lack of marketing materials?	104	2.45	.141	1.434
Valid N (listwise)	98			

¹⁼Not a problem 5=Extremely significant problem

Q21 Has your firm received any rebates from the Premium Efficiency Cooling Program for installing high efficiency air conditioning?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	23	16.4	22.1	22.1
	No	81	57.9	77.9	100.0
	Total	104	74.3	100.0	
Missing	(Don't know)	4	2.9		
	System	32	22.9		
	Total	36	25.7		
Total		140	100.0		

Q22 Are those rebates for locations serviced by San Diego Gas Electric?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	12	8.6	57.1	57.1
	No	6	4.3	28.6	85.7
	Most of them	1	.7	4.8	90.5
	Some of them	2	1.4	9.5	100.0
	Total	21	15.0	100.0	
Missing	(Don't know)	2	1.4		
	System	117	83.6		
	Total	119	85.0		
Total		140	100.0		

Q23 What is the primary benefit the program provides your company?

	Frequency	Percent	Valid Percent	Cumulative Percent
Valid Other	4	2.9	17.4	17.4



		Frequency	Percent	Valid Percent	Cumulative Percent
	Receive rebate dollars	7	5.0	30.4	47.8
	Increased profitability selling premium efficiency	1	.7	4.3	52.2
	Competitive pricing,	3	2.1	13.0	65.2
	Premium efficiency equipment better serves customer	7	5.0	30.4	95.7
	(Don't know)	1	.7	4.3	100.0
	Total	23	16.4	100.0	
Missing	System	117	83.6		
Total		140	100.0		

Q24 If a free half day sales training for high efficiency equipment were offered in your area, would you send your staff?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	89	63.6	63.6	63.6
	No	23	16.4	16.4	80.0
	Maybe	22	15.7	15.7	95.7
	Probably	6	4.3	4.3	100.0
	Total	140	100.0	100.0	

Q25 If a free whole day technical training on advanced diagnostic and quality installation and services were offered in your area, would you send your staff?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	93	66.4	66.4	66.4
	No	19	13.6	13.6	80.0
	Maybe	23	16.4	16.4	96.4
	Probably	5	3.6	3.6	100.0
	Total	140	100.0	100.0	

Q26 If SDG&E could do one thing to help your firm sell premium efficiency cooling and quality installation and maintenance what would you choose?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Other	4	2.9	2.9	2.9
	Increase the size of the rebates	73	52.1	52.1	55.0



	Frequency	Percent	Valid Percent	Cumulative Percent
Promote ACCA quality installation or Energy Star certifications	7	5.0	5.0	60.0
Promote and subsidize HVAC technical training	18	12.9	12.9	72.9
Encourage co-branded advertising	6	4.3	4.3	77.1
Advertise the value of premium efficiency and quality installation and maintenance	28	20.0	20.0	97.1
(Don't know)	4	2.9	2.9	100.0
Total	140	100.0	100.0	

Q27A When you replace a unit, what percentage of the time do you put in a larger unit?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	44	31.4	33.6	33.6
	1	2	1.4	1.5	35.1
	2	3	2.1	2.3	37.4
	5	18	12.9	13.7	51.1
	10	20	14.3	15.3	66.4
	15	3	2.1	2.3	68.7
	20	17	12.1	13.0	81.7
	25	4	2.9	3.1	84.7
	30	2	1.4	1.5	86.3
	40	3	2.1	2.3	88.5
	50	8	5.7	6.1	94.7
	65	2	1.4	1.5	96.2
	100	5	3.6	3.8	100.0
	Total	131	93.6	100.0	
Missing	Don't know	9	6.4		
Total		140	100.0		

Q27B When you replace a unit, what percentage of the time do you put in a unit of the same size?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	5	3.6	3.8	3.8
	1	1	.7	.8	4.5
	2	1	.7	.8	5.3
	10	1	.7	.8	6.1
	25	1	.7	.8	6.8



		Frequency	Percent	Valid Percent	Cumulative Percent
	35	2	1.4	1.5	8.3
	40	2	1.4	1.5	9.8
	50	15	10.7	11.4	21.2
	60	7	5.0	5.3	26.5
	70	9	6.4	6.8	33.3
	75	3	2.1	2.3	35.6
	80	16	11.4	12.1	47.7
	85	4	2.9	3.0	50.8
	90	20	14.3	15.2	65.9
	95	13	9.3	9.8	75.8
	98	2	1.4	1.5	77.3
	99	1	.7	.8	78.0
	100	29	20.7	22.0	100.0
	Total	132	94.3	100.0	
Missing	Don't know	8	5.7		
Total		140	100.0		

Q27C When you replace a unit, what percentage of the time do you put in a smaller unit?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	86	61.4	65.2	65.2
	1	1	.7	.8	65.9
	2	1	.7	.8	66.7
	3	1	.7	.8	67.4
	5	11	7.9	8.3	75.8
	10	15	10.7	11.4	87.1
	15	1	.7	.8	87.9
	20	2	1.4	1.5	89.4
	30	2	1.4	1.5	90.9
	35	1	.7	.8	91.7
	40	2	1.4	1.5	93.2
	50	6	4.3	4.5	97.7
	75	1	.7	.8	98.5
	90	1	.7	.8	99.2
	99	1	.7	.8	100.0
	Total	132	94.3	100.0	
Missing	Don't know	8	5.7		
Total		140	100.0		



Q28 In general, is your profit margin for servicing higher or lower than for installations?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Higher	63	45.0	46.0	46.0
	Lower	36	25.7	26.3	72.3
	The same	26	18.6	19.0	91.2
	(Don't know)	12	8.6	8.8	100.0
	Total	137	97.9	100.0	
Missing	(Refused)	3	2.1		
Total		140	100.0		

Q29 Compared to other companies like yours, would you consider yourself small, medium, or large?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Small	112	80.0	80.0	80.0
	Medium	17	12.1	12.1	92.1
	Large	9	6.4	6.4	98.6
	(Don't know)	1	.7	.7	99.3
	(Refused)	1	.7	.7	100.0
	Total	140	100.0	100.0	

Q30 Would you say your firm always attempts to offer a lower price, most of the time offers a lower price, most of the time offers higher quality, or always offers higher quality?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Always lower price	14	10.0	10.3	10.3
	Most of the time lower price	18	12.9	13.2	23.5
	Most of the time higher quality	28	20.0	20.6	44.1
	Always higher quality	76	54.3	55.9	100.0
	Total	136	97.1	100.0	
Missing	(Don't know)	3	2.1		
	(Refused)	1	.7		
	Total	4	2.9		
Total		140	100.0		

Q31 How many technicians work in your company?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	6	4.3	4.3	4.3



					Cumulative
		Frequency	Percent	Valid Percent	Percent
	1	26	18.6	18.7	23.0
	2	29	20.7	20.9	43.9
	3	20	14.3	14.4	58.3
	4	12	8.6	8.6	66.9
	5	15	10.7	10.8	77.7
(6	4	2.9	2.9	80.6
1	7	5	3.6	3.6	84.2
8	8	2	1.4	1.4	85.6
(9	1	.7	.7	86.3
·	10	2	1.4	1.4	87.8
·	11	1	.7	.7	88.5
·	12	1	.7	.7	89.2
•	13	2	1.4	1.4	90.6
•	15	2	1.4	1.4	92.1
•	17	2	1.4	1.4	93.5
•	19	1	.7	.7	94.2
2	20	1	.7	.7	95.0
2	24	1	.7	.7	95.7
2	25	2	1.4	1.4	97.1
	35	2	1.4	1.4	98.6
7	72	1	.7	.7	99.3
•	105	1	.7	.7	100.0
-	Total	139	99.3	100.0	
Missing I	Refused	1	.7		
Total		140	100.0		

Q32 How many of them are NATE certified?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Number	137	97.9	97.9	97.9
	Percent	3	2.1	2.1	100.0
	Total	140	100.0	100.0	

Q32A How many of them are NATE certified? - number

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	75	53.6	57.3	57.3
	1	28	20.0	21.4	78.6
	2	9	6.4	6.9	85.5
	3	9	6.4	6.9	92.4



		Frequency	Percent	Valid Percent	Cumulative Percent
	4	3	2.1	2.3	94.7
	5	4	2.9	3.1	97.7
	7	1	.7	.8	98.5
	8	2	1.4	1.5	100.0
	Total	131	93.6	100.0	
Missing	Don't know	5	3.6		
	Refused	1	.7		
	System	3	2.1		
	Total	9	6.4		
Total		140	100.0		

Q32B How many of them are NATE certified? - percent

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	50	1	.7	33.3	33.3
	75	2	1.4	66.7	100.0
	Total	3	2.1	100.0	
Missing	System	137	97.9		
Total		140	100.0		

Q33 When thinking of your annual sales, would you describe your business as:

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Less than \$250,000 in annual sales	37	26.4	26.4	26.4
	\$250,000 to \$1 million in annual sales	60	42.9	42.9	69.3
	\$1 million to \$5 million in annual sales	30	21.4	21.4	90.7
	More than \$5 million in annual sales	8	5.7	5.7	96.4
	(Don't know)	1	.7	.7	97.1
	(Refused)	4	2.9	2.9	100.0
	Total	140	100.0	100.0	

Q33A Approximately, what percentage of your business is from the following: Repeat business

	Frequency	Percent	Valid Percent	Cumulative Percent
Valid 0	6	4.3	4.3	4.3



	Frequency	Percent	Valid Percent	Cumulative Percent
5	2	1.4	1.4	5.7
10	6	4.3	4.3	10.0
15	1	.7	.7	10.7
20	10	7.1	7.1	17.9
25	5	3.6	3.6	21.4
30	7	5.0	5.0	26.4
33	2	1.4	1.4	27.9
40	3	2.1	2.1	30.0
50	22	15.7	15.7	45.7
60	16	11.4	11.4	57.1
65	1	.7	.7	57.9
70	4	2.9	2.9	60.7
75	8	5.7	5.7	66.4
80	21	15.0	15.0	81.4
85	1	.7	.7	82.1
90	14	10.0	10.0	92.1
95	2	1.4	1.4	93.6
100	9	6.4	6.4	100.0
Total	140	100.0	100.0	

Q33B Approximately, what percentage of your business is from the following: Advertising

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	76	54.3	54.3	54.3
	1	1	.7	.7	55.0
	5	12	8.6	8.6	63.6
	10	14	10.0	10.0	73.6
	15	2	1.4	1.4	75.0
	18	1	.7	.7	75.7
	20	10	7.1	7.1	82.9
	25	8	5.7	5.7	88.6
	30	4	2.9	2.9	91.4
	33	1	.7	.7	92.1
	50	7	5.0	5.0	97.1
	60	1	.7	.7	97.9
	70	2	1.4	1.4	99.3
	80	1	.7	.7	100.0
	Total	140	100.0	100.0	



Q33C Approximately, what percentage of your business is from the following: Referrals

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	21	15.0	15.0	15.0
	2	1	.7	.7	15.7
	5	5	3.6	3.6	19.3
	9	1	.7	.7	20.0
	10	16	11.4	11.4	31.4
	15	7	5.0	5.0	36.4
	20	18	12.9	12.9	49.3
	25	12	8.6	8.6	57.9
	27	1	.7	.7	58.6
	30	6	4.3	4.3	62.9
	34	1	.7	.7	63.6
	35	2	1.4	1.4	65.0
	40	8	5.7	5.7	70.7
	45	2	1.4	1.4	72.1
	50	20	14.3	14.3	86.4
	60	5	3.6	3.6	90.0
	70	6	4.3	4.3	94.3
	75	3	2.1	2.1	96.4
	80	5	3.6	3.6	100.0
	Total	140	100.0	100.0	

Q33D Approximately, what percentage of your business is from the following: Other

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	124	88.6	88.6	88.6
	5	3	2.1	2.1	90.7
	10	7	5.0	5.0	95.7
	20	2	1.4	1.4	97.1
	25	1	.7	.7	97.9
	50	1	.7	.7	98.6
	55	1	.7	.7	99.3
	100	1	.7	.7	100.0
	Total	140	100.0	100.0	

Q33E Approximately, what percentage of your business is from the following: Don't know

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid 0)	139	99.3	99.3	99.3



	Frequency	Percent	Valid Percent	Cumulative Percent
100	1	.7	.7	100.0
Total	140	100.0	100.0	



18. SDGE 3044: VeSM Advantage Plus

Table 18-1 Final Research List

Final Research List						
Target for Data Collection	Data collection mode	Timing of data collection	Key Research Issues	Sample Size	Number of Data points	From where did you get the sample?
Utility Program Manager	In-depth interview	June - January	General understanding of program including goals, roles and responsibilities, marketing and recruitment, program implementation, interaction with other programs and third parties, and satisfaction and recommendations. Specific follow-up as needed.	NA	1	Program Information
Implementer Program Manager and key implementer staff	In-depth interview	June - January	General understanding of program including goals, roles and responsibilities, marketing and recruitment, program implementation, interaction with other programs and third parties, and satisfaction and recommendations. Specific follow-up as needed.	NA	3	Program Information
Account Executives & Targeted Customers	Onsite Observation	August and September	Observe education approach, applicability, concepts taught, receptiveness to information, identify recommendations for improvement to approach	4	2	Debra DeRusha at CMTC





19. SDGE Non-Residential Customer Survey

Table 19-1 Final Research List

Final Research List						
Target for Data Collection	Data collection mode	Timing of data collection	Key Research Issues	Sample Size	Number of Data points	From where did you get the sample?
Non-Residential Customers	CATI Interview	December - January	Equipment use and Energy Efficiency Practices, Interaction with Utility, Effectiveness of Outreach methods, Best methods of contact, Usefulness of Program Activities. Program Specific Modules: DCI, VeSM, Commercial Laundry, Express Efficiency, Small Business Super Saver, Domestic Hot Water, Mobile Energy Clinic, Retrocommissioning, On-Bill Financing	6,246	593	A general list of non- targeted industrial customers from SDG&E



19.1 Summary Results for SDGE Non-Residential Customer Survey

CATI interviews were conducted with SDG&E non-residential customers in December and January. SDG&E provided their customer database to us and a sample was selected, proportional by market segment to the population. The final sample included 6,246 customers, defined by unique phone numbers. Interviews were completed with 593 customers.

The interviews were designed to assess the overall marketplace and the level of interest in energy efficiency programs and practices of non-residential customers. The interviews also covered questions about specific programs, including awareness, whether they had participated and interest in participating in the future. The following programs were addressed: VeSM, Commercial Laundry, Express Efficiency, Small Business Super Saver, Domestic Hot Water Control, Mobile Energy Clinic, Retro-commissioning and On-Bill Financing.

The following sections summarize the results of the interviews.

Sources of Energy Efficiency Information

Just under half of all non-residential customers (45%) reported that they had received information about energy efficiency equipment or services. As shown in Figure 19-1, half (50%) of these customers indicated that they had received this information through the mail directly from the utility, and 29% reported that they received energy efficiency information from their Account Executive. Thirteen percent received information from an email sent to them by SDG&E, 4% received information from media sources (TV, radio, newspaper) and 4% from a contractor or vendor.

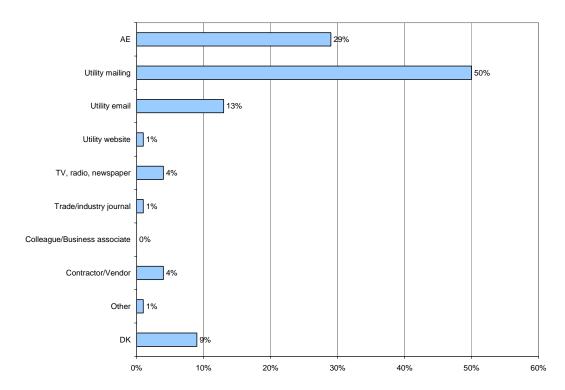
Differences by segment include:

- Overall, the following segments were more likely to indicate that they had received information about energy efficiency equipment and services since January 2006:
 - o Customers assigned to Account Executives (56% vs. 38% for unassigned customers)
 - o Large customers (59% vs. 42% for small customers)
 - O Customers using cooking end-use equipment and/or process-related equipment (61% and 59%, respectively)
- Although not statistically significant, customers who are assigned to Account Executives are surprisingly *less likely* to report that they have received information about energy efficiency from their SDG&E Account Executive, as compared to customers who are unassigned (24% vs. 33%, respectively).



Figure 19-1 Sources of Energy Efficiency Information

(Percent of Non-Residential Customers Receiving Information about Energy Efficiency Equipment and Services by Channel, unprompted)



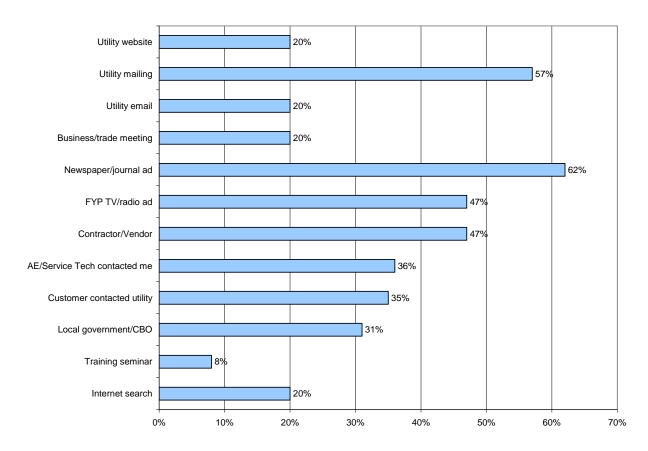
- Customers who are assigned to Account Executives are more likely to have received information about energy efficiency through the mail directly from SDG&E (61% vs. 41% for unassigned customers). Agricultural customers were also more likely to have received information in the mail (75% vs. 37% for industrial).
- Large customers and customers who are assigned to Account Executives are more likely to have received information about energy efficiency in an email from SDG&E (29% and 22%, respectively).

As shown in Figure 19-2, when prompted with specific sources for obtaining energy efficiency information, non-residential customers are most likely to report that they have "seen advertisements in a newspaper or trade journal regarding energy efficiency" (62%) and/or "received information from SDG&E through the mail, such as a bill insert or newsletter with information about energy efficiency opportunities" (57%). Non-residential customers were equally as likely to have indicated that they "heard about energy efficiency opportunities by television or radio specifically for Flex Your Power" and/or "learned about energy efficiency efforts from a contractor or vendor" (47% respectively).



Figure 19-2 Channels through Which Energy Efficiency Information Has Been Obtained

(Percent of Non-Residential Customers Receiving Information about Energy Efficiency Services by Channel, prompted)



Just over one-third (38%) of non-residential customers reported that they visited SDG&E's website, but overall only 20% reported that they noticed anything on the website related to energy efficiency opportunities.

About one-third of non-residential customers reported that they "had been contacted in person by SDG&E, such as by an Account Executive or Commercial Service Technician, about energy efficiency opportunities (36%)," "called SDG&E and had someone inform you about energy efficiency opportunities (35%)," and/or "heard about energy efficiency opportunities from your local government or from a non-profit organization in your community (31%)."

Meaningful differences by segment include:

• More likely to have visited SDG&E website, but not necessarily more likely to have noticed anything related to energy efficiency – large customers and those assigned to Account Executives



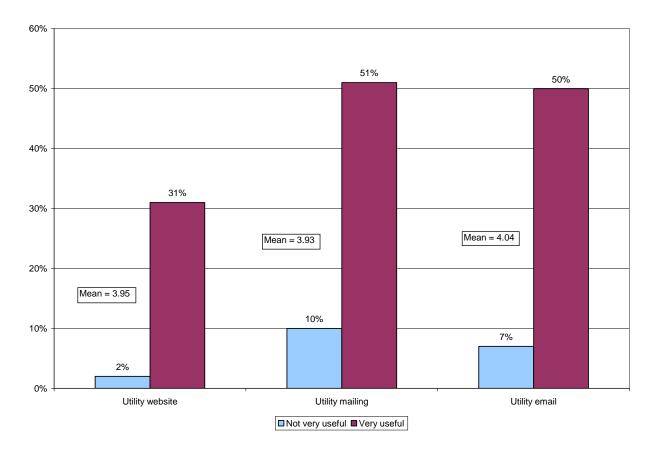
- More likely to have obtained energy efficiency information from SDG&E through the mail (e.g., bill insert, newsletter) agricultural customers
- More likely to have obtained energy efficiency information from SDG&E via email large customers and those assigned to Account Executives
- More likely to have obtained energy efficiency information by attending a business forum/trade meeting – large customers, assigned customers, customers with cooking end-use equipment, commercial customers, and customers who own their facilities
- More likely to have seen advertisements in a newspaper or trade journal regarding energy efficiency – assigned customers and customers who own their facilities
- More likely to have heard about energy efficiency opportunities by television or radio specifically for Flex Your Power assigned customers and customers who own their facilities
- More likely to have learned about energy efficiency efforts from a contractor or vendor large customers, assigned customers, commercial and industrial customers (not agricultural), customers who use water heating equipment (not customers who use process-related equipment)
- More likely to have been contacted in person by an SDG&E Account Executive or Commercial Service Technician about energy efficiency opportunities – large customers, assigned customers, and commercial customers (not industrial or agricultural)
- More likely to have called SDG&E and had someone inform you about energy efficiency opportunities assigned customers, and commercial and industrial customers (not agricultural)
- More likely to have heard about energy efficiency opportunities from your local government or from a non-profit organization in your community – small customers, assigned customers, commercial customers, and customers who own their facilities
- More likely to have performed an Internet search for energy efficiency information and/or programs – large customers

As shown in Figure 19-3, about half of non-residential customers who obtained information about energy efficiency from SDG&E via direct mail or email indicated that they felt this information was "very useful" (51% and 50%, respectively), as compared to only about one third (31%) who visited SDG&E's website. Very few survey respondents offered any suggestions for how to make the information they obtained from any of these three sources more useful. Some of the comments addressed areas of potential weakness, including the content and format of the information provided, as well as specific program design considerations:

- *Content*: More applicable to my business, more detailed information, more information on specific programs/services, more phone numbers/contact information
- Format: More graphics/color, more timely, more simple/checklist, more direct
- Program Design: More rebates/incentives, more technical assistance, more seminars



Figure 19-3
Usefulness of Information Obtained from SDG&E Website, Direct Mail and Email
(Usefulness scale: 1 = "not very useful" and 5 = "very useful")

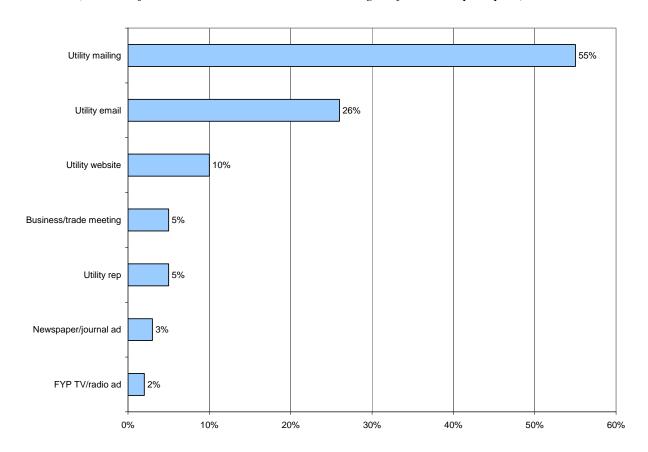


Overall, as shown in Figure 19-4, more than half (55%) of non-residential customers indicated that the best way for SDG&E to provide them with information about energy efficiency opportunities is through the mail. One quarter would prefer to receive information from SDG&E via email and another 10% prefer getting this type of information from SDG&E's website. Differences by segment include:

- Customers who are not assigned to Account Executives are most likely to prefer information provided through the mail
- Email is preferred by large customers and customers assigned to Account Executives, and industrial customers
- Information provided at business/industry events is preferred by agricultural customers



Figure 19-4
Preferred Channels for Information on Energy Efficiency Opportunities
(Percent of Non-Residential Customers Indicating Preference, unprompted)



Interaction with Utility

One third (31%) of non-residential customers reported that, other than their monthly bill, they have communicated with SDG&E since January 2006. The vast majority of these customers were either "very satisfied" (64%) or "somewhat satisfied" (23%) with their interaction with the utility. Only 5% were "very dissatisfied" with their interaction. Notably, large customers and customers assigned to Account Executives were more likely to be "very satisfied" with their utility interactions (87% and 73%, respectively).

Interaction with Account Executive

Over half (58%) of assigned customers indicated that their Account Executives had discussed energy efficiency programs and opportunities with them over the past two years. That is, among the respondents



who identified him or herself as the primary contact for an assigned account, 7 58% reported that they had discussed energy efficiency with their Account Executive within the past two years. These respondents were then asked to indicate how active their Account Executive has been in terms of providing them with information about energy efficiency programs. Most indicated that their Account Executive was either "very inactive" (44%) or "somewhat inactive" (13%). Only 3% reported their Account Executive was "very active" and one-quarter (25%) indicated their Account Executive was "somewhat active." The most commonly mentioned energy efficiency programs and opportunities addressed lighting end-uses (48%), demand response programs (16%) and HVAC equipment (14%).

Program Timing

In an effort to assess the extent to which there are times when customers are less likely to respond to program marketing and outreach (because of other business priorities), we asked non-residential customers "Is there any time of the year where you would be too busy to consider installing new energy efficient equipment?" Overall, just under half (43%) reported that there is no particular time of year when they would be too busy to consider implementing energy efficiency projects. About one in five (21%) reported the summer months (i.e., June, July and August) as a time of year when they would be too busy to implement projects, and another 13% indicated year-end (i.e., December, January and February) as a time when they would be too busy to implement projects. As expected, commercial customers were more likely to report year-end, agricultural customers were more likely to report the summer months, and industrial customers were more likely to report the summer months, and industrial customers were more likely to report "year round" as busy times.

Rebates remain the most helpful means through which to encourage business customers to implement energy efficiency projects. Other services designed to help customers identify energy efficiency opportunities were also considered to be fairly helpful.

As shown in Figure 19-5, more than two-thirds (67%) of the non-residential customers surveyed through this evaluation indicate that "rebates that cover a portion of the costs of energy efficient equipment" would be helpful to their businesses.8 Other services that were viewed as helpful by more than half of all non-residential customers include "an in-person energy assessment of your facilities" and "an email alerting you to a problem with your energy using equipment such as your air conditioning or boiler system." Assistance in obtaining financing for energy efficiency projects and assistance in project implementation were also considered to be helpful services for more than 45% of the non-residential customers surveyed through this evaluation. Surprisingly, services that were not considered to be very helpful by a significant portion (45%) of non-residential customers include "workshops about energy efficiency at an industry-related conference." About one third of non-residential customers would not find "training at your facility on any aspect of energy efficiency use or project implementation" or

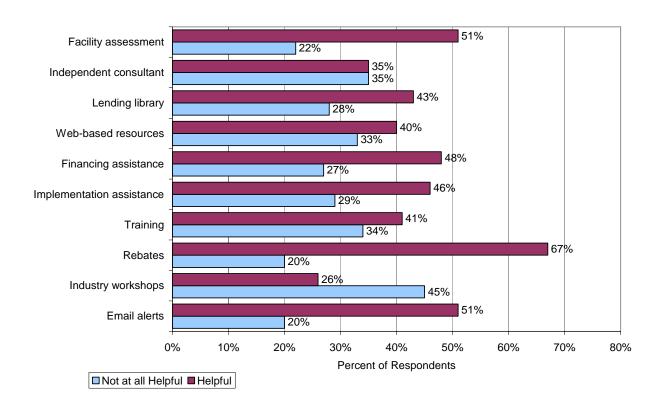
⁷ Specifically, customers assigned to Account Executives were asked "Our records indicated that you have an Account Executive with SDG&E, are you the primary contact?" Just over half (54%) of customers with assigned Account Executives indicated that they were the primary contact for their account.

⁸ Non-residential customers were asked the following question on our non-residential market survey: "SDG&E wants to provide energy efficiency services that will be most helpful to its customers. I am going to read you a list of energy efficiency services and I'd like you to tell me how helpful you think each would be to your business. As I read each one, please assume you are already aware of the service and just think about how helpful it might be to your business. On a scale of 1 to 5, with 1 being 'not very helpful' and 5 being 'very helpful,' how helpful would [service] be to your business?"



"having an independent energy consultant verify sales persons' claims about energy savings" very helpful.

Figure 19-5
Non-Residential Customer Opinions about Helpful Energy Efficiency Product and Service Offerings



Perceptions regarding the helpfulness of these various services vary by customer segment, as discussed below:

- An in-person energy assessment of your facilities
 - O There is considerable interest in this type of service among the largest, assigned non-residential customers. Over half (59%) of all non-residential customers who are assigned to Account Executives would find this service "very helpful," as compared to only 27% of non-residential customers who are not assigned to Account Executives. The Account Executive, therefore, is the key link to identifying customers for whom this type of service would be most beneficial and for identifying the specific service offering within SDG&E's overall portfolio that can best meet this need.
- Have an independent energy consultant verify sales persons' claims about energy savings



- O Although not statistically significant, the results indicate that larger customers and customers assigned to Account Executives would find this service more valuable than smaller customers/customers not assigned to Account Executives (35/35% for large/assigned v. 23/19% for small/unassigned). While these customers are likely to be approached more frequently by sales agents, we might have expected that larger customers would already have greater resources available to them to independently assess their claims and thus might not find this service that valuable. Whereas smaller customers, who may not be approached as frequently, are much less likely to have these types of resources available to them and presumably might find greater value in this type of service. However, for smaller customers, convenience and ease of implementation are key factors in product/service adoption and, potentially, the "hassle factor" associated with this type of service may outweigh the perceived value to smaller customers.
- A lending library of meters and diagnostic tools to measure potential energy saving at your facilities
 - O Not surprisingly, this service would be the most helpful to larger customers as opposed to small (49% vs. 25%). There also appears to be more interest in this type of service among commercial businesses, especially hotels (50%), rather than industrial or agricultural customers. That said, however, customers with process-related end-use equipment (36%) expressed the most interest in this type of service (i.e., more than customers with other types of end-use equipment).
- Web-based energy efficiency resources such as how to specify, select, or calculate the potential energy savings from energy efficient equipment
 - o It appears that agricultural customers would find this service particularly helpful, although the results are not statistically significant due to the relatively small sample size. Out of the 20 agricultural customers asked this question, 12 (or 60%) indicated that they would find this type of service "very helpful."
- Assistance in obtaining financing for energy efficiency projects
 - Nearly three-quarters (72%) of all non-residential customers who are assigned to Account Executives would find this type of service to be "very helpful," as compared to only 27% of non-residential customers who are not assigned to Account Executives. Commercial businesses were much more interested in this type of service as compared to industrial customers (46% vs. 26%), as were non-residential customers who own their facilities as compared to those who lease (51% vs. 28%).
- Assistance in project implementation for energy efficiency projects
 - o Interest in this type of service did not vary across many of the different non-residential segments, except for commercial vs. industrial. Commercial businesses were much more likely to find this type of service to be "very helpful" as compared to industrial customers (29% vs. 13%).
- Training at your facility on any aspect of energy efficiency use or project implementation
 - This type of service was perceived to be "not very helpful" by 40% of non-residential customers who are not assigned to Account Executives. Account Executives, therefore, should continue to promote trainings (in particular trainings conducted onsite at customers' facilities) to assigned customers. Efforts to promote trainings to unassigned customers should be well targeted.



- Rebates that cover a portion of the costs of energy efficient equipment
 - O Across all segments, non-residential customer interest in rebates remains considerable 61% reported rebates would be "very helpful." Large customers and customers with cooking enduse equipment were much more likely to report that rebates would be "very helpful" to their businesses. It should be noted that for nearly one-quarter of all small non-residential customers rebates were reported to be "not very helpful" indicating a significant barrier to increased penetration within this market segment.
- Workshops about energy efficiency at an industry-related conference
 - o Workshops at industry-related conferences were among the least helpful energy efficiency services that SDG&E could offer to its non-residential customers 45% reported that this service would be "not at all helpful." There were no significant differences across segments.
- An email alerting you to a problem with your energy using equipment such as your air conditioning or boiler system
 - o Interestingly, the two segments for which this service was most likely to be considered helpful include (a) customers who are assigned Account Executives, and (b) SDG&E's smallest customers. This implies that different promotional strategies and marketing messages might be needed, but there appears to be interest at both ends of the spectrum for this relatively new and innovative service offering.



19.2 CATI Interview Guide: Non-Residential Customers

FINAL December 6, 2007

The sample will be drawn from utility databases so all respondents will be utility customers who pay their own energy bills. This general market survey will be fielded to a sample of customers in each segment and sub-segment, as defined by the utility's segmentation scheme (primarily using NAICS codes).

Introduction (O/I)	
Hello, my name is	_ and I'm calling from Opinion Dynamics, an independent research
firm. This is not a sales call.	We are conducting research on behalf of [San Diego Gas and
Electric/Southern California Gas also	o known as The Gas Company] to help them develop programs to
better serve their customers.	

I am interested in speaking with the facility manager or someone who is familiar with the energy use and operations for your business or facility?

All responses will be treated confidentially, and will be used to help us understand the overall marketplace and make recommendations to [San Diego Gas & Electric/The Gas Company] regarding energy efficiency services that they could offer to their customers.

Section 1: General Business (GB)

This section will be used to confirm the current segmentation scheme. Since the focus of this effort is to understand awareness of and opportunities for energy efficiency changes through the utilities' programs (based on what they currently know about their customers), we will not be attempting our own more detailed classification, or examining the type of use in this space beyond the initial classification available to the utility.

GB1. Our records show that your business is classified as a/an < NAICS CODE DESCRIPTION>. Is this the type of business at <ADDRESS>?

- 1. Yes [SKIP TO Q.CE1]
- 2. No
- 3. (Don't know/Refused)

[ASK IF SDG&E]

GB2a. How would you characterize your business?

- 1. (Agriculture)
- 2. (Sand and Gravel Contractor)
- 3. (Utility)
- 4. (Government)
- 5. (Military)
- 6. (Lodging)
- 7. (Miscellaneous Services)
- 8. (Recreation/Entertainment)



- 9. (College/University)
- 10. (Healthcare)
- 11. (School/Library)
- 12. (Biotech/Laboratory/Research)
- 13. (Electronics/Telecommunications)
- 14. (General Manufacturing)
- 15. (Groceries)
- 16. (Non-Food Retail)
- 17. (Property Management/Offices)
- 18. (Restaurant)
- 19. (Wholesale/Warehousing)
- 20. (Other, specify) THANK AND TERMINATE
- (No don't know...record as other if necessary)

[ASK IF SoCalGas]

GB2b. How would you characterize your business?

- 1. (Agriculture)
- 2. (Construction)
- 3. (Mining & Extraction)
- 4. (Government)
- 5. (Health)
- 6. (Schools)
- 7. (Universities)
- 8. (Chemical)
- 9. (Food & Beverage)
- 10. (Metals)
- 11. (Miscellaneous Manufacturing)
- 12. (Refineries)
- 13. (Stone, Ceramics, & Asphalt)
- 14. (Retail/Offices)
- 15. (Amusement)
- 16. (Laundry)
- 17. (Lodging)
- 18. (Miscellaneous Services)
- 19. (Restaurant)
- 20. (Transportation)
- 21. (Other, specify) THANK AND TERMINATE

(No don't know...record as other if necessary)

(Other, specify) THANK AND TERMINATE

(No don't know...record as other if necessary)



Section 2: Characterization of Energy Usage (CE)

This section will be used to understand potential areas of opportunities for customers. This information is based on perceptions only. We will also collect basic information on the most frequently mentioned actions taken to date, and plans for future actions.

CE2. I'm going to read you a short list of energy-using equipment that your business may or may not be using. Which of the following types of equipment do you currently use at this facility? (1=Yes, 2=No, 3=(Don't know/Refused))

- a. Heating
- b. Cooling
- c. Refrigeration
- d. Water heating
- e. Cooking
- f. Process-related

CE2g. Does your business use any other major type of energy-using equipment at this facility? (Probe with: Any others?)
[OPEN END]

[SKIP IF ALL CE2=NO, DON'T KNOW]

Now I'd like to ask you some more specific questions about each type of equipment that you indicated that you have at your facility.

[ASK CE3a-CE3g AS MENTIONED IN CE2a-CE2g – GO THROUGH THE REST OF THIS SECTION BY EQUIPMENT TYPE (i.e., Cooling)]

CE3a-CE3g. On a scale of 1 to 5, where 1 means "very inefficient" and 5 means "very efficient," how would you rate the overall energy efficiency of *[read applicable equipment type from CE2a-CE2g]* equipment? When I say energy efficiency, keep in mind not only how old your existing equipment is but also how well it is operated and maintained..

- 1. -1- Very inefficient
- 2. -2-
- 3. -3-
- 4. -4-
- 5. -5- Very efficient
- 6. (Don't know/Refused)

CE3h. What about the lighting equipment used at your facility? On a scale of 1 to 5, where 1 means "very inefficient" and 5 means "very efficient," how would you rate the energy efficiency of your lighting equipment? When we say energy efficiency, keep in mind not only how old the equipment is but also how well it is operated and maintained.



CE4a-CE4h. In the next year, how likely are you to make changes to the [READ EQUIPMENT TYPE] equipment . . . (READ LIST)

- 1. Very unlikely
- 2. Somewhat unlikely
- 3. Neither likely nor unlikely
- 4. Somewhat likely
- 5. Very likely
- 6. (Don't know/Refused)

CE4i. In the next year, how likely are you to make any OTHER major changes to the facility (IF NEEDED: THIS MIGHT INCLUDE BUILDING SHELL IMPROVEMENTS, SUCH AS NEW WINDOWS, INSULATION, NEW ROOF, ETC. AS WELL AS MAJOR/MINOR RENOVATIONS TO ENTIRE SECTIONS OF THE FACILITY)

[ASK CE5a-h IF CE4a-h=4 OR 5]

CE5a-CE5i. What changes are you planning to make to the [READ EQUIPMENT TYPE] equipment? (PROBE WITH: Anything else?)

- 1. (Purchase new equipment, specify:)
- 2. (Improve operation of existing equipment, specify:)
- 3. (Improve maintenance practices for existing equipment, specify:)
- 4. (Other, specify)
- 5. (Don't know/Refused)

CE6. How important of a consideration will energy efficiency be when making changes to your equipment in the future. . . (READ LIST)

- 1. Very unimportant
- 2. Somewhat unimportant
- 3. Neither important nor unimportant
- 4. Somewhat important
- 5. Very important
- 6. (Don't know/Refused)

ASK IF CE6=1-3

CE7. Why do you think that energy efficiency will not be an important consideration? [OPEN END]

Section 3: Information Sources (IS)

This section will be used to collect information on the sources of energy efficiency information, unaided mention of the utility as a source of information.

IS1. Since January 2006, do you recall receiving any information about energy efficiency equipment or services in general?

- 1. Yes
- 2. No [SKIP TO Q.DC1]
- 3. (Don't know/Refused) [SKIP TO Q.DC1]



IS2. From whom did you receive this information? [MULTIPLE RESPONSE-ALLOW UP TO 5 RESPONSES]

- 1. ([San Diego Gas & Electric/The Gas Company] Account Executive)
- 2. ([San Diego Gas & Electric/The Gas Company] promotional materials by mail)
- 3. ([San Diego Gas & Electric/The Gas Company] promotional materials by email)
- 4. ([San Diego Gas & Electric/The Gas Company] website)
- 5. (TV, radio ad, newspaper)
- 6. (Trade or industry journal)
- 7. (Colleague, business associate)
- 8. (Contractor/vendor)
- 9. (Training/seminar at the Energy Resource Center)
- 10. (FYP Website)
- 00. (Other, please specify)
- 98. (Don't know/Refused)

[ASK ABOUT 4 OF THESE – A, D, G, & H OR B, E, K, & L OR C, F, I, & J]

DC1. I'm going to ask you about several ways in which you might have seen or heard about information on energy efficiency. Have you ever... (1=Yes, 2=No, 3=(Don't know/Refused)) [ROTATE – B THRU L]

- W. Visited [The Gas Company's/San Diego Gas and Electric's] website?
 - A2.[IF A=1] Did you see anything on the website about energy efficiency opportunities?
- X. Received information from [The Gas Company/San Diego Gas and Electric] through the mail, such as a bill insert or newsletter with information about energy efficiency opportunities?
- Y. Received an email from [The Gas Company/San Diego Gas and Electric] utility regarding energy efficiency information?
- Z. Attended an event, such as a business forum or trade meeting, where information about energy efficiency was distributed?
- AA. Seen advertisements in a newspaper or trade journal regarding energy efficiency?
- BB.Heard about energy efficiency opportunities by television or radio specifically for Flex Your Power?
- CC. Learned about energy efficiency efforts from a contractor or vendor?
- DD. Been contacted in person by [The Gas Company/San Diego Gas and Electric], (such as by an Account Executive or Commercial Service Technician) about energy efficiency opportunities?
- EE. Called [The Gas Company/San Diego Gas and Electric] and had someone inform you about energy efficiency opportunities?
- FF. Heard about energy efficiency opportunities from your local government or from a non-profit organization in your community?
- GG. Attended a training seminar provided by [SDG&E/SoCalGas]
- HH. Performed an Internet search for energy efficiency information and/or programs?

[IF YES TO DC1A2=1, or B=1, or C=1]

DC2a. On a scale of 1 to 5 where 1 is not at all useful and 5 is very useful, how useful did you find the information provided by [The Gas Company/San Diego Gas and Electric] [through email, through the mail, on its website]?

- 7. -1- Not at all useful
- 8. -2-



- 9. -3-
- 10. -4-
- 11. -5- Very useful
- 12. (Don't know/Refused)

[SKIP IF DC2a=5]

DC3. What would have made this information more useful? [OPEN END]

DC4. Based on all of the things that you can think of, what is the best way to provide you with information about energy efficiency opportunities? [MULTIPLE RESPONSE - ALLOW UP TO 5 RESPONSES]

- 25. (Gas or electric utility website)
- 26. (Information from utility received through the mail, such as a bill insert or newsletter)
- 27. (An email from gas or electric utility)
- 28. (An event, such as a business forum or trade meeting)
- 29. (Advertisements in a newspaper or trade journal)
- 30. (Television or radio advertisements specifically for Flex Your Power)
- 31. (Other television or radio advertisements)
- 32. (A contractor)
- 33. (A representative of the gas or electric utility—didn't mention Account Representative)
- 34. (Specifically mentioned Account Executive or Account Representative)
- 35. (A local government or non-profit agency in the community)
- 00. (Other, specify)
- 98. (Don't know/Refused)

Section 4: Services Desired and Timing

This section will be used to understand customer interest in program opportunities and services offered by the utilities.

[San Diego Gas & Electric/The Gas Company] wants to provide energy efficiency services that will be most helpful to its customers. I am going to read you a list of energy efficiency services and I'd like you to tell me how helpful you think each would be to your business. As I read each one, please assume you are already aware of the service and just think about how helpful it might be to your business. On a scale of 1 to 5, with 1 being "not very helpful" and 5 being "very helpful," how helpful would [READ SERVICE] be to your business?

- 1. -1- Not very helpful
- 2. -2-
- 3. -3-
- 4. -4-
- 5. -5- Very helpful)
- 6. (Don't know/Refused)

[READ AND ROTATE – ASK ABOUT 5 OF THESE]

- M1. An in-person energy assessment of your facilities.
- M3. Have an independent energy consultant verify sales persons' claims about energy savings.



- M5. A lending library of meters and diagnostic tools to measure potential energy saving at your facilities.
- M6. Web based energy efficiency resources such as how to specify, select, or calculate the potential energy savings from energy efficient equipment.
- M7. Assistance in obtaining financing for energy efficiency projects.
- M8. Assistance in project implementation for energy efficiency projects.
- M9. Training at your facility on any aspect of energy efficiency use or project implementation.
- M10. Rebates that cover a portion of the costs of energy efficient equipment.
- M11. Workshops about energy efficiency at an industry-related conference.
- M12. An email alerting you to a problem with your energy using equipment such as your air conditioning or boiler system.
- M13. Is there any time of the year where you would be too busy to consider installing new energy efficient equipment?
 - 1. (December, January, February)
 - 2. (March, April, May)
 - 3. (June, July, August)
 - 4. (September, October, November)
 - 00. (Other, specify)
 - 96. (No)
 - 98. (Don't know/Refused)

Section 5: Interaction with Utility

This section will be used to understand communications with the utility, interactions with Account Executives (for larger customers).

- C1. Other than your monthly bill, have you had any communications with [The Gas Company /San Diego Gas and Electric] since January 2006?
 - 1. Yes
 - 2. No [SKIP TO Q.C4]
 - 3. (Don't know/Refused) [SKIP TO Q.C4]
- C2. How satisfied were you with these interactions?
 - 1. Very dissatisfied
 - 2. Somewhat dissatisfied
 - 3. Neither satisfied nor dissatisfied
 - 4. Somewhat satisfied
 - 5. Very satisfied
 - 6. (Don't know/Refused)
- C2b. What kind of communications did you have with the company? [OPEN END]
- C4. Our records indicate that your company has an Account Executive with [San Diego Gas & Electric/The Gas Company], are you the primary contact?
 - 1. Yes
 - 2. No [SKIP TO SECTION 6]
 - 3. (Don't know/Refused) [SKIP TO SECTION 6]



- C5. In that past two years, has your Account Executive ever talked to you about energy efficiency programs or other energy efficiency opportunities?
 - 1. Yes
 - 2. No [SKIP TO SECTION 6]
 - 3. (Don't know/Refused) [SKIP TO SECTION 6]
- C6. How active is your Account Executive in providing you with information about energy efficiency programs...
 - 1. Very inactive
 - 2. Somewhat inactive
 - 3. Neither inactive nor active
 - 4. Somewhat active
 - 5. Very inactive
 - 6. (Don't know/Refused)
- C7. Specifically, what energy saving programs or services has your Account Executive talked to you about?

[OPEN END]

Section 6: Program Specific Awareness

ASK CUSTOMERS ABOUT NO MORE THAN 3 PROGRAMS FROM THE TABLE BELOW.

For SDG&E

	Small customers (<200kW) will be asked about	Medium customers (200- 500kW)will be asked about	Large customers (>=500kW) will be asked about	
Express		X	X	
Small Business Super Saver	X			
ESB/SPC (combine)		X	X	
DHW		X (Hotel Only)	X (Hotel Only)	
IEEA/VeSM (combine)		X (Industrial Only)	X (Industrial Only)	
MEC	X			
Laundry	X (com. laundry only)	X (com. laundry only)	X (com. laundry only)	
Preschool	X (school only)	X (school only)	X (school only)	
BEA	X	X		
Rx		X	X	
On-Bill Financing	X			

For SoCalGas

	Small customers will be asked about	Medium customers will be asked about	Large customers will be asked about	
Business Energy Efficiency	X	X	X	
Program				
Express	X	X	X	
VeSM			X (Industrial Only)	
Constant Volume Retrofit			X	
Laundry	X (com. laundry only)	X (com. laundry only)	X (com. laundry only)	



On-Bill Financing	X	X	

I want to ask you specifically about three programs offered by [San Diego Gas & Electric/The Gas Company].

Express Efficiency [ASK IF MEDIUM OR LARGE]

PS1a. The Express Efficiency Program offers rebates for nearly 150 types of energy efficient equipment. The program provides rebates to cover a portion of the extra cost of energy efficient equipment such as lighting, HVAC, and refrigeration. Prior to this survey, had you ever heard of [SDG&E's] Express Efficiency Program?

- 1. Yes
- 2. No.
- 3. (Don't know/Refused)

[ASK IF PS1a=1]

PS1b. Have you ever participated in the Express Efficiency Program?

- 1. Yes
- 2. No.
- 3. (Don't know/Refused)

[ASK IF PS1b=1]

PS1c. Have you participated in the last two years?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[SKIP IF PS1b=1]

PS1d. Now that you know a little about the program, how likely do you think your business would be to participate in it?

- 1. Very unlikely
- 2. Somewhat unlikely
- 3. Neither likely nor unlikely
- 4. Somewhat likely
- 5. Very likely
- 6. (Don't know/Refused)

[SKIP IF PS1d=5,WR]

PS1e. What are the reasons why your company might not participate in the Express Efficiency Program?

- 1. (Not interested/not a priority)
- 2. (Don't know enough **about program** and how to participate)
- 3. (Not relevant to my business)
- 4. (Don't have technical expertise)
- 00. (Other, specify)
- 98. (Don't know/Refused)

Standard Performance Contract and Energy Savings Bid

PS2a. The Standard Performance Contract Program and the Energy Savings Bid offer financial incentives for energy efficiency projects involving lighting, air conditioning, refrigeration, gas equipment



and other technologies. In these programs, businesses typically work with registered project sponsors who compile information needed to meet the participation requirements. Prior to this survey, had you ever heard of SDG&E's Standard Performance Contract or Energy Savings Bid Programs?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[ASK IF PS2a=1]

PS2b. Have you ever participated in the Standard Performance Contract or Energy Savings Bid Programs?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[ASK IF PS2b=1]

PS2c. Have you participated in the last two years?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[SKIP IF PS2b=1]

PS2d. Now that you know a little about the programs, how likely do you think your business would be to participate in them?

- 1. Very unlikely
- 2. Somewhat unlikely
- 3. Neither likely nor unlikely
- 4. Somewhat likely
- 5. Very likely
- 6. (Don't know/Refused)

[SKIP IF PS2d=5,WR]

PS2e. What are the reasons why your company might not participate in the programs?

- 1. (Not interested/not a priority)
- 2. (Don't know enough **about program** and how to participate)
- 3. (Not relevant to my business)
- 4. (Don't have technical expertise)
- 00. (Other, specify)
- 98. (Don't know/Refused)

Small Business Super Saver [ASK IF SMALL BUSINESS<100 kW]

PS3a. The Small Business Super Saver Program provides rebate amounts for new lighting, HVAC, refrigeration, and other technologies. Participants usually work directly with a contractor who handles the rebate paperwork and installs the equipment. Prior to this survey, had you ever heard of SDG&E's Small Business Super Saver Program?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)



[ASK IF PS3a=1]

PS3b. Have you ever participated in the Small Business Super Saver Program?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[ASK IF PS3b=1]

PS3c. Have you participated in the last two years?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[SKIP IF PS3b=1]

PS3d. Now that you know a little about the programs, how likely do you think your business would be to participate in them?

- 1. Very unlikely
- 2. Somewhat unlikely
- 3. Neither likely nor unlikely
- 4. Somewhat likely
- 5. Very likely
- 6. (Don't know/Refused)

[SKIP IF PS3d=5,WR]

PS3e. What are the reasons why your company might not participate in the Small Business Super Saver Program?

- 1. (Not interested/not a priority)
- 2. (Don't know enough **about program** and how to participate)
- 3. (Not relevant to my business)
- 4. (Don't have technical expertise)
- 00. (Other, specify)
- 98. (Don't know/Refused)

Domestic Hot Water Control [ASK HOTEL/MOTEL ONLY]

PS4a. The Domestic Hot Water Control Program installs wireless controls for hot water systems in hotels/motels, which can generate natural gas savings. In addition, the program provides reporting services to allow facility managers to monitor the hot water system via the internet. Prior to this survey, had you ever heard of SDG&E's Domestic Hot Water Control Program?

- 1. Yes
- 2. No.
- 3. (Don't know/Refused)

[ASK IF PS4a=1]

PS4b. Have you ever participated in the Domestic Hot Water Control Program?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)



[ASK IF PS4b=1]

PS4c. Have you participated in the last two years?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[SKIP IF PS4b=1]

PS4d. Now that you know a little about the program, how likely do you think your business would be to participate in it?

- 1. Very unlikely
- 2. Somewhat unlikely
- 3. Neither likely nor unlikely
- 4. Somewhat likely
- 5. Very likely
- 6. (Don't know/Refused)

[SKIP IF PS4d=5,WR]

PS4e. What are the reasons why your company might not participate in the Domestic Hot Water Control program?

- 1. (Not interested/not a priority)
- 2. (Don't know enough **about program** and how to participate)
- 3. (Not relevant to my business)
- 4. (Don't have technical expertise)
- 00. (Other, specify)
- 98. (Don't know/Refused)

Industrial Energy Efficiency Acceleration Program and VeSM Advantage Program (ASK If Manufacturing / Process Industries ONLY)

PS5a. SDG&E offers two programs specifically for businesses in the Manufacturing and Processing Industry: the Industrial Energy Efficiency Acceleration and the V.E.S.M. Program. In the I.E.E.A. program, energy experts conduct a FREE on-site assessment to locate sites of critical energy loss in order to provide participants with a detailed report on energy-efficiency opportunities, and energy conservation tips. The V.E.S.M. program uses mapping tools to identify and remove areas of waste energy from the manufacturing process. Recommendations focus on productivity and capacity improvements, waste minimization, efficiency improvements, scheduling enhancements, materials handling, Lean manufacturing and equipment maintenance. Prior to this survey, had you ever heard of SDG&E's Industrial Energy Efficiency Acceleration or V.E.S.M. program?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[ASK IF PS5a=1]

PS5b. Have you ever participated in the Industrial Energy Efficiency Acceleration or V.E.S.M. program?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[ASK IF PS5b=1]



PS5c. Have you participated in the last two years?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[SKIP IF PS5b=1]

PS5d. Now that you know a little about the programs, how likely do you think your business would be to participate in them?

- 1. Very unlikely
- 2. Somewhat unlikely
- 3. Neither likely nor unlikely
- 4. Somewhat likely
- 5. Very likely
- 6. (Don't know/Refused)

[SKIP IF PS5d=5,WR]

PS5e. What are the reasons why your company might not participate in the Industrial Energy Efficiency Acceleration or V.E.S.M. program?

- 1. (Not interested/not a priority)
- 2. (Don't know enough **about program** and how to participate)
- 3. (Not relevant to my business)
- 4. (Don't have technical expertise)
- 00. (Other, specify)
- 98. (Don't know/Refused)

Mobile Energy Clinic [ASK SMALL BUSINESSES ONLY]

PS6a. The Mobile Energy Clinic is a mobile repair van that provides insight, maintenance and on occasion, equipment to enhance the energy efficiency of businesses. During the initial free walk-through inspection performed by the Mobile Energy Clinic staff, they identify various things that could be done to save energy at your business. Prior to this survey, had you ever heard of SDG&E's Mobile Energy Clinic?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[ASK IF PS6a=1]

PS6b. Have you ever received a visit from the Mobile Energy Clinic?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[ASK IF PS6b=1]

PS6c. Was it in the last two years?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[SKIP IF PS6b=1]



PS6d. Now that you know a little about the Mobile Energy Clinic, how likely do you think your business would be to have the walk-through inspection done?

- 1. Very unlikely
- 2. Somewhat unlikely
- 3. Neither likely nor unlikely
- 4. Somewhat likely
- 5. Very likely
- 6. (Don't know/Refused)

[SKIP IF PS6d=5,WR]

PS6e. What are the reasons why your company might not want the Mobile Energy Clinic to come to your facility?

- 1. (Not interested/not a priority)
- 2. (Don't know enough **about program** and how to participate)
- 3. (Not relevant to my business)
- 4. (Don't have technical expertise)
- 00. (Other, specify)
- 98. (Don't know/Refused)

Commercial Laundry Program [ASK Laundromats ONLY]

PS7a. The Commercial Laundry Program provides financial incentives to change-out inefficient coinoperated clothes washers in Laundromats or multi-family sites. Prior to this survey, had you ever heard of [SDG&E's] Commercial Laundry Program?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[ASK IF PS7a=1]

PS7b. Have you ever participated in the Commercial Laundry Program?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[ASK IF PS7b=1]

PS7c. Have you participated in the last two years?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[SKIP IF PS7b=1]

PS7d. Now that you know a little about the program, how likely do you think your business would be to participate in it?

- 1. Very unlikely
- 2. Somewhat unlikely
- 3. Neither likely nor unlikely
- 4. Somewhat likely
- 5. Very likely
- 6. (Don't know/Refused)



[SKIP IF PS7d=5,WR]

PS7e. What are the reasons why your company might not participate in the Commercial Laundry Program?

- 1. (Not interested/not a priority)
- 2. (Don't know enough **about program** and how to participate)
- 3. (Not relevant to my business)
- 4. (Don't have technical expertise)
- 5. (Don't have the needed cash)
- 6. (The current machines are relatively new)
- 7. (I wasn't sure it would be worth the extra money)
- 8. (I don't think that the savings would really be there)
- 9. (We don't buy our machines)
- 00. (Other, specify)
- 98. (Don't know)

California Preschool Energy Efficiency Program [ASK IF PRESCHOOL ONLY]

PS8a. The California Preschool Energy Efficiency Program provides audits, incentives, and turn-key installation of energy efficiency measures at preschools. Targeted equipment includes lighting, heating, ventilating and air conditioning, and refrigeration. Prior to this survey, had you ever heard of [SDG&E's] California Preschool Energy Efficiency Program?

- 1. Yes
- 2. No.
- 3. (Don't know/Refused)

[ASK IF PS8a=1]

PS8b. Have you ever participated in the California Preschool Energy Efficiency Program?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[ASK IF PS8b=1]

PS8c. Have you participated in the last two years?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[SKIP IF PS8b=1]

PS8d. Now that you know a little about the program, how likely do you think your business would be to participate in it?

- 1. Very unlikely
- 2. Somewhat unlikely
- 3. Neither likely nor unlikely
- 4. Somewhat likely
- 5. Very likely
- 6. (Don't know/Refused)

[SKIP IF PS8d=5,WR]



PS8e. What are the reasons why your school might not participate in the California Preschool Energy Efficiency Program?

- 1. (Not interested/not a priority)
- 2. (Don't know enough **about program** and how to participate)
- 3. (Not relevant to my business)
- 4. (Don't have technical expertise)
- 5. (We don't pay our own bills)
- 00. (Other, specify)
- 98. (Don't know)

Business Energy Assessment Program [ASK IF SMALL OR MEDIUM BUSINESS ONLY]

PS9a. The Business Energy Assessment Program has an online tool called "Energy Challenger" that helps compare your company's energy use and energy efficiency levels with similar companies. The Energy Challenger takes about 15 minutes to complete and recommendations for improving energy efficiency at your business is provided based on your responses to the Energy Challenger questions. Prior to this survey, had you ever heard of SDG&E's Business Energy Assessment Program?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[ASK IF PS9a=1]

PS9b. Have you ever participated in the Business Energy Assessment Program?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[ASK IF PS9b=1]

PS9c. Have you participated in the last two years?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[SKIP IF PS9b=1]

PS9d. Now that you know a little about the program, how likely do you think your business would be to participate in it?

- 1. Very unlikely
- 2. Somewhat unlikely
- 3. Neither likely nor unlikely
- 4. Somewhat likely
- 5. Very likely
- 6. (Don't know/Refused)

[SKIP IF PS9d=5,WR]

PS9e. What are the reasons why your company might not participate in the Business Energy Assessment Program?

- 1. (Not interested/not a priority)
- 2. (Don't know enough **about program** and how to participate)
- 3. (Not relevant to my business)



- 4. (Don't have technical expertise)
- 00. (Other, specify)
- 98. (Don't know)

Retro-Commissioning Program [ASK IF MEDIUM OR LARGE BUSINESS ONLY]

PS10a. Through the Retro-commissioning Program, engineers who specialize in detecting and correcting inefficient building operations conduct a detailed study to identify and implement critical operating and maintenance improvements. Training for in-house O&M personnel is also provided. Prior to this survey, had you ever heard of SDG&E's Retro-commissioning Program?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[ASK IF PS10a=1]

PS10b. Have you ever participated in the Retro-commissioning Program?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[ASK IF PS10b=1]

PS10c. Have you participated in the last two years?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[SKIP IF PS10b=1]

PS10d. Now that you know a little about the program, how likely do you think your business would be to participate in it?

- 1. Very unlikely
- 2. Somewhat unlikely
- 3. Neither likely nor unlikely
- 4. Somewhat likely
- 5. Very likely
- 6. (Don't know/Refused)

[SKIP IF PS10d=5,WR]

PS10e. What are the reasons why your company might not participate in the Retro-commissioning Program?

- 1. (Not interested/not a priority)
- 2. (Don't know enough **about program** and how to participate)
- 3. (Not relevant to my business)
- 4. (Don't have technical expertise)
- 00. (Other, specify)
- 98. (Don't know/Refused)

On-Bill Financing

PS11a. The On-Bill Financing program helps qualified customers pay for energy-efficient business improvements through their [San Diego Gas & Electric/The Gas Company] bill. On-Bill Financing works



in conjunction with the rebate and incentive programs to provide a zero-percent financing option for customers, with the loan payments appearing on your utility bill. Prior to this survey, had you ever heard of the [San Diego Gas & Electric/The Gas Company's] On-Bill Financing Program?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[ASK IF PS11a=1]

PS11b. Have you ever participated in the On-Bill Financing Program?

- 1. Yes
- 2. No.
- 3. (Don't know/Refused)

[ASK IF PS11b=1]

PS11c. Have you participated in the last two years?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[SKIP IF PS11b=1]

PS11d. Now that you know a little about the program, how likely do you think your business would be to participate in it?

- 1. Very unlikely
- 2. Somewhat unlikely
- 3. Neither likely nor unlikely
- 4. Somewhat likely
- 5. Very likely
- 6. (Don't know/Refused)

[SKIP IF PS11d=5,WR]

PS11e. What are the reasons why your company might not participate in the On-Bill Financing Program?

- 1. (Not interested/not a priority)
- 2. (Don't know enough **about program** and how to participate)
- 3. (Not relevant to my business)
- 4. (Don't have technical expertise)
- 00. (Other, specify)
- 98. (Don't know/Refused)

Constant Volume Retrofit Program (CVRP)

PS12a. The Constant Volume Retrofit Program focuses on upgrades to constant volume air flow systems which necessitate mechanical manipulation to adjust airflow and, therefore, typically remain set at one volume despite inconsistent building needs. The program provides incentives for a wireless technology that enables automatic airflow changes. Prior to this survey, had you ever heard of The Gas Company's Constant Volume Retrofit Program?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)



[ASK IF PS12a=1]

PS12b. Have you ever participated in the Constant Volume Retrofit Program?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[ASK IF PS12b=1]

PS12c. Have you participated in the last two years?

- 1. Yes
- 2. No.
- 3. (Don't know/Refused)

[SKIP IF PS12b=1]

PS12d. Now that you know a little about the program, how likely do you think your business would be to participate in it?

- 1. Very unlikely
- 2. Somewhat unlikely
- 3. Neither likely nor unlikely
- 4. Somewhat likely
- 5. Very likely
- 6. (Don't know/Refused)

[SKIP IF PS12d=5,WR]

PS12e. What are the reasons why your company might not participate in the Constant Volume Retrofit Program?

- 1. (Not interested/not a priority)
- 2. (Don't know enough **about program** and how to participate)
- 3. (Not relevant to my business)
- 4. (Don't have technical expertise)
- 00. (Other, specify)
- 98. (Don't know/Refused)

Business Energy Efficiency Program (BEEP)

PS13a. The Business Energy Efficiency Program, referred to as the BEEP program, offers rebates on qualified food service equipment (such as steamers, fryers, or ovens), provides incentives for a widerange of process efficiency improvements, and offers grants of up to \$300,000 to large nonresidential customers to develop innovative strategies to reduce gas usage at their facilities. Prior to this survey, had you ever heard of The Gas Company's Business Energy Efficiency Program, or BEEP?

- 1. Yes
- 2. No.
- 3. (Don't know/Refused)

[ASK IF PS13a=1]

PS13b. Have you ever participated in the Business Energy Efficiency Program?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)



[ASK IF PS13b=1]

PS13c. Have you participated in the last two years?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

[SKIP IF PS13b=1]

PS13d. Now that you know a little about the program, how likely do you think your business would be to participate in it?

- 1. Very unlikely
- 2. Somewhat unlikely
- 3. Neither likely nor unlikely
- 4. Somewhat likely
- 5. Very likely
- 6. (Don't know/Refused)

[SKIP IF PS13d=5,WR]

PS13e. What are the reasons why your company might not participate in the Business Energy Efficiency Program?

- 1. (Not interested/not a priority)
- 2. (Don't know enough **about program** and how to participate)
- 3. (Not relevant to my business)
- 4. (Don't have technical expertise)
- 00. (Other, specify)
- 98. (Don't know/Refused)

Section 7: Additional Hotel Questions [ASK HOTEL ONLY]

- H1. Have you ever used Energy Star's Portfolio Manager for the lodging industry?
 - 1. Yes
 - 2. No
 - 3. (Don't know/Refused)
- H2. Do you participate in the Good Earth Keeping Program sponsored by the American Hotel and Lodging Association?
 - 1. Yes
 - 2. No
 - 3. (Don't know/Refused)

Section 8: Firmographics

Finally, I just have some general questions about your business.

- F1. Do you lease or own your facility?
 - 1. Lease
 - 2. Own
 - 3. (Other, specify)



4. (Don't know/refused)

F3a. What is the approximate TOTAL square footage of your facility at this location?

- 1. Less than 1,500 sq ft
- 2. 1,500 4,999 sq ft
- 3. 5,000 9,999 sq ft
- 4. 10,000 24,999 sq ft
- 5. 25,000 49,999 sq ft
- 6. 50,000 74,999 sq ft
- 7. 75,000 99,999 sq ft
- 8. Over 100,000 sq ft
- 9. (Don't know/Refused)
- F5. Do you have anyone devoted full-time as a building engineer or facility manager?
 - 1. Yes
 - 2. No
 - 02. (Other, specify)
 - 100. (Don't know/Refused)
- F6. Would you say that your [IF SoCalGas: gas/IF SDG&E: gas and electric] costs represent a . . . (READ LIST)
 - 1. Very small
 - 2. Small
 - 3. Medium
 - 4. Large, or
 - 5. Very large part of your operating costs each month?
 - 6. (Don't know/refused)
- F7. On average, how many hours a day is your facility in use?
 - 1. Less than 8 hours
 - 2. 8 to 11 hours
 - 3. 12 to 15 hours
 - 4. 16 to 23 hours
 - 5. 24 hours
 - 6. (Don't know/refused)
- F8. Are decisions regarding energy usage being made from a corporate office offsite or at the facility?
 - 1. (Corporate office)
 - 2. (At the facility)
 - 00. (Other, specify)
 - 98. (Don't know/Refused)
- FF1. Do you use email for business purposes?
 - 1. Yes
 - 2. No
 - 3. (Don't know/Refused)

[ASK HOTEL ONLY FF2-FF4]



FF2. Approximately, how many customer rooms are in the hotel?

- 1. (0-25)
- 2. (25-50)
- 3. (50-100)
- 4. (100-150)
- 5. (150-300)
- 6. (Over 300)
- 7. (Don't know/Refused)

FF3. What is the average occupancy rate?

- 1. (0-25%)
- 2. (25-50%)
- 3. (50-75%)
- 4. (75-100%)
- 5. (Don't know/Refused)

FF4. How long has the hotel been operating under the current management?

- 1. (less than one year)
- 2. (1-5 years)
- 3. (5-10 years)
- 4. (10+ years)
- 5. (Don't know/Refused)

[ASK INDUSTRIAL ONLY]

FF5. Does your facility include production or processing operations?

- 1. Yes
- 2. No
- 3. (Don't know/Refused)

Your responses will remain confidential, but may I confirm your name and title in case I need to call you back?



19.3 Disposition of CATI Interviews: SDGE Non-Residential Customer Survey

RESULT

		Frequency	Percent
Valid	1 No answer	194	3.11%
	2 Answering machine	392	6.28%
	3 Busy	39	0.62%
	4 Disconnected phone	657	10.52%
	5 Business/Residential phone (ADJUST)	206	3.30%
	6 Initial refusal	733	11.74%
	7 Computer tone	81	1.30%
	8 Language problems	191	3.06%
	9 RESPONDENT SCHEDULED APPOINTMENT	426	6.82%
	10 Completed interview	593	9.49%
	11 Mid-interview terminate	71	1.14%
	12 Enter a substitute phone number	2	0.03%
	13 Duplicate phone number	27	0.43%
	14 Privacy line/Number blocked	53	0.85%
	15 Wrong number	229	3.67%
	16 Non-specific callback/secretary/NTG	1,675	26.82%
	17 HARD REFUSAL - DO NOT CALL	194	3.11%
	18 Cell Phone Refused to do survey because its a CELL		
	PHONE	25	0.40%
	19 Not in one of our business categories	21	0.34%
	20 No business in California	42	0.67%
	21 Sent to corporate - no number given	127	2.03%
	22 Client removed	43	0.69%
	23 800 number-callback	31	0.50%
	24 Tenant pays separately	31	0.50%
	25 Auto voicemail-cannot be transferred w/o name/ext	124	1.99%
	26 Business closing	14	0.22%
	99 Not called	25	0.40%
	Total	6,246	100
	Incidence	0.969	
	RR	0.128	
	Length	11.48	
	Dates	12/6-1/23/08	