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# ClimateSmart Program 2008 Annual Report

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***Pacific Gas and  
Electric Company™***

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March 16, 2009

## TABLE OF CONTENTS

1. Executive Summary .....	1
a. Accomplishments .....	1
b. Program Benefits .....	4
c. Challenges and Concerns .....	5
2. Introduction .....	7
a. The History of the Program .....	7
b. The Purpose and Contents of This Annual Report .....	8
c. Regulatory Developments and Submittals .....	8
3. Program Administration.....	10
a. Administrative Highlights .....	10
b. Customer Participation.....	10
i. Program Enrollments.....	11
ii. Program Attrition .....	13
iii. Participants' Contributions.....	14
c. Program Partners .....	15
i. The California Climate Action Registry (CCAR) .....	15
ii. The External Advisory Group (EAG) .....	16
4. Education and Outreach .....	17
a. Residential .....	17
b. Partnerships With Governments, Environmental and Other Affinity Groups.....	17
c. Events and Sponsorships .....	18
d. Non-Purchased Media Coverage .....	19
e. Direct Outreach .....	19
f. Broad Based Paid Media Awareness Campaign .....	20
g. Non-residential Customers.....	23
5. Contracts and GHG Impact.....	24

## TABLE OF CONTENTS

(CONTINUED)

a. GHG Emission Reduction Project Solicitation Results.....	24
b. Development of New Protocols.....	25
c. Summary of the Projects Submitting Bids.....	26
d. Verified Emission Reduction Purchase Agreements (VERPAs) .....	28
e. Value of GHG Emission Reductions Under Contract.....	30
6. ClimateSmart Charity Update .....	31
7. Financial Results.....	32
a. ClimateSmart Program Revenues.....	32
b. ClimateSmart Program Authorized Budget .....	33
c. Independent Review of the ClimateSmart Program.....	34
8. Program Assessments.....	35
a. Programmatic Benefits/Successes .....	35
b. Lessons Learned in 2008.....	38
9. Conclusion .....	41
Appendix A – Cross Reference to Decision 06-12-032	
Appendix B – ClimateSmart™ Customer Annual Report	
Appendix C – Summary of Regulatory Submittals and Approvals	
Appendix D – Members of External Advisory Group (EAG)	
Appendix E – List of Events Occurring In 2008 That Included ClimateSmart™ Outreach	
Appendix F – Copy of Letter Sent to Customers From ClimateSmart™ Charity Regarding 2008 Premium Contributions	
Appendix G – List of All Marketing and Communication Materials Produced in 2008	
Appendix H – Redacted Verified Emission Reduction Purchase and Sale Agreements (VERPAs)	
Appendix I – National and International Memoranda of Understanding (MOU)	
Appendix J – Fact Sheet on Climate Change for Low-Income Customers	

## 1. Executive Summary

Pacific Gas and Electric Company (PG&E or the Company) is pleased to provide the California Public Utilities Commission (CPUC or Commission) and interested parties with this second annual report highlighting the key accomplishments, benefits and challenges of the ClimateSmart™<sup>1</sup> program.

The ClimateSmart program gives PG&E customers the means to reduce their personal carbon footprint. PG&E charges each participant a modest fee based on their electricity and natural gas consumption. This fee averaged \$2.89 per month for the typical residential customer, which is less than the \$4.31 forecasted when the program was originally proposed. PG&E uses the entire fee to contract for an equivalent amount of greenhouse gas (GHG) emission reductions, thereby making the energy use in the customer's home or business carbon neutral. All of the GHG emission reduction projects contracted for by the ClimateSmart program are based in California and would not have happened without funding from the ClimateSmart program. Moreover, all of the GHG emission reduction projects are independently verified under the protocols developed by the California Climate Action Registry (CCAR).

By encouraging participants to first reduce their energy use through energy efficiency, the ClimateSmart program reinforces the CPUC's long-standing focus on energy efficiency and contributes to California's multifaceted fight against climate change.

### a. Accomplishments

PG&E reached a number of milestones and achieved a number of accomplishments during the second year of this three-year demonstration program.

#### *Educating and Enrolling Customers*

- Total enrollment in the ClimateSmart program grew by 112 percent from 14,572 on December 31, 2007 to 30,965 on December 31, 2008. The largest percentage growth in enrollment came from commercial customers, which increased by 265 percent.
- The cumulative contributions made by customers in the ClimateSmart program (including PG&E) totaled approximately \$2.6 million by December 31, 2008. Contributions made by ClimateSmart customers tripled in 2008.
- PG&E continues to demonstrate its commitment to the ClimateSmart program by making its own buildings' energy use carbon neutral. The program's largest individual contributor, PG&E has contributed to the ClimateSmart program a total of \$978,000 in shareholder funding as of December 31, 2008.
- In 2008, the ClimateSmart program continued to educate customers about their carbon footprint and communicate how the ClimateSmart program offers a way to

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<sup>1</sup> ClimateSmart™ is the trademarked name for PG&E's Climate Protection Tariff approved by the CPUC in Decision (D.) 06-12-032 (the ClimateSmart Decision).

balance out the GHG emissions associated with their use of energy. Outreach efforts and accomplishments in 2008 included:

- Mailing bill inserts to 5.2 million PG&E customers in January, March, and May 2008;
  - Sending 1.4 million direct mail pieces to targeted residential customers, and 140,000 direct mail pieces to business customers in February and May 2008;
  - Promoting the program at more than 130 events, ranging from sustainability conferences, industry environmental summits, green expos, chamber gatherings, and clean energy showcases;
  - Educating customers about the program through the mass media. The ClimateSmart program was mentioned in more than 60 stories throughout PG&E's service territory thereby reaching thousands of PG&E customers on the subject of climate change. The program was covered in local dailies (such as The Salinas California, The Placer Herald and The Press Democrat in Sonoma County), trade publications (such as Inside Cal/EPA and Power Market Today), ethnic media (such as the World Journal and Ming Pao), and nationwide media (such as PBS's NewsHour with Jim Lehrer);
  - Co-marketing of the ClimateSmart program to residents of the cities of Rocklin, Menlo Park, Millbrae, and Windsor via a city participation announcement letter (inviting the community to become educated on climate change and join the program);
  - Conducting customer-insight projects to measure the effectiveness and refine the program's outreach efforts. These efforts resulted in a revised approach to customer education and enrollment;
  - Launching a new outreach campaign in December 2008 emphasizing the connection between personal energy use and climate change, and further identifying the ClimateSmart program as an easy, affordable way for the average customer to join the fight against climate change. This effort included the development of a new website and an enhanced interactive carbon calculator; and
  - Retaining four dedicated sales representatives by fourth quarter 2008 to augment efforts to reach commercial customers.
- In addition, many other customer-facing outreach efforts took place throughout the year in multiple capacities, from partnerships with environmental and faith-based groups to event sponsorships.

#### *Encouraging the Development of GHG Emission Reductions Projects*

- PG&E issued two Requests for Proposals (RFPs) for GHG emission reduction projects in 2008. In addition to soliciting bids from forestry projects, PG&E actively solicited bids from livestock and landfill projects.

- PG&E took affirmative steps to educate potential bidders and increase the pool of available projects. PG&E surveyed potential bidders from the May RFP who had indicated their intent to bid but did not do so. In response to feedback from this survey, PG&E hosted a bidder's information session to provide additional information about the ClimateSmart program, project eligibility requirements, and the bidding process. In addition, PG&E offered bidder interviews to both educate and improve the likelihood of receiving viable bids.
- In mid-February 2008, PG&E entered into its first two Verified Emission Reduction Purchase and Sale Agreements (VERPAs), with projects from its first RFP (see 2007 Annual Report). The two agreements purchase GHG emission reductions from conservation-based forest management projects. Negotiations are still underway with shortlisted bidders from the May 2008 RFP, with VERPAs anticipated to be executed in the first quarter of 2009. Negotiations with shortlisted bidders from the October 2008 began in January 2009.
- The two initial VERPAs represent a total of 236,058 tons<sup>2</sup> worth of GHG emission reductions. The combined value of these contracts is approximately \$2.2 million (paid out over time, largely as Verified Emission Reductions (VERs) are verified and retired). The GHG emission reductions will be created by these projects from 2007 through 2021; however, the majority of the reductions—more than 97 percent—will be created by the end of 2012. In present dollar terms, the cost of these reductions averages \$9.12 per ton.
- PG&E supported the development and launch of the Climate Action Reserve where every ton of every project registered on CCAR's Climate Action Reserve (Reserve) is assigned a unique serial number. This prevents the possibility of double counting and also assures buyers that when a ton of GHG emission reductions has been retired it cannot ever be sold or transferred again, creating a real and permanent GHG emission reduction.
- Through the ClimateSmart program, PG&E customers helped fund CCAR's development of the Urban Forest Project Protocol.

#### *Program Guidance and Oversight*

- The ClimateSmart program's staff met with the External Advisory Group (EAG)—made up of respected community, environmental, business, and governmental leaders—four times in 2008. The meetings included routine briefings on program results and future plans, feedback on specific marketing and messaging approaches as well as detailed discussions about GHG emission reduction project solicitations, resulting bids, and proposed terms of the contracts. For confidentiality reasons, PG&E provided the EAG members with summaries of the bids without disclosing the identity of the bidders.
- During 2008, PG&E filed and complied with Advice Filings, responded to CPUC data requests, and held meetings with CPUC representatives. In May 2008,

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<sup>2</sup> Note: All units in this report are in U.S. short tons, consistent with the CPUC's ClimateSmart Decision. The CCAR requires reporting in metric tons. All of the bidders provided their contracts in metric tons. To convert from U.S. short tons to metric tons, divide the number of U.S. short tons by 1.1023.

PG&E held a workshop at the CPUC for all interested CPUC staff to learn more about the program and to discuss the contents of the 2007 Annual Report.

- As part of the original ClimateSmart testimony, PG&E committed to conducting an independent financial review of the program, with a specific focus on customer enrollment, vendor eligibility, flow of dollars from the customer through the balancing account to vendor payment, and application of interest to the balancing account. This review was conducted by an independent accounting firm whose report dated December 30, 2008 found no outstanding exceptions to the established procedures.

#### *Other*

- To make customer contributions tax deductible and increase the appeal of the program, PG&E successfully affirmed tax exempt status for the ClimateSmart Charity with the California Franchise Tax Board in 2008. (The Internal Revenue Service granted such status in December 2007.) In January 2008, PG&E sent letters to all of the program's 2007 participants informing them that all customer payments to the program since its inception are eligible for a tax deduction as charitable contributions.
- These are just a few of the accomplishments and activities of the ClimateSmart program during its very busy second year, which are described in additional detail in the remainder of this Annual Report.

### **b. Program Benefits**

PG&E continued to record a number of program benefits during the second year of the program.

- The ClimateSmart program educates all residential and business customers (not just those enrolled) about the impacts of climate change, the link to their own energy use, and what customers can do to reduce their own carbon footprint. This was accomplished in large by a variety of ways including through bill inserts, direct mail, TV and online advertisements, and events.
- Through the ClimateSmart program, PG&E has generated considerable demand for voluntary GHG emission reductions where little such demand existed previously. As such, the program has played an instrumental role in encouraging the early development of CCAR-verified GHG emission reduction projects in California.
- Since the ClimateSmart program started, PG&E has emerged as a leading buyer of California-specific CCAR GHG emission reductions, and its support of the development and use of CCAR protocols has put such emission reductions among the highest quality and value of any currently available.
- Through the creation and implementation of the ClimateSmart program, PG&E's customers are helping the CCAR create some of the substantial infrastructure that will be needed before many of the measures of Assembly Bill (AB) 32 can take effect. For instance, based in part on support from the ClimateSmart program, the

CCAR developed the Climate Action Reserve which created a means for attaching title of a carbon instrument, and transferring said title between holders.

- Following the approval and launch of the ClimateSmart program, several utilities across the country implemented their own GHG emission reduction programs. The ClimateSmart program has served, and continues to serve, as a valuable example of a program that both educates customers and gives them a means to balance out their carbon footprint.

### **c. Challenges and Concerns**

While the ClimateSmart program had numerous successes in 2008 and serves an important function in the development of the climate change infrastructure for California, the program has confronted a number of challenges.

- Since mid-2008, program participation has dropped below the enrollment targets set in the CPUC's Decision approving the ClimateSmart program. Research conducted by the ClimateSmart outreach team revealed that a significant knowledge gap persists among the majority of PG&E customers. For instance, a June 2008 study indicated that the majority of PG&E customers were unfamiliar with the terms "carbon offsets" and "carbon neutrality." These customers did not understand the role their home energy use played in generating GHG emissions or the actions they could take to prevent carbon dioxide from entering, or to remove it from, the atmosphere.
- The ClimateSmart program has received very little enrollment outside of those customers that are particularly motivated to take action. Recent research has found that while most Americans indicate that reducing climate change is important, they feel that corporations, particularly polluters, should pay before individuals are asked to do so.<sup>3</sup>
- There continues to be skepticism about companies making claims of becoming carbon neutral or offering products for customers to become carbon neutral.<sup>4</sup> The ClimateSmart program's rigorous and transparent standards have set it apart from less stringent programs, but doubts remain among uninformed consumers.
- Because the ClimateSmart program is a first-of-its-kind or "pioneer" program, marketing the program has presented some unique challenges, including the difficulty of educating customers about the problem of GHGs resulting from energy use and the solution of GHG emission reductions.
- Because Renewable Energy Credits (RECs) have been available for more than 15 years and promoted by standards such as LEED and federal programs such as the U.S. EPA's Green Power Partnership Program, customers are more familiar

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<sup>3</sup> Wimberly, Jamie. (2008). *Climate Change and Consumers: The Challenge Ahead*. Retrieved February 2009, from Ecoalign website: [www.ecoalign.com](http://www.ecoalign.com).

<sup>4</sup> Story, Louise. (2008, January 9). F.T.C. Asks if Carbon-Offset Money Is Well Spent. *The New York Times*, Retrieved March 2009, from The New York Times website: <http://www.nytimes.com/2008/01/09/business/09offsets.html>.

with RECs than with GHG emission reductions. This enhances the challenges the ClimateSmart program faces in persuading customers to enroll.

- The ClimateSmart program is facing some challenges in obtaining sufficient tons of GHG emission reductions to meet the performance standard set forth in the CPUC's ClimateSmart Decision. PG&E has found that many potential bidders are not far enough along in their project development to submit a bid into PG&E's competitive solicitations. Those who do submit bids are still learning about the CCAR's project protocols, determining their project's potential eligibility for the ClimateSmart program, and figuring out how to develop their projects.

The program's demonstration period is set to end on December 31, 2009. PG&E, in consultation with the CPUC and external stakeholders, is considering a request to the CPUC for an extension of the ClimateSmart program. If PG&E makes such a request, PG&E would likely do so in the second quarter of 2009 through a formal application before the CPUC.

## 2. Introduction

### a. The History of the Program

In January 2006, PG&E filed Application 06-01-012 with the CPUC to establish a three-year demonstration program offering customers a means to balance out the GHG emissions associated with their usage of natural gas and electricity. PG&E proposed the program as part of its overall commitment to climate protection and environmental improvement.

On December 14, 2006, the CPUC approved the proposed program with modifications in the ClimateSmart Decision.<sup>5</sup> The ClimateSmart program enables PG&E customers to balance out the GHG emissions associated with their own natural gas and electric energy use by paying a small volumetric monthly premium on their PG&E bill. The premium is an extra charge of \$0.06528 per therm of natural gas and \$0.00254 per kWh of electricity that appears on the customer's bill.<sup>6</sup> The additional amount the average residential customer pays to become carbon neutral through the ClimateSmart program is \$2.89 per month which is less than the amount of \$4.31 originally forecasted. Exact premiums are determined monthly based upon each participating customer's actual energy usage and the premiums vary by month.

Administrative and marketing (A&M) costs to support the ClimateSmart program are funded by all of PG&E's customers<sup>7</sup> as the program benefits all customers. Customer benefits include education on the risks posed by climate change, the public benefits associated with emissions reductions funded by the program and any other actions individuals take to reduce their environmental impact, as well as the development of elements of California's infrastructure to mitigate climate change.

PG&E invests 100 percent of participants' contributions in new, independently verified GHG emission reduction projects in California. These projects generate additional environmental benefits, such as preserving and restoring California's forest ecosystems. As authorized by the CPUC, all projects in which the ClimateSmart program invests must comply with rigorous protocols established by the CCAR and these protocols must be approved by the CPUC for use by the ClimateSmart program. An External Advisory group (EAG) was created to provide outside expertise and guidance in implementing the ClimateSmart Decision and provide ongoing feedback to the ClimateSmart program.

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<sup>5</sup> D.06-12-032. The program, which was originally referred to as the "Climate Protection Tariff," is now known as the "ClimateSmart™ program."

<sup>6</sup> These rate levels were adopted by the CPUC for use during the ClimateSmart program's 2007-2009 demonstration period. The CCAR has independently verified the entity-wide CO<sub>2</sub>-equivalent emissions levels associated with the natural gas and electricity PG&E delivers to its customers. Those values were used to determine the pounds of GHG emissions resulting from each kWh of electricity and therm of natural gas consumed by PG&E's customers and the resulting rate necessary to achieve climate-neutrality assuming an average project cost of \$9.71 per ton for the 2007-2009 period. (D.06-12-032, p. 47.)

<sup>7</sup> Administrative and marketing costs are allocated to customers on a percentage of revenue basis.

The program's demonstration period is set to end on December 31, 2009. PG&E, in consultation with the CPUC and external stakeholders, is considering a request to the CPUC for an extension of the ClimateSmart program beyond its sunset date.

## **b. The Purpose and Contents of This Annual Report**

In the ClimateSmart Decision, the CPUC ordered PG&E to issue an annual report for each of the three program years, 2007 through 2009. PG&E issued the first report on March 17, 2008. The ClimateSmart Decision requires that certain information be included in the report for the previous calendar year. This second annual report covers the period January 1, 2008, through December 31, 2008.

The ClimateSmart Decision orders the CPUC's Energy Division to review the reports in order to determine: (1) whether the program meets the requirements of the Decision; (2) whether projected program participation levels are being achieved; and (3) the degree of success in GHG contracting and amount of GHG reductions.<sup>8</sup> For the Energy Division's convenience, PG&E has included a summary of program requirements in Appendix A of this report, including a cross reference to the sections in this report where the required contents of this annual report are addressed.

The ClimateSmart Decision also directs PG&E to meet a number of other requirements that are addressed in this Annual Report. For example, the annual report that PG&E sent to participating customers is provided in Appendix B. The redacted copies of the signed VERPAs for PG&E's GHG emission reduction projects are provided in Appendix H.

The major sections of the remainder of this Annual Report are:

- Section 3 – Program Administration;
- Section 4 – Education and Outreach;
- Section 5 – Contracts and GHG Impact;
- Section 6 – ClimateSmart Charity Update;
- Section 7 – Financial Results;
- Section 8 – Program Assessments;
- Section 9 – Conclusion; and
- Appendices.

## **c. Regulatory Developments and Submittals**

In 2008, PG&E submitted a number of advice letters to the CPUC to advance the program. These submittals addressed the transfer and reallocation of unspent 2007 A&M funds, approval to contract for additional GHG emission reduction project-types

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<sup>8</sup> D.06-12-032, Ordering Paragraph 14.

as new protocols were developed and adopted by CCAR, and approval of a Servicing Agreement between PG&E and the ClimateSmart Charity. A complete list of these submittals, with advice filing numbers, is provided in Appendix C. The main effects of these advice filings are summarized below.

**Transfer of 2007 Funds:** In February 2008, PG&E filed an advice letter seeking the CPUC's approval to transfer \$1.7 million of unspent A&M funds from the 2007 budget to the 2008 budget. In addition, the advice letter sought reclassification of a small portion of the transferred unspent 2007 funds from the administrative to the marketing budget category to further support the intensified ramp-up of outreach activities in 2008. The CPUC approved this advice filing on September 18, 2008.

**Landfill Protocol:** In July 2008, PG&E filed an advice letter seeking permission to contract for verified emission reduction projects from landfills that are not currently required to capture their landfill gas. Regulations are scheduled to be imposed on landfills that will limit the period within which potential California projects are eligible to produce voluntary emission reductions. The CPUC approved this request on December 8, 2008.

**Charity Servicing Agreement:** In September 2008, PG&E filed an advice letter seeking authority to (a) execute a Servicing Agreement between PG&E and the ClimateSmart Charity that would implement tax rulings received from the Internal Revenue Service and Franchise Tax Board that make participating customers' ClimateSmart program payments eligible for a tax deduction as charitable contributions, and (b) revise PG&E's gas and electric ClimateSmart Balancing Accounts consistent with the terms of the Servicing Agreement. On October 23, 2008, the Energy Division suspended this advice filing pending further review. This advice filing is still pending.

**Urban Forest Protocol:** In December 2008, PG&E filed an advice letter seeking permission to contract for urban forest verified emission reduction projects. The CPUC approved this filing on February 11, 2009.

### **3. Program Administration**

This section presents an overview of the program's (a) administrative efforts to implement the program during 2008; (b) customer participation through December 31, 2008 (including enrollments, attrition and contributions); and (c) work with the CCAR and the program's EAG.

#### **a. Administrative Highlights**

One of the ClimateSmart program's first administrative efforts in 2008 was to mail ClimateSmart Charity tax letters to the customers who participated in the program in 2007. The ClimateSmart Charity tax letters notified customers that their contributions to the program qualified for a tax deduction as charitable contributions. A copy of the letter is included in Appendix F of this report. PG&E also issued the program's first Customer Annual Report to participants in March 2008 and submitted the 2007 Annual Report to the CPUC on March 17, 2008.

On May 15, 2008, PG&E received affirmation from the California Franchise Tax Board on the tax exempt status of ClimateSmart Charity. Upon receiving this affirmation, PG&E developed and filed the ClimateSmart Charity Servicing Agreement with the CPUC on September 24, 2008. This advice letter is still pending. (Please see Section 6 of this annual report for more information on the ClimateSmart Charity.)

After receiving responses to the January, March, and May 2008 bill inserts (please see Section 4 of this annual report for more details), PG&E discovered that a disproportionate amount of program participants were also California Alternate Rates for Energy (CARE) customers. As a result PG&E sent multi-language letters to program participants who were also enrolled in the CARE program in November 2008 to ensure they understood the nature of the ClimateSmart program (i.e., that participation in the program is voluntary and entails a slight increase in monthly energy bills). About 10 percent of these customers chose to de-enroll from the program after receiving the mailing.

PG&E also held four meetings of the EAG during 2008 as detailed later in this section.

PG&E issued two RFPs (one each in May and October) for GHG emission reductions projects. PG&E also filed advice letters for two new protocols, landfill gas and urban forest in 2008. (Please see Section 5 of this annual report for more details on PG&E's 2008 GHG emission reduction procurement activities.)

#### **b. Customer Participation**

In 2008, PG&E more than doubled customer participation. Customers participating in the program grew from 14,572 on December 31, 2007, to 30,948 on December 31, 2008. This accomplishment came about as a result of the numerous and varying efforts employed by program staff—including event outreach, direct mail and bill insert executions to both residential and small/medium businesses, sales force outreach to large commercial customers, environmental and faith-based group outreach including a charity challenge, and a new advertising campaign and enhanced website—designed to reach every potential customer in PG&E's service territory.

**i. Program Enrollments**

Table 3-1 below shows the breakdown of the 30,948 PG&E customers who were actively enrolled in the ClimateSmart program at the end of 2008. This table also compares the 2008 data with 2007 data.

**TABLE 3-1  
PACIFIC GAS AND ELECTRIC COMPANY  
NUMBER OF ACTIVE CLIMATESMART PROGRAM PARTICIPANTS  
(AS OF DECEMBER 31, 2007 AND DECEMBER 31, 2008)**

Customer Type	Number (cumulative, as of 12/31/07)	Number (cumulative, as of 12/31/08)
Residential	14,378	30,305
Commercial/Agricultural/Government/ Nonprofits/Faith Communities	176	642
PG&E (Buildings Systemwide, Using Shareholder Funds)	1(a)	1
<b>Total</b>	<b>14,555</b>	<b>30,948</b>

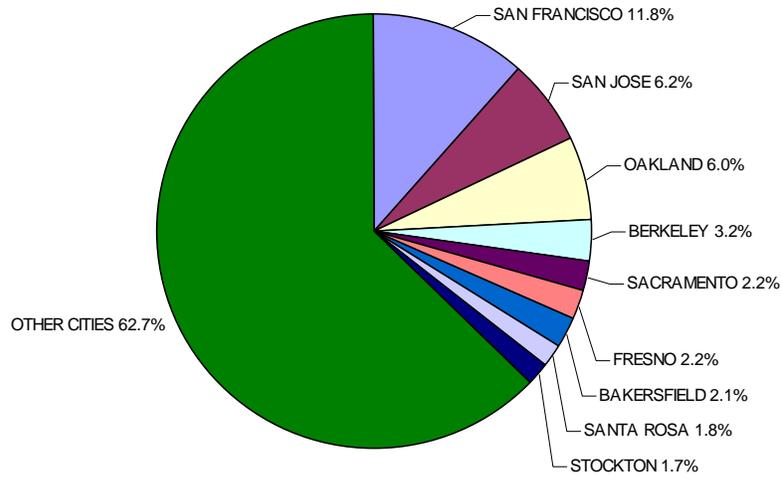
(a) In the 2007 ClimateSmart Annual Report, PG&E was shown as having 18 accounts. However, in this table PG&E is shown as one participant (which currently has 19 accounts). Therefore, the total number of 2007 participants has been adjusted downward to reflect the change in terminology from 18 accounts to one participant.

PG&E's January 2006 testimony in Application 06-01-012 had projected that after one full year of operations, under PG&E's stretch goals, estimated program enrollments would range between 28,000 – 69,000, with a projected medium level of 40,000. As of June 28, 2008, after a full year of post-launch operations, enrollment was at the lower end of this range. Since then, participation has dropped below the stretch goal range. In recognition of the lower participation levels and in an effort to attract more participants, PG&E redesigned its outreach plan for the ClimateSmart program. (Please see Section 4 of this annual report for more details on the revised outreach and education approach, and Section 8(b) for a discussion of the lower enrollment levels.)

**Customers From Wide Geographic Area:** Residential, commercial and agricultural customers enrolled in the program represent communities that span PG&E's service area. Customer enrollment is represented by 558 different cities stretching from Eureka to Bakersfield. Cities with the highest number of participant accounts are shown in Figures 3-1 and 3-2, below. Of particular note is that, as of December 31, 2008, 19 local governments and 15 Chambers of Commerce were enrolled in the ClimateSmart program. Since the beginning of the program PG&E staff has provided 39 local governments an annual accounting of all the GHG reductions for ClimateSmart customers in their jurisdictions.

**FIGURE 3-1  
PACIFIC GAS AND ELECTRIC COMPANY  
TOP CITIES FOR CLIMATESMART PARTICIPANT ACCOUNTS THROUGH 12/31/08**

**Top ClimateSmart Cities by Customer Count  
As of 12/31/2008**





or another. Of this figure, only 2,104 ClimateSmart customers actively chose to de-enroll from the program but remained as PG&E customers.<sup>9</sup> The remaining customers left the program as they closed their service agreements. As shown in Table 3-2 below, program attrition during 2008 was typically in the range of 1-2 percent monthly.

**TABLE 3-2  
PACIFIC GAS AND ELECTRIC COMPANY  
CLIMATESMART ENROLLMENT-2008**

	Jan	Feb	Mar	Apr	May	Jun
New Enrollments	1,747	3,093	2,357	7,584		
Monthly Attrition	160	372	342	346	422	483
Attrition Percentage	1.1%	2.3%	1.8%	1.7%	1.5%	1.7%
Cumulative Active Enrollments	16,159	18,880	20,895	28,133	29,298	32,534
	July	Aug	Sept	Oct	Nov	Dec '08
New Enrollments	494	358	330	364	240	343
Monthly Attrition	537	523	469	409	709	1,068
Attrition Percentage	1.7%	1.6%	1.5%	1.3%	2.2%	3.4%
Cumulative Active Enrollments	32,491	32,326	32,187	32,142	31,673	30,948

### iii. *Participants' Contributions*

As reflected in Table 3-3 below, participants' contributions to the ClimateSmart program through December 31, 2008, totaled approximately \$2.6 million. This table also compares the 2008 data with 2007 data.

<sup>9</sup> In December 2008, 740 CARE customers de-enrolled from the program after receiving the November 2008 clarification letters. Additional CARE customers de-enrolled in early 2009; the final number of CARE de-enrollees has not been determined, but is expected to be about 10 percent of all CARE customers who were ClimateSmart participants at the beginning of November 2008. (Please see Section 3a of this annual report for more details.)

**TABLE 3-3  
PACIFIC GAS AND ELECTRIC COMPANY  
CONTRIBUTIONS TO THE CLIMATESMART PROGRAM  
(\$ THOUSANDS)**

Customer Type	Contributions (Cumulative, as of 12/31/07)	Contributions (Cumulative, as of 12/31/08)
Residential (including PG&E employees)	\$129	\$1,037
Commercial/Agricultural	73	543
PG&E Buildings (through shareholder funds)	502	978
Total	\$704	\$2,558

**c. Program Partners**

**i. *The California Climate Action Registry (CCAR)***

PG&E continued to fund the development of CCAR protocols via the ClimateSmart program in 2008. CCAR's independent development and approval of project protocols has proceeded somewhat more slowly than PG&E originally anticipated, with one new CCAR protocol for urban forest projects being finalized in 2008, reflecting a delay of 10 months from CCAR's original estimated completion date. According to the CCAR, the delay is in part due to the importance of ensuring rigor and accuracy in the protocols, and of engaging stakeholders.

In 2008, the CCAR launched the Climate Action Reserve (Reserve), a program where owners and developers of GHG emission reduction projects publicly register their projects and the associated emission reductions on the Reserve website. Each ton of verified GHG emission reductions associated with each project registered on the Reserve is assigned a unique serial number. This prevents the possibility of double-counting and also assures buyers that when a ton of GHG emission reductions has been retired it cannot ever be sold or transferred again, creating a real and permanent GHG emission reduction.

The CCAR also convened a workgroup in 2008 to produce an updated version of its forest project protocol; PG&E participated in the workgroup meetings as an interested observer. The updated version of the protocol was released for public comment in December 2008, and is expected to be approved by the CCAR Board in May 2009. The framework of the protocol update is designed to allow the protocols to be used beyond California's boundaries with minimal additional analysis. The CCAR continues to fully support projects registered under the current version of the forest protocol and strongly believes that the emission reductions associated with such projects will continue to meet the highest standards today and into the future. Voluntary projects that are registered under the current protocols will continue to be verified under the protocol in place at the time the project was registered for the life of the project.

CCAR also created a new workgroup in November to begin development of a Co-Digestion project protocol.

ii. ***The External Advisory Group (EAG)***

As a core part of the transparency of the ClimateSmart program, PG&E developed the EAG. The EAG provides a forum for diverse stakeholders to engage in productive dialogue and provide feedback on the marketing and selection of projects in the ClimateSmart program. In order to engage in productive dialogue, the EAG is facilitated by an independent organization, SustainAbility.

In 2008, the EAG met on January 17, July 14, October 27, and December 5. Over the course of the year, the EAG members provided input on the 2008 marketing plan and provided valuable feedback on bid selection for both GHG emission reduction RFPs. PG&E provided regular updates on contract negotiations for ClimateSmart projects and solicited ideas on creative ways that the utility's low income customers could actively participate in the reduction of GHG emissions. Appendix D contains a list of 2008 members of the EAG.

## **4. Education and Outreach**

During 2008, the ClimateSmart program continued to both educate the broader customer base about their personal impact on climate change and to drive increasing enrollments. The program used a number of strategies to reach a diverse set of residential and non-residential customers. While enrollments doubled during 2008, many outreach challenges exist that could be expected with a first-of-its-kind program. Our customer research indicates these challenges pose significant barriers to achieving the enrollment goals set for the demonstration period through 2009. This section addresses PG&E's 2008 outreach and education approach and includes a discussion on challenges and mitigation steps PG&E has taken.

### **a. Residential**

The goal of residential outreach was to educate customers about their personal impact on climate change and to inform customers about the ClimateSmart program during opportunities and in environments where they are most open to learning about the program, its benefits, and to consider enrollment. The program employed a number of strategies including partnerships with governmental, environmental, and other affinity groups; events and sponsorships; non-paid media; direct outreach; and paid media. Direct outreach served as the program's primary strategy for enrolling early adopters during the first half of the year. Mid-year customer research indicated that there were continued gaps in understanding of key information. The results of this research were used to provide guidance for a new approach to customer outreach. This new approach placed a greater emphasis on building broad-based awareness of both the GHG emissions associated with home-energy use, and the ClimateSmart program itself.

### **b. Partnerships With Governments, Environmental and Other Affinity Groups**

The ClimateSmart program leveraged existing and new PG&E relationships to educate customers about climate change and promote enrollment. In some cases, PG&E used its shareholder-funded charitable contributions to encourage customers to enroll in the ClimateSmart program. For example, PG&E made shareholder-funded charitable contributions to local nonprofit organizations to recognize new cities that joined the ClimateSmart program. Major press events also took place to inform communities about their local government's commitment to combating climate change and to invite them to join the ClimateSmart program. Events occurred in the cities of Millbrae, Salinas, and Los Gatos.

By the end of 2008, 18 municipalities had enrolled in the program, including the cities of: Atascadero, Gonzales, Hayward, Loomis, Los Altos Hills, Los Gatos, Menlo Park, Millbrae, Oakley, Pleasant Hill, Riverbank, Rocklin, Salinas, San Jose, Santa Rosa, Sunnyvale, Taft and Windsor.

The ClimateSmart program, using charitable funding from PG&E shareholders, continued to partner with membership organizations to help educate their constituencies on climate change and efforts to reduce their GHG emissions. This

included sponsoring the annual report for California Interfaith Power and Light<sup>10</sup> and Sustainable Silicon Valley.<sup>11</sup>

PG&E's charitable contributions also supported the efforts of the EarthTeam Environmental Network's Green Screen project. The Green Screen is a public access TV program on environmental issues airing in seven Bay Area communities. The ClimateSmart program is working with EarthTeam to develop an episode on climate change, the individual's carbon footprint, and the ClimateSmart program. The Green Screen program is developed and produced by twenty students from Richmond and Oakland. These students range in age from 12-19, and are primarily Hispanic. Students who participate in The Green Screen receive hands-on training from professional mentors in all areas of television production.

Environmental partnership efforts culminated during the fall's "Charity Challenge." PG&E supported three environmental organizations -- California State Parks, Golden Gate Audubon Society and Save the Bay -- in an effort to sign up their members for the ClimateSmart program. Under the Charity Challenge, PG&E allocated shareholder funded charitable dollars to each organization based on the number of enrollments identifying one of these organizations during a two-month sign-up period. Members of these organizations learned about the ClimateSmart program through multiple channels within each organization, including emails, newsletters, and on their websites. The Charity Challenge was also promoted to the PG&E employee base through online employee communications and through employee groups. During the two-month promotion, more than 600 new residential enrollments occurred.

### **c. Events and Sponsorships**

To encourage enrollment and expand education, the ClimateSmart program was represented at over 130 targeted events across the entire PG&E service territory. These opportunities presented one-on-one opportunities for connection with both the residential and business public and helped to bridge the education gap. Highlights included program representation at county and state fairs, environmental forums, concerts, the reopening of the California Academy of Sciences, and industry events. The program had major exposure opportunities at San Francisco's Outside Lands Festival and Green Wine conference.

Building off of a broader PG&E sponsorship with the San Francisco 49ers, the ClimateSmart program capitalized on exposure during the 2008 football season. The campaign included prominent in-stadium signs, radio advertising across the service territory, and a print ad in the season program. These efforts were primarily directed at potential residential customers, many of whom aligned with the target customer profile.

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<sup>10</sup> California Interfaith Power and Light is an organization of more than 520 congregations that helps to educate their members on the theological basis for eco-stewardship and assist them in implementing programs to reduce their GHG emissions and become more energy efficient.

<sup>11</sup> Sustainable Silicon Valley is a collaboration of more than 100 businesses, governments and non-governmental organizations that are identifying and addressing environmental and resource pressures in Silicon Valley.

#### **d. Non-Purchased Media Coverage**

The ClimateSmart program continued to educate customers about climate change in the press this year with a range of coverage of more than 60 news stories. For example, the program was highlighted in a front-page [San Francisco Chronicle](#) article on Sunday, September 7, 2008, about forestry carbon offset programs. The program was also covered in local dailies (such as [The Salinas California](#), [The Placer Herald](#) and [The Press Democrat](#) in Sonoma County), trade publications (such as [Inside Cal/EPA](#) and [Power Market Today](#)), ethnic media (such as the [World Journal](#) and [Ming Pao](#)), and nation-wide media (such as PBS's [NewsHour with Jim Lehrer](#)). The program actively sought these opportunities to educate the public about climate change and the ClimateSmart program, as well as to support those customers who had already enrolled in the program.

#### **e. Direct Outreach**

During the first half of 2008, the ClimateSmart program reached out to all customers in an effort to both educate them about the carbon footprint associated with their energy use and to enroll them in the program. Three separate bill inserts targeted approximately 5.2 million customers each (more than 15.5 million in total) during the months of January, March and May. Related messaging was also made available to e-Bill customers. About 16,000 customers responded and signed up for the program through these three bill inserts, however, response rates did not reach expectations. The average response rate of 0.1 percent delivered within the forecasted range, but subsequent bill inserts showed diminishing returns. As research described below indicates, bill inserts may also not be the most effective way to reach the ClimateSmart target participant.

Taking a grassroots approach is often the best way to reach low income customers. Connecting with them in venues that best match their faith, language, socioeconomic, ethnic, or other communal interests has proven to be the most effective approach to outreach. The ClimateSmart program was represented at these types of events in 2008.

For the low income segments, PG&E has developed a fact sheet on climate change that describes what GHG emissions are, what their impact is and actions people can take to reduce their footprint. (This fact sheet is provided in Appendix J to this annual report.) This fact sheet has been translated into multiple languages and is given out as part of individualized home energy assessments that are performed for Low-Income Energy Efficiency (LIEE) program participants. In the fact sheet, the GHG emissions emitted as a result of the use of energy are explained. LIEE energy specialists describe simple, no or low-cost actions the customer can take to reduce their carbon footprint and save money on their bills. The ClimateSmart program plans to continue to incorporate this material as well as other educational tools, like interactive carbon calculators, at appropriate LIEE and integrated venues and events throughout 2009, to make learning about climate change and the program simple, easy to find, and a part of already-established touch-points with these customers.

The targeted residential direct mail effort begun in late 2007 continued in March 2008, with new creative material featuring a small child and the headline, "On behalf of Ryan, age 1 and three quarters, we thank you in advance." Two designs of

this material were sent out to 350,000 targeted customers each to garner enrollments, one self-mailer and one letter package, both with a subsequent postcard reminder. The pieces educated customers about the program by providing in-depth information about the projects in the ClimateSmart program and asked them to participate. In May, the “Ryan” letter package mailing was repeated to an additional 700,000 targeted customers. The pieces received response rates ranging between 0.4 percent and 0.7 percent, well below the rough 1 percent goal.

PG&E conducted a “Receiver/Response” survey of the May direct mail campaign that measured the effectiveness of the messaging techniques in the campaign. Unfortunately, results indicated residential customers were still largely unaware of the program and were confused about carbon offsets in general. Major findings from the study included:

- The majority of PG&E customers were unfamiliar with the terms “carbon offsets” and “carbon neutrality”;
- Customers did not understand the role their home energy use played in generating GHG emissions or the actions they could take to prevent carbon dioxide from entering, or to remove it from, the atmosphere; and
- Customers did not understand the true incremental cost of the program, over-estimating it and the commitment being asked of them.

As additional research was done on target customers, independent data showed they could be better reached in non-traditional utility outreach avenues (i.e., bill inserts) where they would be more open to learning about and considering participation in the program. Recommendations for more suitable venues included placement via entertainment channels (their favorite TV shows or in magazines) or online (while looking up recipes or booking air travel). As a result of the findings, direct outreach was deemphasized in exchange for a broader based awareness campaign that could more effectively address the above gaps.

#### **f. Broad Based Paid Media Awareness Campaign**

The ClimateSmart team developed a new awareness and education campaign to address the study’s findings. The enhanced messages provided essential program information by:

- Identifying the problem (GHG emissions);
- Providing a solution (the ClimateSmart program);
- Emphasizing ease and affordability (about \$5 a month);
- Assuring that PG&E is along with customers together in the solution; and
- Driving customers online to a website for more information and to sign-up.

Focus groups reviewed television advertisement concepts to ensure they effectively conveyed the desired messages. In response to focus group findings the

program's advertising was changed. The focus groups further validated that phrases like "carbon emissions" and "carbon neutral" did not connect with most customers, but using simplified words like "greenhouse gases" did have meaning to them.

Additionally, the program conducted focus group and online research to determine how current customers were responding to the program and how they might react to any program revisions. The program staff tested potential enrollees, both residential and commercial, to gauge their reaction to various program merits. Key insights from the studies included:

- The key drivers for participation in the ClimateSmart program are:
  - Ease by which it allows customers to do something good for the environment, and
  - Types of projects the ClimateSmart program is investing in, and the benefit those projects provide;
- The ClimateSmart program is not automatically viewed as an opportunity to make a charitable contribution without appropriate communications; and
- Overall, current customers enrolled in the ClimateSmart program:
  - Are satisfied to very satisfied with their participation, with little or no intention of de-enrolling,
  - Exhibit a willingness to communicate to peers about the program, and
  - Express a desire for increased communication about developments and progress.

With multiple phases of customer research complete, the ClimateSmart team launched the "365" Awareness Campaign on December 1 with television commercials, online banner advertisements and a new, interactive website. All elements of the campaign visually featured the "SUV as a home" analogy. The primary objective of the campaign was to raise awareness about the ClimateSmart program and drive customers to a website for additional information and enrollment. The key message of this campaign was "Together we can fight climate change. Together we can be climate smart." (The television spot and newly designed website can be viewed at [www.joinclimatesmart.com](http://www.joinclimatesmart.com) under the "In The News" tab.)



*Sample screen shot of TV commercial time-lapse*

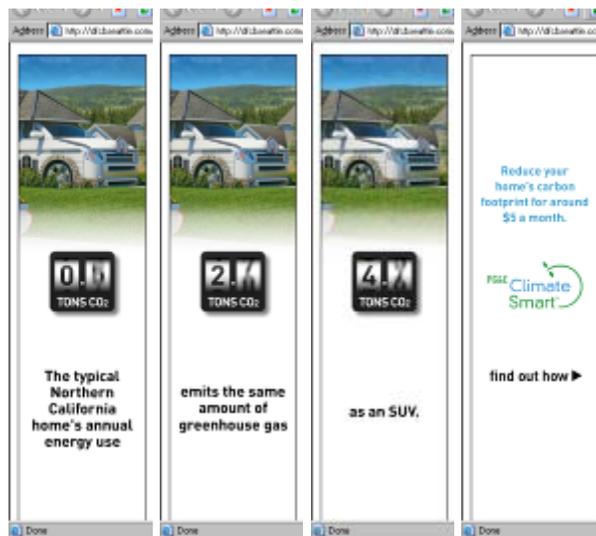
On the newly designed website, customers have the ability to:

- Calculate a home's GHG emissions using an interactive carbon calculator;
- Learn about projects and program objectives, including general information about the purpose of the program, how the funds are spent and the projects under contract;
- Enroll immediately and balance out their homes' or businesses' GHG emissions by joining the ClimateSmart program's community; and
- Identify businesses and local communities currently participating in the program.



*Sample screenshot of microsite landing page & new interactive carbon calculator*

**Banner Advertisements** –To execute the same campaign on the internet, the program developed online ads to introduce the program and direct the user to the website.



*Sample of static online banner ad*

## **g. Non-residential Customers**

PG&E used its Account Services team and direct mail to contact non-residential customers. As a result of these efforts, business enrollments increased by 265 percent over 2007.

By the fourth quarter, the ClimateSmart team added four full-time dedicated resources, located in the four geographic regions of our service territory, to educate and sign-up non-residential customers. They also supported PG&E's Account Services team who incorporated the ClimateSmart program into their integrated offering discussions with customers. The four additional resources provided local technical expertise, attended events and facilitated distribution of customer merchandising.

A direct mail effort to educate and enroll small and medium business customers was executed in March and May, with 70,000 pieces per mailing. Nearly 300 small and medium businesses enrolled in the program. Response rates ranged from 0.23 percent to 0.19 percent (versus a rough 1 percent forecast).

The program provided non-residential participants with turnkey elements to promote their participation and environmental commitment to customers, communities, and other stakeholders. The participant tool kit included outward-facing merchandising such as: certificates, wall posters, table tents/counter cards and window clings. This merchandising serves a secondary purpose of educating others and potentially creating additional enrollments. Hundreds of these merchandising elements are currently being displayed at participant locations such as small offices, hotels, retail establishments and cities.

Appendix G includes a listing of all marketing and communications materials produced in 2008 for the ClimateSmart program. A Compact Disc (CD) that includes the actual items referenced in Appendix G has been provided to the CPUC and is also available to other parties upon request.

## 5. Contracts and GHG Impact

### a. GHG Emission Reduction Project Solicitation Results

PG&E issued two RFPs in 2008, the second and third for the program. The second RFP for ClimateSmart projects was launched on May 16, 2008 and the third RFP was launched on October 6, 2008. In addition to forestry projects, PG&E also solicited bids from livestock projects verifiable under the CCAR project protocols in the May and October RFPs and from landfill projects in the October RFP.

As part of its project solicitation efforts, PG&E developed and conducted outreach with an ever growing network of potential project developers. As revenues from sales of GHG emission reductions represent a brand new type of funding stream in California, PG&E devoted time to educating potential bidders about this opportunity for them to finance new projects. PG&E publicized the opportunity to sectors that may not be aware of this emerging revenue stream. PG&E spoke at numerous conferences throughout the year to encourage people to bid into the RFPs. This “human touch” element has been important in engaging and educating potential bidders, and ultimately to giving those potential bidders the tools they need to develop projects that meet the stringent selection criteria of the ClimateSmart program.

PG&E’s ClimateSmart program publicized the May RFP during the CCAR’s annual conference, posted the solicitation on the PG&E web site, reached out to news media via a News Release, and sent out an email announcement to more than 250 interested parties, including potential project developers, land trusts, environmental groups, local farm bureaus, and verifiers. The RFP requested bids to be submitted by July 2, 2008. In order to encourage participation in the RFP and answer bidder questions, PG&E held bidder’s conferences in San Francisco, Sacramento, and Tulare. PG&E received 23 Notices of Intent to Bid, but only three final bids. Of the three bids from the RFP; two were from forestry projects and one was from a livestock project. One was from a non-governmental organization, one was from a private business, and one was from a government entity. PG&E selected two bidders as shortlisted projects.

In order to enhance the results of our RFP process, PG&E hired SustainAbility to survey potential bidders from the second RFP who had indicated their intent to bid, but did not submit a bid. PG&E learned that potential bidders found the competitive solicitation process too complicated and cumbersome. Additionally, potential bidders wanted more flexibility in the rules and requirements, and more support from PG&E such as a channel to ask specific questions and advice on particular scenarios.

Accordingly, PG&E revised its solicitation process for the third RFP, launched on October 6, 2008. In response to participant feedback, PG&E hosted a bidder’s information session to provide interested parties with additional information about the ClimateSmart program, project eligibility requirements, and the bidding process. PG&E then offered bidder “interviews,” consisting of informal one-on-one discussions with potential bidders about their projects, to see if the projects would be eligible and to answer questions. PG&E learned that few of the parties interested in submitting a bid completely understood what was required in developing and verifying a GHG emission reduction project. These interviews were an important part of educating potential bidders and increasing the pool of available projects. The program staff invited parties that met the basic requirements of the RFP to participate in a bidder’s workshop, where

PG&E provided an overview of the bid questionnaire and discussed in-depth the attributes of a successful bid.

In addition to soliciting bids from forestry and livestock projects, in the third RFP, PG&E also solicited bids from landfill projects verifiable under the CCAR project protocols. PG&E's ClimateSmart program posted the solicitation on the PG&E web site, reached out to local news media and trade publications via a News Release, and sent out an email announcement to more than 300 interested parties, including potential project developers, land trusts, environmental groups, local farm bureaus, municipal landfills, and CCAR approved GHG project verifiers. The RFP requested bids to be submitted by November 20, 2008. PG&E received a total of four bids for projects in response to the RFP; one was from a livestock project, two were from landfill projects, and one was a re-sale of GHG emission reductions. All four bids were from private businesses. The program staff shortlisted three projects and negotiations on purchase agreements with the shortlisted bidders began.

Table 5-1 below shows the range of tons, prices, and delivery terms of GHG emission reductions offered for sale from both RFPs.

**TABLE 5-1  
PACIFIC GAS AND ELECTRIC COMPANY  
RANGE OF 2008 BIDDERS' OFFERS(a) FOR TONNAGE, PRICE AND LENGTH OF CONTRACT**

	Low	High
Tons CO <sub>2</sub>	35,930	376,947
Price per ton CO <sub>2</sub>	\$10.61	\$18.14
Term (years)	0 (immediate)	10

(a) In order to maintain confidentiality and maintain competitiveness for future solicitations, the range of bidders' offers from the second and third RFPs is combined.

## **b. Development of New Protocols**

In addition to forest and livestock projects, PG&E included landfill projects developed under the CCAR's new protocol in PG&E's October RFP. In 2008, PG&E requested permission from the CPUC to contract for projects developed under the CCAR's new protocol for urban forest projects, but that request remained pending at the end of 2008. Hence, PG&E did not include urban forest projects in its RFPs during 2008.

### Landfill Project Protocol

These projects capture currently unregulated methane emissions associated with certain municipal landfill operations. Landfill gas is produced by organic waste decomposing under anaerobic conditions in a landfill. The waste is covered and compressed both mechanically and by the weight of the material that is deposited from

above. This prevents oxygen from accessing the waste and causes anaerobic microbes to thrive. Methane gas builds up and is slowly released into the atmosphere if the landfill site has not been engineered to capture the gas. Landfill gas is extracted from landfills using a series of wells and a blower/flare (or vacuum) system. The collected gas is directed by this system to a central point where it can be flared or further processed to power vehicles, generate electricity on-site or be upgraded to pipeline quality gas.

According to the CCAR, California has 36 landfills that would potentially qualify under the protocol. These landfills emit methane into the atmosphere and are not currently required to collect their gas. Most municipal solid waste landfills in California will be required at some point in the future to capture their methane emissions under regulations pending by the California Air Resources Board (CARB). Therefore, landfill projects can only provide GHG emission reductions up until the date that a landfill gas control system is required to be operational. The landfill projects provide significant environmental benefits by reducing GHG emissions in advance of regulatory requirements. Methane is, on a per ton basis, at least 21 times more potent than CO<sub>2</sub> in its effects as a GHG. These projects also benefit local air quality and provide odor control by simultaneously reducing non-methane organic compound emissions.

#### Urban Forest Project Protocol

The CCAR's Urban Forest Project Reporting Protocol provides guidance to account for and report GHG emissions reductions associated with a planned set of tree planting and maintenance activities which permanently increase carbon storage in trees in urban and other developed areas. Every project has to demonstrate a net tree gain in the project area, meaning the project entity plants more trees than it removes. Tree sites must be planted and then monitored and maintained to ensure permanent carbon sequestration. Urban forestry also creates positive environmental and societal benefits. These include mitigating the urban heat island effect, conservation education, neighborhood revitalization, job training, providing stormwater management, improving air and water quality, reducing energy use, and conserving water. These co-benefits have the potential to influence quality of life in the local neighborhood and community.

### **c. Summary of the Projects Submitting Bids**

PG&E presents the following summaries of the projects that presented bids in response to the two 2008 RFPs. In order to maintain confidentiality and maintain competitiveness for future solicitations, projects are identified only by letter.

#### Project A

Project A is a reforestation project located within the 259-acre preserve of once flood-prone agricultural ground. The project would restore a riparian site by planting a mix of native riparian species such as cottonwood and oak on a key wildlife area along a major river. The work would complement extensive habitat restoration efforts in the area. Over 12,000 acres are managed for conservation within five miles of the site. In addition, the project would filter air and water pollutants, absorb floodwaters, and reduce erosion. As proposed, the receipt of funds from the ClimateSmart program would allow an endowment to be established to guarantee the riparian forest's existence in perpetuity, providing funds for annual maintenance.

## Project B

Project B is a partnership of nine dairies to develop high quality anaerobic digester methane recovery and power generator systems, with each dairy having its own standalone system. Flushed manure, which is currently being collected in uncovered manure lagoons, would be diverted into newly constructed, stirred, covered lagoons scientifically designed to trap all the generated biogas that is currently being emitted into the atmosphere. The biogas would be collected and then combusted in high-efficiency clean-burning internal combustion engine generators to produce electricity, which would be used to power the farm with any excess electricity being sold to a utility. As proposed, funds from the ClimateSmart program would make the project's business plan financially feasible, providing revenue for initial capital costs, ongoing operational expenses related to digester maintenance, and insurance.

## Project C

Project C is a proposed conservation-based forest management project on a portion of 2,100 acres of a native coastal redwood forest. The forest would be managed from a conservation perspective. The project would: (i) include large buffers and reserves around stream corridors; (ii) set aside reserves in steep, erosion-susceptible slopes; (iii) ensure single selection harvest for the purpose of improving forest health and quality and increasing the growth rate of surrounding trees; and (iv) leave large sections of the forest in reserve. Recreational access would be developed in several reserve areas for the community. The approach would increase native species biodiversity and provide late successional forest habitat. The project is expected to enhance watershed recovery and protect species including threatened Coho salmon, rare plants such as the running pine and maple-leafed checkerbloom, and birds including the northern spotted-owl. Furthermore, it would enhance air quality and allow for new public access recreational opportunities. As proposed, funds from the ClimateSmart program would replace a portion of timber revenues as a source of funding for essential forest management including habitat protection, invasive plant removal, road and trail maintenance, reducing fuel loading to minimize fire risk, and protecting the forest from inappropriate public use. Additionally, funds would assist in finalizing the inventory of the forest areas and completing required registration and verification.

## Project D

Project D is a proposed landfill project to capture methane emissions over three years from an active landfill site. The project would install an enclosed landfill gas flare to destroy all collected gas by combustion and expand the existing in-place gas control and collection system to collect currently emitted landfill gas. Flare equipment would include a monitoring system to continuously monitor and record the quantity of methane combusted. The flare would also destroy non-methane organic compounds that would otherwise be emitted to the atmosphere, thereby reducing odors from the landfill. As proposed, funds from the ClimateSmart program would be used to verify the project through the CCAR, install the landfill gas flare system, expand the existing in-place gas control and collection system, and monitor, maintain, and repair the system.

### Project E

Project E is a proposed livestock project to capture methane emissions over ten years from two dairies. The project would install new methane gas collection systems over existing manure lagoons on the dairies, and use a flare to destroy the captured methane gas. No electricity would be generated by this project. The project involves existing lagoon storage systems and would not require construction of new lagoons or ponds. Local residents would benefit from odor reduction as non-methane organic compounds are prevented from being released into the atmosphere. As proposed, funds from the ClimateSmart program would be used to directly support the entire project activity. There are no other revenues being generated from the project.

### Project F

Project F is a proposed resale of GHG emission reductions created by a conservation-based forest management project and verified by the CCAR. As proposed, funds from the ClimateSmart program would be used to directly purchase the verified emission reductions.

### Project G

Project G is a proposed landfill project to capture methane over four years from a certified closed landfill site. The project would install a landfill gas control and collection system on one landfill unit and connect to an existing in-place enclosed flare to destroy all collected gas by combustion. A monitoring system would continuously monitor and record the flow of methane into the combustion device, and the flare itself would also monitor and record the quantity of methane combusted. The flare would also destroy non-methane organic compounds that would otherwise be emitted to the atmosphere, thereby reducing odors. As proposed, funds from the ClimateSmart program would be used to install a landfill gas control and collection system on the landfill unit; properly monitor, maintain, and repair the system; as well as verify the project through the CCAR.

## **d. Verified Emission Reduction Purchase Agreements (VERPAs)**

In mid-February 2008, PG&E entered into its first two VERPAs, with projects from its first competitive solicitation (please see the 2007 Annual Report). PG&E's first two VERPAs represented the largest investments in verifiable GHG emission reductions at the time under California's rigorous forest carbon sequestration project protocols. Following an extensive competitive bidding process, PG&E selected these projects because they met the stringent verification protocols set both by the CCAR and PG&E. The two agreements are to purchase GHG emission reductions from conservation-based forest management projects. Negotiations are still underway with shortlisted bidders from the second RFP, with VERPAs anticipated in the first quarter of 2009, and negotiations with shortlisted bidders from the third RFP commencing in early 2009.

### First VERPA

The seller of GHG emission reductions under the first VERPA is The Conservation Fund (or TCF). (Please see the 2007 Annual Report.) TCF is an environmental nonprofit corporation dedicated to protecting America's most important landscapes and waterways for future generations. TCF's Garcia River project is located on 23,780

acres of TCF property in Mendocino County. TCF will create Verified Emission Reductions (VERs) by reducing harvest levels which will sequester additional CO<sub>2</sub> in trees. These trees could have otherwise been harvested for timber according to TCF's current easement. In addition to the verification requirements by the CCAR, these efforts are verified by a professional forester to be above and beyond the existing conservation easement held by The Nature Conservancy, ensuring the permanent protection of even more carbon-sequestering trees. Co-benefits of the project include protection of the forest from subdivision, development, and conversion to non-forest uses, protection and restoration of fish-bearing streams that are high priority for Coho salmon, protection and restoration of water quality, protection of wildlife habitat for 28 listed animal species including northern spotted owl, Coho salmon, and steelhead trout, and protection of 24 plant species.

The CO<sub>2</sub> sequestered as represented in the VERs must remain sequestered for a period of 100 years from the delivery date of the VERs to PG&E. This permanence period of 100 years is the standard set by the United Nations International Panel on Climate Change for GHG emission reductions from forestry projects. PG&E has not required TCF to purchase an insurance policy for the permanence due to the lack of available policies in the marketplace.<sup>12</sup> To protect against the risk of permanence failure, PG&E has required TCF to provide a 10 percent reserve of VERs from the project. If there is a permanence failure, this reserve will be used to replace the lost VERs. If that is not possible or other VERs from TCF's other projects cannot be procured, then TCF will be required to procure comparable VERs from other sellers to remedy the permanence failure.

In fall 2008, PG&E entered into discussions with TCF over a proposed amendment to the first VERPA. Discussions over the proposed amendment were not concluded by the end of 2008, and were carried over into early 2009.

### Second VERPA

The seller of GHG emission reductions under the second VERPA is the Sempervirens Fund. (Please see the 2007 Annual Report.) The Sempervirens Fund (SVF) is a nonprofit corporation dedicated to preserving and protecting the natural character of California's Santa Cruz Mountains and to encouraging appropriate public enjoyment of this environment. The project is located on 425 acres of SVF-owned property in Santa Cruz County. SVF will create VERs on 202 acres of the land which was slated for logging prior to purchase by SVF. In connection with this VERPA, SVF will place a permanent conservation easement on the land that will prevent any logging. Co-benefits of the project include preservation of habitat for owls, hawks, bats, amphibians, mountain lions, and endangered steelhead trout; protection of a water source for 500 homes; and prevention of noise pollution which would have affected surrounding residents.

Similar to the TCF agreement, PG&E has required SVF to provide a 10 percent reserve of VERs from the project. If there is a permanence failure, this reserve will be

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<sup>12</sup> PG&E has investigated insurance rate information with a number of leading insurance companies and has found that no premiums have been written for this type of risk. To address the risk of loss of permanence in the absence of insurance, the CCAR is in the process of developing a required buffer pool for forest projects that verify their emission reductions under the next version of the forest protocol.

used to replace the lost VERs. If that is not possible or other VERs from SVF's other projects cannot be procured, then SVF will be required to procure comparable VERs from other sellers to remedy the permanence failure.

SVF requested an amendment to the VERPA in late 2008, extending the delivery of the 2007 and 2008 VERs to 2009, in order to have additional time to place the permanent conservation easement on the land. Discussions over the proposed amendment were not concluded by the end of 2008, and were carried over into early 2009.

**e. Value of GHG Emission Reductions Under Contract**

The two initial VERPAs represent a total of 236,058 tons worth of reductions. The combined value of these contracts is approximately \$2.2 million (paid out over time, largely as VERs are verified and retired). The GHG emission reductions will be created by these projects from 2007 through 2021; however, the majority of the reductions—more than 97 percent—will be created by the end of 2012. In present dollar terms, the cost of these reductions averages \$9.12 per ton.

## 6. ClimateSmart Charity Update

In the 2007 Annual Report, PG&E reported that on December 17, 2007, the Internal Revenue Service (IRS) determined that the ClimateSmart Charity is exempt from Federal income tax under Section 501(c)(3) of the Internal Revenue Code and that customer contributions to the ClimateSmart program are eligible for a tax deduction as charitable contributions. PG&E also reported that on January 31, 2008, the ClimateSmart Charity sent ClimateSmart customers (active as well as de-enrolled customers) a letter informing the customer of the IRS determination, as well as the total amount billed to that customer during 2007 for the ClimateSmart program. (An example of this letter can be found in Appendix F to this annual report.)

On January 23, 2008, PG&E sought a similar exemption from the California Franchise Tax Board (FTB) from state income tax. On May 15, 2008, the FTB affirmed the IRS ruling and found the ClimateSmart Charity exempt from state income tax as well. On May 22, 2008, PG&E notified the CPUC's Energy Division, the Division of Ratepayer Advocates and members of the service list to Application 06-01-012 of the FTB ruling.

On September 24, 2008, PG&E filed Advice Letter 2958-G / 3344-E with the CPUC, for its review and approval. This filing included a proposed "servicing agreement" between PG&E and the Charity that is designed to implement the structure proposed to the IRS under which customer contributions would be segregated from other PG&E revenues and then used for charitable purposes. As the Charity explained to the IRS, "PG&E will serve as the [Charity's] agent in collecting the monthly contributions from participants on behalf of the Charity. . . . PG&E will segregate and direct the contributed funds to the [Charity], which will use such funds on initiatives to reduce greenhouse gas emissions." The proposed servicing agreement effectuates this arrangement, putting PG&E formally in the role as a billing agent for the Charity. On October 23, 2008, the CPUC suspended AL 2958-G/3344-E and has not yet acted on PG&E's filing.

Because this advice filing was suspended, in late December 2008, PG&E transferred an additional \$1.95 million into the escrow account established in December 2007 to preserve tax deductible status for customer contributions during 2008. (Please see the 2007 Annual Report for a description of this escrow account.) The amount transferred approximates the total amount billed to ClimateSmart customers for the calendar year 2008, and was calculated by adding actual billings through November 30, 2008 to an estimate of amounts to be billed from November 30 through the remainder of 2008. During 2008, payments to the vendors under the GHG emission reduction contracts executed with PG&E were made from this escrow account.

## 7. Financial Results

### a. ClimateSmart Program Revenues

PG&E billed premiums of approximately \$1.9 million to 30,948 customers, including all eligible PG&E buildings, in 2008. During 2008, PG&E shareholders contributed \$476 thousand in ClimateSmart premiums.

These customer contributions are solely for use in funding independently verified, California-based GHG emission reduction projects under the strict protocols of the CCAR, per the ClimateSmart Decision.

The premium sub-accounts of the ClimateSmart Balancing Accounts track the difference between the premiums billed to customers and the amounts paid to GHG emission reduction projects. As of December 31, 2008, premiums of \$940 thousand were recorded in the Gas ClimateSmart Balancing Account and premiums of \$914 thousand were recorded in the Electric ClimateSmart Balancing Account. The ClimateSmart program's contracts for GHG emission reduction projects began in 2008 and, even though payments under these contracts have been made under the escrow account described in Section 6 of this annual report, the payments are reflected in the figures for the balancing accounts shown herein. Interest accrues on the balance at PG&E's currently-adopted cost of capital of 8.79 percent, pursuant to the CPUC's requirements in the ClimateSmart Decision. The balance in the premium sub-accounts of the ClimateSmart Balancing Accounts is a credit of approximately \$2.5 million at December 31, 2008.

**TABLE 7-1**  
**PACIFIC GAS AND ELECTRIC COMPANY**  
**CLIMATESMART BALANCING ACCOUNT – PREMIUM SUBACCOUNT**  
**(WITH BREAKDOWNS BY CUSTOMER CLASS)**  
**AS OF DECEMBER 31, 2008**  
**(\$ 000S)**

	Electric 2008	Gas 2008	Total 2008
Beginning Balance January 1, 2008	\$435	\$296	\$731
ClimateSmart Premiums – Residential	350	558	908
- Commercial/Agricultural	209	261	470
- PG&E Buildings (Through Shareholder Funds)	355	121	476
Total Premiums	\$914	\$940	\$1,854
Allocated GHG Reduction Project Expense(a)	(121)	(52)	(173)
Interest (at Cost of Capital Rate)	68	66	134
Ending Balance December 31, 2008 (Credit)/Debit	\$1,296	\$1,250	\$2,546

(a) Payments to vendors during 2008 were made out of the escrow account discussed in Section 6 of this annual report. This accounting entry is shown for completeness.

## b. ClimateSmart Program Authorized Budget

A total of \$6.3 million of the \$16.3 million ClimateSmart program's three-year budget was expensed between January 1, 2008, and December 31, 2008. This was less than the CPUC's authorized budget for 2008 of \$6.86 million (including the carry-forward of 2007 unspent funds). Administration expenditures included incremental labor costs, the costs of operating the program, and payments to the CCAR.

The bulk of the 2008 A&M expenditures supported market research and continuing promotion of the program, as well as the launch of the new broad-based awareness campaign. (Please see Section 4 of this annual report.)

Table 7-2 provides a summary of ClimateSmart program expenditures through December 31, 2008.

**TABLE 7-2**  
**PACIFIC GAS AND ELECTRIC COMPANY**  
**CLIMATESMART PROGRAM EXPENDITURES**  
**THROUGH DECEMBER 31, 2008**  
**(\$000)**

	Through 12/31/08
Marketing, Education and Outreach	\$4,733
Program Admin (w/o CCAR)	1,205
CCAR	383
Total	\$6,321

Table 7-3, below, shows the administration and marketing activity, plus accrued interest, for 2008 in thousands of dollars. The credit balance of \$584<sup>13</sup> thousand represents the 2008 unspent administration and marketing funds, and interest accrued on these unspent funds. PG&E will file an advice letter requesting that these unspent funds be transferred to the 2009 ClimateSmart budget.

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<sup>13</sup> PG&E recorded \$4.7 million for marketing costs in 2008 on an accrual basis. The actual costs invoiced for activities in 2008 were lower than the estimated accrual by \$421 thousand. PG&E will include that \$421 thousand in an Advice Letter for the transfer of unspent 2008 funds to the 2009 budget.

**TABLE 7-3**  
**PACIFIC GAS AND ELECTRIC COMPANY**  
**CLIMATESMART PROGRAM 2008 ADMINISTRATION AND MARKETING ACTIVITY**  
**(\$000)**

	Total
Annual Authorized Revenue Requirement(a)	(\$6,860)
Administration Expense – Excluding CCAR	1,205
CCAR Expense	383
Marketing Expense	4,733
Interest (income)/expense	(45)
Balance to Carry Forward (Credit)/Debit	(\$584)

(a) On February 11, 2008, PG&E filed Advice 2903-G/3208-E to request authorization to spend the \$1.7 million credit balance in 2008 on administration and marketing necessary to accomplish the overall goals of the three-year demonstration program. The Advice Letter was approved on September 18, 2008. Thus, the resulting budget for 2008 was approximately \$6.9 million.

**c. Independent Review of the ClimateSmart Program**

As part of the original ClimateSmart testimony,<sup>14</sup> PG&E committed to conducting an independent financial review of the program, with a specific focus on customer enrollment, vendor eligibility, flow of dollars from the customer through the balancing account to vendor payment, and application of interest to the balancing account. This review was conducted by an independent accounting firm whose report dated December 30, 2008 found no outstanding exceptions to the established procedures.

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<sup>14</sup> Climate Protection and Tariff Option Prepared Testimony, Application 06-01-012, January 26, 2006, page 5-3.

## 8. Program Assessments

The ClimateSmart program completed its first full year of operation in 2008 and has achieved many successes. In addition, some of the challenges the program faced in 2007 persisted in 2008, and others have emerged as the program has proceeded. This section assesses the program's successes and lessons learned in 2008.

### a. Programmatic Benefits/Successes

#### 1. *Continued Support of "Carbon Infrastructure"*

Through the creation and implementation of the ClimateSmart program, PG&E's customers helped the CCAR create some of the substantial infrastructure that will be needed before many of the measures of AB32 can take effect.<sup>15</sup> For example, based in part on support from the ClimateSmart program, the CCAR created the Climate Action Reserve which:

- Provides a reliable means of attaching title of a carbon instrument to a single account holder;
- Facilitates the transfer of voluntary GHG emission reductions by providing a means for the transfer of a title to carbon instruments between holders, while ensuring an auditable trail from issuance to retirement of the instrument;
- Provides the CPUC with a way of reconciling commitments made in the contracts from the ClimateSmart program and ensuring that the proper amount of allowances/credits can be retired; and
- Improves environmental integrity by providing transparency and a means of ensuring that credits are appropriately retired.
- With ClimateSmart program support, the CCAR has also developed a number of emission reduction project protocols, including the livestock methane capture protocol, the landfill methane capture protocol, and the urban forestry protocol. The CARB has since adopted the livestock methane capture and urban forestry protocols for use in voluntary actions to reduce GHGs under AB32.
- The CCAR had none of these mechanisms in place at the time when the ClimateSmart program was approved. The program's existence was instrumental in the CCAR's recognition of the need to put in place an emission reduction tracking system and additional project protocols.

#### 2. *Development of GHG Emission Reduction Projects*

The ClimateSmart program has been instrumental in encouraging the early development of CCAR-verified voluntary GHG emission reduction projects in

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<sup>15</sup> Point Carbon and Bank of New York Mellon. (2008). *Towards a Common Carbon Currency: Exploring the prospects for integrated global carbon markets*. Retrieved December 2008, from Point Carbon website: <http://www.pointcarbon.com/advisory/newreports/1.1018681>.

California. Through its three competitive solicitations, the ClimateSmart program generated considerable demand for voluntary GHG emission reductions where barely any before existed. Through this process, the ClimateSmart program has also educated hundreds of potential project developers about the project development process and the applicable CCAR protocols. Moreover, the program was the first to develop a legal structure (including a standard form agreement) for the purchase of GHG emission reductions. Before PG&E developed its standard form contract for the purchase of GHG emission reductions, there was no standard available. The form contract was the basis for a standard form agreement which is in the process of being adopted by the American Bar Association (ABA). PG&E presented the form contract at a nationwide teleconference and the form contract has also been posted to an ABA website.<sup>16</sup> By sharing this document with others, the ClimateSmart program has helped pave the way for others to follow in the implementation of this important work.

### 3. *National and International Memoranda of Understanding (MOU)*

In its Scoping Plan, the CARB notes that “[offset] projects in the Mexican border region may be of particular interest.”<sup>17</sup> The AB 32 Scoping Plan also states, “International projects may also have significant environmental, economic and social benefits.”<sup>18</sup>

At the request of the California Environmental Protection Agency, PG&E signed a MOU<sup>19</sup> in August 2008 with Governor Schwarzenegger, the six Mexican Border States, and the CCAR that calls for cooperation on the development of protocols and projects for Mexican GHG emission reduction projects. The ClimateSmart program is specifically named in the Governor’s MOU. Through its enrolled customers, the ClimateSmart program can help encourage the early development of CCAR-verified GHG emission reduction projects in Mexico just as it did in California. The inclusion of the ClimateSmart program in the Governor’s MOU validates the program’s quality and unique role.<sup>20</sup>

### 4. *Continued Road Testing of Protocols*

Since the ClimateSmart program started, it has emerged as the leading buyer of California-specific CCAR emission reductions, and its influence on the development and use of CCAR protocols has put such emission reductions among

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<sup>16</sup> The form contract may be accessed through the following website:

[http://65.181.148.190/renewableenergyinfo/includes/resource-files/draft\\_verpa.pdf](http://65.181.148.190/renewableenergyinfo/includes/resource-files/draft_verpa.pdf).

<sup>17</sup> California Air Resources Board. (2008). *Climate Change Proposed Scoping Plan*. Retrieved October 2008, from CARB website: <http://www.arb.ca.gov/cc/scopingplan/document/psp.pdf>.

<sup>18</sup> *Ibid.*

<sup>19</sup> Office of the Governor. (2008). *Gov. Schwarzenegger Joins Mexican Border States to Fight Climate Change and Increase Green Investment through Public Private Partnerships*. Retrieved August 2008, from Office of the Governor website: <http://gov.ca.gov/press-release/10419/>.

<sup>20</sup> See Appendix I for the full text of the *National and International Memoranda of Understanding (MOU)*.

the highest quality and value of any currently available.<sup>21</sup> CCAR emission reductions now make up approximately 17 percent of the voluntary market in GHG emission reductions, up from 0 percent in 2007.<sup>22</sup> Demonstrating the project protocols using the ClimateSmart program allows not only the negotiating parties, but also policy makers to learn how these protocols work in practice.

5. *Environmental Co-Benefits Beyond Capturing or Eliminating GHG Emissions*

The ClimateSmart program delivers benefits beyond those of capturing or eliminating GHG emissions. These co-benefits vary among projects. Co-benefits of forestry projects include protection of the forest from subdivision, protection and restoration of fish-bearing streams, protection and restoration of water quality, and protection and restoration of wildlife habitat for multiple animal and plant species. For livestock manure management and landfill gas capture projects, co-benefits include odor reduction for local residents.

6. *Promoting the Development of Green Jobs*

PG&E is committed to the creation of green jobs, and has sought to better understand how investments in projects contracted for under the ClimateSmart program might further this goal. One of the questions in the program's competitive solicitation questionnaire asks bidders to identify how many and what kinds of jobs their proposed project is anticipated to create, and what kinds of skill sets are needed to perform the jobs created. This question allows PG&E to analyze a project's ability to create green jobs. PG&E has also asked its finalist bidders and its contract partners for more information about green job creation where their projects anticipate the creation of new jobs.

7. *Facilitates Customer Awareness of the Issue of Climate Change*

A recent Gallup poll indicates that a record-high 41 percent of Americans believe the seriousness of global warming is exaggerated in the news.<sup>23</sup> The ClimateSmart program has seen similar results with a surprising number of customers still not aware that they have a carbon footprint or that their use of energy contributes to GHG emissions responsible for climate change. The ClimateSmart program continues to educate all residential and business customers (not just those enrolled) about the impacts of climate change and what they can do to reduce their own carbon footprint.

Even after customers have reduced their carbon footprint through energy efficiency, there are GHG emissions associated with customer energy use. The ClimateSmart program provides all customers with a means of balancing out those

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<sup>21</sup> DeBare, Ilana. (2008, July 10). Breaking green ground; State's private forests sell carbon offsets to preserve trees, reduce gases in atmosphere. *The San Francisco Chronicle*. p. A1.

<sup>22</sup> New Carbon Finance. (2008). *Voluntary Carbon Quarterly*, Retrieved December 2008, from New Carbon Finance website: <http://www.newcarbonfinance.com/>.

<sup>23</sup> Saad, Lydia. (2009). *Increased Number Think Global Warming Is "Exaggerated."* Retrieved March 11, 2009, from Gallup website: <http://www.gallup.com/poll/116590/Increased-Number-Think-Global-Warming-Exaggerated.aspx>.

emissions through developing solutions in other parts of the economy. The program complements and enhances the existing state programs for customers, many of whom will not be directly regulated by AB 32 or other GHG regulatory programs.

8. *The ClimateSmart Program Is a Model for Other Utilities and Other States*

Following the approval and launch of the ClimateSmart program, several utilities across the United States have implemented their own versions of the ClimateSmart program. For example, the Sacramento Municipal Utility District has a program called Live Green which directly funds local offset projects in the Sacramento region.<sup>24</sup>

In summary, it is important to note that both the financial and environmental value of the programmatic benefits listed above are substantial and will accrue to all PG&E customers and not just to those who are enrolled in the program. Thus, the investments made by all PG&E customers to establish the ClimateSmart program are likely to provide a significant long term benefits to all residents of California.

**b. Lessons Learned in 2008**

With the passage of time it has become apparent that enrollment goals set for the ClimateSmart program at the outset were excessively ambitious. For reasons that follow, the program is currently not on track to meet enrollment targets set in the ClimateSmart Decision. In addition the program is facing some challenges in obtaining sufficient tons of GHG emission reductions to meet the performance standard.

1. *Much Will Be Required to Educate Customers on the Relationship Between Energy Use and Climate Change*

The ClimateSmart program continues to educate customers on the relationship between their energy use and climate change. In order to address the continued lack of understanding of this relationship, PG&E launched the ClimateSmart “365” Campaign, featuring television, online, and print advertising in December 2008. Through this campaign, the annual GHG emissions associated with home energy use are compared to those produced by a sports utility vehicle. Response to the campaign has been mixed. The new website associated with the campaign recorded over 50,000 hits in the first month and customer awareness of the ClimateSmart program improved. However, December enrollments were not as high as was hoped. Approximately 1 percent of those who visited the new website in its first month of operation eventually enrolled in the ClimateSmart program.

2. *Economic Conditions Appear To Be Impacting Program Participation*

Many residential and commercial customers are impacted by the current economic recession that began in the fourth quarter of 2007. PG&E believes that

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<sup>24</sup> Information on SMUD’s Live Green program may be found at: <http://calc.positiveenergyusa.com/learn/projects>.

some potential ClimateSmart program participants are choosing not to join the program because of the state of the economy.

3. *Delays in Developing and Approving GHG Emission Reduction Protocols Have Restricted the Potential for Potential Projects*

The lengthy protocol development and approval process has constrained the ability of the ClimateSmart program to contract for GHG emission reductions verifiable under protocols other than forestry. Specifically, delays in authorizing the ClimateSmart program's use of the livestock and landfill protocols may have reduced the opportunities for these projects to bid into the ClimateSmart program, which is only authorized for three years.

Development and approval of project protocols has proceeded more slowly than anticipated by the CCAR in the original testimony for the ClimateSmart program. According to the CCAR, this is due to their rigorous process and the time required engaging stakeholders in the development of the project protocols. For the development of the protocols, the CCAR estimated that they "would undertake one new protocol in 2006, two in 2007 and a fourth in 2008."<sup>25</sup> In actuality, no new CCAR project protocols were developed in 2006,<sup>26</sup> the livestock methane capture protocol was approved by the CCAR's board in June 2007, the landfill methane capture protocol in November 2007, and the urban forestry protocol in August 2008.

Similar challenges for PG&E were encountered in the approval process at the CPUC. For example, after the CCAR's board adopted the livestock methane capture protocol on June 19, 2007, PG&E submitted it to the CPUC for approval on June 27, 2007 in Advice 2846-G/3075-E. Due to the technical nature of the protocol and the newness of these issues, it took nearly one year for the CPUC to approve the protocol for PG&E's use in the ClimateSmart program. The CPUC approved the protocol on June 12, 2008 by Resolution G-3410.

4. *Bidders Are Still Learning About What Makes a Good GHG Emission Reduction Project and How to Apply CCAR Protocols*

While the ClimateSmart program was ready to solicit and negotiate its first bids in mid-2007, most bidders are still learning about the CCAR's project protocols, determining their project's potential eligibility for the ClimateSmart program, and figuring out how to develop their projects. As a result, PG&E needed to conduct outreach with potential project developers. PG&E publicized the opportunity to sectors that may not be aware of this emerging revenue stream. PG&E spoke at numerous conferences throughout the year to encourage people to bid into the RFPs. This "human touch" element has been important in engaging and educating potential bidders, and ultimately to giving those potential bidders

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<sup>25</sup> Climate Protection and Tariff Option Prepared Testimony, Application 06-01-012, January 26, 2006, page 2-8, lines 9-10.

<sup>26</sup> The lack of any new Registry board-approved protocols in 2006 limited the type of projects with which the ClimateSmart program could contract and particularly hampered the program due to its short demonstration period.

the tools they need to develop projects that meet the stringent selection criteria of the ClimateSmart program.

5. *Skepticism Persists Over Claims of Carbon Neutrality*

While the media related specifically to the ClimateSmart program was overwhelmingly positive, the public and media continue to be skeptical about companies that claim to be carbon neutral or offer products that enable customers to become carbon neutral. The ClimateSmart program's rigorous and transparent standards have set it apart, however, these negative perceptions have influenced the views of some consumers and represent an additional barrier the ClimateSmart program must overcome before some customers will enroll.

## 9. Conclusion

In its first full year of operation, the ClimateSmart program has achieved many successes. The number of PG&E customers participating in the program doubled in 2008. In addition the program entered into two VERPAs that represent a total of 236,058 tons worth of reductions. The ClimateSmart program funded the development of new GHG emission reduction protocols, and the program's outreach team gained a deeper understanding of how to market the program to customers.

The ClimateSmart program provides many benefits to Californians in general, and PG&E customers in particular. Among other things, the program increases customer awareness of the challenges presented by climate change, and the important role that GHG emission reduction projects play in addressing climate change. The program also gives individual customers the ability to take direct action to combat climate change.

Cities are using the ClimateSmart program as a part of their Climate Action Plans. Since its launch in June 2007, 18 cities have enrolled in the program.

The ClimateSmart program also helps facilitate and expedite the climate change infrastructure for the state. The readiness of project proponents to proceed with GHG emission reduction projects, the creation of solutions to regulatory or technological barriers to project development, the integrity of tracking systems and registries, and experience negotiating contracts are just some of the outcomes from the ClimateSmart program that are a valuable source of information and experience for the state.

Some of the same challenges the ClimateSmart program faced in 2007 persisted in 2008, and others have emerged as the program has proceeded. The ClimateSmart program is currently not on track to meet the customer enrollment targets set in the ClimateSmart Decision.

The ClimateSmart program is a first-of-its-kind program and educating customers about the relationship between energy use and climate change has proven to be a challenge. Concern over enrollment trajectory prompted the program's outreach team to review the customer outreach approaches adopted in 2007. The ClimateSmart program continually analyzes and refines its marketing plan to attract more participants.

The ClimateSmart program has successfully negotiated contracts for 236,000 tons of GHG emission reductions. It will be challenging for the program to contract for 1.5 million tons by December 31, 2009, as required by the ClimateSmart decision. Most bidders are still learning about the CCAR's project protocols, determining their project's potential eligibility for the ClimateSmart program, and figuring out how to develop their projects.

The program's demonstration period is set to end on December 31, 2009. PG&E, in consultation with the CPUC and external stakeholders, is considering a request to the CPUC for an extension of the ClimateSmart program. If PG&E makes such a request, PG&E would likely do so in the second quarter of 2009 through a formal application before the CPUC.