

Planning Strategic Communications and Outreach for the Solar Program

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Planning Strategic Communications and Outreach for the Solar Program

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ABSTRACT

Advances made through the Solar Program in photovoltaic and solar thermal technologies must be well communicated to appropriate audiences if further technical and market growth will occur. As the Program's communications team, we developed a plan to: 1) integrate communications across the various solar technologies and reduce redundancy; 2) target audiences and messages strategically; 3) respond better to changes in markets, technology perceptions, audiences, and funding; 4) develop communication projects within the context of other relevant plans (e.g., Solar Program Multi-Year Technical Plan); 5) leverage limited resources; and 6) cultivate a multiyear mentality. Our approach included profiling eight key audiences, including their perceptions of solar technologies; formulating audience-specific messages and communication objectives and strategies; and proposing communications tactics to reinforce the objectives. Presently, we are conducting a needs assessment of print products, as well as a gap analysis. We will then prioritize projects, complete high-priority projects, measure effectiveness of selected projects and the plan, and seek strategic connections with other activities and programs.

1. Objectives

The Solar Energy Technologies Program helps to direct and support advances being made in the solar technologies of photovoltaics, concentrating solar power, and solar heating and lighting. But word of such advances must be communicated clearly and strongly to appropriate audiences. If not, the impact these advances could have on further technical progress may be stifled. And the continued growth of solar markets may be stunted.

Therefore, we see the need for carefully tailored communications and outreach products and activities related to key targeted audiences. Within the Solar Program, managers are developing a systems-driven approach [1] to assess the potential of various solar technologies. This approach considers target markets for these technologies, along with relevant technical and market barriers to their success. Understanding these factors helps in targeting research that more effectively achieves the promise the technologies have in the markets. As communicators, we can key into this approach by focusing on these same markets and determining how communications can be used to overcome barriers and address key issues.

To better accomplish the Program's communications goals, we developed a communications plan to:

- Provide a comprehensive guide to integrate the communications work across the three solar technology areas within our Solar Program.
- Coordinate communications efforts and reduce redundancy across several offices, namely DOE, NREL, and SNL.
- Strategically target our efforts regarding audiences and key messages.
- Strengthen the effectiveness of our work by putting greater emphasis on targeted messages to those audiences and on distributing and evaluating our products.
- Improve our response to changes in markets, audiences, funding, and opportunities, allowing us to be flexible and able to prioritize our projects.
- Develop projects within the larger context of national, DOE, EERE, and Program plans, including our Program's systems-driven approach.
- Best leverage our limited resources of people, time, and funds.
- Cultivate a multiyear mentality involving a concerted focus on ongoing Program and communications goals.

2. Technical Approach

The core of our Solar Communications Team working on this project included: Wendy Burt (Solar Program Liaison from the Communications and Outreach Office of the Office of Energy Efficiency and Renewable Energy), Connie Brooks (in Sandia National Laboratories' Solar Program), and Susannah Pedigo, Ruby Nahan, Susan Moon, and Don Gwinner (in the Communications Office at the National Renewable Energy Laboratory, who, along with their teammates, specifically represent Solar Program clients).

Our final document [2] represents the first comprehensive strategic plan that covers communications and outreach activities within the Solar Program. As an initial step in our planning, we took an introspective look at our own performance. We then focused on eight audiences that we consider critical at this time. The external audit of these target audiences involved evaluating their needs, values, and attitudes toward solar energy.

This information served as a starting point in establishing our communication objectives and strategies for each audience. Specifically, for each audience, we developed "positioning objectives," consisting of messages (what we want to say), the rationale for each message (why we want to say it), associated strategies (how, when, and where we are going to convey the messages), and the intended goals (what we expect our efforts to accomplish). These objectives were used to develop broad strategies and tactics

that ultimately led to proposed communications projects within the implementation portion of the plan [3].

3. Results and Accomplishments

We focused on the following target audiences: (1) building industry, (2) consumers, (3) federal government, (4) solar industry and industry research partners, (5) state and local governments, (6) students—kindergarten through university—and educators, (7) university research partners, and (8) utilities and energy service providers.

Through our analysis, we tabulated preliminary answers for each audience to questions in the six categories below:

Audience make-up:

- Who are some actual people, groups, or organizations in this audience?
- How extensive is this audience? Diverse and large with many subsets, or a simple, singular segment?

Decision-making process and influence:

- How do members of this audience make decisions?
- Who does this audience have an impact on or most influence? What leverage do they have?
- Who most impacts or influences them? Does another group represent them or play an advocacy role for them?
- What do people in this audience hope to accomplish or obtain by considering relevant solar technologies?
- What would we like this audience to do regarding solar?
- What will most increase this audience's involvement with solar?

Audience values:

- What issues are important to this audience?
- Why is solar important to this audience?
- What are the most important features about the relevant solar technologies to this audience?

Audience needs:

- When these people consider relevant solar technologies, what do they want to accomplish with solar?
- Name three features of relevant solar technologies important to this audience.
- What is the one thing that solar could do that would have a dramatic impact on this audience?
- What level of content does this audience need? How much detail will they need or understand?
- What does this audience most need from us?

Audience attitudes:

- What is this audience's "bottom line"? What do they really care about?
- What is this audience's perception of solar now?

Internal audit:

- What should not be communicated to this audience? What is sensitive information?
- Where does this audience typically look to get its information?
- What are our opportunities to help this audience?
- What are our threats to reaching this audience?
- Where does this audience get information on our technologies now? Where would they look in the future?
- Who are their competitors?
- What is their stake in the success or failure of solar?

Based on each audience's values, needs, and attitudes, we crafted communications objectives and identified tactics, which are specific activities and projects that support the objectives and strategies we outlined for each audience. The tactics reinforce at least one of the objectives listed. We will further develop these tactics with our clients' input and support, to ensure that the proposed projects align with their needs. Metrics will be sought to gain some measure of return on investment, as well as directional changes in attitudes and behaviors toward solar technologies.

Currently, we are evaluating our inventory of existing communication products to assess the needs of customers or audiences. Through this "gap" analysis [4], we wish to leverage what we already have done, then propose projects that fill the gaps where we are missing opportunities.

4. Conclusions

We now have a plan that serves as a source of information and guidance for much of our work. However, although the plan itself is important, it is the planning process that contributes the most value to the effectiveness of our communications.

This plan is a work in progress and will always be such. As we "work the plan"—completing prioritized, high-value, well-justified communications and outreach projects—we will better see how and where to refine it. We intend to update this plan on an ongoing basis, including a detailed annual review by the entire communications team prior to the next Annual Operating Plan cycle. Finally, we will make a more concerted effort to collect quantifiable data on the impact of our communications and outreach products and activities.

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REFERENCES

- [1] U.S. Department of Energy, *Solar Energy Technologies Program—Multi-Year Technical Plan, 2003-2007 and Beyond*, 168 pp., DOE/GO-102004-1775 (January 2004).
- [2] S. Pedigo and others, *Solar Energy Technologies Program—Strategic Communications Plan, 2004 and Beyond*, 44 pp., internal NREL report (2004).
- [3] S. Pedigo and others, *Solar Energy Technologies Program—Strategic Communications Implementation Plan*, Excel others, *Solar Energy Technologies Program—spreadsheet* (2004).
- [4] S. Pedigo and *Communications Gap Analysis*, Excel spreadsheet (2004).

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