

# CHAPTER 7 Outreach and Education

## 7.0 INTRODUCTION

Bioproducts such as biomass and biofuels are becoming important topics of discussion among politicians, natural resource professionals, environmental groups, and the general public. Much of the discussion includes conflicting opinions and questions—two indicators that outreach and education are needed. For example, public perceptions research suggests that most people know little about energy, in general, and even less about bioenergy. In order for landowners, community members, and other stakeholders to decide if biomass is something they should or should not embrace, education is essential. If people come to you for information, resources, and assistance, there are many ways you can provide outreach and educational resources. This chapter is designed to help you think about how to do it effectively. While the concepts presented in this chapter focus on woody biomass, most tools and strategies could easily be used with other types of biomass. The following are scenarios you might encounter in your work.

*1) A local forest landowner approaches you with questions. His land has been in forestry for three generations. Recently, he's received numerous offers from developers for his property and isn't sure what he should do. He wants to be able to pass the land on to his children and would rather find ways to keep his forest working for him. He heard that bioenergy markets are coming to your region and wants you to help him determine how to take advantage of this possibility.*

*2) Your county is exploring the possibility of using wood to help meet growing electricity needs. Some members of the community are proposing a 30 Megawatt wood-powered plant to be built within the next three years. Two local environmental groups are strongly opposed to the plan, while one is in favor. A county commissioner calls, asking if you can give a "wood-to-energy 101" presentation to the commission during a public meeting.*

*3) Your boss thinks there might be potential for a cellulosic ethanol facility in the community and has asked you to put together an outreach program on the topic. She wants you to get a community discussion going on the possibility of stimulating economic development through cellulosic ethanol production.*

Figure 1: Effective outreach is clear, concise, and relevant to the audience. PHOTO BY LAUREN McDONELL, UNIVERSITY OF FLORIDA.



## 7.1 PRINCIPLES OF EFFECTIVE OUTREACH

The possibilities for outreach opportunities are almost endless. No matter who your target audience is, however, there are a few principles to keep in mind when developing your plans for educational efforts. Effective outreach needs to be (Jacobson et al., 2006)

- clear and concise,
- simple and easy to understand,
- at an appropriate technical level for your audience,
- accurate and up-to-date,

- personally relevant to your audience,
- credible and trustworthy, and
- detailed enough to provide a basic understanding and foundation for learning more.

If you're not sure what information is appropriate for your audience, ask them! Either conduct a needs assessment (e.g., a brief questionnaire) or ask individual clients directly what information will best meet their needs. Your most important focus is the audience you are trying to reach, rather than the general public so you will want to learn and understand what they already know and what they need to know.

## **7.2 UNDERSTANDING YOUR AUDIENCE**

Who is your audience? Farmers, forestland owners, or elected officials? Adults or youth? People looking to sell woody biomass or use it? Is your audience approaching you with questions or are you trying to gain their participation in an educational program?

### **Responding to Your Audience**

There is a good chance that many of your outreach activities will either involve people contacting you with questions or requests to do a presentation on woody biomass. When people come to you with questions, keep it simple. Ask questions to find out what they know, what they care about, and what misconceptions they may have about woody biomass. Misconceptions are important because when people believe something that may not be true, they are not likely to accept information that contradicts what they believe (Monroe, 2005). If you know about some potential misconceptions that your audience may have, you can tailor your outreach approach to acknowledge the misconceptions and gently correct them by providing science-based facts. Provide your audience with basic handouts (you can use the ones provided in this guide or create your own). Consider the list of outreach tools provided later in this chapter and determine which ones will be most useful with specific clients. If, as in scenario 1, a forest landowner wants help figuring out if woody biomass production might be a good option for him, you might give a basic overview of some of the possible sources of woody biomass, existing or planned local and regional facilities that use wood (if any), and the potential prices he might be able to expect.

If you are asked to give a presentation on woody biomass at a public meeting, as in scenario 2, use the PowerPoint® presentations provided with this guide as a starting point. You can pick and choose which slides and information you think will be most relevant and helpful to your audience, and add local data and examples where possible. Keep your presentation basic and concise and be sure to leave time for questions.

### **Attracting an Audience**

If you are responsible for delivering a community-based program, as in scenario 3, you will need to attract an audience. Jumping up and down may not be the best approach. You can attract an audience by focusing on common concerns that people have, and as you learn more about their specific concerns, you can adapt the details of your message to address what they care about and need to know.

A community is an area where people live and interact with one another. The area may be defined by a town, city, county, or region. In this case, we are referring to people who may be affected by woody biomass production or utilization. There are a few key questions that you should consider when creating a community outreach program. Is biomass on the community's radar at all, or is it a completely new concept? Is there enough wood growing locally to supply a bioenergy or bioproducts facility? Is there a desire to figure out where a biomass-using facility might work but no formal plan? Or are there plans for a facility already? Is the community preparing to gather public input on plans for a facility? Answers to these questions will help determine what information will be most helpful to your target audience and which outreach tools and strategies will be most effective. In scenario 3 given earlier, an effective approach might include learning about existing forestry or energy industries within the region; finding out if plans or interest exist to develop a cellulosic ethanol or other woody biomass facility; and identifying and exploring concerns within the local community, such as the need for more jobs, the desire for increased energy independence, and the fate of local forests.

Whatever your role in public outreach and engagement, do your best to make sure that the public's concerns are addressed and their questions are answered. If you are asked questions that you cannot answer, explain that you need to research the answer and will respond later via email or phone. See the "Frequently Asked Questions" in the appendix to help prepare for questions you might be asked. The *Common Concerns* handout also may be useful.

## Public Perceptions

Whether you help engage the public in a community discussion or provide information to individuals, having a general idea of public perceptions can help you identify potential informational needs and respond to common concerns and misconceptions about woody biomass. Public perceptions research has identified a need for education about energy and more specifically, the production and use of woody biomass. A national study in 2001 revealed that only 12 percent of Americans can pass a basic energy quiz (NEETF, 2002). The University of Florida conducted a random mail survey of 298 single-family home and mobile home owners in Alachua County, Florida, about their knowledge and attitudes concerning using wood for energy. Fifty-four percent of respondents said they were "not at all knowledgeable" about using wood for energy and only 5 percent consider themselves "very knowledgeable". Seventy-one percent of respondents support using waste wood, while 61 percent support using wood grown for energy (Monroe et al., 2007).

Information such as this can help shape your outreach messages and make them resonate with your audience. For instance, if you know

Figure 2: Knowing whether or not a community is considering producing or using woody biomass is essential to designing an effective community outreach program. PHOTO BY MARTHA C. MONROE, UNIVERSITY OF FLORIDA.



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### Dealing with Controversial Issues

In some cases, the concept of using wood for energy production or biobased products can be a controversial subject. There may be groups or members of the public who strongly oppose the idea. Be prepared to listen to their thoughts and concerns and acknowledge that their points of view is important. Maintain professionalism as you share facts, gently correct misconceptions, and answer questions. When dealing with contentious issues, it is especially important to avoid the appearance of bias.

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In general, the University of Florida study respondents reported the following:

- local forests and good air quality are important things to keep
  - using waste wood for energy production is acceptable
  - solar and wind are the best energy sources,
  - burning wood increases atmospheric CO<sub>2</sub>
  - wood is dirtier than natural gas
  - healthy forests are unmanaged forests
  - and foresters, environmental groups and extension agents are reliable sources of information
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the public is concerned about forest sustainability, you can ensure that your materials and conversations respond to that concern. If you know the public is generally comfortable with the idea of using wastewood for energy and biobased products, but opposes growing trees for these purposes, your message can focus on local sources of wastewood. If you learn that your audience believes wood bioenergy will contribute to global climate change, you can tailor your outreach activities to address this misconception.

Public perceptions are also important because public support, or lack of it, can have a tremendous impact on the outcome of a biomass utilization proposal. For example, in North Wiltshire in the United Kingdom, a utility company proposed a 5.5 megawatt (MW) plant to power 10,000 homes using advanced gasification technology. Local people, who worried about negative effects to the local environment, formed an action group called Biomass Lumbered on Our Town (BLOT) to stop the proposal.

Using letter campaigns and surveys, residents convinced the North Wiltshire District Council to reject the proposal. The utility company's appeal was also dismissed (Upreti and Van der Horst, 2004).

Conversely, in Burlington, Vermont, citizens were engaged in a process of determining how best to use local wood for energy. They were given ideas of how such a system would be set up and then they created additional options. In the end, the citizens approved a system that would use woody biomass from timber stand improvement activities that would be shipped to their urban utility by rail at specified times of day to reduce impact on local traffic. See the case study, "Community Involvement in Developing a Wood-powered Utility," in chapter 8 for more information.

Clearly, good outreach and education can be essential, and part of what makes an outreach program successful is a keen understanding of public perceptions. You may be able to find additional existing research about public perceptions or you can gather your own local data by conducting a survey or series of focus groups designed to find out what people know and don't know, and what they value. Another option would be to start slowly and spend time listening. Use feedback to improve your presentations. Ask questions to find out what was too complicated and what made sense. The handouts provided in this guide were designed to meet educational needs identified by public perceptions research conducted in the South. They might work for you.

### **7.3 DEFINING YOUR GOALS AND OBJECTIVES**

Defining goals and objectives for your activities is an important next step in the outreach process. A goal is an overarching statement or purpose that guides your outreach efforts; objectives are more specific and measurable descriptions of what you want each outreach activity to accomplish. If you don't have a target audience identified, defining your goals and objectives can help direct and focus your program. For example, your goal might be to raise community awareness about using wood for

ethanol production. Your objectives might be to (1) introduce Earth Day festival attendees to the idea that wood can be a sustainable, renewable source of ethanol; (2) inform local landowners about potential biomass markets; and (3) educate the local city commission about the functions of basic wood-to-ethanol facilities. These objectives help define the target audience, which in this case would be Earth Day festival attendees, local landowners, and elected officials.

## 7.4 SELECTING A MEDIUM AND A MESSAGE

Once you have identified and understood your target audience or community and defined your goals and objectives, you can begin selecting your outreach tool(s) and defining your message. Following is a list of outreach tools that may help you in your efforts. When choosing which tool or tools to use, consider what will make it easiest to connect with your target audience, which tools will help you achieve your objectives and ultimately your goal, and which tools are feasible for you to implement. Remember to use what you know about public perceptions to guide your selection of outreach tools. The “Outreach Planning Worksheet” in the appendix can help you clarify your outreach plans. Some outreach tools are much more time consuming and resource intensive than others. Be realistic when estimating what you will be able to contribute to your outreach efforts. Developing a Web site or video might seem like perfect approaches for your audience and objectives, but only if you have the resources to complete them. Instead, using already developed fact sheets, brochures, and Web sites can save time and money. Make sure you have a clear idea of what your outreach message is and that your outreach tools communicate that message effectively. Our Woody Biomass 101 presenter in scenario 2, for example, could use flip charts, posters, handouts, a demonstration, or slides to illustrate a presentation. A community outreach program could resemble a media campaign or take a more conservative approach to education with workshops and handouts.

### Outreach Tools

The following descriptions of the suggested outreach tools are based on two books that comprehensively cover many outreach tools for use in the natural resource field: *Conservation Education and Outreach Techniques* by Susan K. Jacobson, Mallory D. McDuff, and Martha C. Monroe and *Communication Skills for Conservation Professionals* by Susan K. Jacobson.

**DEAR NEIGHBOR LETTER** – Write a friendly letter to local residents to invite them to an upcoming event, introduce the idea of biomass production and utilization, or provide other rel-

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### Education vs. Advocacy

Some agency staff may be able to advocate one perspective when it comes to woody biomass outreach, while others must walk the fine line between education and advocacy. In situations where there is distrust, opposition, or a need to establish credibility, it may be especially important to avoid the appearance of communicating only one side. Some factors that create the image of advocacy are unavoidable but carefully considering how you, your outreach team, and your approach are perceived can minimize the issue. Here are some ideas on how to avoid the appearance of advocacy:

- When possible, include the advantages and disadvantages of using wood.
  - When comparing wood to other fuel sources, try to weigh both evenly and be careful about word choices (e.g., avoid “coal-bashing”).
  - Stick to facts and avoid assumptions, appeals to emotion, or opinionated statements.
  - In a forum or community meeting, it can be helpful to use an independent facilitator.
  - Openly state that there are many options and wood is just the one you’d like to explore at this time. People appreciate honesty.
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evant information. This can be a good way to reach your audience if you have postal or e-mail addresses for them. To save postage, this letter can also be sent by e-mail. But remember that while most people have access to the Internet in their homes or public libraries, a portion of the population cannot be reached this way. See the appendix for a sample dear neighbor letter.

**MEDIA OPPORTUNITIES** – Use the mass media to communicate with the public through an article, a series of articles, a radio/television interview, or a news story. This can be a great way to reach a broad spectrum of people with general information and few details. Send a news release to the local newspapers, television stations, or radio stations and talk with editors and reporters about covering the issue of biomass production and utilization. You can also use the media to publicize an upcoming outreach event. For the cellulosic ethanol outreach program in scenario 3, newspaper, radio, and television announcements might help raise awareness and improve turnout for community forums. See the appendix for a sample press release.

**NEWSLETTERS** – Write articles for newsletters published by local organizations such as environmental groups (make sure you know their stance on bioenergy), civic clubs, county extension offices, faith-based groups, or create your own newsletter. Such an article can contain information on biomass production and utilization, interviews with key community leaders or experts, and lists of upcoming related events. Distribute the newsletter by mail, e-mail, or place copies around the community and with interested organizations. If you have trouble gaining access to postal or e-mail addresses, consider posting your newsletter on electronic mailing lists for various organizations.

**POSTERS AND SIGNS** – Develop a poster or sign to depict some aspect of biomass and display it at meetings and conferences, or get permission to hang it in appropriate buildings such as the city hall, libraries, or community centers. To build community awareness, create a simple, balanced message about bioenergy and where to get more information. These methods can reach a wide range of people; however, this method is difficult to manage in terms of measuring who your message reaches.

**BROCHURES OR HANDOUTS** – Brochures or handouts can be strategically placed at state forestry and county extension offices, community centers, stores, and libraries. These tools may contain basic information or may be more technical. Make sure the information is at an appropriate level for the audience you want to reach. Check back often to assess whether people are picking up materials and replenish when necessary. This is a good method to reach many people with a fairly detailed message but is limited in terms of personal interaction with the community. A handout might be helpful for the forest landowner in scenario 1 who wants specific information, which would supplement the information given to him verbally and provide a resource for him to refer to later.

**FIELD TRIP** – Invite interested community members, landowners, or community leaders to an organized tour of a nearby biomass-powered facility, a wood-handling operation, or a local forest that is sustainably managed. While the field trip may involve a substantial time commitment from participants, experiential learning opportunities like these can be beneficial and memorable.

**CONFERENCE/SYMPOSIUM PRESENTATION** – You may be invited to give a presentation at a conference or symposium. These venues can be great places to network with people

of similar interests, share ideas, and build new skills. Conference audiences are often interested in more detailed information.

**PRESENTATIONS AT CITY OR COUNTY COMMISSION MEETINGS** – As in scenario 2, you may receive a request to give a basic overview presentation on woody biomass. You might even request time to speak at local governmental meetings and plan a presentation that is relevant to the community leaders. You can provide an introduction to using biomass for energy, transportation fuels, and other products, costs and benefits of using wood, the sustainable supply of biomass, the economic impacts, etc. Such a presentation provides an opportunity to share specific information with local leaders, and because these meetings are open to the public, you will be able to inform the residents about using biomass. Bring enough copies of simple, accurate handouts to share with the commission and attendees. If you choose this approach, be prepared to deal with individuals or groups who oppose the idea of using biomass. If the thought of using an LCD projector to give a PowerPoint® presentation makes you feel anxious, refer to Box 3 for some simple tips.

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### **The Nitty Gritty of Using an LCD Projector (eHow Business Editor 2008)**

Steps for using an LCD projector:

- 1) Plug the LCD projector power cord into an outlet and plug the power cord into the back of the LCD projector.
- 2) Use the VGA cable (usually a 15-pin male-to-male) to connect the laptop to the projector. If the projector has more than one VGA connector, use the connector that says something like “line in” or “in from computer.”
- 3) Turn on your laptop, then turn on the projector, giving it a few minutes to warm up. Open your presentation file and click on “slide show view” on the top taskbar. When you are ready to project your image, press “Function” (Fn) and at the same time as “F8.”
- 4) You can move back and forward in your presentation using the and buttons, “Page Up” or “Page Down,” the spacebar and backspace, the N and P keys (next and previous), or a handheld remote.
- 5) When you’re done with your presentation, press the “off” button on the projector. Sometimes a dialog box appears on your laptop asking if you are sure you want to turn it off. Press the “off” button again, and the machine powers down. Leave the machine plugged in until the cooling fan stops. Replace the lens cap and pack it into its case, once cool.

#### **General Tips:**

- Make sure you have a clean screen or white wall on which to project your presentation.
- If possible, keep the projector manual close by.
- Position the projector near the center of the screen at which it is aiming.
- Use the projector’s adjustable feet to make your projection image level. You can also place the projector on a book or two to raise it up, if necessary.
- Most projectors have focus knobs to help make the image clearer.
- For safety, avoid running cords across walking areas.
- Test the laptop, the presentation file, and the projector at least a day before your presentation. Make sure you know where to find replacement light bulbs for the projector.
- Make sure to turn off the screensaver on the computer you’re using so it doesn’t interrupt your presentation.
- To turn the screen black before your presentation starts, press “B”. Once you’re ready to start, press “Esc”.
- Have your presentation saved on at least two storage devices, such as a USB stick and a CD. Some people like to have their slide notes printed out, just in case technology fails altogether.

## 7.5 HOW TO ORGANIZE A COMMUNITY FORUM OR MEETING

In addition to the outreach tools described, organizing your own small meeting or community forum may be a useful approach to reaching your target audience, especially if you are conducting a community outreach program. Following are some important considerations when planning public events.

The community forum is one way to create opportunities for the public to increase their knowledge about biomass by first providing information and then stimulating discussion. Somewhat different from a meeting or presentation, this interaction al-

**Figure 3:** *Community forums can increase public knowledge and stimulate community discussions about woody biomass.* PHOTO BY LAUREN McDONELL, UNIVERSITY OF FLORIDA.



lows community members to become engaged in the discussion of local energy options. Forums consist mainly of two parts: (1) a short introductory presentation of using wood for energy, fuel, or other bioproducts (see the presentations on the CD-ROM provided with this guide) and (2) an engaging discussion that allows participants to ask questions and voice their perspectives. Participants' perceptions, ideas, and concerns can be collected through surveys or by taking notes during the discussion. These ideas can be reported to community leaders to help guide their decision making. The community forum model might be especially useful for the professional in scenario 3 who needs to foster local discussions about cellulosic ethanol.

Whether you're holding a community forum or meeting for the general public, elected officials, or interest groups, there are a few key concepts to keep in mind. Choose a neutral, comfortable meeting space. A public library, a community college, or an extension office may be able to offer a room for ten to twenty people to meet at no cost. One to two hours is probably sufficient for most gatherings; provide coffee and snacks if possible. Invite people to participate in the meeting with an invitation (by e-mail or post) that introduces the purpose and possibilities. Develop an agenda for your meeting. Box 4 shows a sample forum agenda that could be used to introduce people to the concept of using wood for energy.

### Bringing in Experts

If you are planning a community forum or meeting, you may want to identify a team of resource people to help present the information. The following combination of experts may be helpful:

- State forestry staff
- Cooperative Extension agents or specialists
- Resource Conservation and Development (RC&D) council members
- Researchers who understand economic impacts, biomass costs, forest management, biomass harvesting, climate change, combustion and gasification technology, biofuels, and wood utilization
- Industrial wood users such as buyers and sellers of wood, generators of wood waste, and wood haulers
- State and local energy staff
- Biofuels or biobased products experts



- Environmental or civic leaders
- Elected officials
- Renewable energy or carbon tax experts

Following are some general guidelines to help you organize community forums. Many of these tips are useful for any kind of face-to-face outreach activity.

1) **EXISTING MEETINGS:** Community forums can be held in conjunction with an organization’s meeting. For example, community service organizations such as the Kiwanis and Rotary clubs, neighborhood associations, environmental groups, political groups, or faith-based groups have ready-made audiences who are often looking for speakers. Be aware of the format and timeframe that the organization is accustomed to and plan accordingly.

2) **PUBLIC FORUMS:** You can also hold forums that are open to the public, where the primary purpose for meeting is the forum itself. This type of forum can be held at public libraries or community centers, which often have meeting rooms that can be reserved (sometimes free of charge). Think about the best time and location for community attendance.

3) **UNDERSERVED COMMUNITIES:** Choosing a diversity of locations and clubs for forums is very important to reach different segments of the community. For example, holding a community forum on a Native American Reservation or in conjunction with a local minority organization, such as the National Association for the Advancement of Colored People (NAACP), can reach community members who may not attend other forums.

4) **ADVERTISE:** In order to assure a good turnout, begin advertising your forum well in advance. If the forum is open to the public and not a regularly scheduled meeting, it is essential that you promote the event. You can make flyers to place at popular stores, restaurants, and community bulletin boards in the area; send news releases to local television and radio stations and newspapers; and spread the word via electronic mailing lists. Organizations and clubs will usually have their own forms of advertising via a newsletter or Web site. In addition, you could ask to send an announcement to the organization’s e-mail list, notifying all members about the forum and where to get additional information.

5) **GET PREPARED:** Before the forum, practice the presentation, especially if other people are involved. Also, think about the types of questions people are likely to ask. See the “Frequently Asked Questions” appendix in the appendix for ideas. Depending on what equipment is available at the location, you may need to bring a laptop computer, projector, extension cords, and a projector screen. Find out ahead of time what will be provided and what you’ll need to bring. Gather appropriate

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### Sample Community Forum Agenda

- Welcome folks at the door, provide name tags and snacks
  - Introduce the topic, your speakers, and ask everyone to introduce themselves (10 min)
  - Speaker 1: Our community, current energy sources, anticipated energy needs (4 min)
  - Speaker 2: Our forest resources—now and in the future (4 min)
  - Speaker 3: The benefits and concerns associated with using wood for energy (4 min)
  - Speaker 4: How industry already uses wood for energy (4 min)
  - Speaker 5: The potential in this community (4 min)
  - Questions and discussion (30 min)
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Figure 4: Holding community forums during regularly scheduled club and organization meetings may be a good way of reaching a captive and interested audience. PHOTO BY LAUREN McDONELL, UNIVERSITY OF FLORIDA.



handouts and if possible, organize them in folders for easy distribution. Remember to bring a sign-in sheet so you'll be able to send additional information to participants in the future. In addition, you may want to bring refreshments to encourage participant interaction and satisfaction.

**6) MEETING DETAILS:** The agenda for the forum can be rather straightforward or it can be modified to meet time constraints. At the beginning of the forum, pass around the sign-in list and let the participants know that you will only contact them to send additional information about woody biomass. The introductory presentation should be just long enough to provide a brief overview of using wood (or other types of biomass) for energy, fuel, and other bioproducts (about 20 to 30 minutes). The rest of the time the floor should be open to participant questions and comments. The forum atmosphere should be comfortable, open, and inviting. Encourage participants to voice their questions and concerns and also to be respectful and understanding of others' views.

**7) NEUTRAL FACILITATOR:** You may want to have an independent facilitator help coordinate the forum. Facilitators can help keep participants on topic, manage the time, and keep the forum from becoming a divisive debate. If you cannot afford to hire an outside facilitator, there are many resources available that can assist you in improving your or the team's facilitation skills (see the "Resource List" in the appendix for some ideas).

**8) THE SIMPLER, THE BETTER:** Keep presentations simple and concise. Use graphics, photographs, and other visuals to illustrate the presented information, when possible. The information should be relevant to the community and paint a clear picture of what biomass utilization might look like in the participants' community. Use analogies to explain difficult concepts and explain all terms (sustainable forestry, cogeneration, etc.).

**9) JUST THE FACTS:** Misconceptions can derail discussions and make it difficult for people to understand new information. The benefit of a community forum is the opportunity to engage people in a discussion that reveals their misconceptions and allows the experts to gently offer new ways of seeing the situation.

**10) A RESPECTFUL TONE:** Make sure speakers avoid phrases such as, "You've got to understand that..." or "My professional opinion is..." which create a distance between the agent or expert and the audience, which reduces the likelihood of joint exploration and understanding. Responses which suggest that a variety of views are reasonable and helpful, that every question is interesting, and that audience members have good ideas are preferred.

## 7.6 EVALUATION

You will more than likely need to report to someone whether your time and energy for the outreach effort were well spent. Keep track of how many people attended, how many brochures were distributed, how many landowners were reached, and how many questions you answered. You may want to pass out an evaluation at the end of

your meeting or event. If you are able to get attendee contact information, you can send participants a short survey asking if their questions were answered and what else they would like to know. If you are involved in a long-term community education program, one of the partnering organizations may be able to conduct a public survey. And, if your efforts can be reported in terms of a city commission vote or acres managed or dollars saved, all the better.

## 7.7 SUMMARY AND CONCLUSION

Educating your audience about biomass and bioenergy concepts may be an increasingly important part of your work but getting started can be overwhelming. Use the tips and ideas in this chapter as a foundation and gather additional resources (see the “Resource List” section in the appendix) to help you become familiar with relevant issues and topics. Defining and understanding your audience, developing goals and objectives for your outreach work, and finally selecting outreach tools that will best fit your audience’s needs are essential steps to creating a successful outreach program. Be sure to start with the concepts and tools that you’re comfortable with and gradually try new and more ambitious approaches. As long as you prepare adequately, maintain a professional and courteous demeanor, use reliable information, and find effective ways to engage your target audience, your outreach efforts are bound to be helpful.

This chapter was adapted from the following source and used with permission.

Monroe, M. C., L. W. McDonell, and A. Oxarart. 2007. Wood to energy outreach program: Biomass ambassador guide. Gainesville, FL: Florida Cooperative Extension Service, Circa 1526, University of Florida.

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