1 chapter 1

Introduction

Are you a member of a community environmental group deciding whether to engage in a dialogue with a local manufacturing facility? Are you a plant worker interested in joining discussions about environmental and health issues at the facility? Are you a facility manager hoping to establish interactions with the community but not sure how? Are you a government official who believes that bringing together industry and community groups will lead to smoother permitting or site cleanup?

If you are one of these people, this guide is for you. It introduces you to Constructive Engagement—any effort that brings together a diverse group to cooperatively discuss a facility's environmental activities. Such a group includes representatives of various *stakeholders*—individuals or groups who "have a stake" in these issues. Stakeholders usually include facility managers, facility workers, government agencies, and community groups or organizations. Through Constructive Engagement, a non-adversarial partnership is formed in which each stakeholder has the capacity to participate effectively.

Constructive Engagement issues and activities can vary. For example:

- A group of stakeholders negotiates how best to clean up a contaminated industrial site.
- A facility-sponsored group meets periodically to provide input to the company about the community's reactions to the plant's environmental performance.
- Negotiations between a manufacturing plant, its workers, and the surrounding community lead to an agreement providing for increased community oversight of the facility's environmental management.
- Negotiations involving a plant, various government agencies, and community members lead to an agreement to streamline environmental regulations in exchange for superior environmental performance.

This guide will help you decide whether to get involved in Constructive Engagement and how best to go about it. Through both general guidance and the case studies (Appendix 1), it will help you address questions such as:

- What resources will Constructive Engagement require, in terms of time, people, money, and expertise?
- How do I decide whether Constructive Engagement is better than the alternatives?
- Who should participate in a Constructive Engagement process? How do I get them to the table?
- How do I set up the process? What procedural guidelines will we need?
- How will we handle complex technical information?
- How will I know if some players are at a disadvantage?
- What makes Constructive Engagement successful?

This resource guide arose from the Computers and Electronics Sector Subcommittee of EPA's Common Sense Initiative (CSI). CSI involved select industries, environmental and public interest groups, state regulators, and others to improve the environmental results and reduce the economic impacts of EPA programs. The subcommittee developed the concept of a facility-based alternative system of environmental protection, with the objectives of increasing facilities' environmental performance; regulatory flexibility; and constructive engagement of, and accountability to, communities and workers. (See Appendix 2 for more details on the background of this resource guide.) This guide is written with the computer and electronics sector in mind, but you can transfer the lessons and advice to any Constructive Engagement situation.

Constructive Engagement is a way to solve problems rather than hide behind them.

The Evolution of Constructive Engagement

Many trends have stimulated the need for Constructive Engagement. Industry has been developing rapidly since the 1800s, yet American society did not begin to pay serious attention to the environmental effects of industry until much later. In recent decades, the environmental movement has exploded, and in response to its growing power and influence, environmental laws have been passed (from municipal to federal) to reduce environmental degradation. In addition, science has produced a richer understanding of our relationship to the ecosystem, and sophisticated technologies have emerged to prevent pollution and remedy environmental problems.

The results of these changes include:

- New industrial processes and materials whose environmental and health impacts may or may not be known.

- A more environmentally informed public that is willing to confront polluters actively.
- A complex range of technical solutions to environmental problems.

Because of these changes, uniting stakeholders to discuss concerns and reach solutions has become an attractive way to address environmental issues. Ignoring conflicting interests and values of stakeholders can be costly, and cooperation among multiple stakeholders can sometimes produce better solutions for everyone.

Constructive Engagement in the Computer and Electronics Industry

The computer and electronics industry is a rapidly growing part of the United States economy. It has a reputation for having a minimal effect on the environment, workers, and communities. Even so, during the 1980s and 1990s, people have become increasingly aware of the industry's environmental and health impacts. For example, microchip production uses numerous chemicals and often requires large amounts of water. Moreover, the fast-changing nature of the industry creates market pressures to develop new products, using new methods, quickly. This makes it more difficult to fully evaluate the safety of the manufacturing processes, and increases the importance to industry of streamlining regulatory procedures.

For these reasons, the computer and electronics industry has sought models to improve community relations and obtain community input into its environmental planning. The Chemical Manufacturers' Association's Responsible Care program has provided inspiration. Initiated in the 1980s partly in response to the Bhopal chemical spill in India, this program urges chemical manufacturers to sponsor Community Advisory Panels (CAPs)—company-sponsored, community-involvement groups which discuss environmental issues and offer input to a facility's environmental management.

The CAP model has been useful, but also remains controversial. Some commend it for alerting companies to community concerns, promoting trust, and providing opportunities for meaningful dialogue. Others criticize the model for tending to exclude environmental organizations and for having little effect on environmental performance.

About the same time CAPs were forming, Alternative Dispute Resolution (ADR) processes, such as mediation, became more widely used. Several ADR models have emerged for engaging stakeholders in cooperatively resolving environmental disputes and meeting regulations. These developments have helped shape the emergence of Constructive Engagement.

This resource guide offers a variety of Constructive Engagement processes. Any model can be effective, but each has different goals and outcomes. By considering a variety of possibilities, you can begin to imagine a model that will support your situation and goals.

Stakeholder Roles in Constructive Engagement: Communities, Workers, Industry, and Government

This resource guide is written for four different stakeholder groups—communities, workers, industry, and government.

Communities

How are the interests of the community represented in Constructive Engagement? In some of the case studies (see Appendix 1), such as the Silicon Valley Pollution Prevention Center and the Vulcan Chemical Community Involvement Group, community participants represent organizations (local, regional, and national) and coalitions. In other instances, such as the Sybron Chemicals Neighborhood Involvement Group and the Shell Oil Community Advisory Panel, community participants serve as individuals. Some Constructive Engagement efforts strictly define who constitutes a community member. There are many different ways to characterize community involvement.

Workers

How can workers participate in Constructive Engagement? Workers often share community experiences and concerns about health, safety, and the environment. In the Rohm and Haas case, for example, a large percentage of the facility workers lived in the community where they worked. Their interests naturally overlapped the two stakeholder groups (the facility and the community), and they served as a bridge between the two. Similarly, in the Sheldahl case, communities and workers served as valuable allies to one another. The Romic Environmental Technologies Corporation case provides an example of a community-based approach to a workers' health and safety campaign. It raises questions about regulations and their effects on workers and communities, particularly because the two groups are protected by separate sets of laws and regulations.

Workers play a unique role in Constructive Engagement because of their relationship with the facility. On the one hand, they have a personal stake in the economic well-being of the company, which sometimes leads to "jobs versus environment" tensions. On the other hand, they understand facility operations, and can lend a credible perspective to complement the management's view. Sometimes, workers may hesitate to participate in Constructive Engagement because of their concern for maintaining positive relationships with their employers. In general, however, worker participation is important to Constructive Engagement.

Industrial Facilities

What incentives do companies have for participating in Constructive Engagement? While each facility's experience is unique, notable trends surface in the way a company becomes involved, their motivation, and the results of their efforts. Through Constructive Engagement, companies often experience a shift in the way they interact with the community, workers, and government agencies. For example, Sybron Chemicals received complaints from neighbors about odors emitted from its facility and reacted defensively. Now, through its Constructive Engagement

process, managers actively involve citizens in detecting odors and identifying their sources. Similarly, Lucent Technologies shifted from one-way to two-way communication with the community. If you are an industry stakeholder, challenge yourself to examine your company's traditional approach to solving problems, and envision new approaches that involve your community.

Industry representatives find that Constructive Engagement is a way to solve problems rather than hide behind them, and value Constructive Engagement as a learning experience. Companies develop their capacity for Constructive Engagement by engaging in the process, learning lessons from the experience, and then "going back for more."

When agencies are pulled in different directions by competing interests, Constructive Engagement can help.

Government Agencies

Local, state, and federal agencies often participate in Constructive Engagement. Several case studies provide examples of government-initiated processes, government programs that include stakeholder participation, and other instances where a government agency plays a key role in Constructive Engagement. For illustrations, see the Intel Project XL, Lead Steering Committee, Romic Environmental Technologies, and New Bedford Harbor Superfund cases.

Government agencies find Constructive Engagement valuable in many situations:

- Permitting: Collaboration among stakeholders can resolve obstacles to issuing permits for facility expansion or upgrades.
- Clean up: Constructive Engagement has been used to facilitate remediation efforts in contaminated areas, including Superfund sites.
- Regulations: Cooperation among government, facilities, and communities can streamline regulations and improve environmental results. It can also resolve disputes over enforcement of regulations.

In general, when agencies are pulled in different directions by competing interests, Constructive Engagement can help. If you are a government official, consider your regulatory role and whether Constructive Engagement might enhance your efforts.

2 chapter 2

Constructive Engagement: The Concept and The Challenge

What Is Constructive Engagement?

The use of Constructive Engagement has become increasingly popular in the last several years in many industries, including computers and electronics. Constructive Engagement is both a value and an approach to bringing communities, workers, industry, and government together to address their mutual concerns.

As a value, Constructive Engagement is based on a belief in the benefit of bringing together people with different points of view to communicate with each other about the issues that concern them. The process is based on the following specific values:

- People affected by the operations of an industrial facility have a right to know how the facility will impact them and to influence how these impacts are addressed.
- The interests of all stakeholder groups are legitimate and need to be taken into account in making decisions about industrial siting and operations.
- The best approach to promoting environmentally and community friendly practices, along with economically healthy industries, will develop if all groups have an opportunity to discuss their concerns and ideas with each other in a collaborative and constructive way.

The interests of all stakeholder groups are legitimate and need to be taken into account.

- People with very different outlooks and goals can work together effectively if they are motivated to find common ground and are given a credible opportunity and the tools to do so.
- People need access to relevant information presented in a comprehensible way in order to engage in constructive and meaningful discussions.

As an approach, Constructive Engagement processes are designed to provide forums in which meaningful and timely discussions can take place among workers, government regulators, industry representatives and community groups. Specific activities include:

- The convening of a group representing a range of different interests to communicate about the plans or operations of an industrial facility or a group of such facilities.
- A series of meetings where participants discuss their issues, generally in a small group.
- A set of clearly articulated goals and procedures for the process.
- An effort to conduct the discussions in a collaborative spirit in which everyone has a chance to explain their concerns and consider ways in which they may be met.
- A process for sharing and explaining important technical information.

Constructive Engagement is only one approach for community and worker participation in regulatory or other decision-making processes. It is only appropriate under certain circumstances. Constructive Engagement is NOT:

- Public relations: While a well-designed Constructive Engagement process may be good for public relations, that is not its purpose. Constructive Engagement is designed to address concerns in an open and forthright manner. Sometimes this requires airing problems in a way that may not be desirable (at least in the short run) for a company's public image. If a Constructive Engagement process is convened mainly as a public relations gesture, it is unlikely to be truly effective over time.
- Public hearings: Public hearings usually focus on obtaining one-time input; Constructive Engagement promotes ongoing discussions. Constructive Engagement is usually not a substitute for formal public notification and input procedures. Sometimes these processes might be made superfluous by a Constructive Engagement effort, but generally the requirement to allow the public to comment on proposed permits and regulations is not satisfied by Constructive Engagement activities.
- Public education: Education is a necessary part of all Constructive Engagement efforts, and occasionally Constructive Engagement groups take it upon themselves to engage in a wider public education effort. However, Constructive Engagement is not specifically designed as a mechanism for educating the wider public about a proposed action or an issue of concern.
- Public advocacy: Participants in Constructive Engagement are encouraged to advocate for their interests at the same time as they listen to the concerns

of others. However, Constructive Engagement is not designed as way of building support for a point of view among the broader public.

- Lobbying: Constructive Engagement discussions can provide an effective opportunity for presenting concerns or ideas to government officials. Their purpose, however, is dialogue and joint problem solving. They are not designed to put pressure on government regulators or policy makers.

These distinctions are critical. One of the biggest problems that a Constructive Engagement effort can face is the inconsistent goals of participants and initiators. Stakeholders *may engage* in the above activities while they participate in Constructive Engagement. However, if they take part in Constructive Engagement *for* these other purposes, the potential for effective results will considerably diminish.

Constructive Engagement Processes

Many approaches to Constructive Engagement have been used in the computer and electronics industry. Each Constructive Engagement process is different based on its specific goals, participation, the form of representation, the convening authority, the breadth of focus, decision-making procedures, the group's formal authority, and the duration of the process. Typical processes include:

Good Neighbor Agreements are contracts between companies and community groups.

- Citizen Advisory Committees. These committees have many names, such as Community Advisory Panels, Community Involvement Groups, Local Advisory Groups, etc. Citizen advisory committees include members of the community in which a facility is located, and sometimes representatives of broader constituencies as well. They are typically convened and staffed by the facility to provide input about community concerns. These are normally ongoing groups, who meet on a regular basis and serve in an advisory capacity. Sometimes they are formed in response to particular problems, and at other times they focus on prevention and relationship building.
- Stakeholder Negotiations. Stakeholder negotiations are formal efforts to negotiate around specific issues among representatives of different groups or constituencies, such as local citizens' organizations, environmental advocacy groups, environmental justice organizations, industry, government, and labor unions. Stakeholder negotiations are typically convened by a public entity or regulatory authority to resolve controversial issues. Occasionally, stakeholders meet to prevent a current issue from developing into a major dispute. Some stakeholder negotiations relate to site-specific concerns about a plant operation or proposed facility location. At other times, the focus is on policy issues concerning regulations or standards.

- Formal Mediations. When other decision-making processes have failed, groups have occasionally requested a neutral mediator to conduct a negotiation process. This can lead to a formal, binding agreement, an agreement in principle, a consent decree, or a consensus-based recommendation to a decision maker.
- Good Neighbor Agreements. Good Neighbor Agreements are contracts between companies and community groups, typically providing for community access to information, inspections of the facility, accident preparedness, pollution prevention, and/or non-environmental provisions about jobs and local economic needs. In return, citizens' groups may agree to end adversarial action against the company, generate positive publicity about the company, or protect company trade secrets. These agreements may be binding or non-binding. Binding agreements typically result from negotiations following challenges to facility permits or from settlement discussions following an industrial accident.
- Oversight Committees. When specific agreements or decisions have been made that require ongoing implementation or action on the part of an industry or community, oversight committees have occasionally been set up. They usually review progress made in carrying out decisions, discuss problems that arise, and report their findings to industry, community, and government.
- Independent Constructive Engagement Organizations. There are some interesting examples (see for example the Silicon Valley Pollution Prevention Center case study) of independent organizations formed for the purpose of organizing and promoting Constructive Engagement efforts among communities, workers, industry, and government. These organizations typically receive public or foundation support, but are occasionally funded by industries as well. They usually concern themselves with issues that go beyond a single facility, unless that facility is very large.
- Multi-level Interrelated Constructive Engagement Efforts. Constructive Engagement does not occur in a vacuum. Typically, Constructive Engagement efforts occur alongside other public involvement activities. Often there are different Constructive Engagement efforts taking place around the same issues. For example, a citizen advisory committee may exist alongside a stakeholder negotiation or formal mediation.

The process of Constructive Engagement is creative and allows for variety in design and operation for each situation. There are many variations on Constructive Engagement, and within each of these examples, there are many different approaches. New and creative approaches frequently emerge.

This guide suggests when different kinds of Constructive Engagement may be appropriate and offers general advice on designing and operating a Constructive Engagement process. It is not intended to limit your ideas about different approaches that might be effective for you. For Constructive Engagement to work, it must be tailored to each specific community, industry and regulatory situation.

Types of Issues

Constructive Engagement efforts have addressed many issues related to how the computer and electronics industry activities have affected communities and workers, including:

- Location of new facilities
- Expansion of existing operations
- Regulations of many types of potentially harmful emissions
- Worker safety and health
- Regulatory relief efforts
- Traffic, noise, odor, and aesthetics
- Emergency notification and response
- Waste disposal procedures
- Regulatory initiatives
- Cleanup of contaminated sites
- Social issues such as housing and employment
- Pollution prevention
- Education and job preparation.

The nature of the issue helps shape the Constructive Engagement process. For example, regulatory relief efforts generally require a stakeholder negotiation process, while issues such as traffic and noise pollution are often handled by citizen advisory groups. To determine the appropriate type of Constructive Engagement process, it is important to be clear about your goal. If you want to have an agreement among interest groups that they will support and carry out, stakeholder negotiations are probably indicated. If your goal is to promote more open, informal, and cooperative ongoing communications between a company and community, then a citizen advisory process may be more appropriate.

What Challenges Must Be Met for a Constructive Engagement Process to Be Successful?

General Challenges

For a Constructive Engagement endeavor to be successful, there are several key challenges that must be faced:

- A clear *purpose* for the process must be articulated. While it is normal for participants to have different goals, it is important to have a commonly accepted understanding of the purpose for the process. The purpose statement should identify the scope of issues to be addressed, the level of decision-making (e.g., advisory input, recommendation, or decision), and the anticipated time span of the effort.

- A credible means of *initiating* the process must be established. How the group is initially organized, participants recruited, a clear purpose articulated, and initial staffing provided are critical. There are many different ways to begin Constructive Engagement processes. Community groups may request them, government entities may initiate them, or companies may organize them. The credibility of the initiator and the convening process creates credibility for the Constructive Engagement effort itself. If the initiator is not credible, key potential participants may be lost, or important groups may dismiss the output of the group.

- Appropriate *participation* must be obtained. This may be the hardest challenge of all. Participants must be credible, effective, cooperative, committed, and diverse enough to accomplish the tasks of the Constructive Engagement effort. They must be articulate, persuasive, and able to make meaningful contributions. They must be able to forward their interests in both an assertive and constructive manner. Other issues to consider: Should participants serve as individuals or as representatives of particular constituencies or organizations? What role should regional or national interest groups play? How should the facility be represented?

The amount of effort it takes to engage in a successful Constructive Engagement process is often underestimated.

- Adequate *resources* must be provided to accomplish the task. The amount of effort it takes to engage in a successful Constructive Engagement process is often underestimated. Sufficient resources are needed for staffing, expert consultation, facilitation or mediation as appropriate, effective communication procedures, and meeting facilities. Insufficiently staffed and funded efforts can actually make matters worse by leading to delays, slow responses to information requests, poorly drafted documents, and a general sense that people's concerns are not being taken seriously.

- An effective *process* needs to be designed. The design should address such issues as ground rules, conducting meetings, decision-making, and disseminating information to participants.

- Mechanisms are needed for addressing *power issues* among stakeholder groups. All stakeholders should be able to participate effectively so that one set of interests does not dominate another. Different interests should be adequately represented; discrepancies regarding access to funds and technical expertise should be addressed; meetings should be scheduled to encourage broad participation; the process should be clear, understandable, accessible, and open; and participants should have meaningful influence over both procedural and substantive issues.

- Frequently, attention must be given to a *history of conflict* or problematic personal or organizational relations. Constructive Engagement processes are often characterized by positive relations, but there may also be a history of previous conflict. Sometimes, participants have been involved in legal, political, or media battles, and occasionally these are ongoing. This dynamic can put participants in the situation of worrying whether they can effectively "make peace and make war" at the same time, a particularly

troublesome issue if an effective process requires the disclosure of sensitive information. In these situations, a relationship building or conflict resolution procedure is often needed as an integral part of Constructive Engagement activities.

- Sensitivity to *cross-cultural issues* needs to be built into Constructive Engagement procedures. There are a variety of cultural issues that are reflected in most Constructive Engagement activities. First, the cultures of the corporate world, workers, community groups, advocacy organizations, and government officials are very different. There are often class, gender, age, and ethnic differences as well. Sometimes there are language and other communication barriers that need to be addressed. A genuine Constructive Engagement process must develop the capacity to bridge these cultural differences. This involves more than lip service to diversity; it requires a genuine appreciation for the way different groups approach dialogue, consensus building, decision-making and conflict resolution.

There are also specific challenges facing communities, workers, industry and government. While these may not be the exclusive issues of any one group, they may be more prevalent concerns to one group than another.

Challenges for Communities

Many of the challenges of Constructive Engagement for communities arise because of limited financial means and lack of technical expertise. Community groups must decide whether to devote their limited resources to Constructive Engagement endeavors. Resource issues frequently affect community groups' access to the process. They often need outside support in order to participate in an effective way. Other issues have to do with representing, informing, and bringing along the constituencies they represent. Specific challenges for communities include:

- Limited time. Even established and well-funded advocacy organizations usually only have limited time to devote to Constructive Engagement activities, which can save time in the long run, but tend to be very labor intensive. The major asset of most voluntary groups is the donated time of their members. If there are paid staff, they tend to be thinly stretched among multiple commitments. Sometimes, project participation depends more on whether anyone is willing to devote time to it than whether the project is worthwhile. As a result, many community groups must make difficult choices about allocating time and staff, especially if a group is considering legal action or a public initiative as an alternative to Constructive Engagement. Preparing for both at once is sometimes impossible, making the decision to participate in Constructive Engagement particularly risky from a community point of view.

- Funding and resource needs. Community groups often have little, if any, funding to devote to a Constructive Engagement process, so they may have to accept a process funded by other groups or devote time to fundraising. Community groups need access to independent resources, especially when they want to participate fully and do not want to depend on other participants to provide resources.

- Developing technical expertise. Many community representatives develop impressive levels of expertise about technical issues. Nonetheless, they are usually not technical specialists. There are two related problems they face in this respect: 1) interpreting and evaluating proposals based on complicated data, and 2) judging the credibility of the data itself. Since many efforts hinge on data, its credibility is a major issue that must be settled to everyone's satisfaction. Credibility is enhanced if community representatives have access to independent technical experts and if they participate in designing new studies and collecting information.

- Distinguishing genuine Constructive Engagement efforts from public relations gestures. Community groups are particularly concerned about being used as "tokens," so a government agency or an industry can say they received wide support or extensive public input for their actions. Participants probably approach most Constructive Engagement initiatives with a complicated array of motives. They often experience a genuine desire to work together and they also hope to appear cooperative and open to the public. Under these circumstances, it becomes especially important to community participants to ensure they are not being "used" primarily for public relations. How can you evaluate this objectively? Perhaps the main motivation for a company or government agency does not matter as long as everyone is genuinely trying to work on each other's concerns. Assessing and cultivating the efforts others are willing to make to address the community's concerns may be the real challenge.

- Accountability to constituents. Some very effective Constructive Engagement efforts have floundered because representatives of important constituencies lost credibility with their own groups. It is important for representatives to keep their constituencies informed and to make sure they do not become isolated from the people they represent. If meetings are closed, information is confidential, and clear communication channels between representatives and their constituents do not exist, this is difficult. There are many ways to handle this issue, but it should not be ignored.

- Community organizing versus Constructive Engagement. Community groups often use petition drives, demonstrations, letter-writing campaigns, and similar advocacy actions to build support for an organization and focus attention on an issue. It is harder to organize around participation in a collaborative dialogue. Community groups sometimes need the time to organize and coalesce before they can effectively focus on problem solving or negotiation. This need can sometimes contradict the desire for prevention or early intervention in potentially conflictual situations. If a community group is primarily focused on galvanizing support among its constituents, it may be hard for it to participate in Constructive Engagement activities.

- Dealing with in-group conflict. Voluntary organizations have different accountability and decision-making structures than companies or government agencies. As a result, they are often faced with a complicated internal negotiating process when participating in certain types of Constructive Engagement processes, such as stakeholder negotiations. In

order to participate effectively they have to develop practical mechanisms for addressing internal differences (including ideological ones) about how to approach the issues under discussion. Otherwise they will have little room to maneuver in the negotiation process. Most successful negotiations require give-and-take on each side of the table as well as across the table.

Challenges for Workers

Worker participation in Constructive Engagement is often overlooked, even though workers are affected by many of the same environmental concerns, exposures and health consequences that communities are, and are intimately connected to the actual facilities. In fact, legal limits on worker exposure to many chemicals are not as stringent as those in the Clean Air Act. Community groups and workers sometimes unite because of a shared concern about an industry or governmental activity. Workers share many of the challenges community groups face, such as limited resources, and distinguishing genuine Constructive Engagement from public relations gestures. However, workers also have unique challenges, and sometimes workers' concerns conflict with those of the community. Specific challenges for workers include:

- Fear of retribution. All workers, whether organized or unorganized, deserve to be protected from retaliation for raising difficult issues. Workers are legally protected from such retaliation, but they may not be aware of their rights or comfortable about the strength of the protection. Most Constructive Engagement processes have ground rules that address all participants' concerns about what they say and the information they disclose. Workers still may have concerns about whether their participation will adversely affect their jobs, and need to be aware of how their activities might be perceived and the consequences they may face. This concern is affected by the type of Constructive Engagement process, the company's commitment to genuine employee participation, and the general state of labor-management relations at the facility.
- Jobs versus the environment. Workers depend on the economic livelihood of the company for their jobs. Whether measures to improve environmental performance substantially increase a facility's operational costs or whether this is simply a perception, issues are sometimes seen as trade-offs between environmental protection and job security. This presents a dilemma for workers because they value their health and the local environment as do neighboring communities, but they also need jobs. Furthermore, there are chemicals identified in the Clean Air Act for which there are no occupational limits. Workers should beware of decisions in which risks are shifted to them in the process of improving environmental performance. Sometimes worker participation in Constructive Engagement can help bring about creative solutions that protect jobs, workers' health, and the environment, but this is not always easy.

- Maintaining independence from other stakeholders. Workers may find themselves caught in the middle between company economic concerns and the health and environmental concerns of neighboring communities. Their support is often sought by competing interest groups. Workers should remain vigilant about maintaining their independence, and should keep their own interests clearly in mind, while they consider forming alliances.
- Worker organization. When workers are organized, participation in Constructive Engagement is easier, and the above challenges less daunting. Whether this is through formal collective bargaining units, workers' councils, or other internal systems of bringing workers together, such organization makes it easier to bring worker input to a Constructive Engagement effort in a systemic way. It also can provide individual employees a "shield" for voicing opinions that may not be popular with management. Workers need to consider carefully whether there exists an effective and protected method for allowing them to present their concerns or ideas and reflect on the issues being considered in the Constructive Engagement process.
- Collective bargaining agreements and Constructive Engagement. Collective bargaining agreements frequently contain provisions that may impact or be impacted by Constructive Engagement activities. For example, collective bargaining agreements often contain procedures for worker input on health and safety issues. It is important to make sure that neither the process nor the outcome of a Constructive Engagement activity contradicts the collective bargaining agreement. A collective bargaining process can work very well with Constructive Engagement activities if attention is given to their potential to enhance or to interfere with each other.

Challenges for Industry

Regardless of the genuine motivation companies may have for being "good neighbors" and responsible corporate citizens, they must also be attentive to the bottom-line business consequences of their activities. For the most part, the public does not see the computer and electronics industry as a major source of environmental concern. As a result, the prospect of engaging with community groups, environmental advocates, and workers about potentially divisive issues can seem like opening a "can of worms." It is natural to want to avoid controversy. Specific challenges for industry in Constructive Engagement are:

- Opening an issue for public scrutiny. Since the computer and electronics industry often has either a low profile or a positive public image in communities, many managers would prefer not to attract attention or raise concerns about their company. The question is: Will a Constructive Engagement process serve more to stir up an issue than to resolve it? While Constructive Engagement processes can focus attention on a particular activity or potential impact in the short run, an on-going and trusting relationship with community and workers' organizations can help facilities deal with difficult issues when they arise in the future.

- Incorporating Constructive Engagement into a business or project planning process. The computer and electronics industry is particularly concerned with issues of "time compression." Will a Constructive Engagement process speed up the time-frame for launching a new facility, product, or process, or slow it down? While the alternative to Constructive Engagement may be even more unpredictable, it is challenging to base a business plan on the outcome of a process that is so variable and dependent on individuals.
- Sharing sensitive information. Effective Constructive Engagement often requires discussions of potentially sensitive information. On the one hand, withholding relevant information may make it difficult for a group to discuss important issues and can also raise suspicions about company motives. On the other hand, companies are reluctant to share proprietary or unflattering information in such an open forum. Before committing to Constructive Engagement, companies must assess what information they are willing to share, what they want to keep confidential and how this will affect the process.
- Assessing the credibility of community representatives. Industries are sometimes tempted to solicit the participation of community members whom they view as sympathetic to them and then to assume they have achieved a genuine engagement with the public. Sometimes people claim to speak for the community, when they have a very particular viewpoint or little genuine connection to the community at all. It is difficult for industry to know who is credible with different segments of the public. This is one reason why carefully identifying and recruiting participants is so important.
- Empowering a Constructive Engagement structure. Industry must decide how much authority should be given to a Constructive Engagement group. Sometimes this is not at issue, but often there is some leeway in how much power a group is granted. Will they be asked to make formal recommendations? How much power will those recommendations carry? To whom will the groups report? In practice, advisory groups are usually quite comfortable with their role. Nonetheless, there is often a relationship between the level of authority given to a Constructive Engagement group and the amount of credibility the process has with the public.
- Funding the process. Sometimes a company is the only readily available source of funds. However, if industry funds the process, the process may be perceived as belonging to the company.

It is important for representatives to keep their constituencies informed and to make sure they do not become isolated from the people they represent.

Challenges for Government

Government officials often find themselves in multiple, and sometimes conflicting, roles when dealing with public participation processes. Constructive Engagement presents some particular challenges in this respect:

- Role as convening authority. Government agencies often have the authority, prestige, and resources to get a Constructive Engagement effort going, but they act as the convening authority. Under whose auspices should the Constructive Engagement process take place? Government officials are often caught between competing groups who struggle mightily to pull them in opposite directions. Government agencies frequently have access to most of the potential participants and often see themselves as being neutral. However, this is a perception that is often not shared by other parties. Government agencies usually have important interests of their own. Regulations, such as the Federal Advisory Committee Act, sunshine laws which require certain kinds of meetings to be open to the public, and complicated contracting regulations come into play when government officials initiate Constructive Engagement activities. When an activity is sponsored by a government agency, participants sometimes feel that the results should have official standing, even when a group is organized for advisory purposes.
- Roles of individual agency representatives. Government employees can have several roles in a Constructive Engagement process, so it is important to clarify the role of each individual agency representative. Sometimes government officials serve as staff to Constructive Engagement processes. Sometimes they are participants who act as stakeholders, and sometimes they facilitate Constructive Engagement activities. One responsibility of a government agency is to represent the public interest, apart from its role in organizing or conducting collaborative processes. These roles can be conflicting. It is not unusual for government staff to split their responsibilities, with some sitting in as participants and others as staff to a process. Clarity of roles is especially important if the interests of a government agency need to be represented in a Constructive Engagement process. Trying to play too many roles at once can undercut the process and the credibility of the official.
- Government funding. Government funding, as all funding, comes with certain "strings" attached and accountability mechanisms. There are many circumstances when it is neither politically nor financially feasible for government agencies to fund a Constructive Engagement effort. On the other hand, sometimes government provides the most neutral and politically acceptable source of funds, and may actually be the only participant with the necessary resources.
- Government as regulator, enforcer, and negotiator. There are times when an agency's regulatory and enforcement role seems to contradict its role as collaborative problem solver. It is important to know from the start how government will use the output of a Constructive Engagement process within the formal regulatory framework, so the group won't have mistaken assumptions that could lead to distrust, suspicion, or cynicism.

- "Sunshine" versus confidentiality. Should Constructive Engagement meetings be open to public attendance or should they be confidential? Sometimes, Constructive Engagement processes are governed by "sunshine" provisions, which require that policy-making meetings be open to the public. At other times, even if there is no legal obligation to openness, there is a significant public interest in having a "transparent" decision-making process. On the other hand, private meetings can encourage certain frank exchanges that might be more awkward in an open setting. Also, there is sometimes confidential information that needs to be shared within the Constructive Engagement group.
- Representing the general public. Who represents the interests of the general public? There is usually no shortage of people willing to claim this role when controversial issues arise. Government officials may face conflicting demands between representing the particular policies and concerns of their agency and insuring that the general public is adequately represented. Since participants in Constructive Engagement are not usually chosen through an official public selection process, the general public is not really officially represented. Normally, the public is assumed to be represented through a balance of people representing key interests. This assumption is not always valid, however, and this can put government officials in an awkward position.

A Cautionary Note About Constructive Engagement

Constructive Engagement processes may have much to offer the various stakeholders and the public at large. However, there are some significant potential pitfalls as well. Perhaps the most troublesome problem has to do with inequities of power. Constructive Engagement requires participants to operate in a powerful manner, so that no individual or group is overrun in the process. If a process is not well constructed or if there are too many "hidden agendas," power problems can easily arise. In some Constructive Engagement processes, stakeholders from various sectors are occasionally exposed to considerable social and economic pressure to refrain from raising significant concerns or to sign off on agreements despite their misgivings. It is important to structure the process to ensure that all participants are comfortable in raising their significant issues and withholding their agreement until they are clear that their essential concerns have been addressed. (For an example of the complexities of how this can play out, see the case study on Intel Project XL in Appendix 1.)

Another concern is the time and resources required to conduct an effective Constructive Engagement effort. Could these resources be better spent in research, enforcement, environmental improvement, public education, or public advocacy efforts? Clearly, the answer is sometimes "yes." Another issue is timeliness. Constructive Engagement efforts take time. They can be used to delay implementation of needed changes or impede work on a proposed plan. Sometimes, the delay itself can prevent a potentially worthwhile development from taking place at all. Such delays can be environmentally and economically costly. If there

is an alternative process that can occur more quickly, then the time that Constructive Engagement takes can be a serious problem indeed. Furthermore, as with all consensus-based activities, there is no guarantee of a successful outcome. There are examples of Constructive Engagement activities that have not produced any significant results.

As with any approach to dealing with complicated issues, the Constructive Engagement process can be abused. All stakeholders should be alert to this possibility. Participants could agree to be part of the process, but have no intention of reconsidering or even reviewing their positions. Individuals might claim to represent a group or to have decision-making authority from an organization when the opposite is true. The process could be used to delay needed action or avoid other responsibilities, or to thwart other stakeholders' advocacy activities. People might participate primarily to promote their public image, or they could fail to implement agreed-upon decisions.

If there are too many "hidden agendas," power problems can easily arise.

For each of these potential problems, however, there is also a potential benefit. Sometimes, more can be done to empower individuals or organizations in a consensus-based process than in a political or legal alternative approach that favors people or organizations with financial resources and political access. Often, it is more difficult to maintain "hidden agendas" in a forum which encourages openness and straightforward communication. Sometimes Constructive Engagement dialogues help people separate their essential interests from more peripheral concerns, so they can decide which issues are essential to raise and which do not need to be decided in a consensus-based process. Under some circumstances, considerably fewer resources are required to achieve certain goals through a collaborative process than through the alternatives available to participants. Constructive Engagement activities can sometimes move more quickly than other alternatives and can rapidly lead to corrective actions, plan approval, or policy development. While there is no guarantee of results in Constructive Engagement efforts, there often is no guarantee in alternative procedures either, and the relative openness of most Constructive Engagement processes can make them more predictable than other approaches. While the process can be abused, it can also lead to deeper understanding of others' goals and values, and therefore a greater creativity and willingness to accommodate them.

It is important to be realistic about the potential pitfalls of Constructive Engagement, and not to naively assume that collaborative efforts necessarily lead to good results. On the other hand, it is also important to understand the problems with the alternatives to Constructive Engagement. These problems have led people to experiment with a variety of collaborative and consensus-based activities, such as Constructive Engagement.

Conclusion

There are many different approaches to Constructive Engagement; they all offer ways for stakeholders to address issues of mutual concern. The issues outlined in this chapter are not presented as reasons to avoid Constructive Engagement; they are challenges that each group must face to decide whether and how to participate. The many successful Constructive Engagement efforts that have taken place are proof that these challenges can often be met and that by facing them, the Constructive Engagement process becomes even more powerful and effective. The rest of this resource guide helps you confront these challenges as you decide whether and how to participate in Constructive Engagement.

Your first, and in some ways most important, challenge is to decide whether to participate in a potential Constructive Engagement initiative at all. This challenge is addressed in the next chapter.

3 chapter 3

Assessing Your Situation: Is Constructive Engagement for You?

Constructive Engagement can provide a way for stakeholders to collectively address important environmental issues, but how do you decide whether to participate in a Constructive Engagement process? This chapter presents specific ideas, guidelines, and tools to help you make your decision. It explores the question from the perspectives of communities, workers, industry, and government, knowing each stakeholder group has its own considerations.

Answering these questions will help you make a thoughtful, well-informed decision about whether Constructive Engagement makes sense for you:

1. What do you hope to accomplish?
2. What resources are required?
3. What are the costs and benefits of Constructive Engagement?
4. How do you address the specific challenges that exist for your stakeholder group?
5. What are your alternatives?

Question #1: What Do You Hope to Accomplish?

Whether you are a community, worker, industry, or government stakeholder, first identify what you want to achieve and assess whether your goals are compatible with the Constructive Engagement process. After you define what you want, you can determine whether the process will serve your purpose. Because Constructive Engagement processes vary, it is important to:

- Identify the issues you want addressed. There is no set rule about what you can and cannot address through a Constructive Engagement process. Your issues may be ongoing or event-specific. They may be directly related to facility operations or focused on community needs. Clarify the specific issues you want to address, so you will be in a good position to assess whether the process will meet your interests.
- Define your goals and objectives. Now that you know your issues, what do you want to achieve? For example, if you are concerned about the siting of a facility, is your objective to learn more about the siting? Provide advice about how the siting should happen? Help to identify alternative sites? Or prevent the siting? Clearly defined goals and objectives will help you clarify your expectations and ascertain what needs to happen to make your participation in Constructive Engagement worthwhile. If you do decide to participate, they will also provide you with a way to measure your success.

- Gather information about the process. Get enough information to know exactly what you are committing to. If you are initiating the process, you will likely have a good sense of what is involved; if not, gather details—What are the goals of the Constructive Engagement process? What issues will be addressed? Who initiated the process and who are the other participants? What will your role be in the process and in decision-making? (See Chapter 2, "General Challenges," for more information about the issues you should consider.)
- Assess whether there is alignment between your goals and the process. Of all the considerations you need to make, this one should "make or break" your decision to participate. There is a degree of risk-taking involved here because results must be projected. Realistically assess what Constructive Engagement can and cannot provide, and decide if the likelihood of achieving your goals is high. If a major gap exists between your goals and the anticipated outcome of the process, discuss this with other stakeholders. Perhaps you can change the process to better meet your goals or maybe you need to reexamine them. If the process and your purpose do not align, the wise choice for you may be to forgo participation.

The above steps focus primarily on self-assessment, as opposed to reflecting on the motives, concerns, and interests of other stakeholders. However, it is important that all participants' goals are compatible with the purpose of the Constructive Engagement process, and that participants agree to the purpose of the process itself. (These issues are discussed more thoroughly in Chapter 4.)

Building Trust and Rapport: Is it One of Your Goals?

A common outcome of Constructive Engagement, particularly open-ended processes, is better relationships between participants. For example, the Lead Steering Committee process required community members in conflict to work together in new ways. Participants gradually got to know each other, trust levels increased, and unproductive antagonisms subsided. Community and government agency representatives also formed closer ties. Though less tangible than other

outcomes, these developments significantly impacted community relations, relations between the community and the agencies, and, therefore, how the community addressed the original issue of contamination.

Building trust and rapport may or may not be important to you. For some, improving relationships among stakeholders is not a sufficient reason to participate, but for others, building trust and rapport is a central goal. In general, relationship building is most important when stakeholders are interdependent and have a long-term interest in the future of their relationship. (Chapter 4 offers suggestions for building trust and rapport during Constructive Engagement.)

Question #2: What Resources Are Required?

Participation in Constructive Engagement requires resources. What resources do you have and how do you want to use them? Consider the following resource categories:

- Staff—Are paid employees available?
- Volunteers—Community groups, in particular, rely on volunteers to carry out the organization's work. Volunteers often undertake their duties in addition to their jobs, so they are only available evenings and weekends.
- Funding—Money is needed for meeting-related expenses, technical assistance, and program costs.
- Skills and expertise—Collaboration is most successful when participants have communication and negotiation skills and understand the subject matter. While many Constructive Engagement efforts provide technical assistance to participants, some training may be necessary.

List your resource needs for the proposed Constructive Engagement activity in each of the previous categories. After you have your resource list, ask yourself the following questions:

- Which resources do I (or my group) have to provide?
- Which resources will be provided by someone else?
- Are these resources available on both a short- and long-term basis?
- Are certain resources available only for this Constructive Engagement process and not available otherwise?
- When compared to the alternatives, is participation in a Constructive Engagement process the best use of these resources?
- Is the anticipated outcome worth the investment of these resources?

Your answers to the above questions should provide you with a sense of whether you have the resource capacity, in both the short- and long-term, to participate in Constructive Engagement and whether doing so is a wise choice. (See "What Are

the Costs and Benefits of Constructive Engagement" in this chapter for additional guidance on resource use.)

Long-Term Considerations

One of the biggest challenges for stakeholders is maintaining support for Constructive Engagement when business cycles and social trends fluctuate. When business is booming, companies are more willing to devote resources to programs that are deemed "nonessential" in harder economic times. For community organizations, volunteers and financial contributions are more available when issues are extensively covered in the media. For government agencies, resource availability depends on government decision-making; budgets can be cut. Changes in the economic, political, and social climate can increase or reduce the amount of available resources. For this reason, consider resource needs and the factors that could affect their availability over time.

Question #3: What Are the Costs and Benefits of Constructive Engagement?

There are many ways you can evaluate the costs and benefits of Constructive Engagement, although it may be difficult to quantify them because some are intangible. Perhaps the hardest benefit to measure is the development of more collaborative working relationships among participants. Over time, this may be the most important benefit of Constructive Engagement. The most significant intangible cost of participation may be the stress created by a change in the organizational culture of participants that Constructive Engagement often requires.

Time is the largest direct cost of participation and is the easiest cost to measure.

Even though the intangible risks and advantages of Constructive Engagement may be the most significant, consider the tangible costs and benefits—these are usually the criteria used to evaluate the process. If you consider the actual costs you spend on the process in terms of the time and money (and perhaps the cost of the opportunities lost by not spending those resources elsewhere), you can weigh these costs against the time and money you save by not incurring legal and related costs in alternative processes. If you are an industry stakeholder, take into account the money you save by shortening the time it takes to initiate a new process, locate a new facility, and bring a new product to market. Finally, consider the more rapid and complete achievement of environmental and community benefits.

The next sections examine the costs and benefits of Constructive Engagement from the dimensions of participation (occurring *during* the process) and outcome (occurring *as a result* of the process). See also the sample worksheet in Appendix 3 detailing the costs and benefits of Constructive Engagement from an industrial perspective.

Participation Costs

Time is the largest direct cost of participation and is the easiest cost to measure because it can be readily quantified. As an example, consider the time demands of a typical stakeholder negotiation, consisting of convening, participating in the process itself, and follow-up and maintenance.

The following formulas are rough estimates, based on assumptions for the role of convenor, staff (this could be a government employee, industry official, or anyone else who provides staff support to the process), participants, and facilitator for a local, moderately-intensive stakeholder negotiation process.

1. Convening: The process of bringing the parties to the table typically takes anywhere from one to three months. The bulk of the preparatory work is performed by the convenor who has to read many documents, conduct interviews, produce reports, and hold conversations with potential participants. The convenor can be a staff member or someone brought in to conduct the process. If a convenor is hired, the staff spends considerable time contracting with the convenor, reviewing the convenor's work, and communicating with all of the involved parties. Participants hold internal discussions and spend time deciding if and how they want to participate in the Constructive Engagement effort.

   A rough estimate of the average time involved for a convening process would be:

ROLE	HOURS
Convenor	140
Participant	30
Staff	120

2. Participation in the Ongoing Process: Constructive Engagement processes can last from two or three meetings to many years—the variation in length, format, and intensity is great. For example, some processes have regular one- to two-day meetings, with subcommittee meetings in between; others involve two- to four-hour meetings on an intermittent basis. Participants spend time preparing for, traveling to, and attending meetings. The facilitator and staff spend time on those activities, and also provide administrative support to the process. The facilitator can be a staff member serving in that capacity, or someone hired to fill the role.

   A typical format might require the following time commitment for each cycle of plenary meetings:

ROLE	ACTIVITY	HOURS	TOTAL HOURS (PER PERSON)
Participant	Plenary meeting	4	
	Plenary preparation and travel	4	
	Committee meetings between plenary	2	
	Committee preparation and travel	2	12
Staff	Plenary meeting	4	
	Plenary preparation and travel	8	
	Committee meetings between plenary	2	
	Committee preparation and travel	4	
	Other administrative support	4	22
Facilitator	Plenary meeting	4	
	Plenary preparation and travel	8	
	Committee meetings between plenary	2	
	Committee preparation and travel	4	
	Write up and distribution of minutes or reports	4	22

Assuming there are six cycles (bimonthly) of plenary and committee meetings, the total time spent over one year would be:

ROLE	BREAKDOWN	HOURS (PER PERSON)
Participant	12 hours x 6 months	72
Staff	22 hours x 6 months	132
Facilitator	22 hours x 6 months	132

3. Follow-up and Maintenance: Normally, there is follow-up activity after a stakeholder negotiation is completed to fine-tune written documents, follow up on commitments, explain the results to others, and meet periodically to review and update aspects of the agreement.

   Assuming a moderate level of follow-up and maintenance for three months, the time commitment might look something like this:

ROLE	ACTIVITY	HOURS	TOTAL HOURS (PER PERSON)
Participant	Attend meetings, hearings, public meetings, etc.	8	
	Review and comment on documents and other products	4	
	Miscellaneous follow-up activities	4	16
Staff	Attend meetings, hearings, public meetings, etc.	8	
	Review and comment on documents and other products	8	
	Miscellaneous follow-up activities	8	24
Facilitator	Attend meetings, hearings, public meetings, etc.	8	
	Review and comment on documents and other products	8	
	Miscellaneous follow-up activities	8	24

4. Total Time Spent: Here is an overview of the total time commitment for the steps outlined above:

ROLE	CONVENING HOURS	PARTICIPATION	FOLLOW-UP MAINTENANCE	TOTAL HOURS
Convenor	140	—	—	140
Participant	30	72	16	118
Staff	120	132	24	276
Facilitator	—	132	24	156

The above table illustrates the total amount of time required for one person to participate in a stakeholder negotiation in the role of convenor, participant, staff, or facilitator. To calculate the total amount of time required of the process, it would be necessary to multiply the number of participants by the total number of hours for each role. For example, a stakeholder negotiation with one convenor, six participants, two staff, and one facilitator would result in the following:

ROLE	BREAKDOWN	HOURS
Convenor	1 x 140 hours	140
Participant	6 x 118 hours	708
Staff	2 x 276 hours	552
Facilitator	1 x 156 hours	156
TOTAL		1556

In addition to time, other sources of direct participation costs include:

- Travel expenses
- Meeting costs: facility, refreshments, audio visual

- Production and distribution of materials
- Telephone and fax charges
- Education and training expenses
- Technical expert expenses.

In addition to the direct costs of participation, remember the less tangible ones. For community groups, it can be practically and emotionally difficult to participate in Constructive Engagement and advocate in more adversarial arenas as well. For workers, the concern about retribution can be very stressful. For companies, there is often a significant internal price to pay to change the prevailing organizational culture. For many government officials, there is a fear that the scientific basis of their work may be compromised through the process.

Participation Benefits

Why do many participants in a Constructive Engagement process say they would do it again, in spite of the time and costs involved? The most prevalent answer is that effective communication and good working relationships between government, companies, workers, and communities are extremely important. Short-term costs or risks pale in comparison to the long-term advantages of constructive relationships. In theory, the benefits of good working relationships can be measured, but in practice this is very difficult. Here are some other participation benefits:

- Company input. An opportunity to have in-depth and ongoing input into company operations can be a great benefit for communities and workers. There are many limits on what a company can be forced to do by government regulators, but there are fewer limits on what a company might agree to do to meet community concerns through a Constructive Engagement process.
- Resource gains. Communities and workers are valuable resources because companies learn things from them that they would not know otherwise. This enables companies to develop appropriate responses, including preventive approaches, to community and worker concerns.
- More neutral forum. Government officials are often caught in the middle of competing pressures from industry, workers, and communities and also face political demands from elected officials. Constructive Engagement is not a panacea, but it can help key parties resolve their own issues, allowing government officials to participate in a less politically-charged way.

Outcome Costs

The greatest outcome costs of Constructive Engagement result when the process does not turn out as hoped and anticipated:

- Input vs. outcome. From a community and worker perspective, perhaps the greatest potential cost is using a great deal of time and not addressing the most pressing and genuine problems. It is very important, therefore, for communities and workers to be realistic about the time commitment and to assess the likelihood of a constructive outcome.

- Unmet expectations. For a company, a potential risk is having the group raise an issue for discussion (which might not otherwise be scrutinized), and then raise expectations that cannot be met. If participants are disappointed, they may call the legitimacy of the process into question.
- Uncertainty. Government agencies often have deadlines—typically judicial or administrative—to bring certain problems to closure. Constructive Engagement can help meet deadlines, but the timing of the process may be unpredictable and sometimes can even stretch out a timeline. Additionally, government regulators often feel like they are moving into uncharted waters when they try to solve problems in a less familiar forum.

Outcome Benefits

It is extremely difficult to predict outcome benefits, but if participants have considered the costs of an administrative, legal, or political process, they can roughly calculate the comparative costs of different processes. Outcome benefits can be realized by:

- Saved time and costs. There are savings, in both time and costs, in not using public hearings, court processes, and complicated permitting procedures. Constructive Engagement may reduce the time it takes to obtain a permit, with additional revenue derived from the earlier production of a product as the benefit. Likewise, there may be tangible financial gains to a community from addressing an environmental problem more quickly (such as improved property values or improved community health and welfare).
- More efficient business practices. If an agreement produces a streamlined approach to reporting requirements, this can increase efficiency and translate into lower production costs. Although companies usually draw clear boundaries when it comes to input on their management practices, stakeholders provide valuable insight that can enhance operations.
- Improved environmental results. Improving environmental management practices is a main impetus behind Constructive Engagement activities. Collaborative processes can achieve significant long-term environmental and health benefits.
- Community building. Constructive Engagement processes often bring diverse members of the community together who otherwise would not work with one another. Further, the benefits a company brings to a community are more likely to be maximized through Constructive Engagement because the community can directly communicate its needs.
- Good relationships. Companies need good relationships with their communities. Communities may not be able to prevent a company from doing certain things, but they can make every permit application and every public hearing much more difficult. Furthermore, bad community relations are almost always bad for a company's public image. On a positive note, harmonious community relationships can contribute to better worker relations, more rapid permitting, and much higher morale for company employees.

In the end, there are always both tangible and intangible costs and benefits to every process dealing with public issues. It is often easier to put actual figures to the costs than to the benefits. The Constructive Engagement approach is much newer than most approaches, so while its potential benefits are great, the risks are associated with moving into somewhat uncharted waters.

The following tables, developed by community and industry stakeholders who contributed to this guide, summarize some general costs and benefits that industry and community groups should consider. (For an industry representative's approach to evaluating the costs and benefits of Constructive Engagement, see Appendix 3.) Workers and government stakeholders are encouraged to develop their own comparisons of Constructive Engagement costs and benefits.

Costs and Benefits of Constructive Engagement for Industry

COSTS	BENEFITS
• Start-up costs and time required • Cost of recruiting community participants • Meeting costs • Administrative labor and materials costs • Internal labor costs—industry reps • External labor: facilitator, translator, technical assistance/ advice, technical studies, travel	• May lead to fewer hearing requests; faster permitting • Increased revenue from faster permitting • Reduced cost of permit hearings • Avoidance of multiple layers of complex and contradictory regulations • Increased revenue from quicker zoning change • Reduced cost of zoning hearings • Increased revenue from faster process change • Reduced cost of permitting for process change • Elimination of abatement/ operation restrictions • Better relations with community and regulators • Improved worker productivity • Reduced time and expense of adversarial processes • Improved community image through increased communication with public • Expanded knowledge base—additional sources of information, fresh perspectives, and new solutions

Costs and Benefits of Constructive Engagement for Communities

COSTS	BENEFITS
• Time • Frustration/difficulty in participation in stakeholder process given short-term economic pressures (time pressures) that dominate the computer and electronics industry • Possibility of focusing on small gestures rather than more serious environmental problems • Some Constructive Engagement programs may marginalize or neutralize environmentalists • Lost opportunity for publicity or precedents that may result from adversarial processes	• Increased accountability of the industry to the community (increased community input into facility decisions that have environmental and other impacts on the community) • Increased knowledge of environmental information from industry • Improved health of citizens and workers, without loss of jobs • Cleaner environment (superior environmental performance) • Sustainable communities • Avoid having to engage in a costly and time consuming adversarial process • Clearer idea of community goals; cooperative community spirit

Question #4: How Do You Address the Specific Challenges Facing Your Stakeholder Group?

Chapter 2 presented specific stakeholder challenges when deciding to participate, or actually participating, in Constructive Engagement. This section provides guidance to help you address some of those issues.

Communities

To participate effectively in a Constructive Engagement process, your organization or group must be in a good position to participate and view the process as legitimate. Otherwise, your gains from participation will likely be minimal.

In both the Romic and Intel cases, the concerns of some community stakeholders were so great that they decided not to participate in the Constructive Engagement process. In the Romic example, while some community members chose to become involved in the company's Community Advisory Panel, others did not believe their goals could be achieved through the company-initiated process. In the Intel example, some community organizations declined to participate because they did not feel the Constructive Engagement process was fair, in terms of community and worker representation, meeting accessibility, and the availability of independent technical resources.

To assess your situation, consider the following questions:

Readiness to Participate

- Is the timing right for your organization to participate in a collaborative dialogue process? Is your group sufficiently organized? Examine your organization and constituency, asking these questions:
- Is there sufficient institutional support for the effort?
- What kind of membership support exists?
- Is it enough to support the Constructive Engagement effort?
- Will more support come through another approach such as continued organizing, activism, or litigation?
- Will participation be on an "even playing field" with other stakeholders or do you need more membership support and/or resources for that purpose?
- Is there agreement on why you want to participate in Constructive Engagement, i.e., your organization's goals?
- Is there an understanding of how participation in a collaborative effort fits in with your organization's mission and long-term goals?
- Will your members view participation as "making deals with the enemy," "selling out," or co-optation?
- Will your constituency support your representative to the Constructive Engagement process?
- Are there well-developed internal communication channels?

Concerns About Legitimacy of the Process

One of the biggest concerns of community organizations who participate in Constructive Engagement is whether the process is legitimate. In other words, do the other stakeholders genuinely desire collaboration or is the forum being used for other purposes, such as public relations?

Determine whether your group views the Constructive Engagement process as legitimate, or at least having the potential to become legitimate if changes were made. If your constituency has doubts, you may experience in-group conflict over participation. You can use the following as initial indicators that the process is legitimate:

- The purpose of Constructive Engagement is well defined. The convenor is explicit about the intentions of the process, or the stakeholder group works together in developing common goals.
- Your role is clear; you know you are there to give advice, make recommendations, reach consensus decisions, etc.
- A feedback loop exists, so you know how your feedback is used or why it is not used, particularly when the group is advisory.
- Information is shared openly. Although this may be difficult to assess prior

to meeting, pay attention to whether information requests are honored, and credible independent technical assistance is available.

- The group functions independently. Participants, with or without the assistance of a neutral facilitator, share the tasks of setting agendas, conducting meetings, and organizing work.
- Process decisions are made by the group. Participants develop and make decisions about ground rules, membership criteria, and other policies related to the process itself.

You need to trust the fairness of the process, so the above elements should be present to the extent necessary to establish that trust.

Workers

Workers often offer a big advantage in Constructive Engagement because their interests overlap with facility management and the community. In the Sheldahl case, workers wanted to reduce their exposure to the chemical methylene chloride, which was also important to Northfield citizens. They also wanted to keep the Northfield plant open, an interest of the Sheldahl company stakeholders. Constructive Engagement provided an opportunity to address both sets of concerns, and workers became a valuable link between the other two stakeholder groups.

If you are a worker at a facility, participating in Constructive Engagement is probably a new experience. Whether Constructive Engagement is something you are considering for the first time, or whether you have been involved in previous efforts, here are some questions you might consider:

- What are your interests? To what extent are they similar to those of management and to those of community groups? Is this the best forum in which to pursue your interests?
- Is any group (management or community) trying to use you to support their position? What do you stand to gain?
- What will your role be? Who will you represent?
- How will your work setting (team-based or not, unionized or not) affect your participation?
- Will you be able to freely express your opinions, given the facility's culture and level of commitment to employee participation?
- What safeguards will be built into the process so that you will not fear retribution if you express disagreement with management?
- Is Constructive Engagement an opportunity to have more influence than you would otherwise?
- Are workers at the facility reasonably united in their goals?
- Will you be able to choose your own representatives, or will management pick them?
- Is there a way to make sure your representatives speak for the facility workers as a whole?

- Will representatives be allowed time during work hours to consult with other workers in order to remain accountable to them?
- Can participation in Constructive Engagement be coordinated with the collective bargaining process and agreement?

Industry

Consider your company. Can it support your participation in Constructive Engagement? Review your company's organizational structure and analyze its internal capacity to participate effectively in a collaborative process.

Organizational "Fit"

How well does Constructive Engagement fit within your organizational structure? Where will Constructive Engagement "live" within your company? This guide provides many examples of how Constructive Engagement fits within different companies' organizational structures.

In the Sybron Chemicals case, the vice president of manufacturing convened a team of top managers from different departments to develop and implement the company's community relations program. In the Romic example, the company's community relations program is centralized in a single department and overseen by a manager of community relations. Both approaches contain advantages and disadvantages. Your task is to determine how Constructive Engagement will be integrated into the structure of your company.

The following questions can guide your assessment:

- Will the effort be the responsibility of one department or a joint endeavor of several departments?
- What are the advantages and disadvantages of both approaches?
- Who will oversee the effort?
- Who will manage the project on a daily basis?
- Who will serve as the company representative(s) in meetings, negotiations, etc?
- How will employees be involved?
- How will the outcomes be communicated to others in the company?

Internal Support for Constructive Engagement

In the majority of the case examples, including Vulcan, Romic, Shell, Lucent, Rohm and Haas, and Sybron, high-level champions inside the company, at both the facility and corporate levels, are crucial in initiating and sustaining company participation in Constructive Engagement. Support from key managers, including plant managers, also lends legitimacy to the process for the other stakeholders. Representatives from community groups, in particular, believe top-level management participation shows the company is taking the process seriously. Their confidence in the process is bolstered by the presence of individuals with decision-making authority and the power to implement decisions and recommendations.

Flexibility

Chapter 2 poses the question of how much authority should be vested in a Constructive Engagement effort. Company stakeholders sometimes experience tension over how to be flexible while still working within the boundaries of the Constructive Engagement process. One of their biggest concerns is that the group will want more influence over company policies and operations than the company deems appropriate, particularly in situations where community stakeholders serve in an advisory capacity. For this reason, discuss decision-making authority up front and know what will happen with the group's input. If you do not demonstrate to the group that its concerns and contributions carry any weight, participants may question the legitimacy of the process.

Where will Constructive Engagement "live" within your company?

If you are a company stakeholder, you can further reduce some of the tension by doing the following:

- Secure internal commitment and support for Constructive Engagement prior to participation.
- Be clear about your goals and the goals of Constructive Engagement with other stakeholders.
- Be clear about the role you want the group to play in your company's decision-making.
- Select company representatives with decision-making and implementation authority.
- Make sure communication channels among all stakeholders are well developed, including the feedback loop.
- Determine whether the company is willing to adopt and implement the recommendations of the Constructive Engagement process.

Government

If you are a government stakeholder, ask yourself what your reason is for being at the table. In answering this question, consider your potential role, as well as the larger context in which you operate.

Defining a Role

As you decide whether to participate, consider your potential role. Your presence should add value to the process, empower the group, provide participants with something they cannot access or achieve without your participation, and further the goals of your agency.

You can serve many roles in any given Constructive Engagement process, so your first step is to define what your role(s) will be. Are you there to:

- Provide information?
- Gather information?
- Serve as a moderating force?

- Help forge consensus?
- Set parameters on what the parties can do?
- Enforce regulatory obligations?
- Forward agency interests?
- Represent parts of the public?
- Help the parties implement their decisions?

Do you want to emphasize one particular dimension of your participation or balance several roles at once? In either case, you will need to distinguish between the role you want to play and the ones others will assume.

Your regulatory role will also influence your decision about the role you'll play because Constructive Engagement is, among other things, a mechanism to enhance regulatory frameworks, not a process for parties to use to delay or avoid their regulatory obligations. If there is a conflict between your role as the enforcer of environmental regulations and your role in Constructive Engagement, reconsider whether participation in Constructive Engagement is appropriate.

Another potential role for government is convenor of the process. The Lead Steering Committee case illustrates a situation in which two state agencies convened a community committee to help facilitate cleanup of a contaminated site. They assumed the role of convenor because the conflict within the community was so great that intervention by another party was needed. The state agencies were viewed as a legitimate convenor because their presence was instrumental to the cleanup effort. If you are contemplating a role as convenor of the process, you should have a clear sense of why you are initiating the effort and whether the other parties will view you as a legitimate convening authority.

As you decide whether to participate, consider your potential role.

Political Considerations

Your decision to participate in Constructive Engagement will be influenced by political considerations, both internal and external. Like any other endeavor, your ability to effectively engage depends on whether it is politically feasible for you to do so. Be realistic in your assessment.

There are three dimensions to this issue: 1) the internal climate, 2) the external stakeholder environment, and 3) the broader political context. Will you get the support you need from within your agency to carry through your efforts? Are stakeholders pulling you in different directions and should you sort this out before committing to Constructive Engagement? Are there broader issues, such as a department or agency reorganization or an election that will impact you? These are questions you should ask in assessing your political environment.

Question #5: What Are Your Alternatives?

Evaluate all of your options before deciding whether to engage in a Constructive Engagement process. In some cases, Constructive Engagement may be the best

option for all stakeholders. In other cases, it may not be the best way to achieve your goals. Being aware of your alternatives enhances your ability to participate wisely. If you enter Constructive Engagement knowing where you stand, you will be in a better position to collaborate with others.

Communities

For communities, your alternatives to Constructive Engagement span a range of options. Within the environmental community, and particularly within the environmental justice movement, an ongoing debate exists over whether dialogue processes ultimately result in a compromise of values and principles. The complex issue of power influences this discussion. Within the larger context of your organization's ideology and belief structure, this debate may play a significant role as you consider your alternatives to Constructive Engagement.

Here are some of the main alternatives you might consider, including potential pros and cons:

ALTERNATIVE	PROS	CONS
Take no further action on this issue(s)	• No further resource expenditures • Can focus on other issues/ campaigns	• Unlikely to achieve goals • Issue may still be important • Resources invested already are lost
Continue current strategy	• Can pursue original goals without fear of compromise • Avoid having to adjust to changes produced by adopting a new strategy, including different resource needs	• May not make further progress toward achieving goals • Effort may not be sustainable • Constituency may lose interest
Increase levels of direct citizen action	• Can pursue original goals without fear of compromise • Increased pressure on company or agency • Issues are brought to the wider public's attention • Can increase negotiating power if collaboration occurs in the future	• May require more resources • Conflict may escalate • Other stakeholders may be less likely to consider collaboration in future
Use a formal mechanism—litigation	• Rights-based approach • Will likely result in a decision • Can result in enforcement of protection laws, punishment of perpetrators	• Can be more costly than other approaches • Less control of outcome • Interests may or may not be met

Workers

For workers, alternatives to Constructive Engagement exist along two dimensions: follow traditional procedures—like individual grievances and collective bargaining—or try to increase your influence through organizing and alliance building. Your alternatives include individual strategies, collective approaches, and combinations of the two. Like Constructive Engagement, some of your alternatives may involve forging new ground.

Here are some of the main alternatives you might consider, including potential pros and cons:

ALTERNATIVE	PROS	CONS
Take no action on this issue(s)	• No energy or time commitment • Fears of retribution eliminated • Can focus on other issues/ campaigns	• Unlikely to achieve goals • Issue may still be important • Resources invested already are lost
Pursue individual strategies • follow grievance procedures	• Institutionalized mechanism • Rights are protected • May result in individual gains	• May not make further progress toward achieving broader goals • Will not realize benefits of collective action
Try to effect change within company	• Pragmatic • May be able to influence management structures and decision-making • Establishes a collaborative atmosphere with management—may be useful for many issues • Most common approach in non-unionized industry	• Reliant on management to be receptive to efforts • Does not incorporate the concerns of other stakeholders • Not as likely to receive support from other stakeholders

Continued on the following page

ALTERNATIVE	PROS	CONS
Step up enforcement of occupational safety & health laws/rules • build alliances with other stakeholders • work with/lobby government agencies	• Other groups share interests and concerns • External support • Collective strength • Increased pressure on the company • Can increase negotiating power if collaboration occurs in the future	• May not share all interests and concerns with other stakeholders; some may conflict • Same "cons" as organizing
Use the collective bargaining process (if unionized)	• Institutionalized mechanism • Utilize collective strength • Outcomes are enforceable	• Not customary to include environmental issues • Limits opportunity to ally with community groups
Organize to form unions or other kinds of worker associations	• Collective strength • Increased pressure on company • Can increase negotiating power if collaboration occurs in the future • Rights are protected	• May require more resources • Tensions with management may escalate • Increased risk of retribution • Climate (economic, social, political) may not favor organizing • Time consuming

Industry

Participation in Constructive Engagement may be independent from other activities, or it may be part of a larger initiative. Assess your alternatives by looking at Constructive Engagement in terms of its compatibility with your company's other public involvement efforts and activities. In many of the case studies, Constructive Engagement is a component of companies' larger community relations programs. For example, in addition to its Neighborhood Involvement Council, Sybron Chemical's Community Relations Program includes an inquiry and notification system to enhance communication between the company and the adjacent neighborhood, a quarterly community newsletter, plant tours and open houses, and training for community volunteers in odor identification.

Here are some alternatives to Constructive Engagement you might consider, including potential pros and cons:

ALTERNATIVE	PROS	CONS
Do not collaborate	• No immediate resource expenditures • Can focus on other activities	• Public pressure may increase • Issue may not "go away" • Bad publicity may affect business
Continue current strategy of one-way communication • lobbying and/or public relations	• Issue may be manageable • Degree of interaction with other stakeholders is sufficient • May influence public and government agencies • May require less resources than other alternatives	• Same "cons" as listed above, at a later point in time • Prolonged time period may result in more expenditures over the long-run

Government

Consider your answers to the questions posed in this chapter. Your decision to embark on Constructive Engagement will be heavily influenced by your goals and anticipated role(s). These considerations should also influence your thinking about your alternatives, including how Constructive Engagement efforts can be used to enhance traditional approaches for obtaining stakeholder input.

Here are some alternatives to Constructive Engagement you might consider, including potential pros and cons:

ALTERNATIVE	PROS	CONS
Minimize involvement	• No immediate resource expenditures • Can focus on other activities • Decrease risk of serving in an awkward role or being caught between parties	• May still have a vested interest in the situation • Issue may be important • Pressure from stakeholders for action on government agency level
Follow traditional procedures for obtaining stakeholder input • public hearings	• Staff is available and familiar with process • Procedures already institutionalized • Will eventually achieve an outcome	• Adversarial relations continue/may worsen between stakeholders
Initiate litigation	• Can result in enforcement of protection laws, punishment of perpetrators • Rights-based approach • Some stakeholders may support effort • Approach is familiar, rules are clear	• Huge resource expenditures • Adversarial relations continue/may worsen between stakeholders • Lost opportunity to promote creative and flexible solutions • Lose control over outcome

Conclusion

If you approach Constructive Engagement with a strong sense of purpose and realistic expectations, you will have a greater chance of success. Understand the specific issues and challenges for your group, so you can decide whether Constructive Engagement is the best way to achieve your goals. Before you commit to a Constructive Engagement process, carefully assess your reasons for participating, the resources you will need, and your alternatives. You will not only maximize your gains, but also contribute to the success of the Constructive Engagement effort.

4 chapter 4

Constructive Engagement Is For Me. What Do I Do?

If you've decided to move forward with a Constructive Engagement process, what do you do next? This chapter provides guidance that applies to all major stakeholders: workers, facility managers, government, and communities. Some of the guidelines, such as designing the process and identifying participants, only pertain to process initiators[1], but everyone should be aware of them. Although the majority of cases in Appendix 1 were initiated by industrial facilities, *any* stakeholder can initiate Constructive Engagement.

This chapter is divided into four sections, following the process in roughly chronological order. However, Constructive Engagement is less linear than this list suggests. For example, designing the process and identifying and recruiting participants can occur together, since stakeholders should have some role in designing the process. Nevertheless, these stages are presented separately to make it easier to refer back to them as you create your process:

1. Designing the process
2. Identifying and recruiting participants
3. Participating in the ongoing process
4. Gaining closure

Each section offers guidelines that apply to many different types of Constructive Engagement processes, making frequent references to examples from the case studies.

[1] In this chapter, the term "initiator" means the organization initiating and perhaps funding the Constructive Engagement process. Some people use the term "convenor" instead. The term "convenor" can also mean a third-party neutral hired to design the process and identify and recruit participants.

Readers are also advised to consult Appendix 3, which contains sample forms for charters, agendas, guidelines, and mediation.

1. Designing the Process

How will you design your Constructive Engagement process? Spend time consciously and explicitly designing the process, and involve your stakeholders to an appropriate degree. Making clear, deliberate decisions at this stage, ideally in a collaborative manner with all stakeholders, saves time later in the process.

Purpose drives design. Stakeholders should agree on the purpose of the process, and make sure design decisions flow from that purpose. For example:

- If the purpose is to resolve a controversy between two or more adversaries, the process must include those adversaries, and should address all issues contributing to the controversy.
- If the purpose is to recommend a particular decision that an array of stakeholders will support, such as a decision about where to site a new facility, it is critical that all parties with an interest in that issue be included. There must be a way to provide the credible technical information necessary to make the decision. It is also important that the ultimate decision maker supports the process.
- If the purpose is to improve relations with the community over time, it makes more sense to have an open-ended process, open to any issues the group wants to discuss, rather than a time-limited process.

Establishing the Purpose

Develop a written purpose statement specifying what level of decision-making power the group has, and on what issues. (See topics 1-3 on the Sample Procedural Guidelines table on p.50.) It is frustrating, but common, to discover after several meetings that participants have different understandings of the purpose.

To build stakeholder commitment to the process, develop the purpose statement collaboratively, so stakeholders can see how the process will help them reach their goals. Of course, if you are initiating Constructive Engagement, you need to have a tentative purpose to recruit participants; the group can work from your first draft. In defining the purpose, participants should have roughly the same level of decision-making power they will have when discussing substantive issues. For example, if the group hopes to use consensus for making recommendations on the issues, they should strive for consensus on the purpose.

Level of Decision-Making Power

The purpose statement should address the level of individual or group decision-making power. There are generally three different levels of decision-making power in Constructive Engagement:

1. Individual input and feedback to decision makers. Participants may give individual recommendations or ideas, but the group does not collectively make formal recommendations. Citizen Advisory Committees and Community Advisory Panels usually have this level of power.
2. Group recommendations. The group collectively makes formal recommendations to a decision maker, by consensus or some other procedure such as a supermajority vote. This is common in stakeholder negotiations and formal mediations.
3. Group decisions. The decision makers are involved as stakeholders, and the group makes decisions—typically by consensus—which stakeholders are bound to implement. This is typical in good neighbor agreements and some mediations and stakeholder negotiations.

Spend time consciously and explicitly designing the process.

How do you decide what level of decision-making power is appropriate? Consider how important it is to have the stakeholders agree on decisions. Also, many groups will not be willing to participate unless the process offers them real influence. A process that seeks consensus of each individual participant provides the strongest incentive.

Scope of Issues

The purpose statement should clearly identify which issues are inside or outside of the group's scope. Does the group exist to address only a single issue? Any environmental issues related to a facility? Or any issues concerning a facility and the community?

> *Example:* The Shell Oil Community Advisory Panel is open to any issues concerning the plant and the community. The group has discussed environmental issues as well as others such as the company's charitable giving. In contrast, the collaboration between the Sheldahl plant workers and community groups focused on the facility's use of one chemical.

Establishing Procedures, Roles, Responsibilities, and Expectations

Like the purpose of the process, it is important for the procedures, the roles and responsibilities of participants, and other expectations to be clear and explicit. Here again, participants should have a voice in developing these expectations similar to the level of decision-making power they have for the substantive issues.

The more initial conflict or distrust exists within the group, the more carefully you need to design the process to ensure fairness and credibility. Distrust has many sources. There may be distrust of the sponsoring stakeholder, a history of bad relations, lack of prior contact or communication, a poor environmental track record, or group differences such as race, ethnicity, or class. If trust is high and relations are good, some procedural items can be addressed informally as the process moves along. However, planning carefully and being open and explicit may prevent unforeseen problems and promote inclusiveness, fairness, and trust.

Creating Procedural Guidelines

Procedural guidelines differ from one process to the next, but many topics are commonly addressed. These are shown in the accompanying table, along with some sample guidelines. Some topics in the table may be unnecessary for you, and you may address additional topics, or create guidelines not mentioned here. Use common sense and your group's input to decide which guidelines you need. Remember, the purpose of procedural guidelines is to clarify the nature of your process and avoid misunderstandings.

Written procedural guidelines can help a Constructive Engagement process go smoothly.

Written procedural guidelines can help a Constructive Engagement process go smoothly. The act of writing them forces the group to make clear, explicit procedural decisions, and later, participants can point to the guidelines in order to enforce them.

Procedural guidelines can be more or less comprehensive.

- *Ground rules* usually cover only meeting conduct—avoiding repetition, sticking to the agenda, allowing everyone to be heard, etc.
- A *charter* is broader, typically laying out the entire process design.

All groups should have ground rules at a minimum. A charter is essential in situations of conflict or distrust.

Key Procedural Issues

The case studies revealed a few particularly important procedural issues. They are discussed below, and topic numbers from the Sample Procedural Guidelines table on pp. 50-54 are included.

- What commitments and boundaries will the initiator and the participants set for themselves? Many facilities and agencies fear they will be asked to give too much decision-making authority to the group. Participants may also need to limit the scope of their roles. (See topics 2–4 in the Sample Procedural Guidelines table.)

  Example: Rohm and Haas managers have made it clear that the Community Advisory Committee is not part of the plant's management structure and does not make managerial decisions. In the Lead Steering Committee, citizen members were concerned about their legal liability, and limited their activity to what was included in the group's mandate: providing input, participating in discussions, and making recommendations related to the site cleanup.

- What exactly is required of individual participants? How much time is required? What are their specific obligations? (See topics 5, 6, 8, and 15.)

  Example: The Intel Project XL stakeholder groups held a total of about 100 meetings of the main group and subgroups over an 11-month period. Many meetings lasted late into the night. In contrast, Lucent's Local Environmental Advisory Group in Allentown meets bimonthly for about two to three hours.

- What is the feedback loop for the group's input or recommendations? If the group's role is to offer recommendations or general input, the decision maker needs to consider the input and also notify the group how the input was weighed and acted upon (or not acted upon). (See topic 18.)
- How might the procedures be changed? Many processes suffer major setbacks when initiators of the process change rules midstream, without proper group input. (See topic 19.)

  Example: The Lucent Allentown LEAG's charter states that "Changes to the LEAG Charter will be made with the consensus of the group at any meeting."

Many other issues are addressed in the Sample Procedural Guidelines table.

Process of Establishing Guidelines

The process for establishing guidelines is important. The more distrust or controversy there is, the more open and participatory this process needs to be.

Example: In the New Bedford Harbor Superfund mediation, the stakeholder group first met to jointly select the mediator. The first meeting conducted by the mediator was entirely devoted to establishing ground rules and procedures. In the Silicon Valley Pollution Prevention Center case, it was important that a careful and collaborative process was established to design the mission, decision rules, participation structure, and funding mechanisms.

A common way of establishing procedural guidelines is for the initiator or the facilitator to draft guidelines and discuss them with the full group at the first meeting to see if there are any objections or suggested changes. This method balances expedience with inclusiveness. Issues for the first draft can be obtained through one-on-one interviews with selected participants before the first meeting. The interviewer can ask the participants what they think is procedurally needed for meetings to be productive, or can ask about specific guidelines that seem troublesome (for example: "How do you think we should handle information requests from the media?"). The most participatory way to develop guidelines—and also the most time-consuming—is for the facilitator or chair person simply to pose open questions at the first meeting, inviting discussion and negotiation.

Sample Procedural Guidelines

TOPIC	SAMPLE GUIDELINES
1. What is the purpose of the forum?	• To have two-way communication between the plant and the community in order to improve relations, educate each other, and build trust. • To obtain input from the community about the plant's environmental impacts. • To find a consensus solution to the issue of ___. • To arrive at mutually satisfactory solutions to issues regarding ___. • To work together on ___.
2. What level of decision-making power does the group have?	• To provide input, feedback, and reactions for consideration by ___ [decision-makers]. • To develop [consensus/majority] recommendations that will be given considerable weight by ___ [decision-makers]. • To make [consensus/majority] decisions.
3. What issues will be discussed?	• The group will discuss how to clean up the XYZ site [or other specific issues]. • The group will address the plant's environmental impacts on the surrounding community and on workers. • The group will address the plant's impacts on, and interactions with, the community [not limited to environmental issues].
4. What issues will not be discussed?	[Matters that are either non-negotiable, confidential, or outside the group's purview may be outlined here.] • The facility's financial and personnel matters will not be discussed. • The agency's enforcement actions concerning other regulated entities will not be discussed. • Issues in the ___ lawsuit will not be discussed. • Individual complaints/claims against the facility/agency will not be discussed.
5. How long will the forum continue?	• The group will meet from ___[date] until the issue is resolved, but no later than ___[date]. • The group is created for a period of ___ year(s), after which the continuation of the group will be discussed. • The group is meeting indefinitely.
6. When will meetings be held?	• Meetings will be held the first Tuesday of every month, from 6:00 p.m. to 9:00 p.m. • The first meeting will be held March 1 from 1:00 p.m. to 5:00 p.m. Future meeting times will be discussed at this meeting. • The group will meet Wednesday, September 1 through Friday, September 3, 8:30 a.m. to 4:30 p.m. daily. Additional meeting time will be scheduled if necessary.

TOPIC	SAMPLE GUIDELINES
7. How are participants identified, and how can group composition change?	• Participants are selected to represent a broad cross-section of the community, diverse with respect to age, gender, race/ethnicity, occupation, level of education, and civic affiliation. Participation is for a renewable one-year term. Future participants will be selected by the Membership Subcommittee. The group will include 20 to 25 participants. • Participants include representatives of the City Planning Commission, the State Department of Environment and Conservation, the local chapter of the Outdoors Club, the state branch of the Ecological Defense Association, the Citizens Against Pollution, the local Chamber of Commerce, the Jack of All Trades International Union Local #1111, XYZ Co. corporate headquarters, and the XYZ manufacturing plant. The addition of other parties who seek to participate will be discussed and decided by consensus within this initial group.
8. What happens if participants miss meetings?	• Substantive decisions will not be made without the attendance of at least ___% of the participants. • The group will not be expected to backtrack to revisit information shared or decisions made due to a participant's absence. Participants unable to attend a meeting are responsible for getting updated. • Each representative may have one alternate, who will attend if the primary representative cannot. Each primary representative is responsible for keeping the alternate informed. • Each major stakeholder [listed elsewhere] may have three representatives at the meetings, and is encouraged to have at least two so that at least one is present when there are scheduling conflicts.
9. How open or confidential are the discussions?	[Note: laws may affect the level of confidentiality allowed] • Participants may inform others of the discussions, but may not attribute comments to specific participants other than themselves. • Meetings are completely open to the public, and no confidentiality rules are being observed. • At the end of each meeting, the group will discuss and decide by consensus what may be revealed to the public about the meeting. If consensus is not reached, participants may only reveal the general issues discussed and not the points of view expressed.

TOPIC	SAMPLE GUIDELINES
10. How open or restricted is meeting participation?	[Note: laws may affect the openness of meetings] • Meetings are open to the public. • Participation is limited to members selected by the Membership Subcommittee. • Meetings are open to observers. Observers are invited to make statements or ask questions in the last 15 minutes of each meeting. • Meetings are open to all residents of the ___ and ___ neighborhoods.
11. How will journalists and mass media be handled?	[Note: laws may affect accessibility to mass media] • Journalists are welcome like any other observers, but television and video cameras are not allowed in meetings. • All press interviews will be handled by ___. • Members are free to speak to the press, following the confidentiality guidelines, above. • The group will decide by consensus when a press release is needed, and a small group will be formed—with at least one member each from industry, government, workers, and citizens' groups—to draft the press release. • All meetings will be videotaped and televised on local cable channel ___.
12. How will a record of meetings be kept?	• The chairperson will appoint a staff member to take minutes at each meeting and distribute them to all participants. • The facilitator will take public notes of the discussions on flip charts. • Meetings will not be formally recorded; participants are free to take notes on their own. • Meetings will be tape recorded. • The facilitator will draft a summary of each meeting and distribute it to all members. Corrections to the summary will be invited at the following meeting. • Meeting summaries are intended to keep participants and alternates up to date only, and should not be released to the public or the press. • Meeting summaries may be released to the public or the press, but will not attribute any comments to particular individuals.

TOPIC	SAMPLE GUIDELINES
13. How should participants conduct themselves during meetings?	• Once an agenda has been agreed upon, it is important to stick to the topics and the time. • To give everyone a chance to talk, be sensitive about the length of comments and encourage equal participation from all participants. • Maximize the productive time available by not repeating points that have already been adequately made by yourself or others. • Avoid side conversations or interruptions so everyone has a chance to be heard and to hear others. • Focus the discussion on the issues involved, rather than perceptions of motives and personalities. • Each group member should work to create an open and frank dialogue that allows for a full and respectful exploration of similar and different points of view. • Remain open-minded about different proposals, ideas, and concerns. It often helps to stay focused on the underlying concerns or interests that need to be addressed, rather than on whether any particular proposal is "good" or "bad"—this makes it easier to evaluate the ideas that are presented in a productive way.
14. What rules concern worker participation?	• Employees may attend meetings "on the clock," getting paid as part of their regular work hours. • Employees participating in Constructive Engagement may use a reasonable amount of work time [or: may use up to ___ hours per week] to communicate with other employees about the process and to prepare for meetings. • Employees are encouraged to be candid during meetings and will not be subject to disciplinary action for their comments.
15. How are participants to communicate with their constituencies?	• All participants are here in their individual capacity, and speak only for themselves. However, participants are encouraged to inform others in the community about these discussions and obtain input from them. • All participants are responsible for keeping their constituents informed about the discussions and obtaining their feedback in order to ensure they are accurately representing their constituencies. • At least two public meetings will be held over the course of this process to get input from the general public.

TOPIC	SAMPLE GUIDELINES
16. How will decisions be made—consensus or voting? What is the definition of consensus?	• Procedural decisions will be made by a majority vote of participants present. • Decisions will be made by consensus, meaning every participant supports the *overall package* of decisions/recommendations being proposed. • Decisions will be made by consensus, meaning every participant signs off on each recommendation. • Decisions will be made by a supermajority of 80% of all participants.
17. If decision-making is by consensus, what happens when consensus cannot be reached?	• The group will not make any recommendations on which there is not consensus. • In the event consensus cannot be reached, the final report will include a description of the majority and the minority viewpoints.
18. What will be done with the group's input or product?	• The State Department of Natural Resources will give serious weight to any consensus decisions reached by this group of stakeholders. • XYZ Inc. will take the group's input into account when making environmentally-related decisions. • XYZ Inc. will consider recommendations made by the group, will inform the group whether and when the recommendations have been implemented, and will provide an explanation if a recommendation is not accepted.
19. How will the guidelines be changed?	• These guidelines may be changed by consensus if at least ___% of the participants are present. • These guidelines may be changed by a majority vote.

Meeting Logistics

Meetings should be "participant-friendly," to encourage participation, and keep the energy and enthusiasm alive in the group. Considerations include:

- Meeting times, length, and frequency
- Meeting location and accessibility (access to public transportation, ease of parking, lack of complex sign-in or security-clearance requirements, accessibility to people with disabilities)
- Availability of food and drinks
- Availability of day care
- Method of information distribution (mail, fax, e-mail, web site)
- Accommodation of scheduling conflicts (must all participants attend all meetings? Are alternates allowed?)
- Availability of translators and/or second-language written materials
- Reminder calls and other logistical support.

Using a Facilitator

You may think of a facilitator as someone who runs meetings, yet some of a facilitator's most important work is behind the scenes: designing the process, helping select participants, developing ground rules, creating meeting agendas, and troubleshooting between meetings. An independent facilitator can enhance a meeting's fairness, balance, and credibility by managing the process from a neutral perspective.

> *Example:* The facilitator of Lucent Technologies' Local Environmental Advisory Group in Allentown has helped increase the plant managers' comfort in sharing information, has persuaded them to invite environmental activists and union members, and wrote the initial "straw" draft of the group's charter.

A facilitator may not always be needed. If a group can design a good process, easily build trust, and develop good habits of meeting management, it may be able to function well without a facilitator.

Tips for Community Groups in Constructive Engagement

- Recognize that the purpose and procedures of a Constructive Engagement process are negotiable. Don't assume your only choices are to participate under unfavorable conditions or leave.
- Watch to see if all stakeholders have a chance to participate fully and that no one dominates. If the process does not seem fair, raise your concerns or request that these procedural issues be put on the agenda for group discussion, and try to persuade other participants to support your position.
- If difficult technical information is presented only by industry or government experts, request that an independent expert be provided, or seek the help of colleagues who have more expertise.
- Finally, be conscientious in remaining accountable to your organization. Advocate firmly for your group's interests, while engaging in problem solving to find solutions acceptable to all stakeholders.

Funding Constructive Engagement

How will the process be funded? There are several considerations:

- Who has an interest in seeing the process happen? Practically, in many cases, the initiator of Constructive Engagement also funds it. For example, industrial facilities usually fund the processes they initiate. Similarly, government often funds processes that aim to produce a recommendation to a government decision maker.
- Who has the funds available? Sometimes those most interested in the process may not be able to contribute funds—this is often the case with community groups or workers.

Example: In the Silicon Valley Pollution Prevention Center case, it was important that there was significant funding available from the settlement of a Clean Water Act lawsuit. The environmental coalition who filed the suit might not have been able to fund such an endeavor.

- How can all participants have a sense of control in the process? Groups who help pay for Constructive Engagement may feel more "bought in" to the process, both literally and figuratively. Moreover, concerns about more powerful parties unduly influencing weaker ones can be resolved through joint funding. However, there are other ways to achieve buy-in and ensure equal control, such as involving all stakeholders in designing the process.

If multiple parties contribute funds, they may negotiate, around the same time they make decisions about purpose and procedures, to determine how they will share funding responsibility.

Building-In Evaluation

Evaluation is an important part of any Constructive Engagement process, both to correct shortcomings and to adjust to changing needs and goals over time. Build evaluation into the process design, rather than waiting until the end of the process.

An evaluation can be as simple as asking participants what is working well and what can be improved.

An evaluation can be as simple as asking participants what is working well and what can be improved. Invite all relevant people to contribute their feedback—not just participants but also initiators, facilitators, technical experts, past participants, and anyone else who has been involved. You can gather this input using full-group discussion, individual interviews, or written questionnaires. Compile their comments and discuss with the group how to adjust the process.

If you want a more in-depth evaluation, you can probe the following:

- What was the original *purpose* of the Constructive Engagement process as a whole?
- What were the *goals* of each stakeholder or participant?
- How have these goals and purposes changed over time?
- How well is the process meeting these goals and purposes?
- What needs to happen for these goals and purposes to be reached?
- At the end of the process: What would you do differently if you had it to do again? What lessons have you learned that will aid similar activities in the future?

When should an evaluation be conducted?

- At a midpoint, if it is a closed-ended process, or
- At fairly regular intervals, if it is an open-ended process.
- At the end, so lessons can be drawn from the complete process.

- After implementation of the agreement is well under way, so evaluators can assess the group's ultimate impact.
- Any time the purpose has changed, so the process can be adjusted accordingly.

Example: Romic's Community Advisory Panel conducts an evaluation once a year to assess the CAP as a whole, the facilitator, and the company. CAP members complete written questionnaires, and an ad hoc subcommittee compiles the results and writes recommendations. After a review, these recommendations become the basis for modifications to the CAP.

Evaluation is the easiest element of a process to neglect, and resources may limit how much you can do. Still, a simple evaluation is better than none.

2. Identifying and Recruiting Participants

Who will participate in your process? As you establish a way to choose participants, remember that inclusiveness can determine fairness and credibility. Participants' individual qualities and their accountability to constituencies are also important.

Base your participant selection criteria on the purpose of the process, the role of the group, and the issues you will address. As a general rule, all stakeholders should be represented. Specifically, the process should include all groups:

- Affected by the issue
- Whose support is needed for whatever decision the group is trying to make
- With whom it is important to build a relationship concerning the issues.

The Importance of Inclusiveness

Since conflict can be uncomfortable, it is natural to avoid our adversaries. However, the point of Constructive Engagement is to bring together stakeholders who might have competing goals, in order to improve understanding and reach solutions that integrate opposing interests. If you only recruit participants who support your point of view, you will have an easy-going, harmonious group. However, you will be less likely to deal with the issues fully, and the process may not be viewed as credible. Generally, as the process develops, stakeholders are often pleasantly surprised at the positive relationships that form among participants with opposing views.

Example: Shell Oil Company's Community Advisory Panel includes individual environmentalists, but does not include members of environmental groups that protest the plant. The protesters continue their adversarial activities against Shell, showing the CAP missed an opportunity to resolve the protesters' complaints. In contrast, Lucent Technologies' Local Environmental Advisory Group includes activists from two local environmental groups, who have become committed and cooperative members of the group rather than protesting the Lucent facility.

Welcoming the full range of opinions and interests may take courage, but is the best way to gain broad support for the group's work. Opposition to the group's actions will probably be expressed inside the group and dealt with there. Initially, this may create contentiousness and hard work for the group, but if the process is open and proceeds according to the stated purpose and design, trusting relationships will form.

Welcoming the full range of opinions and interests is the best way to gain broad support for the group's work.

Creating a Selection Process

The process by which participants are recruited or selected is at least as important as the actual composition of the Constructive Engagement group. The more contentious the situation or the higher the stakes, the more the selection process should be explicit, open, and independent. As the initiator, you may be tempted to select the participants yourself, but you will have more credibility if the selection process is collaborative and open. You can do a number of things to achieve this:

- Use a facilitator to identify and recruit participants. The facilitator can independently conduct interviews to determine whose participation is appropriate.
- Publicize the Constructive Engagement activity and openly invite participation or applications to participate.
- If the initiator is selecting participants, establish clear, written criteria for selection.
- Form an initial steering committee that selects other participants.
- As potential participants are contacted, ask them who else should be involved, and follow up on these leads.
- At the first meeting of the Constructive Engagement process, ask if participants know of anyone who should be there but is missing.

Sometimes uninvited stakeholders create a natural check on participant selection. If they feel they have been excluded, they may contact the initiators themselves to request participation. Initiators need to stay flexible and change the composition of the group if needed. Conversely, if no one shows interest in participating, perhaps the issue has not generated enough concern or controversy to merit dialogue. Still, it is better to identify all relevant groups up front, to create a sense of fairness and avoid having to change the group later.

Dilemmas in Identifying Stakeholders

Many initiators of Constructive Engagement may face potentially controversial questions about who participates:

- Should national or other non-local community groups participate?
- Should facility workers participate?

- How should the general public be represented?

National Organizations

Communities are one of the basic stakeholders in Constructive Engagement. When dealing with particular facilities, you can assume that local residents need to be involved, either as individuals or as representatives of local organizations. Should national (or regional or international) advocacy organizations participate as well? The following considerations can help you decide:

- Whose support is needed? If a national group has the power to undo what the process is trying to accomplish, consider involving the group from the start.

  Example: In Intel's Project XL stakeholder negotiations, national and regional environmental and labor groups criticized the process and the Final Project Agreement. They took their concerns to EPA Headquarters, and also published an open letter explaining their opposition. Having representatives of these organizations in the stakeholder group might have enabled them to address their concerns before they escalated into public opposition.

- Can a larger group with more resources bolster a smaller, local community group, preventing it from being overpowered? Other stakeholders may similarly rely on support from larger counterparts: corporate offices support facilities, international unions may support local unions, and government headquarters offices support regional offices.

  Example: In the New Bedford Harbor Superfund mediation, the representatives of local citizens' groups had difficulty understanding the technical presentations on alternative cleanup technologies. Using a government technical assistance grant, they hired a technical consultant through a national environmental justice organization. This national group played a constructive role in supporting the stakeholder that was weaker in both technical knowledge and funds.

- Can a national group build bridges between conflicting groups?

  Example: In the Sheldahl case, the differences between community activist groups and the local Amalgamated Clothing and Textile Workers Union (ACTWU) were substantially bridged when a representative of ACTWU's national union visited the area and helped bring the union and community groups together.

- Finally, can a national group bring additional insights, knowledge, or capability to the process? For example, they may bring lessons from similar experiences elsewhere, or they may have significant public influence. Local and national groups must, of course, work together cooperatively to enhance and not undermine the efforts of the local group.

National groups can participate in varying degrees. Your process might include only local representatives of national organizations. Alternatively, national group representatives could observe or even participate in discussions, but not in decision-making. Your decisions about the inclusion of national organizations are extremely important to the credibility of the process.

Tips for Facility Managers in Constructive Engagement

- Don't assume you have to give away trade secrets or other legitimately confidential information such as financial or personnel data in Constructive Engagement. People understand that some information is "off the table."
- Do, however, have the courage to share relevant information you may not be proud of, such as data on emissions or accidents. This will go a long way toward building trust and credibility.
- Be forthcoming about your concerns about the cost and time required for environmental improvements, and seek help from the group in finding ways to meet environmental goals fully, yet efficiently. The stakeholder group may support you in advocating within the corporation for fundamental changes in production and operations that will prevent pollution and save costs in the long run.
- Finally, seek help from the facilitator on any sticky procedural questions.

In general, being more open, fair, and inclusive may seem risky in the short-run, but will make the company a more well-respected environmental leader in the long run.

Facility Workers

There are fairly few instances of worker participation in Constructive Engagement. However, workers' interests, experiences, and knowledge make them an important stakeholder group:

- Worker and community health and safety issues are linked—workers are at risk for health and safety hazards from plant operations. Their experience can serve as an indicator of community risks. Also, workers are on the front line of safety protections in plant operations.

  Example: Workers in the Sheldahl case shared an interest with the community because they were exposed to the same chemical, in higher concentrations.

- Workers can be a natural moderating influence between the company and the community, since they are often residents of the local community, and also have an interest in the company's viability.

  Example: In the Sheldahl case, there was debate over how to reduce workers' and neighbors' exposure to a toxic chemical. Workers persuaded local community activist groups that a toxic-use-reduction approach (the company's proposed method) was better for all

concerned than the recapture-and-recycle approach the community groups had initially advocated.

- Workers can provide information about plant operations, based on intimate knowledge, and from a point of view independent from plant management.

  Example: The workers on Lucent's Local Environmental Advisory Committee helped community participants understand the inner workings of the facility. Sheldahl workers could also discuss the effects of different options for reducing emissions, because of their experience in the facility.

Tips for Facility Workers in Constructive Engagement

Participation by workers in Constructive Engagement is still fairly new.

- Try to get assurances in writing that you may express your opinion freely, even if you openly disagree with management.
- To keep other employees informed and involved, work to develop a democratic selection method and process of accountability to other employees, if no such process already exists.
- It may be useful to hold separate discussions with either facility management or community groups, or both, to coordinate strategies. At times, your goals may be closer to those of the facility, and at other times, they may be closer to those of the community groups.
- You may find that pollution laws that affect the facility's neighboring communities may be more favorable than those that affect workers; this can be a good argument to improve safety standards inside the plant.
- Use your knowledge about facility operations to help find solutions that protect health and the environment without endangering jobs.

The General Public

Should it be a goal to represent the general public? The answer depends on the purpose of the process.

- For processes aimed at sparking dialogue and getting community input, the answer is probably yes. Many of these activities aim to get a cross-section of the community, including a sampling of nearby facility neighbors. Even so, it is wise to consider informal leadership, and to involve those who are influential, irrespective of formal status.
- For processes aimed at making a decision or recommendation, the answer is less clear. These forums typically have organized groups represented. Arguably, some of these do represent the general public. For example, environmental issues usually affect the general public, which is why some environmental organizations are sometimes called "public interest groups." Elected officials (and, by extension, their staff) also represent the general public, because they were elected by the public. However, both community

It is advisable to combine stakeholder negotiations with public meetings.

organizations and elected leaders could be perceived as having interests and agendas separate from those of the general public.

For these reasons, it is advisable to combine stakeholder negotiations with public meetings, so the public can be briefed about the status and progress of the Constructive Engagement process. Ideally, this should happen more than once in a lengthy negotiation. If the first public meeting occurs just when participants are ready to sign an agreement, unexpected public opposition could cause carefully-negotiated solutions to unravel. Instead, the first public meeting should occur early in the negotiations.

Tips for Government Officials in Constructive Engagement

Strive for clarity in your role in the Constructive Engagement process. This may be a confusing issue.

Your role may be:

- As a neutral convenor of a process to get agreement among stakeholders on a decision,
- As a stakeholder with interests to advance—such as enforcing laws and regulations, upholding the authority of your agency, protecting public health and safety and the environment, promoting economic growth and development, or
- To promote a balance of the latter two.

Your task may be to:

- Make a decision (the Constructive Engagement process may be aimed at providing input or a recommendation on that decision),
- Share in decision-making responsibility with other government agencies and/or other stakeholders, or
- Provide resources and information to stakeholders to enhance their ability to address their own issues.

There may also be ambiguity within your agency about what decisions you are authorized to make, and when you need to seek approval from higher levels.

Like other design issues in Constructive Engagement, issues about your role are best raised explicitly and discussed up front—first within your agency, and then, when appropriate, with the other participants.

Getting the Best Representatives

Once you know what stakeholder groups are involved, the next question is what individuals will represent these groups. Clearly, representatives should have credibility within their own groups, and be knowledgeable, articulate spokespersons. What additional skills are needed for Constructive Engagement, and should participants be technical specialists?

Skills for Constructive Engagement

Some processes have encountered trouble because of "difficult" participants who advocated in a competitive rather than cooperative manner. On the other hand, many stakeholder groups have been let down because their representatives were more interested in accommodating other stakeholders than in being accountable to their constituents.

The best representatives are *both* strong advocates *and* collaborative group members. They can make a strong case for their own groups' goals, then work with others to find ways to meet all the stakeholders' interests. This requires skills in cooperative negotiation and problem solving.

Is Technical Expertise Helpful?

To what extent should participants be technical specialists at the outset of the process? Although it may seem ideal if all participants walk into a Constructive Engagement process fully informed, there are advantages and disadvantages of having technically expert participants, particularly if the group is composed mostly of at-large community members. A technically trained participant can help translate jargon, and can help build trust by serving as an independent check on the information provided by just one stakeholder. On the other hand, if a group has different levels of expertise, the lay people may give up trying to understand the information, relying instead on the specialists in the group. If most at-large community representatives have technical expertise, it is questionable whether they truly represent ordinary community members.

> *Examples:* In the Vulcan case, scientific or technical background was a criterion in participant selection. As a result, the group has high credibility with the company, and can comprehend the voluminous technical data. On the other hand, it is unclear whether the group is truly representative of the community. In addition, the less-knowledgeable members are more inhibited in expressing their views. Finally, discussions about technical issues sometimes get mired in fine technical points.

In contrast, Shell Oil Co. did not make technical expertise a major qualification for membership in its Community Advisory Panel. As a result, members have widely varying levels of technical comprehension, which is also true for the community. However, some members tend to sit back and count on more knowledgeable members to detect problems and raise concerns.

Of course, an important aspect of a Constructive Engagement process is to build group-wide knowledge of relevant technical issues. For tips on conveying technical information, please refer to the later section, "Participating in the Ongoing Process."

Choosing Representatives

It is up to each stakeholder group to choose its representatives. However, if you are the initiator, you can explain to stakeholders the importance of sending representatives with the right skills or the appropriate level of technical expertise.

Getting Stakeholders to the Table

The previous sections discussed who should ideally participate, but how do you get them to the table? A group may need to be persuaded either to initiate or to participate in Constructive Engagement.

In general, it is best to use cooperative means to get others to the table—persuading them that engaging in the process is a good idea. Using existing relationships with other stakeholders will help. If, however, cooperative methods fail, you may need to use adversarial tactics to get another group's attention—especially if you are a less-powerful group trying to get a more-powerful group to engage. Here are some more specific getting-to-the-table ideas:

Champions Needed

In getting any stakeholder to the table, ask whether the group has someone at a high level of decision-making authority who strongly supports the process. Such a "champion" is needed, especially within the initiating organization, to lend credibility to the process and to implement group recommendations.

> *Examples:* In the Vulcan case, the plant manager was an important champion of Constructive Engagement. In the Lucent case, the ongoing participation of the plant manager and the environment, health, and safety officer have helped demonstrate the company's commitment to the Constructive Engagement process.

Facilities

If you are trying to persuade a facility to initiate Constructive Engagement, either a "carrot" or a "stick" approach may work, and a combination is best. In other words, some facilities have initiated Constructive Engagement in response to positive incentives ("carrots")—such as the prospect of establishing the company as an environmental leader or getting regulatory relief. Other facilities have been prodded by negative concerns ("sticks")—such as pressure from environmental activists and neighbors, or a regulatory crackdown.

> *Examples:* As an example of a "carrot" approach, EPA's Project XL grants regulatory flexibility in exchange for stakeholder engagement and environmental performance that goes beyond regulatory minimums. The prospect of a streamlined regulatory process served as an incentive for Intel to broaden its existing Constructive Engagement efforts to participate in Project XL.
>
> As an example of a "stick" approach, complaints from neighboring residents and pressure from local officials helped lead Sybron to initiate its Neighborhood Involvement Council.
>
> As an example of a combination approach, Shell initiated its Constructive Engagement effort both to avoid the kind of public outcry it had weathered before, and to try to further its image as an environmental leader.

Community Groups

If you are trying to persuade community organizations to participate, you may find that they must have a compelling reason. Often community groups run on a shoestring budget, and they are invited to more processes than they can attend. Like all stakeholders, they must be able to answer "What's in it for me?" in terms of their own interests.

These interests, of course, may vary. Most people value the chance to have meaningful influence on important decisions. Beyond that, for community representatives, their goals may depend on whether they participate as individuals or as representatives of organizations.

For those serving as individuals, their interests may include learning about what is happening in their community, networking with influential people, or participating in something useful.

> *Example:* Members of Lucent's Allentown Local Environmental Advisory Group, who participate only as private individuals, cited the chance to learn about the Lucent facility, its environmental problems and solutions, and its ways of working with regulators as the reason they maintain their membership.

Representatives of organized groups often have "bigger" interests—to influence company policies or operations in certain ways, to increase environmental protection, or to bring about other changes that will advance their organizations' goals.

> *Example:* In agreeing to help form the Silicon Valley Pollution Prevention Center, the CLEAN South Bay coalition was enticed by the opportunity to play a significant role in promoting pollution prevention.

Of course, like sponsors of Constructive Engagement, potential participants need to weigh participation in a Constructive Engagement process against the alternatives. In some cases, the alternative is worse, and therefore, Constructive Engagement will be an attractive idea.

> *Example:* In the New Bedford Harbor Superfund site mediation, none of the parties relished the thought of a protracted legal battle to address cleanup concerns.

In other situations, the alternative is better than participation, in which case they may not be willing to take part.

Taking No for an Answer

What happens when you know a particular group is affected by the issue under discussion, but the group declines to participate? You may need to redesign the process to make participation more worthwhile for that group. For example, community groups with minimal resources may need to have some of their expenses reimbursed. In addition, some groups may not feel participation is worth their time if the goal is only to provide input. When juggling multiple demands on their time, they may only want to participate if they can have a more direct role in decision-making.

Ask the stakeholders themselves what they need to make participation worthwhile, and treat the process design as a negotiable issue.

Representatives or Private Individuals?

A final matter about identifying and recruiting participants is whether members participate as representatives of particular organizations or as private individuals.

Generally, if the goal of the Constructive Engagement process is simply to get a range of input, like many facility-sponsored Constructive Engagement forums, it is usually adequate for members to participate as individuals. Membership in such forums is usually intended to include a cross-section of the community (although it may still be worthwhile to involve individuals from relevant organizations).

On the other hand, if the goal is to produce an outcome that earns the support of different organizations, those groups need to be formally represented. Their representatives should attend as spokespersons and be accountable to the organization, rather than participating as private individuals.

3. Participating in the Ongoing Process

Once the Constructive Engagement process is underway, some of the most difficult procedural matters are behind you. The majority of processes—though by no means all of them—go reasonably well once participants are face-to-face. Still, there are a number of procedural issues that can make the difference between success and failure, including:

- Setting meeting agendas
- Handling information needs
- Building trust and rapport
- Maintaining communication between participants and their constituents or the public.

Each of these issues is discussed below.

Setting Agendas

There are no hard-and-fast rules about setting meeting agendas. For Constructive Engagement processes designed to resolve a particular set of issues, create an agenda that moves toward overall resolution. Two possible approaches are:

- Beginning with smaller, less contentious issues. Build early success by resolving easier issues first. This approach is particularly suitable for highly divisive disputes, because it helps build trust and momentum towards resolving the tougher issues.
- Addressing the most central, important issues first. If the group is working together well enough to handle tough issues early, this approach relieves the

anxiety about whether there will be time for the central issues. Sometimes the smaller issues resolve themselves once the major ones are addressed.

A facilitator or mediator can be extremely helpful in establishing agendas when a fixed set of issues has to be settled.

For ongoing processes that focus on building relationships over time, agendas can be set in several ways. The initiating organization can set the agenda, based on the issues that prompted the process. (Other participants may not initially know enough about the issues to propose agenda items.) A facilitator can also propose agenda items. Participants can propose agenda items as they become more informed, or they can ask questions that prompt the initiating organization to devote time to that topic at a subsequent meeting.

> *Example:* The Rohm and Haas Community Advisory Committee's agendas are formed jointly, in advance, by members and the public affairs manager.

It is always helpful to distribute agendas before the meeting, but it is essential if members need to prepare. In more contentious gatherings, it is critical that participants see agendas in advance, so they will not feel the initiating organization is trying to catch them "off guard." Also, in processes where participants formally represent larger stakeholder groups, receiving agendas in advance allows them to get input from their constituents.

In more contentious gatherings, it is critical that participants see agendas in advance.

Handling Information Needs

One of the greatest challenges in Constructive Engagement is handling the often voluminous, complex technical information. This information can be:

- Scientific—such as the health effects of certain pollutants,
- Engineering-related—such as available technologies for pollution control,
- Operational—such as how some part of a facility works,
- Legal—such as the regulations affecting a particular kind of emission, or
- Financial—such as the costs of various cleanup alternatives.

It is essential for Constructive Engagement participants to have a common base of information to make informed comments, recommendations, or decisions. Sources must be credible. Different sources are appropriate for different kinds of information. Ideally, there should be technical expertise from a variety of viewpoints—not just the viewpoint of a facility or government agency—in order to present objective, or at least balanced, data. Assuring participants have access to complete, comprehensible, and balanced information is an important way of addressing power imbalances.

A few guidelines make the exchange of technical information more smooth:

- Allow time to exchange information. Acknowledge—both to yourself and to others—that it is challenging to communicate technical information, and allow plenty of time for it. Often the bulk of a Constructive Engagement group's time is spent sharing data—formal presentations, question-and-answer sessions, and impromptu explanations. This should be considered time well spent.

- Share information openly. Sharing information openly, including information that a stakeholder may not be proud of, helps ensure fairness and build trust. This openness is a key factor in stakeholders perceiving the process as genuine.

  Examples: At the beginning of Lucent's Local Environmental Advisory Group (LEAG) in Allentown, managers were nervous about opening up to the public. A major turning point came when the plant had a minor chemical spill, and the facilitator persuaded them to tell the LEAG. LEAG members remarked that it seemed the accident was handled well. They also offered suggestions, and pressed plant managers for accident prevention plans. The members, including those from environmental organizations, were pleased with this openness.

One environmental activist on the LEAG said she heard about a similar group where a facility manager said, "We don't want to disclose that because we don't want to alarm the public." She said if she had been there she would have responded, "You just did."

Facilities sponsoring Constructive Engagement processes usually find they don't get pressured or coerced into sharing sensitive business or financial information—participants understand that some information is off limits. This fear has sometimes been used as a rationale for not doing Constructive Engagement at all.

Alternatively, some facilities claim information is confidential business information, when the truth is the information may just not be very flattering. As mentioned above, being forthcoming in such a case helps build credibility.

- Make technical information easy to understand. There are several ways to share technical data to make it easy to understand:

  - Use plain English, rather than technical jargon, as much as possible.
  - Use visual aids such as charts, graphs, and diagrams.
  - Encourage questions, allow time to answer them, and acknowledge that the information is difficult.
  - If there are some participants who are more technically trained or informed, welcome their help in explaining things to other participants.
  - Conduct plant tours, site visits, or other hands-on events to put the information in context and make it more real.

- Ask questions freely. If you are a participant with little technical savvy, don't be shy. All participants should freely ask questions and otherwise insist that information be made comprehensible. If you don't understand

it, chances are someone else is also having trouble. Communicating complex data is an expected part of the process.

- Build in education or training. It may be worthwhile to have training or education components as part of the process. Training could cover the regulatory process, environmental laws, or any other topic participants need to understand in order to make well-informed decisions.

- Consider using an independent expert. In particularly contentious processes, an independent source of technical expertise is useful. It is easy for people on one side of an issue to feel that people on the other side are trying to "snow" them with biased or misleading information. An independent expert can help keep the process fair by providing an objective view and helping stakeholders grapple with complex issues. It may be worth it for a facility or an agency to fund an independent technical expert, even if they know their own data is objective and accurate. The EPA makes Technical Assistance Grants (TAGs) through the Superfund program and also through Project XL.

  Use plain English, rather than technical jargon, as much as possible.

  Examples: Shell Oil has a standing offer to its CAP to pay for an independent technical expert. So far, the group has not found an expert necessary, but the standing offer enhances participants' confidence in the fairness of the process.

  In the Sheldahl case, the Air Toxics Study Group, formed of university science professors, in effect served as an independent expert group. This group worked closely with the neighborhood organization and the union involved in the case.

  In the Intel Project XL stakeholder negotiations, the question of whether Intel would pay for an independent expert became an issue of contention with outside critics of the process. EPA now provides technical assistance funding in its XL projects, partly as a result of the concerns raised during this process.

Building Trust and Rapport

In most Constructive Engagement processes, trust and interpersonal relationships grow naturally over time because people talk face-to-face and form a common base of information and experience. This phenomenon sometimes surprises skeptics who fear they can't reason with their "opponents." If you are concerned about building trust, there are steps you can take:

- Encourage an atmosphere where disagreement is acceptable. Some people are uncomfortable with conflict and likely to get agitated at disagreements. Others express agreement only to keep the peace. Hiding disagreement may build short-term harmony but not long-term trust. All participants should encourage an open expression of views by listening attentively to different opinions and probing the reasons behind them.

- Share informal and unstructured time. Sometimes site visits, meals, traveling together, or other opportunities for social interactions are worth hours of well-constructed meeting time. Informal time allows for exploring others' perceptions, and can help bridge serious differences.
- Be open with information. The earlier section "Handling Information Needs" discussed how a willingness to share unflattering information about one's own group can build trust.
- Withhold judgment of others' values. Government officials, facility managers, workers, and community activists tend to have different values and cultures. Accept that people with distinct values can still work toward mutually acceptable solutions.
- State your true interests in ways others will understand.
- Have a genuine concern for meeting the interests of everyone at the table. Continually probe the needs and concerns of other participants, and ask variations of the question, "How can we meet your interests and at the same time meet our own?"

Communicating with Constituents and the Broader Public

A significant challenge in Constructive Engagement is to keep constituencies informed, and to communicate with the general public. The challenge differs depending on whether participants represent organizations or participate as individuals.

Participants Representing Organizations

The challenge is usually less difficult when participants clearly represent particular organizations. In this case, they are likely to have procedures for communicating with their groups. For example, representatives of facilities, government agencies, and community groups with paid staff can distribute memos or e-mails to inform colleagues about meeting progress, and they can hold meetings with colleagues during business hours to exchange views and get input. Representatives of unions and volunteer community groups can use letters, newsletters, and regularly-scheduled meetings for the same purpose. Still, it is always a challenge to ensure that all stakeholder groups are kept informed about the Constructive Engagement process and that their concerns are adequately represented.

It is wise to take steps to make sure participants are bringing their constituents along with the progress of the group, so there will not be a surprise, last-minute refusal on the part of one stakeholder to accept the outcome. This might require a discussion early in the process on how to ensure effective, ongoing communication with constituencies.

Participants Serving as Individuals

Communication is even trickier in groups where participants serve only in their individual capacities. (These are typically ongoing groups intended to get reactions and input, but not to reach formal decisions.) In these cases, there are sometimes procedural guidelines about participants communicating with their

The Role of Culture

How can cross-cultural issues be addressed in Constructive Engagement processes? This section provides an approach for acknowledging and bridging cultural differences. Cultural differences may pose challenges, but they are not insurmountable.

- Acknowledge cultural differences. Your first step in addressing cross-cultural issues is to acknowledge them. Cultural differences can be related to organizational culture, class, ethnicity, age, religion, language, and gender. While some differences may be readily apparent, others are more hidden. Keep in mind that differences are a two-way street—when you notice something different about another person, they likely notice something different about you!
- Determine how cultural differences can affect participation in Constructive Engagement. Cultural differences—and how they are addressed—can often be a significant factor affecting individual and group participation in Constructive Engagement. Cultures can differ in approaches toward communication, decision-making, conflict, competition, cooperation, problem solving, time, space, and venue.
- Be willing to confront the cultural issue. Cross-cultural issues must be addressed to avoid an adverse effect on the Constructive Engagement process. Issues can surface in many ways. Someone may raise an issue of cultural difference directly, but more often, cultural differences surface in the form of tense group dynamics or conflict over substantive issues. Your willingness to directly address the culture issue may itself be influenced by cultural views.
- Develop appropriate responses. Developing appropriate responses to cross-cultural differences involves careful thought. There are some practical approaches, but it is important to promote a group norm that encourages respect and awareness of differences. Ideally, if participants are willing to address cross-cultural issues, they will also be able to identify their own culturally-influenced participation needs.

Here are some practical steps that can be taken to facilitate participation and accommodate cross-cultural needs:

- Include an educational component in the process that includes developing an awareness of cultural needs.
- Check for a balance in participation among all group members in order to create a "safe place."
- If there is a cultural group that is reluctant to participate, ask what procedures might help them feel comfortable, and make appropriate changes.
- Provide language translation services.
- Use a facilitator who can help point out and bridge cultural differences.
- Have the group develop ground rules that address procedural and communication issues.
- Pay attention to when and where meetings are held.
- Provide information in both written and oral forms.
- For a long-term or intensive process, consider training in cross-cultural competence.

This list is just a beginning. Part of your group's work will include developing other mechanisms for addressing cross-cultural issues and tailoring them to your situation. Your ultimate goal is to transform the challenges presented by cross-cultural differences into opportunities for learning.

"constituencies," but they have not always proven effective. Participants might talk to a few family members or friends, but do not conduct any organized outreach. Participants have cited several reasons for this:

- These forums are often sponsored by a facility, and participants do not want to sound like corporate "mouthpieces."
- No organized mechanisms have been established for outside communication to occur.
- Participants may not feel conversant in the technical matters involved.

Clarifying Communication Expectations

The mismatch between what Constructive Engagement initiators expect and the role participants are willing to accept may point to inappropriate expectations. In processes designed for input and feedback only, and not for reaching consensus decisions or recommendations, the participants are often "at-large" individuals. Facilities and government agencies may be hoping in vain that by talking with a *sample* of the community, they are talking with the *whole* community. The bottom line is that initiators of Constructive Engagement should not expect participants to communicate actively with "constituencies," unless they are participating as representatives of organizations.

How can Constructive Engagement initiators exchange views and information with the general public? You may need to supplement the Constructive Engagement process with other public communication strategies. These might include familiar mechanisms for communicating *to* the public, such as press releases, radio interviews, and news conferences—the usual domain of public relations professionals.

Also, consider getting input *from* the public by offering:

- Public meetings, open to all
- A toll-free telephone comment line
- Polls and surveys—by phone or mail
- A web site with a place for people to register their comments.

These mechanisms need to be well publicized.

Keep in mind that public communication may need to be different in different settings. Hanging notices on church bulletin boards, for example, may work fabulously in an area with high church attendance, but may be nearly useless in another area. People from the community can tell you how information gets around the fastest.

4. Gaining Closure . . . *or* Managing an Open-Ended Process

Some Constructive Engagement processes have a natural ending point (such as a final consensus recommendation), so are closed-ended. Others continue over time,

so are considered open-ended. How do you reach closure in closed-ended processes? How do you maintain open-ended processes over time? How do you know whether your process should be open- or closed-ended?

Closed-Ended and Open-Ended Processes

Whether a Constructive Engagement process is open- or closed-ended depends on the purpose of the process. If it was established to make a decision or recommendation on a particular issue(s), the process will have a natural ending point after the decision has been made. On the other hand, if the goal is ongoing feedback and input, an open-ended process makes more sense, although it is still possible to set up the process for a fixed period (such as one year), and then assess whether to continue.

> *Example:* Intel's Chandler, Arizona, stakeholder group existed for the purpose of reaching a Final Project Agreement for Project XL. The process lasted less than one year. However, the same Intel facility has an ongoing Community Advisory Panel that began before and continues after the Project XL stakeholder negotiations.

Combinations of open-ended and closed-ended processes are also possible. For example, an open-ended process might devote a specified time to decision-making on a specific issue, but then continue in a more open-ended fashion.

> *Example:* Lucent's Allentown Local Environmental Advisory Group made part of its job to reach a Final Project Agreement for Project XL. However, the group's broader purpose is to provide ongoing discussion and input, so the process is open-ended.

More commonly, a process intended to be closed-ended will continue even after the issue is resolved, perhaps because participants find the process beneficial in ways that go beyond the original issues. In this case, an evaluation is needed to clarify new goals, change the composition of the group, and decide whether an open-ended or closed-ended process suits the new purpose.

Sometimes the purpose of a Constructive Engagement process changes significantly over time. Some Constructive Engagement activities are designed to address a particular crisis, but turn out to be useful beyond that crisis and so continue to function.

> *Example:* Vulcan Chemical's Community Involvement Group (CIG) was originally formed to head off controversy surrounding a planned incinerator, but soon after forming the group, Vulcan dropped the incinerator plan. At that point, the facility decided to continue the CIG, with the broader purpose of promoting two-way communication to address concerns about the plant's environmental impacts.

Others may shift their focus more gradually.

> *Example:* Romic's Community Advisory Panel initially addressed specific health and environmental concerns surrounding the facility.

Now, the bulk of its time is devoted to more broad-based issues of how the company can function as a good corporate citizen. For example, after a large earthquake, the CAP worked with the company and the community to develop mechanisms to respond to other natural disasters.

It is relatively easy to define crisis-oriented purposes (for example, "reach agreement on the controversy"). For open-ended processes, new purposes can emerge, and evaluation can help clarify them and provide insights for modifying the process to meet new purposes.

Closing Out the Process

Deadlines

If a Constructive Engagement group is designed to produce an agreed-upon decision or recommendation, it is important to have an appropriate deadline. Either a tight deadline or the absence of a deadline can lead to failure.

- *If the deadline is too soon*, an impasse is likely. The important stages of expressing strong feelings, exploring issues, exchanging data, and developing options get shortchanged as participants feel they must jump to decision-making. Also, rushing creates stress and anxiety, which hinder constructive problem solving.
- *If there is no deadline,* participants may feel there is no compelling reason to let go of their initial positions. Discussions may go on and on, and eventually everyone may get frustrated at the lack of movement.

What is an appropriate deadline? Determine this case by case. Processes can take anywhere from a few days to a few years, depending on the number, complexity and divisiveness of issues, and the frequency and length of meetings. If you are inexperienced with Constructive Engagement, allow more time than you expect—you may want to double or even triple your initial estimate. Ask facilitators or those more experienced to help you set an appropriate deadline. Remember that the most important thing is simply to *have* a deadline, so it is better to overestimate the amount of time you need rather than underestimate.

Remember that the most important thing is simply to have *a deadline.*

Overcoming Disagreements and Building Consensus

As the end of a process draws near, the group must move beyond sharing information and views, and begin reaching agreements. In consensus processes (where the goal is agreement of all stakeholders or participants), there are many ways to overcome disagreements:

- Identify whether the disagreement is held by a single individual or several people.
- Make sure the dissenting participants express the underlying reasons for their disagreement.

- Ask the objecting participants for alternative proposals the whole group might consider to overcome the objections.
- Have everyone express their views on the question without response by other participants. Then test for consensus on the old proposal or a newly modified one.
- Return to earlier steps of problem solving to determine if any new, mutually-acceptable options can be developed.
- Decide whether it is an objection the whole group should consider, or whether it is one that could be worked out by a sub-group and then presented to the whole group for approval.
- Break into small groups to discuss the question and to develop new proposals.
- Consider making the result non-precedent setting, temporary, or trial.
- Suggest a break or postpone the discussion to a later date, allowing people time to consider the objection and alternatives.
- Break down the decision into pieces, so consensus can be reached on parts of it, if not on the whole package.

Last-Minute Objections

When many areas of agreement have been reached, and the group is coming close to a consensus, some participants may suddenly reverse their consent and raise new objections. This behavior may seem irrational, but is actually common and arises from facing the realities of closure. For the first time, participants may truly think about the implications of their consent: Are they selling out? Is the agreement fair? Can they convince their constituents it was the right decision? More generally, change can be frightening.

This last-minute doubt is normal, but what can you do? You might need to circle back to earlier stages in the process and revisit issues, so participants can relive the thought process that led them to the decision. This helps them reassure themselves that the proposed agreement is sound and acceptable to their constituents. On the other hand, the new objections may be real, and the group must discuss them as new issues and modify the proposed agreement.

Even if no new objections arise, a renewed level of tension may replace some of the relaxed atmosphere and warm relationships. Again, this is normal and does not necessarily mean that the group's achievements are unraveling.

Impasses and Alternatives to Consensus

Sometimes, despite everyone's finest efforts, consensus cannot be reached. If this is the case, there are several ways to proceed:

- Those with the objection may simply block consensus, and your group may disband without a final decision.
- Those with the objection may allow the group to record the disagreement, but proceed with the majority view.

- Those with the objection may "stand aside" and not block consensus, thus allowing the group to proceed. Standing aside can release those who object from any involvement in implementing the agreement.
- Those with the objection can prepare a minority report describing their concerns and submit it to the decision maker for a final decision.

  Example: The New Bedford Harbor Superfund case ended with a majority and a minority recommendation, in spite of a strong agreement-in-principle about what would be the ideal outcome (an outcome that was not technically feasible). A single document described all the areas of consensus, and also detailed both the majority and minority views. This document was submitted to the EPA for a final decision on cleanup of the site.
- The individual who disagrees may decide to leave the group, releasing the group to move ahead.

Maintaining an Open-Ended Process

For ongoing groups, where the goal is input rather than decision-making, a big challenge in the long-term is apathy and low attendance.

Example: The Shell and Romic Community Advisory Panels have struggled to keep attendance high, and have addressed this in part by recruiting new members.

How can you keep participant energy and attendance high?

- Ask for a limited time commitment (such as one year), which may or may not be renewable. This way members can gracefully leave and new members with fresh enthusiasm can join.
- Hold meetings less frequently, such as once every two or three months. Unless there are urgent issues to address, this should be adequate.
- Hold meetings at convenient times and locations, and provide food.
- Make reminder calls to members before each meeting, or whenever members have reading assignments or other preparation to do.
- To help with all of the above, have a designated coordinator from the initiating organization to serve as point-of-contact between meetings.

Conclusion

Constructive Engagement is a challenging, and often demanding, process, but offers great potential rewards. It can also be a lot of fun. There is no one right way to "do" Constructive Engagement. The approaches and considerations discussed in this chapter are meant to guide you, but not to constrict your thinking.

Whatever approach you select, it will be important to be clear about the purpose of the process, and then to design the process to meet those goals. Inclusiveness is important, and can be achieved in a variety of ways. When initiators work with

other stakeholders to design the process, decide who participates, create guidelines, determine funding, and set agendas, there is a greater chance that difficult decisions can be made in a collaborative manner. Assessing the process throughout enables participants to collectively shape the effort and adapt it to changing needs and goals.

5 chapter 5

Lessons Learned

Constructive Engagement can be a powerful tool for community groups, workers, advocacy organizations, industry, and government agencies. Constructive Engagement can provide a forum for each group to promote its individual interests and find creative ways to achieve common goals. Constructive Engagement forums can help promote better communication and a higher level of understanding of each other's needs and perspectives. They can help overcome a perception that the needs of one group can only be met at the expense of another. They can encourage everyone to take a long-term view of the issues they are facing and to get past the stereotypes, mistrust, and insensitive practices that may have characterized past relations and activities. The benefits of these processes have become increasingly clear to participants from all sectors. As a result, there is likely to be a significant increase in Constructive Engagement activities in the years to come.

Effective Constructive Engagement activities require more than good will and a desire to work together; they also require appropriate procedures, structures, and skills. Perhaps most important, they demand a clear vision of the purpose of the process, its potential benefits, and likely costs. Constructive Engagement is a potentially valuable, but demanding process that is not appropriate under all circumstances. Perhaps the most important decision potential participants in Constructive Engagement will make is the initial determination about whether to participate at all. All participants should enter into Constructive Engagement with an understanding of why they are there and how they can be effective. If the resources a Constructive Engagement effort requires are going to be well spent, the process should be designed to allow each participant to be a powerful, well-informed, and involved player. The process should also allow personal relationships to develop, conflicts to be addressed thoroughly, and groups to coalesce.

Twenty-Three Lessons

During the process of compiling this guide, a number of themes emerged. These are offered as the primary lessons learned about Constructive Engagement:

- Good processes can emerge from mixed motivations. The desire to avoid bad publicity or a lawsuit can be as powerfully motivating as the opportunity to achieve a positive outcome. However, if the process is to succeed, positive motivations and goals need to ultimately develop as well. Participants need not be motivated by a clear vision of the potential positive benefits of a Constructive Engagement process in order for it to succeed. There are many examples of Constructive Engagement activities that ultimately led to positive results, but started with at least some of the stakeholders participating for damage control or defensive purposes. In these cases, however, a positive vision also emerged and members understood they had a lot to offer each other through their joint efforts.

- Ideally, the time to initiate Constructive Engagement is before a major incident, but sometimes it takes a crisis to create the momentum necessary to get adversaries to talk or to awaken interest in an issue. The consequence of this, however, is that more work will be necessary to build trust and open up communication. Constructive Engagement efforts are often initiated after a public controversy about facility activities or plans. In these cases, it often is necessary to spend considerable effort to repair relations in addition to resolving the specific issues involved. Sometimes, this has led to the creation of a more cooperative and effective structure of communication among different groups than might otherwise have developed.

Good processes can emerge from mixed motivations.

- To initiate and sustain a Constructive Engagement effort, it is crucial for the initiating organization to have a champion with a high level of decision-making authority who shows ongoing commitment to the effort. A Constructive Engagement effort is likely to be ineffective or cosmetic at best without active support from major players inside the initiating organization. These players need not be the formal leaders, as long as they have significant decision-making authority. Other stakeholders are more likely to view the process as legitimate if they know there is active support for it.

- When undertaking Constructive Engagement, resources devoted should match the expectations for the process. If they do not, the initiator should either cancel the process or re-evaluate the purpose, scope, or nature of the process. Constructive Engagement can only achieve its potential if adequate resources, including time, are devoted to the process. A well-intentioned but inadequately supported effort can lead to failed expectations and worsened relations. Consider the resources available when deciding how ambitious the process should be.

- Constructive Engagement does not serve all purposes. Some purposes are better served by a different process, such as unilateral action or advocacy. Constructive Engagement provides a mechanism for all

participants to address their issues, but it is not an end in itself. The decision to initiate or join such a process should be based on a careful assessment of its potential costs and benefits. Individuals or groups who decide they do not want to participate should not be condemned. Instead, their concerns should be listened to, and they should be responded to with respect. If Constructive Engagement becomes a value independent of its potential benefits, it may become a divisive force and fail to achieve its potential as a collaborative tool.

- The purpose of the Constructive Engagement activity should drive the process. A process that is constructed just for the sake of having a process is unlikely to be effective. Instead, it should be designed to meet specific needs and to achieve desired outcomes. All participants should clearly understand the purpose of the process and evaluate it with this in mind.

- Ideally, the goals of the process should be defined collaboratively by all stakeholders. At a minimum, the goals should be explicit and have the agreement of all participants. Collaboratively defining the goals ensures that the process belongs to everyone, not just the initiator. This is particularly important for consensus-building processes. However, for some short-term processes intended to elicit input only, it is acceptable for the purpose to be established by the initiator only. Nevertheless, the purpose should be explicit so that all participants know what it is and can choose to participate accordingly.

The purpose of the Constructive Engagement activity should drive the process.

- Different participants may have different goals, but all goals should be compatible with the purpose of the Constructive Engagement process. Compatibility of goals does not necessarily mean uniformity of goals. Industry may be interested in more flexible permitting procedures, whereas community groups may be focused on decreasing industry's environmental impact. However, if they do not at least share the overarching goal of working together to help each other achieve their goals, then Constructive Engagement is unlikely to succeed. If potential participants have goals that are fundamentally incompatible with a Constructive Engagement effort (for example, if a community group is committed to shutting a facility down, or if a facility wants only to communicate *to* the public), then a Constructive Engagement effort may be ill-advised.

- It is important to define and agree on roles, responsibilities, and decision-making procedures at the outset, and to change these only through an agreed-upon, decision-making procedure. The structure of the process is ideally established collaboratively with all participants, but at a minimum should be made clear and explicit to all participants. One of the best ways to ruin a Constructive Engagement process is to establish expectations at the beginning, then change them midway without going through the established group decision-making procedure.

- Trust among stakeholders does not need to exist for a successful process

to be convened, but the process needs to be trustworthy from the beginning. Stakeholders often question their participation in a dialogue with people or organizations whom they do not trust. Yet sometimes this lack of trust among groups whose activities affect each other and whose interests overlap is the most important reason to initiate a Constructive Engagement process. Trust does need to develop for the process to attain its potential, but it does not need to be present from the beginning. The initiator must be clear and honest about the purpose, goals, and expectations of the process. Group members must come with an intention to participate in good faith, give the process the energy and time it deserves, and avoid premature judgments about each others' behavior and motives.

Once a group begins to work together successfully, trust tends to develop.

- The less trust there is, or the more complex and significant the issues, the more important it is to negotiate the structure, ground rules, membership, and goals, and to have a neutral convenor and facilitator. The lower the trust and higher the stakes, the more important it is to ensure that all participants have a powerful role in determining the process and structure of the group. Under these circumstances, a group designed and run by one stakeholder is not only less likely to succeed, but can actually breed greater mistrust, even with the best of intentions. Using a neutral and credible facilitator and convenor can be especially valuable under these circumstances.

- Once a group begins to work together successfully, trust tends to develop whether or not building trust was an expressed goal. At the same time, building effective communication and decision-making processes is a more realistic (and therefore more effective) goal than developing trust. As important as the development of trust may be, it is usually not effective to approach this as an explicit goal of the process. Trust will develop, as appropriate, out of effective communication and fair decision-making procedures. Participants may not be willing to agree to building trust as an initial goal, and they are often understandably skeptical about whether trust will emerge. Furthermore, trust as a goal is an elusive target, whereas good communication and decision-making procedures are not.

- Diversity issues should be recognized early. Differences in how participants work and communicate affect the process. Communication methods must be tailored to the different communication styles of participants and their constituencies. When Constructive Engagement processes do not allow for a variety of communication styles, educational levels, and linguistic needs, important contributions are lost and participants are not empowered. Participants who feel excluded or uncomfortable with a process will not always indicate their discomfort, but they will often cease to attend or remain in the background. To prevent this from happening, the process must help raise awareness about these differences and develop ways to address them.

- The credibility of a process is enhanced by the participation of people who have contrasting perspectives. It is, therefore, better to welcome a

broad range of participants—including adversaries—than to focus on creating a harmonious group. By and large, it is smarter to risk the challenges of a contentious group than to exclude potentially important participants. All groups who have a stake in the outcome should be included. Conflicts can be resolved, issues addressed, and mutually acceptable decisions reached, but only if key interests are represented and if key people are brought together. Any agreement made without the support of key stakeholders is unlikely to be durable and lasting.

- If there are significant groups who decline to participate, the initiator should re-evaluate the process and procedures, reaching out to the groups and encouraging their input to improve the process. There is seldom one person whose participation alone can make or break a Constructive Engagement effort, but if a key group declines to participate, the process will not be as strong. It is important to talk to groups that decline to participate in order to understand their refusal and to evaluate whether to redesign the process so that their issues can be addressed. Sometimes, it will still make sense to proceed without a group, but the potential of the process will then be limited in proportion to the significance of the missing group's constituency.

- The logistics and mechanics of the process should promote inclusiveness. Practical matters significantly affect participation. For example, meetings should be held in an accessible location, food should be provided, stakeholders should be given adequate notice, all participants should be encouraged to voice their views, and workers should be protected from retaliation for their participation.

- If the purpose of the process is to make group recommendations, stakeholders should be formally represented. If a process is only intended to elicit input and feedback, people can participate in their individual capacities. However, if the group's purpose is to ensure various constituencies' interests are reflected in the recommendations, and to obtain the support of different groups for the outcome, a more formal representative process is necessary.

- Constituent groups vary widely with respect to how they are organized and how they wish to be represented. It is important to clarify who is participating as an individual and who is taking part as the representative of an organization. Representatives of groups or organizations should be clear about how they will communicate with their constituents. Confusion about who is in a representative position can quickly breed mistrust in a group. If representatives do not keep their constituent groups adequately informed, significant problems can also develop. The method of communication between participants and their stakeholder groups needs to be established in the beginning.

- A successful process must have credible sources of information. For important, controversial information, it is helpful to have a range of

perspectives, including an independent source of information. Many people identify this as the single most important factor in building credibility for a process and allowing all participants to play a meaningful role. Sometimes, for information to be credible, it needs to be developed or confirmed by a source independent of the facility or government agency. Many community organizations are concerned that without independent expertise, information, and advice, community members are at a great disadvantage. Independent expertise is one of the best ways to empower community participants to play a significant role and to understand the consequences of the decisions they are making. When members have fears about the impacts of the decisions or recommendations they are considering, independent experts can assist them in assessing these impacts in an objective and, therefore, credible way.

- Openness of information is vital to a successful process, even if the information is sensitive. Sharing relevant information is a significant indicator of good faith intentions. This is especially true when there is a history of conflict. While industry is often concerned about divulging sensitive information, there were no reported incidents in the case studies of information being misused. Furthermore, groups did not request information when they understood a legitimate need to maintain confidentiality.

A fair process should lead to a result that provides benefits to all participants.

- In order to address differentials in power, resources should be available to enable effective participation by all stakeholders. This may include: a) information presented in an easy-to-understand manner, b) education or training for participants, c) translation, d) funding for participants' travel or time, and/or e) access to independent expertise. All stakeholders need to have the resources to participate meaningfully. Some participants—often those from community groups—have fewer resources. For the process to fully include all participants, stakeholders should work together to find ways to make sufficient resources available to all group members.

- Participants should have genuine influence, consistent with the type of Constructive Engagement process and the expectations established. For example, if the goal of the process is to provide input to decision makers, the decision makers should report back to the group to let them know how their input was considered. If the goal is to make decisions by consensus, consensus should be used for setting the goals and procedures of the process, as well as for arriving at the final outcome.

- The most successful Constructive Engagement processes result in outcomes that benefit all stakeholders, and do not shift risks to more vulnerable groups. A fair process should lead to a result that provides benefits to all participants. There should be a balance, for example, between achievement of regulatory flexibility and environmental, health, and safety improvements. Similarly, groups with less political power, such as low-income and minority groups, should achieve outcomes as beneficial as those achieved by more powerful stakeholders.

The Future of Constructive Engagement

The future of Constructive Engagement looks very promising. These efforts are occurring more often in the computer and electronics industry. They are happening because participants realize that the best way to address contentious issues facing industry, workers, regulators, and communities is usually by working together and acknowledging their many common goals. Constructive Engagement efforts will not solve all problems, prevent all conflicts, or mend all relations. Genuine differences remain among industry, government agencies, community groups, and workers that will occasionally have to be resolved through legal or political means. Still, Constructive Engagement offers an interactive process of communication and decision-making that can be both meaningful and beneficial for all participants. Its potential is just beginning to be realized.

In order to achieve this potential, several developments are necessary:

- More people need training in how to organize, conduct, and participate in Constructive Engagement. Potential participants need to learn the skills and processes that can help make Constructive Engagement efforts more successful. With more trained participants and facilitators, these processes can be more effective.
- Better funding and contracting systems are needed to make the publicly funded initiation of such efforts simpler and more available. Currently, government contracting procedures can be daunting and potential initiators are sometimes discouraged by the complexity of this process.
- Participants in Constructive Engagement activities should be encouraged to document their experiences and share the lessons they have learned.
- More reviews about organizing and using Constructive Engagement are needed. This is still a relatively recent development that requires more research, evaluation, and discussion in order to use past experiences to improve future activities.

The appendices to this report contain additional information useful in considering Constructive Engagement activities. In addition to case studies in Appendix 1, Appendix 3 contains a variety of sample forms for use in planning and conducting Constructive Engagement. Appendix 4 contains a listing of federal, state, and nonprofit organizations, hotlines, and other resources that could be helpful in pursuing Constructive Engagement.

We hope the Constructive Engagement Resource Guide is part of a much wider effort to understand and promote the effective use of Constructive Engagement.

REFERENCES

Chemical Manufacturers Association, "Advisory Panels: Options for Community Outreach," Washington, D.C.

Chess, Caron, Stephen K. Long, and Peter M. Sandman, *Making Technical Assistance Grants Work*. New Brunswick, NJ: Environmental Communication Research Program, Rutgers University, 1990.

Cormick, Gerald, Norman Dale, Paul Emond, S. Glenn Sigurdson, and Barry D. Stuart, *Building Consensus for a Sustainable Future: Putting Principles into Practice*. Ottawa, Ontario: National Roundtable on the Environment and the Economy, 1996.

EPA Common Sense Initiative Auto Manufacturing Sector Subcommittee Alternative Sector Regulatory System/Community Technical Assistance Project Team, "U.S. Automobile Assembly Plants and Their Communities: Summary of Community and Plant Environmental and Economic Issues Obtained Through an Electronic Literature Search," Final Subcommittee Support Document, March 27, 1997.

EPA, Office of the Administrator, "People, Places, and Partnerships: A Progress Report on Community-Based Environmental Protection," EPA-100-R-97-003, July 1997.

EPA, Office of Policy, "Better Decision Through Consultation and Collaboration," Draft 1998.

EPA, Office of Policy, Planning, and Evaluation, "Community-Based Environmental Protection: A Resource Book for Protecting Ecosystems and Communities," September 1997.

EPA, Office of Reinvention, "Project XL Stakeholder Involvement: A Guide for Project Sponsors and Stakeholders, EPA-100-F-00-001, February 1999.

EPA, "Report of the Common Sense Initiative Council's Stakeholder Involvement Work Group," June 3, 1998.

Harrison, Myron, M.D., "Why We Need the Precautionary Principle," in the Silicon Valley Toxics Coalition website, http://www.svtc.org.

INFRASTRUCTURE, "The INFRASTRUCTURE Resource List," Irving, Texas, http://www.infras.com.

Lewis, Sanford and Diane Henkels, "Good Neighbor Agreements: A Tool for Social Justice," *Social Justice*, Vol. 23, No. 4, 1995.

Lynn, Frances M., Presentation, "Constructive Engagement: What Do We Know? What's Left to Discover?" CSI Computer and Electronics Subcommittee Alternative Strategies Work Group, April 1998 meeting.

Lynn, Frances M., George Busenberg, Nevin Cohen, and Caron Chess, "The Chemical Industry's Community Advisory Panels: What's Been Their Impact?" unpublished paper, Department of Environmental Sciences and Engineering, University of North Carolina at Chapel Hill.

Rutgers University Center for Environmental Communication, Cook College, New Brunswick, New Jersey, http://aesop.rutgers.edu/~cec.

Smith, Ted, and Leslie Byster, "The Challenges of Environmental De-Regulation in the Era of Globalization," in *Semiconductor Fabtech: New Technological Developments in the Semiconductor Industry.* London, UK: ICG Publishing, 1998.

Society of Professionals in Dispute Resolution, "Best Practices for Government Agencies: Guidelines for Using Collaborative Agreement-Seeking Processes," January 1997.

Stewart, Thomas E., Dynamic Networking, Martinez, California. Information developed by Dynamic Networking on forming Community Advisory Panels.

1 appendix 1

Case Studies

This appendix provides case studies using Constructive Engagement and are organized according to the type of process. The collection is diverse; each case study illustrates a unique set of issues and lessons. Taken as a whole, themes emerge and you can identify what you can expect to accomplish through successful Constructive Engagement.

Table of Contents **Page Number**

Citizen Advisory Committees

Lucent Technologies Microelectronics Group's Local Environmental Advisory Group:

A COMPANY TAKES THE ADVISORY GROUP PLUNGE — *Allentown, Pennsylvania*

Lucent Technologies' Microelectronics Group has run Local Environmental Advisory Groups (LEAGs) at its facilities throughout the world since 1996, including its Allentown, Pennsylvania plant. A LEAG provides input and recommendations to a facility about its environmental management plans and results. This case illustrates:

- How a company benefits from including both friends and adversaries in its community involvement group.
- How a company's disclosure of sensitive information to a group may be less scary than expected and can help build trust.
- How skeptical activists were recruited and then continued to participate.
- How the LEAG maintains high attendance and enthusiasm.

Background

Lucent Technologies' Microelectronics Group developed a business-wide Environmental Management System (EMS) as part of its efforts to meet the voluntary International Organization for Standardization (ISO) 14001 standards, which require companies to incorporate environmental management systems into all aspects of their operations. At the same time, through implementation of the EMS, Lucent sought to participate in EPA's Project XL (XL stands for "Excellence and Leadership"). Project XL is an alternative-compliance program which offers regulatory flexibility in exchange for 1) a plan for achieving "superior environmental performance," i.e., better results than full compliance with existing regulations would produce, and 2) stakeholder involvement in developing and implementing the company's participation plan.

According to EPA's Steve Hoover, it took a long time and considerable pressure from EPA and the Pennsylvania Department of Environmental Protection before key staff at Lucent fully grasped the concept of public involvement as expressed in Project XL. Once they realized it entailed much more than one-way communication to the public, "Lucent finally got the message and started to ask exactly what we meant by community involvement," said Hoover. "…they finally got on the stick and developed the LEAGs."

Goals

The Allentown LEAG is one of Lucent Microelectronics' most successful advisory groups. According to its charter (which was discussed and accepted by the members), the group's purpose is to "gather a diverse group of community representatives and facility personnel in order to exchange ideas and respond to concerns regarding environmental activities at the facility."

Participants

The LEAG has 20 members, representing a diversity of views. Included are three Lucent employees—the manufacturing director and two union representatives—who do not participate in making group recommendations. The union representatives were included at the urging of the facilitators. Other members include environmentalists, business people, scientists, civic group members, emergency response professionals, and facility neighbors. Members are only asked to serve for one year, but the vast majority have renewed their membership. The LEAG has its own member selection committee, although company personnel chose the initial members from people who responded to an open invitation in local newspapers.

Guidelines from Lucent Microelectronics headquarters ask LEAG organizers to create a diverse group that includes detractors as well as friends. Initially, facility managers, such as Environment, Health, and Safety Manager Debra Wenger, were nervous about inviting potential

adversaries, such as vocal environmental activists, into the group. Eleanor Winsor, lead facilitator from the firm Winsor Associates, helped managers overcome their fears. Wenger now feels that it is better to have potential foes at the table rather than outside the process. Their participation has proven valuable, stimulating useful discussions, rather than making meetings more difficult.

The environmental activists in the group also had concerns to overcome. Tom Kerr of Wildlands Conservancy explains, "I was skeptical in the beginning, but not enough to keep me away." He worried about being "manipulated," but this has not been his experience. Pat Smith of Clean Water Action said "I thought it would be another dog-and-pony show," but found otherwise. "They're trying to reach out to the community, be open about what they're doing . . . I believe Lucent is honest in saying they want to simplify permitting and regulatory processes, but also move towards environmental impact improvement."

While members are chosen to represent a broad range of interests and affiliations, they officially participate in their individual capacity. The charter contains a ground rule, "Members should exchange relevant information with non-group constituents," but there are no formal mechanisms for implementing this rule.

Procedures and Issues

The LEAG usually meets bimonthly. Ground rules are established in the charter, and an independent facilitator is present. The meetings are informal and fairly amicable, although members sometimes openly disagree with each other. Meetings are open to the public, with time set aside at the end of the meeting for observers to speak.

Originally, the two-and-a-half hour meetings began at 7:00 pm, with no meal served. However, members complained they didn't have time for dinner, so the meeting time was changed to 6:00 pm, and a light supper was offered at 5:30 pm. Ilse Stoll, a plant employee designated as LEAG coordinator, said she was initially concerned that providing a meal might look like Lucent was "buying" the participants. However, she now sees the meal as a form of customer service, and finds that the meal puts members in a better frame of mind to listen and provide input.

The group discusses issues including the EMS, chemical use and the Toxics Release Inventory, some air quality issues, and water consumption and discharge. LEAG members also took a plant tour in which employees pointed out aspects of the facility that could potentially affect the environment.

Role of the LEAG

The role of the group is strictly advisory. Jerry Fields of PPL Inc. (formerly Pennsylvania Power and Light) says members "review and evaluate [Lucent's] ideas . . . We're their conscience, though they're already very conscientious. We're a check on their thinking." Facilitator Eleanor Winsor explains, "The company keeps control of the decision-making process. No one questions that or objects to it."

Challenges

Public disclosure. According to Eleanor Winsor, one challenge was Lucent's nervousness about opening up to the public. "We did a lot of hand-holding to develop their comfort level." A major turning point came when the plant had a minor chemical spill, and, according to Winsor, "They were panicked." Winsor continues, "We worked with them, and when they shared the information with the LEAG, members responded, 'Well, it looks like you handled things well.' Lucent couldn't believe it was such a non-issue. The LEAG offered suggestions and asked 'how will you prevent this in the future?' They were very constructive." Member Tom Kerr concurred: "It was in effect [Lucent] blowing the whistle on themselves. If my son came to me upset and said, 'I got a B-B gun and shot a bird,' the effect of him telling me would be powerful. It's kind of the same . . . It's healthy for people to admit their mistakes, to admit they're human, and invite us to help keep them clean."

So far, the members have not requested information that the company considers too sensitive to reveal. The charter stipulates that, "Issues associated with confidential business information or trade secrets, personnel information or legal questions will be outside the group's scope of discussion." Overall, however, sharing information

openly has been an important trust-builder. One member recently revealed that he had asked for certain information early on just to test whether the company would provide it! (They did.)

Technical information. Many group members found it difficult to digest and respond to complex technical information. Member Tom Kerr has dealt with this mostly by relying on other group members with more technical expertise. He originally hoped Lucent could use less technical language, but acknowledges that might be costly. Member Pat Smith remarked, "I can always raise my hand and say I don't understand" and receive a better explanation. She pointed out that using plain English, taking time to explain, using charts and visuals, and offering plant tours have all helped.

Publicity. Smith points out a different area in need of improvement: "I'd like to see more press about what's happening at Lucent." The goal of heightening public awareness about pollution and its prevention would be served by such publicity. Smith also notes that other companies might be inspired by Lucent's example to involve the community in their environmental planning.

Costs

Most LEAG costs are absorbed by Lucent. The plant manager, Nick Khoury, attends most of the meetings. The two union representatives participate, and others from the company, such as environmental engineers, attend when they are needed to make presentations and answer questions on particular topics. Other costs include a newspaper ad for each meeting, refreshments, the facilitator's fees, and the time of one Lucent employee, Ilse Stoll, who serves as coordinator and point-of-contact for the LEAG. Stoll does considerable between-meeting work including: 1) reminding members of upcoming meetings and action items, 2) arranging for catering and room set-up, 3) reminding them to read minutes, and 4) regularly thanking members for their participation.

Member costs essentially consist of the time to attend meetings, read minutes, and do follow-up. A few members give additional time on the membership committee, and occasionally activities are planned which require some preparation. For example, one member was asked to give a presentation about his organization.

Outcomes

The LEAG has provided many benefits to the company.

- According to Debra Wenger, the LEAG is "building a good will account with the community . . . you hope you never have to call upon it. It's been a challenging growth exercise for our organization . . . It broadens our perspective and keeps us on our toes."
- It helps keep environmental issues at a high priority for the company, according to Wenger.

Members cite different benefits for themselves:

- For members, the opportunity to learn about Lucent's actions—and to hear other members' reactions—is an important participation benefit. The plant is a major business in Allentown, so its actions can affect the whole community. Specifically, Pat Smith of Clean Water Action sees her participation as furthering the goal of greater public awareness of industrial facilities and the toxics they generate. Dan Koplish of the Allentown City Water Department and Jerry Fields of PPL Inc. both take interest in Lucent's innovative way of working with regulators on environmental compliance (particularly through EPA's Project XL) and its approach to working with the public. They are also interested in the plant as a major customer of water and power. Tom Kerr of the Wildlands Conservancy participates in part to learn what makes some companies more inclined than others to balance environmental considerations with profit motives.
- Members also gain a chance to network with other influential people, and in some cases, to promote their organizations.
- Finally, members derive satisfaction from seeing their input taken seriously.

The LEAG has also contributed to substantive changes:

- With the help of the LEAG's input, the company is reducing the usage of water and water-treatment chemicals, thereby reducing discharges of treated water into the nearby Lehigh River.

- The LEAG discussed and agreed to the plant's Final Project Agreement for Project XL. Under the agreement, the plant will conserve large amounts of water, while benefiting from a new water discharge permitting procedure.

Success factors

Several factors have contributed to the LEAG's success:

- Although the EMS establishes a few basic requirements for all LEAGs, they are otherwise locally controlled. For example, each LEAG selects its own members, establishes its own charter, and chooses what issues to address.
- The company's willingness to invite environmental activists has contributed to a credible balance of views on the LEAG. However, all members must be local, according to the company-wide guidelines for LEAGs. Thus, any representatives of national environmental organizations must be from a local chapter. According to Lucent's Ted Polakowski, this is intended to ensure that the representative shares a concern for the community as a whole, not just a particular issue.
- Both the professional facilitator and Lucent's LEAG coordinator (Ilse Stoll) have been crucial to the smooth functioning of the LEAG. The facilitator keeps the meetings on track, encourages the plant to be open with information, offers advice on membership, and helps build meeting agendas—all in the interest of an open, fair process and building trust among all parties. Ilse Stoll's between-meeting contacts and reminder calls may be the reason for regular attendance of over 90%, and for generally high enthusiasm and morale.
- The top management of the plant is as committed to the LEAG as the environmental staff, showing the LEAG that the whole plant is committed to environmental responsibility. According to facilitator Eleanor Winsor, plant manager Nick Khoury actively participates by listening, interacting, and treating the members as peers. Winsor feels this is crucial: "You have to have the commitment at the top—it's extremely important, and it has to be sincere. If there's no commitment, people see right through it."

Note: The charter for Lucent's Allentown LEAG is included in Appendix 3.

Sources

Harris, Paul, "Beyond ISO 14000: Lucent Technologies Blazes Trail to Reg Relief," *Environmental Management Today,* Vol. 7 No. 1, 1996.

Lucent Technologies Microelectronics Group, Allentown, Pennsylvania, *LEAG News Update,* September 24, 1996.

Lucent Technologies Microelectronics Group website, "Local Environmental Advisory Group, Allentown, Pennsylvania," last updated 1998, http://www.Lucent.com/micro/Leagpage.html.

Local Environmental Advisory Group, Lucent Technologies, Allentown, Pennsylvania, "Charter and Nomination Form."

Polakowski, Ted D. and Laurence Mach, "ISO 14000 Certification: Lucent Technologies Microelectronics Group's Strategic Choice," *Corporate Environmental Strategy,* Vol. 4 No. 2, 1996.

Interviews

- Jerry Fields, LEAG member, July 21, 1998.
- Steve Hoover, EPA Headquarters, August 12, 1998.
- Tom Kerr, LEAG member, July 13, 1998.
- Ted Polakowski, Corporate Environmental and Safety Officer, Lucent Microelectronics Group, July 1, 1998.
- Pat Smith, LEAG member, July 14, 1998.
- Ilse Stoll, LEAG coordinator, Lucent Allentown plant, July 20, 1998.
- Debra Wenger, Environment, Health, and Safety Manager, Lucent Allentown plant, July 9, 1998.
- Eleanor Winsor, facilitator, July 22, 1998.

Rohm and Haas' Bristol Plant's Community Advisory Committee:

PROMOTING COMMUNICATION BETWEEN A COMPANY, ITS WORKERS, AND THE COMMUNITY — *Bristol, Pennsylvania*

The Community Advisory Committee (CAC) at Rohm and Haas' Bristol plant convened in 1986 after a series of events led leaders to conclude that the company needed to rethink how it was communicating with the public. Since then, the CAC has functioned as a component of the plant's Community Relations Program. This case study illustrates:

- How a company-initiated collaborative process serves as an important link between the company, workers at the plant, and the surrounding communities.
- How a company developed internal mechanisms to communicate more effectively about community health, safety, and environmental concerns.

Background

The two communities of Bristol and Croydon border Rohm and Haas' Bristol plant in eastern Pennsylvania. The chemical company's corporate office is in Philadelphia; it has 22 subsidiaries located in the United States and 27 others throughout the world. The Bristol plant is one of the company's largest facilities, with both a manufacturing and a plastics research operation. The materials manufactured at the Bristol plant are commonly used by other companies in their production of consumer goods.

The Bristol plant opened in 1917 and has a long history with the surrounding communities. While a large portion of its workforce resides in the area, the relationship between the plant and the local communities has, at times, been characterized by a high degree of conflict. Contentious labor-management relationships existed in the early 1970s. In 1983, the company and the local communities became involved in a highly publicized dispute over waste disposed from 1952 to 1975 in a Bristol site landfill. Cleanup of the landfill followed, but the company's credibility was questioned during the process.

The events at the Bristol plant, and at other Rohm and Haas facilities in the U.S., led company leaders to believe they had reached a crisis point and needed to examine company practices for managing community relations. The result of their effort was a shift within Rohm and Haas, changing the way the company works with neighboring communities and in how it involves workers in the process.

Goals

The Bristol plant established its Community Relations Program with several goals in mind. High-level managers, both at the corporate and local levels, want the plant to be seen as a positive force and valued member of the community. They believe there is a direct correlation between how the company is perceived by the community and its economic performance. The company depends on community cooperation to attract employees and to carry out many of its activities. Managers also believe that the company can serve an important role by providing information to the community.

The Bristol plant's CAC was created to help the company achieve the goals of its Community Relations Program. The CAC meets monthly, and the meeting agenda is developed in advance by CAC members and Rohm and Haas' public affairs manager. The Bristol plant's CAC is chaired by the mayor of the Bristol Borough, and includes a number of local elected officials. Participants also include representatives from local and regional groups such as the League of Women Voters, the Chamber of Commerce, and the Croydon Civic Association. Although a community representative serves on the committee, the group is intended less as a forum for citizens than for identifiable interest groups. Environmental groups are not represented on the CAC, but the public affairs manager says this is because there are no environmental organizations in the immediate area.

When the CAC was initially formed, plant

managers selected the committee members. Now the participants themselves elect new representatives when their three-year terms expire or when a member leaves the group. The Bristol Plant Manager and the Manager of Public Affairs play active administrative roles in the advisory group.

Role of the CAC

The by-laws of the CAC state that it serves as an advisory body. According to the Manager of Public Affairs, the CAC's role includes identifying key community issues and providing the plant with an opportunity to talk about its activities. Managers at the plant view the CAC process as a way to discuss issues in a positive, informal manner. Managers stress that the CAC is not part of the plant's management structure and does not rule on managerial decisions. The company wants to avoid having the community determine its priorities, but wants the community to be assured that the company is acting with their concerns and interests in mind.

The Bristol plant's CAC addresses issues raised by participants and also responds to issues presented by the company. The CAC has discussed a proposed solid waste incinerator, remediation of a landfill, and the location of a truck terminal. The truck terminal issue was brought to the CAC by the company after a community attitude survey identified it as a community concern.

Managers at the Bristol plant participate in CAC meetings, update the CAC on current affairs, and lend their administrative support to the CAC. Opinions vary on the degree to which the company considers and responds to the CAC's input. Plant managers say that generally the CAC's comments are a factor in company decision-making. When possible, plans are modified to meet CAC concerns. The company, however, has not always acknowledged when the CAC has influenced its decisions.

Outcomes

There have been several outcomes of the CAC process:

- *The company's positive experience with its Community Relations Program has led to more openness with the community and its workers.* The CAC has given managers at the Bristol Plant a better sense of community issues, including what information the surrounding communities need, how the company can provide the needed information, and what it takes for the community to feel comfortable with the company's activities. Managers at the Bristol Plant report that they are now better equipped to anticipate community concerns and, as a result, address them in a proactive manner. This approach has been part of an overall culture shift within the company.

- *The Bristol plant developed internal communication mechanisms to make it easier for the company to know and respond to community concerns.* Managers are alerted directly about any CAC issues that relate to their operations. The Plant Manager holds monthly meetings with employees to relay the concerns of the CAC and discuss other community relations issues. Departmental and staff meetings are also used to communicate information about community needs and concerns.

- *Employees of the Bristol plant serve as ambassadors to the community.* Plant employees play an important role in facilitating communications between the company and the surrounding communities. Because workers, as community members and employees, serve in a dual role, they serve as conduits for information about plant activities and community issues.

- *The CAC has made recommendations for how the company could work with the community.* For example, the CAC asked the company to inform the community about the incinerator issue. To accomplish this task, the CAC suggested that the company run ads in the local paper to explain issues over which there was public confusion. Another example is that, at the suggestion of the CAC, the company instituted a policy of contacting the township and police dispatcher whenever a situation arises that could prompt complaints, concerns, or questions from the surrounding communities.

The Bristol plant conducted surveys in 1985, 1988, and 1990 to assess long term community attitudes about the plant. Survey results are inconclusive as to whether community relations activities improved public perceptions. Measuring the impact has been difficult when a general distrust of the chemical industry exists and more public attention has been focused on environmental issues in recent years. Also, it is uncertain whether relations would be worse if the Bristol plant's community relations activities had not taken place. Nonetheless, the Bristol plant's efforts have led to better communication among the company, its workers, and the community.

Source

This case study was adapted from Caron Chess, Michael Greenberg, Michal Tamuz, and Alex Saville, "Building Trust from the Inside: Behind the Scenes of the Risk Communication Program of Rohm and Haas' Bristol Plant," Environmental Communication Research Program, Rutgers University, November, 1992.

Shell Oil Company's Community Advisory Panel:

A FRIENDLY SOUNDING BOARD — *Martinez, California*

Since 1990, Shell Oil's manufacturing facility in Martinez, California has operated a Community Advisory Panel (CAP), which was originally formed to ease the permitting process for a large facility expansion. The group continues to serve as a vehicle for Shell to address community concerns. This case addresses the following issues:

- How a CAP can serve as a sounding board for the company's plans and persuade the company to make positive changes, even if it is not inclusive enough to resolve all controversy surrounding a plant.
- How a CAP might shy away from taking formal positions or recommendations.
- How a company learned to be more forthcoming about sensitive information with its CAP.

Background

Shell thought it had a good reputation in Martinez, but certain factors showed that its good standing in the community was precarious. Foremost, Shell had a large oil spill in 1988, leading to protests by environmental activists and heightening community environmental awareness. In addition, numerous professionals were moving into Martinez, and this population had less appreciation than the existing working class population of Shell's role as a large employer.

In the early 1990s, Shell made plans for a billion-dollar upgrade and expansion to launch its Clean Fuels Project, a facility to produce reformulated fuel. Shell feared this could lead to community protests and anger. A county supervisor suggested the idea of a CAP, and at the same time, the Chemical Manufacturers' Association was promoting the idea of CAPs in general. The idea sat well with Shell managers and their desire to be leaders in the environmental arena.

Goals

The goal of the CAP was to improve company relations with the community through two-way communication. The CAP's main function is to sensitize the company to troubling or important community issues, and to serve as a sounding board for messages that Shell wants to relay to the rest of the community.

Participants

Shell selected participants to create a cross-section of the local community. The CAP has 12 members, including a scientist, two environmentalists, a businessperson, a school board member, two Shell retirees, an employee of the County, and a high school student. The group also includes the plant manager and other managers from the facility. The three neighborhoods surrounding the plant are represented. Initially, five participants were selected by the mayor and the county supervisor, then those five recruited the other seven.

Role and Procedures of the CAP

The group has an advisory role and operates informally and amicably. The group agreed to keep all meetings closed to the public, to encourage honest communication. Shell has been very open with communication, and has spent considerable meeting time presenting information to the other members. The CAP has a professional facilitator. Overall group dynamics have been congenial and trusting, and consensus has come easily.

Decisions are intended to be made by consensus, but in practice the group does not generate formal recommendations or positions. At one meeting, the members present reached a consensus decision to formally oppose an environmental group's proposal for a county-wide "community inspector" position. During a later public hearing, Shell cited this consensus, and CAP members who had not been present for the decision reacted angrily. Another member, who had been present, spoke up at the public hearing and said she changed her mind on the matter. After this uncomfortable chain of events, the CAP decided to avoid taking positions. Instead, they express a variety of views, questions and concerns, and the company responds based on all of the feedback.

The CAP has urged Shell to hold several public meetings. CAP members attend, but do not actively participate. There are no frequently used, formal mechanisms for CAP members to obtain input from the broader community.

Costs

Shell has not kept separate records of CAP costs, but direct costs include food for meetings, photocopying, and the facilitator's fees.

Issues Addressed

Central to CAP discussions are environmental issues, such as the Clean Fuels Project facility and discharge of selenium into a strait. However, the group also addresses other issues, like company philanthropy and ways of effectively communicating with the community.

Challenges

The CAP has coped with several challenging situations.

Disclosure. In one case, the company did not fully tell the CAP of a controversy surrounding its vapor recovery system, until the controversy became public. After the CAP complained, the company learned to be more forthcoming with the CAP about potentially controversial issues.

Technical information. Another challenge is the wide discrepancy among members in understanding technical information. Some members rely on their more knowledgeable colleagues to detect problems and raise concerns. Other members seek assistance from people they know outside the CAP, and Shell has a standing offer to pay for an independent technical expert.

Attendance. Maintaining participants' interest has been difficult, so the CAP voted to add new members to raise enthusiasm.

Communicating with the broader community. In the beginning, the company hoped that CAP members would actively communicate with the broader community to elicit the community's views. However, CAP members feel it is inappropriate to serve as conduits for communication in this manner, worrying that they may be seen as company spokespersons.

Failure to address some viewpoints. Several local environmental groups have continued to press the company for greater accountability. These groups are not represented in the CAP. While the CAP represents a range of segments of the community, it does not aim to build consensus across the full range of interests in the community or to draw in Shell's strongest detractors. Rather, it functions harmoniously and informally to provide community input, serve as a sounding board for the company's ideas, and improve Shell's communication and problem solving with the community.

Outcomes

The CAP can claim a number of accomplishments:

- *The group persuaded Shell to hold a public meeting at an early stage of planning for the Clean Fuels Project expansion,* and provided input on various aspects of the expansion, such as landscaping and traffic flow.
- *The CAP helped bring about an annual "report card" meeting,* where representatives of all the agencies regulating Shell gave a public presentation on Shell's environmental performance.
- *The CAP helps Shell communicate to the public more effectively*. The CAP works with Shell on brochures and presentations to make sure these communications are easy to understand and do not sound defensive.
- *The CAP has encouraged Shell to target more of its philanthropic giving to the local community,* including schools.
- *The CAP played a moderating role in a local dispute,* when a neighbor of the plant complained about asphalt being spread on the ground near the plant (an erosion-control practice). With nudging from the CAP, the company agreed to restore the area by removing the asphalt.
- *The CAP helps the company welcome and use community input rather than fearing it.* Shell managers say they think about the CAP's reaction—and, by extension, the public's reaction—before making major decisions. Shell managers also say they are now "less afraid of the public."

Success Factors

A number of factors have helped make the CAP successful.

- The commitment and participation of the facility's top management have been key.
- A professional facilitator and the ability of group members to resolve internal conflicts have also been helpful.
- Shell's willingness to pay for an independent technical expert has increased trust.
- Finally, it was beneficial to form the CAP at a time when there was not a crisis—this made building good relations easier.

However, the exclusion of environmental representatives defines the limits of the CAP's ability to resolve important issues.

Source

This case study was adapted from Nevin Cohen, Caron Chess, Frances Lynn, and George Busenberg, "Improving Dialogue: A Case Study of the Community Advisory Panel of Shell Oil Company's Martinez Manufacturing Complex." New Brunswick, NJ: Center for Environmental Communication, Rutgers University, 1995.

Sybron Chemicals' Neighborhood Involvement Council:

BUILDING A RELATIONSHIP WITH NEIGHBORS — *Birmingham, New Jersey*

The Sybron Chemicals Neighborhood Involvement Council (NIC) was established in 1989, a year after a series of incidents compelled the company to examine its environmental practices and relationship with the surrounding community. This case study illustrates:

- How a company overcame a crisis of public confidence through its community relations efforts.
- How a community engagement process was used to build a lasting relationship between a company and its neighbors.
- How a company narrowly defined who it considers to be a community stakeholder, and how this approach affected the community engagement process.

Key Events

Sybron Chemicals, a manufacturer of specialty chemicals, has 17 facilities worldwide. The company's headquarters and one of its plants are located in Birmingham, New Jersey, a semi-rural community 20 miles east of Philadelphia.

It was at the Birmingham facility in October of 1988 that Sybron accidentally released forty pounds of ethyl acrylate, an extremely strong-smelling chemical, into the air. Within two hours, citizens began calling local officials to complain about the smell. Several area residents went to the hospital for treatment of eye irritation. Because the local fire department lacked information about the situation, they evacuated 60 residents from their homes and took them to the local fire station. This incident was featured prominently on the local news the next day.

Two other incidents occurred shortly after the ethyl acrylate release. The following day, another spill occurred. Although it was much smaller, those living near the facility could smell the chemicals. Several months later, there was a flash fire at the plant in the middle of the night. Two workers were severely injured. Local residents were awakened by the sound of medical evacuation helicopters. Together, these three incidents profoundly changed the company's image in the community.

Sybron had maintained a low profile in the community, but now found itself faced with a crisis of public confidence. Township officials convened public accountability sessions, and members of the public called for the plant to be closed. A group of citizens traveled to Washington, D.C. to speak with elected officials about their health and safety concerns. New Jersey's Senator Lautenberg called for an investigation of the plant. On the state level, the New Jersey Department of Environmental Protection (NJDEP) scrutinized the company's regulatory compliance, and demanded that it conduct an environmental risk assessment.

Deciding to Collaborate

As a result of these events, the Vice President of Manufacturing convened a team of top managers to develop and implement a community relations program. The team hired an outside public relations consultant to advise them on risk communication and management issues. In working with the consultant, the team came to believe the company's survival was partially dependent on developing a positive relationship with the surrounding community. A community relations program was viewed as necessary to achieve the company's overall goal of staying in business and growing.

The goal of Sybron's Community Relations Program is to build a relationship with the community; the company wants to demonstrate that it cares about its neighbors. To this end, Sybron's Community Relations Program has several parts: the Prompt Inquiry and Notification System (PINS); the Neighborhood Involvement Council (NIC); community surveys; a quarterly community newsletter; plant tours and open houses; and training for community volunteers in odor identification and reporting. Company managers

consider all of the components integral to communicating with the community; the program as a whole is greater than the sum of its parts.

Participants

Sybron strictly defines its neighbors as the 600 residences located within 1.5 miles of the plant. Most residents of the lower-middle class neighborhood have lived there for years; some are workers at the plant. Eighty-five percent of the company's community relations efforts are targeted to this population. The company views them as the most affected by plant activities and the most likely to impact its operations.

Sybron explicitly excludes environmental and activist groups from its Community Relations Program. Termed "anti-groups" by the public relations consultant, these groups fall outside of the company's definition of a plant neighbor. Managers make a distinction between neighbors who need to know and outsiders who do not possess that right. The company believes that if it builds a close relationship with the neighborhood, the residents will act as a buffer between the company and environmental or other citizens' watchdog groups. This approach is based on the theory that activist organizations are effective when they enter communities where there is no relationship between the community and the company or when the company lacks credibility within the community.

Convening the Process

In the summer of 1989, Sybron convened the NIC by inviting all of its PINS program subscribers to join. Eleven people attended the first meeting and a core group of regular participants soon developed. Over time, the council has grown in size, partly because the first elected chairperson actively recruited members. The NIC was initially composed of senior citizens, but now more younger neighbors attend. The Council also includes the chairperson of the Local Emergency Planning Committee. While Sybron extended invitations to the neighborhood's most vocal detractors, none of them became NIC members.

The NIC is a forum for two-way communication between the company and its immediate neighbors. Two or three managers attend every meeting. The company goes to the NIC when it wants to present information and learn of neighborhood opinion. When NIC members have concerns about plant operations, they bring issues to NIC meetings or contact managers directly. Members of the NIC have developed relationships with individual plant managers as a result of the meetings, and speak with them on an informal basis.

Outcomes

Since its establishment, the NIC has addressed a range of topics and has participated in a variety of activities. It has heard presentations from representatives of the municipal waste water treatment plant, the NJDEP, and Sybron's regulatory compliance department. Members participated in a tour of Sybron's waste water treatment facility. The NIC brought up the issue of company trucks turning on private property, and has initiated projects to upgrade Sybron's ballpark and restore an historic schoolhouse on company property.

Sybron, according to its own estimates, has spent more than $1,000,000 on environmental improvements and community relations activities since 1989. Managers and academics who have studied Sybron's Community Relations Program have made the following observations:

- *Sybron's Community Relations Program has been accompanied by meaningful plant improvements.* While the company increased communication with its neighbors, it also improved its performance through such initiatives as the odor abatement and safety upgrade programs.
- *Relationship-building has been the focus of Sybron's Community Relations Program.* Communication and trust have increased between Sybron and its neighbors as a result of the company's efforts. Individual relationships have developed, and the two groups have been willing to learn from each other.
- *The NIC has been less technically oriented and less critical than originally anticipated.* Managers report that little discussion occurs over the substantive issues brought before the group. One manager expressed surprise that the Council raised so few questions about information presented on plant emissions.

Another manager suggested that NIC members lack sufficient knowledge to probe the company's operations more deeply.

- *The amount of influence the NIC has on Sybron operations is difficult to ascertain.* It appears to be issue-specific, largely dependent on whether the neighborhood is directly affected by the plant's activities. Managers consider what NIC members say, but it is unclear what happens when interests diverge.
- *It is debatable whether the NIC operates independently from Sybron.* The NIC's brief guidelines were developed by Sybron's consultant before the NIC was established. Opinions differ as to whether the NIC chair or Sybron personnel actually conduct the meetings. The Vice President of Human Resources, who serves as the secretary of the group, works with other managers to develop the meeting agenda. The chair of the NIC is not always consulted. Members do, however, raise issues that are not on the agenda and invite their own speakers to meetings. Both the company and NIC members brainstorm issues to be addressed in the coming year at the annual banquet.

Overall, Sybron managers consider the Community Relations Program a success. In 1990, Sybron received the Silver Anvil Award from the Public Relations Society of America for the best community relations program in the U.S. Additional factors contributing to the success of the program include the active involvement of senior managers, widespread support among company leaders, and sound advice from the public relations consultant.

Source

This case study was adapted from Caron Chess, Alex Saville, Michael Greenberg, and Michal Tamuz, "From Crisis to Credibility: Behind the Scenes of the Risk Communication Program of Sybron Chemicals, Inc.," Center for Environmental Communication, Rutgers University, July, 1991.

Vulcan Chemical Company's Community Involvement Group:

A SINGLE-ISSUE FORUM EXPANDS — *Wichita, Kansas*

Vulcan Chemical Company's chlor-alkali manufacturing facility in Wichita, Kansas, has had a Community Involvement Group (CIG) since 1988. The group addresses community concerns about the environmental impact of the plant on the community. This case illustrates the following issues:

- How activism can lead to a productive, cooperative dialogue between a plant and the community.
- How a group formed to address a specific, controversial issue can evolve to address environmental issues more broadly and proactively.
- How having many technically sophisticated members can be both an advantage and a disadvantage.
- How it is difficult for members of an ongoing input group to formally represent or communicate with constituencies.

Background

Several events occurred in the late 1980s that indicated Vulcan was perceived as an environmentally unfriendly neighbor. An article was published in *USA Today* putting Vulcan on a "top polluters" list, and there was activism against the plant from the neighborhood and from environmental groups. When Vulcan planned to build a hazardous waste incinerator at the site, community opposition increased, and the public meetings Vulcan held to explain the decision turned into shouting matches.

While the facility searched for a better way to respond to community opposition, a group of environmentalists discussed the possibility of a dialogue with the facility. One group recommended a facilitator, who worked with Vulcan to establish the CIG process (and later managed the meetings). Vulcan initially hesitated about creating a CIG but finally decided to take the leap. The then-assistant plant manager was a key champion of forming the CIG.

Goals

The CIG was originally formed to resolve the controversy surrounding the planned incinerator, and to improve relations with the community. Soon after the CIG formed, Vulcan dropped its plans to build the incinerator. The CIG's input may have contributed to Vulcan's decision, but the facility cited cost as the main reason for changing plans. At that point, the facility decided to continue the CIG because of other environmental issues, and because regulators looked upon it favorably. The group revised its purpose to promoting two-way communication with the community and resolving concerns about the plant's environmental impacts.

Participants

A steering committee of key people from the incinerator controversy chose CIG members with scientific backgrounds who represented the immediate neighborhood as well as the broader Wichita community. The resulting membership of about a dozen active members includes representatives from the Sierra Club, the Wichita/Sedgwick County Health Department, the Kansas Natural Resource Council, industry, local universities, close neighbors, and residents of surrounding communities. The facility is usually represented by the Plant Manager, the Environment, Health, and Safety Manager, and occasionally the Manager of Public Affairs.

Selecting people with scientific or technical backgrounds has proven helpful, but also has some disadvantages. On one hand, the group has credibility with the company, and can make sense of the voluminous technical data. On the other hand, it is unclear whether the group truly represents the community. In addition, because not all members have equivalent expertise, the less-knowledgeable members have been more inhibited in expressing their views. Finally, discussions sometimes get mired in fine technical points.

Role and Procedures of the CIG

The CIG meets monthly, spending a great deal of time listening to facility presentations on technical issues, so the group can develop well-informed views. The group is advisory only. In principle, it operates by consensus, but it rarely generates formal recommendations or positions. Instead, the emphasis is on exchanging information and opinions and achieving mutual understanding. Group interactions are generally informal and collegial.

Costs

Vulcan estimates that the direct costs of the CIG have been about $20-30,000 per year, which pays for the facilitator, meeting space, photocopying, postage, and technical studies.

Challenges

The CIG has faced several challenges.

Communicating with the broader community. Initially, the facility expected that the CIG members would be true *representatives* of their community by reporting back to their "constituencies"—their neighbors, or the people in the organizations they represented—about the discussions. However, the members have been reluctant to formally report back, either because they do not know how or do not want to appear to be public relations vehicles for the facility. Thus, while CIG members feel they have a good sense of the community's concerns about the facility, they have not actively disseminated information or discussed changes in their attitudes, other than through informal conversations with their acquaintances and families.

Attendance. The group has also faced low participation, particularly in recent years—only about half of the members come to a typical meeting. Perhaps the group has satisfactorily addressed the most pressing environmental issues, so there is now less motivation to participate.

Issues Addressed

The group has dealt with several environmental issues. They have discussed major issues, like Vulcan's use of deep wells for hazardous waste disposal, and how to make Vulcan's sodium chlorite facility safer. Smaller issues have included health risk assessment of a landfill and communication of Toxics Release Inventory data.

The facility's unwillingness to share sensitive business information has not been an appreciable problem, because CIG members generally have not requested this information. The group has been more interested in operational and environmental information, which Vulcan is willing to share.

Outcomes

The Community Involvement Group has accomplished tangible and intangible results:

- *The group helped persuade the facility to make significant environmental changes.* On the deep well issue, Vulcan agreed to pay for an independent technical consultant, selected by the CIG, to critically examine Vulcan's original safety assessment of the well system. Ultimately, the CIG persuaded Vulcan to phase out the wells and build a plant that converts the waste into re-sellable material. The CIG also helped influence Vulcan to install an extra scrubber at the sodium chlorite facility.
- *The CIG has improved Vulcan's community involvement.* The CIG has helped the facility communicate better with the public and solicit community participation earlier in the planning of new facilities. This has helped propel Vulcan into a position of environmental leadership. For example, Vulcan received an award for its pollution reduction efforts from the national group Renew America.
- *There seems to be less community suspicion of the plant*. Anecdotal evidence suggests the community has greater confidence in the facility's environmental management. For example, environmentalists no longer protest at the facility.
- *The CIG helps Vulcan reach sound decisions.* A strategy for environmental plans was developed with the CIG's input.
- *The CIG serves as a good sounding board for the facility.* Vulcan uses the CIG to better understand how the community will react to the facility's actions.

Success Factors

The CIG's success has been possible because of support from top management, openness in sharing data, use of a professional facilitator, and Vulcan's willingness to fund independent technical consultants.

Source

This case study was adapted from Nevin Cohen, Caron Chess, Frances Lynn, and George Busenberg, "Fostering Environmental Progress: A Case Study of Vulcan Chemical's Community Involvement Group." New Brunswick, NJ: Center for Environmental Communication, Rutgers University, 1995.

The Lead Steering Committee:

A COMMUNITY TAKES ON HEAVY METAL — *Bartlesville, Oklahoma*

Heavy metal contamination from the National Zinc smelter site has been a major concern for the small town of Bartlesville, Oklahoma, for decades. In 1991, the Oklahoma State Department of Health (OSDH) convened the Lead Steering Committee as a component of its three-part community involvement strategy to facilitate area remediation efforts. This case study illustrates the following issues:

- How a collaborative process can address community controversy over contamination cleanup.
- How a collaborative process can help build relationships within a community and with state and federal regulatory agencies.
- How a collaborative process can serve as a model for further collaborations.

Background

The National Zinc smelter site spans portions of Oklahoma's Washington and Osage Counties. Smelting operations have been conducted at the site since 1907 and were the source of widespread off-site contamination until 1976. When the original smelting process was updated in 1976, particulate emissions decreased by 99.7%. Lead, cadmium, and arsenic were the main contaminants produced by the original smelting method.

The west side of Bartlesville, closest to the smelter site, has experienced most of the heavy metal contamination and its effects. This portion of the city is home to several thousand residences, retail businesses and office buildings, light industry and agricultural operations, and several schools, parks, and playgrounds.

The community's perception of the west side is that it is populated by a larger percentage of residents belonging to ethnic and racial minorities. In fact, 1990 census figures indicate that minority representation is equally distributed throughout the city. A similar perception exists in relation to community housing. While the majority of housing on both sides of the river is middle income, the perception exists that residents with the highest income levels live on the east side.

Key Events

Perceptions over whether minority and low-income neighborhoods were disproportionately experiencing the contamination may have helped fuel the conflict that brewed within the community over cleanup of the contaminated area. While the smelter had long existed as a source of community interest, citizen activism grew during the early 1990s. Citizens formed a community task force in 1990 to investigate complaints of odors coming from the smelter. Community concern was elevated in 1991 by a series of articles about the pollution and health risks in the *Tulsa Tribune*.

Increased citizen action led to more state and federal involvement. Citizens complained to the OSDH about health problems they believed were related to smelter activities. The Oklahoma Toxics Campaign organized a local environmental activist group, Citizens Against Toxics, which contacted U.S. Senator David Boren. In response, he asked two federal agencies to investigate—the Environmental Protection Agency and the Agency for Toxic Substances and Disease Registry (ATSDR).

In 1991, remediation activities began under the Superfund removal program. The first step of the short-term cleanup process was to determine the type and area of contamination. By this time, the community was deeply divided over several issues, including 1) how much the contamination threatened human health, and 2) the potential impact the cleanup would have on the economy. Additionally, there were now four agencies involved in the process—OSDH, EPA, ATSDR, and the Oklahoma Department of Environmental Quality (ODEQ). Community debate ensued over what should be the extent of state and federal government involvement.

Deciding to Collaborate

In the fall of 1991, the ODEQ and the OSDH decided the conflict within the community had reached a point where it had to be addressed. Action needed to be taken to mitigate the public controversy over the contamination and the cleanup process. As a result, the ODEQ and the OSDH developed a public participation process to serve as part of the short-term cleanup effort. The Lead Steering Committee was a major component of this effort. The two other aspects included holding public meetings to release information about the site, and establishing an office to serve as the single point of contact for the public, press, and other agencies.

Convening the Process

The members of the Lead Steering Committee were appointed by the OSDH. A broad set of community interests were represented, including the city and county government, the Chamber of Commerce, area industry, public and private schools, community environmental groups, community service organizations, news media, and citizens-at-large. A local pediatrician was elected by the committee to serve as chair. While the initial group consisted of 24 participants, only 10 remained active throughout the process.

The Lead Steering Committee was established with three objectives:

- To serve as the local forum for managing public information and community involvement;
- To provide a mechanism for input to and from all of the involved groups; and
- To assist the OSDH in coordinating the project.

Role of the Lead Steering Committee

Overall, the committee's role was to serve as a vehicle for two-way communication between stakeholders and provide advice on the cleanup. The committee's duties included providing input, participating in discussions about technical issues, and making recommendations about project goals. Having clear goals and objectives was a key factor in ensuring the committee's success. Citizen members were concerned about indemnification from tort liability, so they limited their activities to fall within the parameters of the group's objectives.

In 1992, cleanup began; areas of high access to children, including schools, day care centers, and playgrounds received priority. In 1993, cleanup was extended to residences with high levels of soil contamination and areas where housing residents had elevated blood lead levels. In 1994, removal work began by the Potentially Responsible Parties (PRPs) at the site, as directed by an EPA Unilateral Administration Order. Shortly thereafter, the ODEQ prepared a Record of Decision. In June of 1995, the ODEQ and the PRPs signed an agreement directing remedial action to begin at the site.

Outcomes

There were several outcomes of the Lead Steering Committee process:

- *The Lead Steering Committee successfully functioned as a mechanism for two-way communication and the exchange of information among stakeholders.* As the cleanup process went through its phases, active committee members provided continuity to the project. They became highly knowledgeable about the site, contaminants, potential health effects, and the Superfund process. Public controversy was reduced as a result of their efforts.
- *Citizens built relationships with each other.* Many committee members, although all long-term residents, did not know each other before serving on the Lead Steering Committee. In fact, many of them viewed one another as "the opposition." By working together over time they were able to acknowledge personal values and goals and transformed them into community goals.
- *Members of regulatory agencies built relationships in the community through their work with the committee*. As committee members became better acquainted with OSDH and ODEQ personnel, trust increased. Community members no longer viewed regulatory staff as "outsiders." Ultimately, this helped facilitate the cleanup because decisions were more likely to be endorsed by the entire community.

- *The Lead Steering Committee served as a model for other community participation processes.* In 1994, three organizations, traditionally at odds with each other, formed a coalition to obtain and administer a Technical Assistance Grant offered by the PRPs at the site. The coalition consisted of representatives from an environmental activist organization, a group opposed to listing the site on the National Priorities List, and a group dedicated to improving business opportunities in the contaminated area. The Lead Steering Committee and the city council were also represented as ad hoc members.

The Lead Steering Committee was primarily formed to address the conflict in Bartlesville over the contamination and the cleanup effort. The public participation process was instrumental in reducing controversy over substantive matters, bringing together a divided community, building relationships among committee and regulatory agency members, and providing a model for future collaborative efforts.

Source

This case study was adapted from Montressa Jo Elder, "The Process of Community Involvement—A Case Study: The Bartlesville, Oklahoma, Lead Project," *Toxicology and Industrial Health*, Volume 13, Nos. 2/3, 395-400.

Intel's Project XL Stakeholder Group:

A DIFFICULT CONSENSUS ON DIFFICULT ISSUES — *Chandler, Arizona*

From January to November 1996, Intel's Fab 12 facility, which manufactures semiconductors in Chandler, Arizona, negotiated an agreement with multiple stakeholders (regulators at all levels and community members) to participate in EPA's Project XL ("Excellence and Leadership"). Project XL is an alternative-compliance program which offers regulatory flexibility in exchange for 1) a plan for achieving "superior environmental performance," i.e., better results than full compliance with existing regulations would produce, and 2) stakeholder involvement in developing and implementing the company's participation plan. This case addresses the following issues:

- How a stakeholder group struggled and reached consensus on complex environmental and regulatory issues.
- How national interests became involved in a process that was conceived as local.
- How all participants—especially community members participating as individuals without organizational support, can be subject to intense social pressure from stakeholders and the community to reach consensus.
- How a consensus-based stakeholder negotiation process both succeeded and stumbled, particularly when consensus appeared to be out of reach.

Background

Intel managers were primarily motivated to join Project XL because of the delays caused by frequent permit revisions in a fast-changing business,

and because the four levels of regulation—municipal, county, state, and federal—overlapped and were inefficient. In addition, these permits and regulations seemed ineffective, because they did not appear to be achieving environmental results proportional to the resources involved in their compliance. Project XL promised to streamline the environmental compliance process, and Intel, as well as the EPA, wanted to showcase this new alternative-compliance model and promote more efficient and effective regulatory processes.

Project XL requires participating companies to reach agreement with stakeholders on a plan to achieve superior environmental performance. Intel's Arizona site already had a Community Advisory Panel (CAP) for over four years, and prided itself on a history of good relations with the community. The XL process included 1) a stakeholder negotiating group, 2) monthly public meetings which Intel publicized widely, 3) updates to workers and opportunities for them to comment, 4) some briefings of national and local environmental groups by Intel, and 5) posting of information on Intel's website with an invitation to comment.

Participants

The 15-member stakeholder group included several members of the local community, selected from the environmental subcommittee of the CAP; regulators from all four levels of government; an Indian tribal representative; and Intel representatives. While environmental organizations were not represented, one of the members was a community activist and another an environmental consultant. The full stakeholder group, called the Executive Committee, had four subgroups: 1) the Air/Planning Group, 2) the Regulatory Efficiency Group, 3) the Recycling Group, and 4) the Legal Working Group.

Procedures and Issues Addressed

The stakeholder group worked to achieve consensus of all participants, including the community members. This stands in contrast to other Project XL stakeholder groups, where the community input is advisory, and only the facility and regulators have decision-making power. The Executive Committee met regularly, aided by a professional facilitator. The subgroups met in between the plenary meetings.

The Executive Committee meetings were held at the Fab 12 facility. At first, there was no provision for public attendance at these meetings. Later, when people asked to attend, protocols were established for meeting observers. Since all visitors to the facility had to get pre-approval and security clearances, these requirements were among the protocols. Representatives of national and regional environmental groups followed these protocols and observed some meetings.

According to the National Academy of Public Administration, "[The] endeavor was careful, complete—and stressful. The group began by establishing ground rules and allowing sufficient time for lay stakeholders to learn about air pollution and other technical issues, for the government participants to negotiate jurisdictional issues, and for Intel to learn what the community cared about most deeply—water conservation and a protective buffer zone between the fabrication buildings and adjacent residential areas" (from *Resolving the Paradox of Environmental Protection: An Agenda for Congress, EPA, and the States,* p. 90).

The discussion focused largely on air emissions from the facility, but other environmental issues were also discussed. The group worked late nights on many difficult issues, and in the end, all stakeholders signed on to the Final Project Agreement (FPA).

Agreement

The FPA was complex, but included a few key elements:

- The centerpiece was a facility-wide emissions cap, in place of individual limits for different air emissions sources. This cap was under an air permit which could apply to future facilities built at the site, without the need to seek permit modifications—a significant regulatory concession. The provisions of that permit were binding.
- Intel made other commitments, some embedded in the enforceable air permit, and others not legally binding. These included 1) increasing water and waste conservation and

recycling, 2) increasing property line setbacks to widen the buffer zone around the facility, 3) reducing vehicle miles traveled by employees, and 4) donating computer equipment and training.

- Intel agreed to publish environmental reports containing information usually provided to regulators plus other information, but consolidated into a single document, in an easy-to-read format. The purpose of the reports is to enable the public to hold Intel to its goals and commitments, including those that are not legally binding.

An initial goal of establishing a single point of contact for all regulating agencies from local to federal soon turned out to be impossible for several legal and political reasons.

Costs

The process took much longer and was much more intense (in terms of hours per week) than expected. It lasted 11 months, whereas it was originally expected to last only six. For this reason, the costs were higher than expected—in terms of money, time, and stress. Participants found the process extremely draining, and most felt pressure at some point to overcome their objections and move towards consensus. In financial terms, Intel managers figure the company may make up the costs over the course of the five-year air permit through the reduced costs of permit revisions. However, they decided early on that the project was worth the price to demonstrate this new environmental management model.

Challenges

Numerous other challenges made the process trying. Intel originally understood the term "stakeholders" to mean *local* stakeholders. However, part of EPA's and Intel's intent was for this Project XL negotiation to serve as a model for others throughout the country. Therefore, national and regional environmental groups followed the process closely.

Some of these national groups felt there was a significant imbalance of power in the process, contending that the community participants were outgunned by Intel and governmental participants, particularly in terms of staffing, knowledge, and resources. They argued that measures such as providing funds for community participants to hire a technical expert would have helped even the playing field. (EPA later decided to provide funds for independent technical assistance to XL stakeholder groups.) These groups saw the FPA as unbalanced as a result, providing too much leniency for Intel and not truly achieving superior environmental performance. On the day the FPA was signed, the environmental groups, along with representatives of several community and labor groups, published an open letter stating their concerns and opposing the FPA. The EPA responded with a letter addressing the concerns raised by these organizations.

One source of conflict was defining and objectively measuring "superior environmental performance." The national groups had a more stringent interpretation than the stakeholder group. Did the phrase mean superior to the facility's *actual* past performance, or to what was *allowed* at a maximum under current regulations and permits? (This was further complicated by the fact that Fab 12 was a new facility that began operation while the negotiations were taking place.) Also, comparing environmental performance with the FPA and without it was like comparing apples and oranges, because different chemicals and different media are involved. The disagreement about assessing superior environmental performance and the process for achieving it is evident in the contrast between the stakeholder group members' consensus on the FPA and the national groups' letter of opposition.

The role of stakeholders was another source of disagreement. Some believe stakeholder participation in the XL process in effect replaces government oversight, so the composition, capacity and procedures of stakeholder groups are critically important. Others believe stakeholder involvement is not a substitute for government oversight, so stakeholder groups should only be advisory and not subject to extensive procedural rules.

During the process, some of the national groups took up their concerns directly with EPA headquarters, surfacing a procedural ambiguity in the stakeholder negotiations. The stakeholders assumed that the EPA regional representative in the

group had authority to sign on behalf of the EPA as a whole. Instead, in an attempt to address the concerns of the national groups, EPA headquarters claimed authority to review the FPA. In the end, they did not exercise this authority, but many stakeholders were frustrated by the lack of clear accountability.

Throughout the process, one participant—a community member participating only as an individual—was particularly hesitant about signing the FPA. This surfaced a procedural ambiguity over the definition of "consensus." Some understood it to mean that each *individual participant* had to approve the agreement; others understood it to mean that each *stakeholder group* (government, industry, and community members) had to approve it. The latter definition would have allowed the agreement to go forward without this individual's signature. Feeling pressure from all sides, he did ultimately sign the FPA reluctantly.

Benefits

In spite of these difficulties, the negotiation and public involvement process seems to have largely achieved its purpose—greater regulatory flexibility, and environmental results that some argue are superior to what would have happened otherwise. In addition, since it was an early, experimental XL effort, all parties and the public probably learned from the process.

There were also some unforeseen benefits. Some participants say the process helped regulators understand how their various programs complemented or conflicted with each other and may have catalyzed greater coordination. Also, a community member said that the public participation component helped educate the public, yielding other long-term benefits. The participants' stamina and perseverance, and the willingness to risk something innovative, are to credit for these successes.

Summary of Outcomes

In summary, the Fab 12 Project XL stakeholder group achieved the following:

- A consensus FPA providing for superior environmental performance (in the participants' view), with streamlined regulatory procedures for the company.
- An early test of the innovative regulatory model represented by Project XL.
- Improved public communication and public accountability regarding the plant's environmental performance.

Sources

Intel website, "Intel/EPA Project XL," last updated 1998. http://www.intel.com/intel/other/ehs/projectxl/index.htm.

Mohin, Timothy J., "Alternative Compliance Model: A Bridge to the Future of Environmental Management," in *Semiconductor Fabtech: New Technological Developments in the Semiconductor Industry,* 6th Edition. London, UK: ICG Publishing, 1997. (*Note: Timothy Mohin is Manager of Corporate and Environment Affairs for the Intel Corporation.)*

National Academy of Public Administration, "Excellence, Leadership, and the Intel Corporation: A Study of EPA's Project XL" in *Resolving the Paradox of Environmental Protection: An Agenda for Congress, EPA, and the States.* Washington, DC: National Academy of Public Administration, 1997.

Orenstein, Suzanne Goulet, "Intel XL Stakeholder Negotiations," in *Evaluation of Project XL Stakeholder Processes: Final Report*. Washington, DC: RESOLVE (for U.S. Environmental Protection Agency), 1998. (*Note: RESOLVE is an organization specializing in environmental dispute resolution.)*

Smith, Ted and Leslie Byster, "The Challenges of Environmental De-Regulation in the Era of Globalization," in *Semiconductor Fabtech: New Technological Developments in the Semiconductor Industry,* 7th Edition. London, UK: ICG Publishing, 1997. (*Note:* Ted Smith and Leslie Byster are the Executive Director and the Program Director, respectively, of the Silicon Valley Toxics Coalition.)

U.S. Environmental Protection Agency, Project XL website, "XL at a glance," last updated 1998. http://199.223.29.233/ProjectXL/xl_home.nsf/all/xl_glance.

U.S. Environmental Protection Agency, Project XL website, "Intel drafts environmental operations plan and obtains flexible air permit," last updated 1998. http://199.223.29.233/ProjectXL/xl_home.nsf/all/intel.html.

New Bedford Harbor Superfund Community Forum:

PROGRESS WITHOUT COMPLETE CONSENSUS — *New Bedford Harbor, Massachusetts*

From December 1993 until June 1998, a multiparty mediation was held by the Massachusetts Office of Dispute Resolution (MODR) to determine how to clean up the New Bedford Harbor Superfund Site. This case study concentrates on the period up to November 1994, when the group, called the Forum, reached its first of three recommendations. The case illustrates the following:

- How even bitter rivals can, with third-party assistance, collaborate, negotiate, and reach consensus.
- How allowing participants considerable control over procedural matters can help build cooperation in highly contentious settings.
- How televising meetings can enhance public trust of the process, but may still be inadequate for enabling the public to follow the substance of long-term negotiations.
- How environmental justice activists helped reignite a previously settled matter—and how they played a constructive role in the ultimate resolution of the issue.

Background

Manufacturers of electrical capacitors released polychlorinated biphenyls (PCBs) into the New Bedford Harbor for decades, earning it a place on the Superfund National Priorities List in 1982. Previously during 1987–90, there was a stakeholder negotiation on cleaning up the site. This initial group, which worked closely with the EPA and the Massachusetts Department of Environmental Protection (DEP), included citizens, businesses, local environmentalists, and city council members. Members of the local Portuguese and Cape Verdean communities were included. The group voted six to three to dredge the harbor and destroy the PCBs through incineration. The EPA adopted this approach in a 1990 Record of Decision (ROD). Of the three parties who voted against the outcome, two were businesses liable for paying shares of the cleanup cost, and may have favored a less-expensive option. Overall, the stakeholders favored incineration, believing it was the safest available method for destroying the PCBs.

Triggering Events

In 1991, as the EPA prepared to implement the ROD, a ground swell of opposition to incineration arose in spite of the inclusive decision-making process. Two trends were shaping at that time which may explain the reaction: first, there was growing opposition nationwide to using incineration (which was increasingly being employed as an alternative to landfills), and second, the environmental justice movement was gaining strength. The opposition was spurred on by 1) journal and newspaper articles raising fear about incineration and citing the case as an example of environmental racism, and 2) national organizations initiat-

ing activities in the New Bedford area. The first stakeholder group was criticized as being a "mouthpiece" for the EPA and industry and as lacking minority representation. Senator Edward Kennedy and Congressman Barney Frank threw their support behind the protesters.

The controversy reached a climax in 1993. Protesters threatened to block the path of construction equipment, and the New Bedford City Council passed an ordinance that, in effect, made construction impossible. The EPA filed suit against the town in September 1993, and a court order rendered the ordinance unenforceable. The EPA threatened to fine the city $25,000 for each day it delayed the dredging, and one community group filed its own Intent to Sue with the EPA.

Deciding to Collaborate and Convening the Process

None of the parties welcomed a protracted fight, so they found the idea of mediation an attractive option. The Massachusetts DEP had experience with alternative dispute resolution, and the Massachusetts congressional delegation supported the use of mediation as well.

MODR, led by Jane Wells, conducted a lengthy process of interviewing stakeholders, persuading groups to participate, explaining MODR's role, and negotiating who should be at the table. The Forum came to include representatives of three citizens groups (from the three affected towns), local government officials, state elected officials, DEP, EPA, and the National Oceanic and Atmospheric Agency.

MODR was responsible for convening participants, arranging meeting logistics, and overseeing the whole process. Because of citizens' concerns that MODR—a state-funded agency—might impose a particular mediator, MODR arranged for the stakeholders themselves to screen and select an independent mediator. The mediator selected was J. Michael Keating of Rhode Island.

Procedures

The mediator's first task was to meet separately with each of the parties. The first joint meeting was then held to establish ground rules and procedures. One early decision was to make the process truly public by videotaping the meetings and broadcasting them on a local cable channel. At that meeting, the EPA agreed to delay the start of dredging, and the community group that had filed the Notice of Intent to Sue agreed to put the suit on hold.

The next stage was a four-month evaluation process. Over a dozen vendors of alternative technologies made presentations, and Forum members questioned them extensively.

As the meetings continued, the mediator and MODR drafted a proposed "Framework of Resolution" which helped focus the remaining negotiations. The document listed emerging agreements on principles that would guide decisions, and identified points of disagreement.

Negotiation and Agreement

During this four-month evaluation, the group agreed to search for a solution that would avoid on-site incineration. Two innovative technologies emerged as preferred alternatives, and the Forum recommended that site-specific tests of both technologies be implemented.

However, a serious disagreement occurred over what to do if neither of these methods passed the test. The agencies wanted a reliable, safe back-up that was already tried and true. One of the back-up options was off-site incineration, which the citizens opposed. After extensive discussion, the Forum agreed to defer the question of back-up technologies until the tests were finished. They also agreed to try to reach consensus on primary and back-up technologies before the EPA amended the ROD. The agreement was completed in November 1994.

Challenges

The Forum faced two significant challenges:

Technical information. During the evaluation stage, citizens group representatives had difficulty comprehending the vendors' presentations, which used highly technical terms. The citizen members solved this problem by using the EPA's Technical Assistance Grant to hire a technical consultant through an environmental justice organization. With the consultant's help, the citizens became more active in scrutinizing the vendors.

Communication with the public. Another challenge was communicating back to the local public. The televised meetings were too lengthy for most people to follow, and there were no concise updates or formal mechanisms for the Forum to inform the public and gain their support.

Later Stages

The mediation resumed and reached other interim agreements, culminating in a final recommendation in June 1998. By that point, no approved method of destruction other than incineration had emerged, but one alternative (solvated electron technology) was nearing approval. Members leaned towards a combination of a new on-site separation method and off-site destruction, with hopes that the new destruction method would be approved in time—satisfying the goal of eliminating the contaminants without incineration.

However, at a public meeting held just before making a final recommendation, attendees opposed on-site separation because of its possible side effects, which included toxic emissions, noise, and dust. They favored the next-best option, which was to dewater the waste and send it to a landfill. In response to this input, the final June 1998 recommendation expressed a majority preference for the landfilling option, though a minority still urged the separation and destruction option, with continuing efforts to use a non-incineration method of destruction.

Outcomes

Forum members were unanimously disappointed by the lack of approved alternatives to either landfilling or incineration, and it is unclear to what extent they felt the effort was worth their time. Nevertheless, the Forum can claim a number of accomplishments:

- Stakeholders reached consensus on the principle that a method of destroying the PCBs that avoided either landfilling or incineration would be ideal.
- The Forum provided the best opportunity for finding that ideal outcome.
- Because of the thorough research on alternative technologies, most of those involved felt the resulting majority recommendation pointed to the best cleanup option available at the time.
- The Forum's work may have advanced the goal of finding non-incineration technologies for other contaminated sites in the future.
- The Forum succeeded in eliciting the cooperation of previously bitter foes.

Success Factors

Several factors contributed to the Forum's achievements:

- The fairness and credibility of the process was enhanced by the use of a skilled, independent mediator, oversight by MODR, and stakeholder control of procedural matters—including selection of participants, selection of the mediator, and establishment of the agenda.
- The televised meetings and ongoing political attention prevented perceptions of back-room bargaining.
- Independent technical advice through an environmental justice organization helped level the playing field in terms of technical understanding, and helped prevent charges of environmental racism.

Sources

Finney, Carolyn, and Ruth Polk, "Developing Stakeholder Understanding, Technical Capability, and Responsibility: The New Bedford Harbor Superfund Forum." Unpublished draft, 1995. (Note: Carolyn Finney is Manager of Government Affairs for the Environmental Industries Association and researched this case on behalf of the Massachusetts Office of Dispute Resolution. Ruth Polk is a graduate student at the School

of Natural Resources and Environment at the University of Michigan and worked temporarily on the staff of the Massachusetts Office of Dispute Resolution.)

"New Bedford Harbor Superfund Site Community Forum Agreement," 1994.
"New Bedford Harbor Superfund Site Community Forum Agreement," 1996.
"New Bedford Harbor Superfund Site Community Forum Recommendation," 1998 (pending signatures).

The Silicon Valley Pollution Prevention Center:

A CONSTRUCTIVE ENGAGEMENT CENTER — *San Jose, California*

The non-profit Silicon Valley Pollution Prevention Center (SVP2 Center) was established as a result of the 1993 settlement agreement between the Coalition for Effluent Action Now in South Bay (CLEAN South Bay) and the City of San Jose, California. This case study illustrates the following issues:

- How a collaborative process evolved out of an adversarial approach to pollution prevention.
- How a non-profit organization can serve as an ongoing collaborative forum for members of government, industry, and non-governmental organizations to address pollution prevention issues.
- How a collaborative forum can serve individual interests while participants pursue a common goal.

Deciding to Collaborate

In January 1983, CLEAN South Bay, a coalition of seven environmental organizations, filed suit in the U.S. District Court for the Northern District of California alleging regional permit violations under the Federal Clean Water Act. At issue was the discharge of wastewater containing excessive concentrations of copper, nickel, silver, and chromium from the San Jose/Santa Clara Water Pollution Control Plant into the South San Francisco Bay. The complaint named the City of San Jose, the City of Santa Clara, the mayors of the two cities, and the Director of the San Jose/Santa Clara Water Pollution Control Plant as defendants.

As the administering agency and operator of the San Jose/Santa Clara Water Pollution Control Plant, the City of San Jose entered into settlement negotiations over the lawsuit with CLEAN South Bay. During the process, coalition members promoted pollution prevention as a reasonable alternative to providing more advanced treatment at the plant. An agreement was reached between the two parties to establish a center for pollution prevention. The agreement excused the lawsuit and released the city from further enforcement actions concerning copper, nickel, and silver by CLEAN for a period of five years.

Convening the Process

In March 1994, the San Jose City Council approved the establishment of a convening board and working council to carry out the start-up functions of the SVP2 Center. The convening board recruited a permanent board, developed incorporation documents, and defined roles and functions of the organization. Members of the convening board consisted of nine representatives, three each from local government, industry, and environmental groups. Group decision-making involved a vot-

ing process that required the support of seven out of nine members for approval.

At the November 30, 1994 meeting, the convening board nominated permanent board members and unanimously recommended that they be approved by the San Jose City Council. The Center was formally incorporated with the State of California on December 2, 1994.

A nine-member board of directors governs the SVP2 Center; three members each from government, industry, and environmental organizations. The City of San Jose appoints the board members that represent government and industry. CLEAN South Bay selects its own environmental representatives. Board members serve three-year terms. An Executive Director works with the board to oversee daily operations of the Center. The board votes through a two-thirds (six out of nine) majority rule, with the provision that every majority must have the support of at least one member from each group.

The original settlement agreement envisioned collaboration through the Center only as a short-term endeavor, but the Center has since taken on a more permanent role. The original framework for the Center was for each represented group to select one major area of focused work, consistent with the Center's purpose, to be performed by the Center during its first three years of operation. Once the work was complete, the Center would dissolve. However, in lieu of this approach, the board early on decided to hire an Executive Director, initiate a strategic planning process, and use the seed money to establish a sustainable pollution prevention center to serve the community on a more permanent basis.

Financial support for the Center is provided by San Jose-Santa Clara Water Pollution Control Plant funds. The City of San Jose, as fund administrators, agreed to provide $375,000 to the Center for initial start-up and operations costs for three years. The Center is additionally funded through grants and contributions. The city has also established a $2 million Pollution Prevention Capital Fund to provide industrial dischargers with financial assistance to invest in pollution prevention measures. The Executive Director of the Center hopes the city will decide the collaborative approach is useful, recognize there are clear economic incentives to pollution prevention, and re-designate the capital fund as a trust fund for the Center to sustain its activities.

Collaboration Goals

The purpose of the SVP2 Center, as described in the settlement decree, is "To coordinate, develop, and transfer information on pollution prevention measures that will reduce toxic pollution in the San Francisco Bay, south of Dumbarton Bridge." The Center describes its function as, "educating the public, industry, business, and government in Silicon Valley about the causes and sources of pollution, and identifying and promoting methods to prevent pollution."

Consistent with its purpose, the Center's goals are the following: 1) to foster institutional understanding and cooperation; 2) to emphasize pollution prevention from all sources; 3) to promote research, development and use of pollution prevention measures; and 4) to provide an information and referral service.

The Center's work priorities are established annually by the board of directors. The program is then developed by the board and its Program Options Committee. In 1997, strategic issues were identified as transportation-related impacts to water quality; industrial water efficiency and reuse; dioxin prevention; and convening the annual State of the South Bay Symposium. To date, the SVP2 Center has engaged in a variety of projects, including community education; business outreach; working with academic institutions to encourage pollution prevention education in science, engineering, and business curricula; an on-line resource center; and sponsorship of the State of the South Bay Symposium. The purpose of the symposium is to bring local decision makers together to assess the progress of the various pollution prevention programs designed to protect the South Bay and its streams and watersheds.

Challenges

A big challenge all participants face is how to go back and forth between their Center work and their own constituencies. Industry and government, in particular, must recognize their compli-

cated operating structures in comparison to the environmental representatives who are not as limited by bureaucratic structures and who, for this reason, bring vision to the meetings. According to the Executive Director, environmental groups may have more flexibility in their operating structures, but may have less resources to analyze and respond to proposals by government or industry on waste management issues.

Outcomes

In spite of the challenges individual members face in participating, the SVP2 Center provides a creative and innovative model for collaboration among stakeholder groups. The most notable features of the process include:

- *Each group represented on the board of directors has compelling reasons to participate in the work of the SVP2 Center.* The Center provides a collaborative forum for all three groups to forward their own interests. Industry representatives recognize the economic benefits of pollution prevention. Representatives of environmental groups work to integrate workplace health, safety, and environmental protections into pollution prevention processes. Representatives of local government, including the Water District, realize that development and waste management issues are connected. The Center provides them with the opportunity to address these often challenging issues with concerned stakeholders.
- *The organizational structure of the SVP2 Center has continued to evolve, reinforcing the collaborative nature of the effort.* The board of directors is currently reexamining the organization's bylaws. In particular, the board is looking at its decision-making structure. Trust among participants has developed to the extent that the two-thirds voting structure can now be relaxed. This step can be interpreted as a sign of the board's willingness to further embrace a collaborative, rather than adversarial, approach. It is also a testament to developing relationships between participants.
- *The SVP2 Center has gone beyond the original intent of the effort, serving as an ongoing collaborative forum.* The Settlement Agreement did not anticipate that the Center could continue to play a vital role for collaboration among the three sectors and be a catalyst for continuous improvement in pollution prevention. The original plan was for the effort to cease once its initial work in the three areas of focused activity was complete. Almost four years after its incorporation, however, the Executive Director and several board members believe the Center is playing an important role by serving as a neutral forum for reaching agreement on pollution prevention alternatives. The SVP2 Center's biggest challenge now is how to sustain the ongoing effort.

Sources

Bylaws of the Silicon Valley Pollution Prevention Center, Inc.

Evaluation Summary, The Silicon Valley Pollution Prevention Center, State of the South Bay Symposium II, March 27, 1998.

Interview with Patrick T. Ferraro, Executive Director, The Silicon Valley Pollution Prevention Center, June 9, 1998.

Pollution Prevention Center, Status Report (including Workplan), as submitted to the Regional Water Quality Control Board, June 30, 1994.

San Jose City Council Memos, including Proposed Scope of Work to Establish the Pollution Prevention Center: December 13, 1993; December 22, 1993; and March 9, 1994.

Settlement Agreement Between Citizens for a Better Environment, Peninsula Conservation Center Foundation, Bay Institute of San Francisco, San Francisco Bay Keeper, Save San Francisco Bay Association, Santa Clara Valley Audubon Society, Silicon Valley Toxics Coalition and the City of San Jose, June 1993.

Silicon Valley Pollution Prevention Center, 1997 Annual Report.

Romic Environmental Technologies Corporation:

COLLABORATION AND CONFRONTATION IN EAST PALO ALTO — *East Palo Alto, California*

Romic Environmental Technologies Corporation has a strong presence in culturally diverse East Palo Alto because, unlike most of Silicon Valley, there is no industrial buffer zone between the company and its bordering neighborhoods. Largely for this reason, members of the community have paid close attention to the company's activities over the years. Their efforts have resulted in two different processes for collaboration between the company, community activist groups, individual citizens, workers, and government regulators. This case study illustrates the following issues:

- How different Constructive Engagement processes can occur concurrently to address community and worker health, safety, and environmental concerns.
- How the potential benefits of a Constructive Engagement process may be very different depending on one's perspective and goals.
- How collaboration between community organizations and government regulators can help both groups achieve their health, safety, and environmental goals.
- How the role of a company-initiated Citizen Advisory Panel evolved from addressing issues of immediate community concern to broader, long-term issues.
- The choices community members face in deciding whether to participate in a company-initiated Citizen Advisory Panel and what considerations guide their decisions.

Background

Residents of culturally diverse East Palo Alto have long been concerned about the potential for industrial accidents, the long-term effects of contamination, and worker exposure to toxic substances. In an effort to promote community and worker protection, environmental justice groups and activist organizations in Silicon Valley have closely monitored the activities of Romic, a company who specializes in hazardous waste recycling and disposal. They have targeted facility operations, as well as government agencies, responsible for enforcing health, safety, and environmental regulations.

In the mid-1990s, community activism regarding Romic's operations in East Palo Alto focused on two major issues. One of the most contentious matters among citizen groups, regulatory agencies, the City of East Palo Alto, and the company was the historic lack of an Environmental Impact Report (EIR). Romic applied to the California Environmental Protection Agency (CalEPA) Deparment of Toxic Substances Control to renew its operating permits. The agency reviewed the application and, at that point, determined a negative declaration—no EIR was needed. Citizen groups felt that because East Palo Alto lacks political and economic clout, state agencies were remiss in mandating Romic to comply with regulatory requirements. The company contended that, despite the agency's willingness to issue a negative declaration, it requested that a full environmental analysis be performed, including a Health Risk Assessment of its operations. The City of East Palo Alto, economically dependent on the company, was caught in the middle of the controversy.

Concerns about Romic's operations were furthered by a specific event at Romic's Redwood City facility. On February 15, 1995, Rodrigo Cruz, a Romic employee, suffered brain damage while removing toxic sludge from a railroad tank car. Seeking support after the incident, Cruz affiliated himself with the Santa Clara Center for Occupational Safety and Health (SCCOSH), a citizen and worker watchdog group. Members of another organization, WATCH (Workers Against Toxic Chemical Hazards), soon launched a "Campaign for Justice for Rodrigo Cruz."

As part of the campaign, WATCH, a network of Filipino electronics workers, formed an alliance with the Ujima Security Council in East Palo Alto.

The latter group was composed of African-American and Latino residents from the communities surrounding Romic's East Palo Alto facility. The combined efforts of these groups focused the attention of government agencies on the East Palo Alto facility. In 1996, the California Occupational Safety and Health Administration (CalOSHA) conducted an investigation of the site. Investigators issued 22 citations against the company for health and safety violations. Although WATCH and its allies felt the fines levied on Romic were minor compared to the violations, the company eventually settled with CalOSHA subsequent to further administrative procedures. The agency issued a separate set of citations against Romic for the Rodrigo Cruz incident.

For JoLani Hironaka, Executive Director of SCCOSH, both of these issues challenged government agencies to live up to their regulatory and enforcement responsibilities to workers and the community. They also required Romic to address the impacts of its operations on the community.

Deciding to Collaborate

The events that followed provide an example of how collaboration can occur between community groups and government agencies. Although the community groups that led the workers' rights campaign had drawn public attention to the issue, they were not satisfied with the outcome of the Rodrigo Cruz incident. They felt there were gaps in enforcement, and had ongoing concerns about the response of government regulators, including CalOSHA, California EPA, and the Air Quality Management District. One issue for them was whether and how the Resource Conservation and Recovery Act (RCRA) applied to the Cruz case.

Because SCCOSH had a good working relationship with an influential individual within EPA Region IX, the group contacted the agency for assistance with the Cruz issue. SCCOSH felt it had important information about the situation and sought a forum to communicate its concerns. As a result of SCCOSH's effort, the EPA agreed to convene a series of three informal meetings involving community groups and state and federal agencies. EPA Region IX used its influence with the other government agencies to encourage their participation in the process.

The meetings convened by the EPA were heavily attended by community activists from Redwood City and East Palo Alto. The forum gave community groups access to government regulators and an opportunity to provide information to them about the Cruz incident. One unique aspect of the collaboration was that representatives from several government agencies, including CalOSHA, California EPA, and the Air Quality Management District, attended the meetings. Although not all of the agencies were represented at all three meetings, the collaboration provided an opportunity for community groups to communicate with several agencies at once. After hearing their concerns, the government agencies agreed to investigate the incident further.

Romic's Citizen Advisory Panel

While community groups saw collaboration with government agencies as integral to achieving their goals, Romic had its own approach for addressing community concerns. In 1995, Romic convened a Citizen Advisory Panel (CAP) in response to suggestions from local residents. Romic's CAP, which meets monthly, serves in an advisory capacity to the company. The CAP has a facilitator that is funded by the company, but serves at the pleasure of the CAP. The goals of the CAP include the following:

- To further enhance two-way communication between the multilingual, multicultural East Palo Alto community and Romic Environmental.
- To identify and work together to address issues of concern to the community and Romic Environmental.
- To build, maintain and enhance a climate of trust and mutual respect between Romic Environmental and the East Palo Alto community.
- To help establish East Palo Alto as a leader in the field of industrial ecology and a model of sustainable living.

According to the facilitator of Romic's CAP, Tom

Stewart of Dynamic Networking, before the CAP was formed the company knew less about the issues important to the community. Over time, as the community's perception of and relationship with the company have changed, so has the work of the CAP. While issues such as odor monitoring, waste discharge, and emissions still capture the CAP's attention, only 10% of the CAP's time is devoted to single issues such as these. Where the CAP initially served as a forum for the company to react to community concerns, the emphasis now is on how the company can function as a good corporate citizen.

Romic's CAP addresses a broad spectrum of issues, often focusing on community activities and corresponding needs. One example is an emergency response resource guide the CAP developed for the city. After the 1989 Loma Prieta earthquake, residents and city officials realized there was no community response mechanism to deploy in emergency situations. While the City had prepared an emergency response plan, it lacked the funds to prepare the accompanying document that matches needs to available resources in the immediate community. This issue was brought to the CAP by members who also serve on the Public Safety Commission. For the CAP, the matter also raised questions about how a natural disaster (or other event) would affect Romic's operations and the facility's safety. Because the city did not have the resources to develop a response mechanism, the CAP undertook the project. As an outgrowth of that experience, when flooding occurred in the area in the winter of 1998, the city had a plan to sandbag the community. Romic, with a heightened sense of community needs as communicated by its CAP, contributed sand, bags, and personnel to fill and stack the bags.

Once a year, an internal evaluation process takes place to assess the performance of Romic's CAP, the CAP's facilitator, and the company. After individual members complete their evaluations, a subcommittee is formed to compile the results and write recommendations. After a review process, these recommendations become the basis for modifications to the CAP process.

Community Participation

The East Palo Alto residents who participated in the EPA meetings do not serve on Romic's CAP (whether they have been invited to attend or not is a matter of some dispute). For them, the CAP process does not have credibility and does not provide them with the means to achieve compliance. According to JoLani Hironaka of SCCOSH, Romic's CAP process has not been responsive to specific questions concerning whether the company is meeting its minimal legal obligations to the community. Members of SCCOSH, WATCH, and the Ujima Security Council have also expressed concerns about how members of Romic's CAP were selected. They view Romic's CAP as controlled largely by the company itself. Further, a former CAP member believes that the company failed to provide meaningful technical information to the group.

The CAP facilitator has a different perspective on community participation. He points out that new members of the CAP are selected by current members in a closed session which company representatives do not attend. CAP decisions are made by majority vote. The company is represented in a non-voting capacity.

Current community members of Romic's CAP view participation as a valuable and worthwhile activity. The membership of the CAP now includes public officials and representatives of neighborhood associations, with an emphasis on community members living near the facility. Lois Frontino, a member of Romic's CAP since its inception, views involvement as an opportunity to learn about Romic and its activities. It also provides Romic with the opportunity to talk to people, create community awareness, and develop community understanding of the company's activities. For Moses Webb, a Public Safety Commissioner and CAP member, participation is motivated by the belief that a company has obligations to the community and must be willing to meet residents' concerns.

Outcomes

The two collaborations between Romic, community activist groups, community members, workers, and government agencies illustrate the following:

- *Enhanced communication between workers, community groups, and government agencies can strengthen existing regulatory mechanisms.* Collaboration between community groups and government agencies can help enforce environmental, health, and safety regulations when government personnel are willing to respond to community efforts. Whether through an institutionalized or informal process, community groups can raise issues and provide important information to government regulators. For community groups, such a process provides accessibility to regulatory staff. Worker health and safety inspections and analysis of process hazards can guide environmental enforcement to be more focused, efficient, and ultimately more effective.
- *Communication between regulatory agencies can be enhanced through a collaborative process.* Collaboration between community groups and government agencies can have the added benefit of increasing communication between different regulatory agencies. The process can provide a forum for state, regional, and federal agencies to coordinate enforcement efforts and promote environmental justice.
- *Community and worker health and safety issues can be addressed through a collaborative process.* The community groups that collaborated with the government agencies strongly believe that community and worker health and safety issues are linked. They feel that regulatory divisions between the two groups artificially separate them, and that they are better able to protect both by addressing them together. By having a forum to raise their concerns, they were able to bring the worker and community agendas together.
- *Goals are important when deciding what kind of collaborative process to engage in.* The community groups that participated in the dialogue with the regulatory agencies were able to focus on compliance. They believed these issues should take precedence. For those participating in the collaboration with the company, their focus is on how the company can meet other community needs. While Romic's CAP still addresses issues related to company operations, its focus is on building a relationship between the company and the community.
- *Goals of a collaborative process can change over time.* Whereas Romic initially convened its CAP to address specific community concerns, the group now functions in a proactive manner. Its focus now is on how Romic can serve as a corporate citizen of East Palo Alto.

The relationship between the community of East Palo Alto and Romic is long and complex. While community residents and activist groups have chosen different avenues for bringing their concerns to the attention of the company and government regulators, their ongoing efforts illustrate how different collaborative strategies can be used to protect the environment, community, and workers.

Sources

Bacon, David, "Silicon Sludge," *San Francisco Bay Guardian*, December 24, 1997, pp. 17-19.

Bacon, David, "Toxic Technology," *In These Times*, November 23, 1997, pages 18-20.

Community Advisory Panel to Romic Technologies Corporation:

- *Mission Statement and Goals*
- *Policy Regarding Acceptance of New Members*
- *Policy Regarding Company Notification*
- *Policy Regarding Meeting Cancellation and Rescheduling*
- *Policy Regarding Member Participation*
- *Policy Regarding Panel Notification*

- Romic Environmental Technologies Corporation website, "Commitment to the Community," March 6, 1998, http://www.romic.com/romcmty.html.

Interviews

- Lois Frontino, ROMIC CAP member, July 23, 1998.
- JoLani Hironaka, Executive Director, Santa Clara Center for Occupational Safety and Health, July 28, 1998.
- Dave Jones, U.S. EPA Region 9, July 27, 1998.
- Christopher Stampolis, Community Relations Manager, Romic Environmental Technologies Corporation, March 10, 1998.
- Thomas E. Stewart, ROMIC CAP facilitator, Dynamic Networking, Martinez, California, July 8, 1998.
- Moses Webb, ROMIC CAP member, July 22, 1998.

Sheldahl Inc.:

CITIZENS' GROUPS, A LABOR UNION, AND A COMPANY COOPERATE — *Northfield, Minnesota*

In 1989, citizens of Northfield, Minnesota and workers from the Sheldahl manufacturing facility banded together in an effort to reduce exposure to the chemical methylene chloride. This case illustrates the following:

- How collaboration between workers and citizens' groups led to binding commitments of the facility to a toxic-use reduction plan with firm deadlines.
- How a number of factors make neighbor-labor cooperation difficult.
- How the slower approach of toxic-use reduction (rather than recapture-and-recycle) emerged as the approach that nearly all stakeholders favored after they communicated their concerns to each other.

Background

Sheldahl uses methylene chloride in manufacturing flexible electronic circuit boards. In 1989, the Natural Resources Defense Council published information based on the Toxics Release Inventory (TRI) data collected by the EPA as part of the Community Right to Know Act. It listed Sheldahl as the 45th largest emitter of airborne carcinogens in the country. A public outcry from Northfield residents ensued. At about the same time, by coincidence, Sheldahl's state air emission permit was up for renewal, and, also coincidentally, the facility's contract with the Amalgamated Clothing and Textile Workers Union (ACTWU) local was up for negotiation.

The union was already aware of the increasing evidence that methylene chloride causes cancer. At the union's urging, Sheldahl had been studying and monitoring methylene chloride since 1984, and had instituted some measures to reduce workers' exposure to the chemical. In 1985, the EPA designated methylene chloride as a "probable human carcinogen."

Goals

The workers wanted to further reduce their exposure to the chemical, but they also wanted to keep the facility open and maintain their jobs in Northfield. Sheldahl's somewhat shaky financial state at the time, and the fact that some jobs had already been transferred to another site, added to the workers' sense of insecurity. Meanwhile, the residents wanted to eliminate the facility's emissions of methylene chloride as fast as possible, and a few activists wanted this "at any cost"—even if it meant closing the facility. Union members and other Northfield citizens thus had some shared and some conflicting interests.

Triggering Events

Sheldahl seems to have foreseen the stir that the TRI data publication would create. After the community outcry, Sheldahl held a public meeting at the City Council's request and unveiled a toxic-use reduction plan. The plan entailed reducing emissions by 90% over five years by curtailing use, largely through substitution of methylene chloride with safer substances. Sheldahl did not, however, firmly commit to this plan, saying reductions beyond the first year would depend on a variety of factors beyond their control.

Shortly thereafter, in early summer, a group of Northfield citizens called a public meeting of their own, and decided to form Clean Air in Northfield (CAN). Simultaneously, a dozen science faculty and students from two Northfield colleges—Carleton and St. Olaf—formed the Air Toxics Study Group (ATSG), to study Sheldahl's emissions and what to do about them. The ATSG was one of Carleton's Technology Policy Projects (part of the Environmental and Technology Studies Program), designed to lend academic resources to technology policy controversies. It soon established connections with CAN, Sheldahl, the Minnesota Pollution Control Agency (MPCA), and workers at the facility.

Deciding to Collaborate

The first meeting between CAN members and union leaders was contentious, with the union accusing the community leaders of wanting to shut down the facility, and some activists accusing the workers of withholding knowledge that the facility was emitting a carcinogen. At this point, the citizens favored a *recapture-and-recycle* strategy to reduce the amount of the chemical emitted from the facility. The workers favored a *toxic-use reduction* strategy, similar to what Sheldahl was already proposing. Each option required a large capital expenditure by Sheldahl, but the latter would take more time.

A turning point in the relationship between CAN and the union came when Eric Frumin, the union's National Director of Occupational Safety and Health, visited and spoke at a joint meeting of CAN, ATSG, and union leaders. In addition to stressing the research that increasingly showed the dangers of methylene chloride, he deplored the recapture-and-recycle strategies favored by CAN, likening this to "putting a cork in the bottle"—leaving workers inside the bottle with the chemical. He argued that even so-called "closed-system" recycle-and-recapture technologies do not live up to their promise to stay closed and protect workers. He largely succeeded in persuading the CAN and ATSG members that toxic-use reduction was the best strategy to protect both workers and the surrounding community. The three groups were on the road to cooperation, and held a series of joint meetings over the next few months.

Meanwhile, CAN was pressuring the Minnesota Pollution Control Agency and the local Environmental Quality Control Commission to regulate Sheldahl more stringently. At the request of MPCA, Sheldahl hired an engineering firm to assess the health risks of methylene chloride emissions to residents. The firm found that Sheldahl exceeded the safe level of exposure for people outside the facility, and proposed to install fans in the exhaust stacks to disperse the chemical more widely over the community and thereby reduce the maximum concentration. The MPCA and ATSG cooperated to defeat this plan. In addition, a Carleton student wrote a report showing that workers at the facility were exposed to 50 parts per million of methylene chloride. When this was publicized in the local paper, the community had the eye-opening experience of comparing that to the long-term exposure limit of .006 parts per million that the MPCA considers safe for citizens outside the facility.

Negotiation and Agreement

Buoyed by this public attention to methylene chloride, the ACTWU workers decided to include the issue in its collective bargaining with the company. They pressed Sheldahl to put firm time commitments on their proposed toxic-use reduction plans. The resulting agreement, signed on November 1, 1989, included commitments from Sheldahl to:

- Reduce methylene chloride use by 64% by 1992.
- Eliminate 90% of methylene chloride emissions by 1993.

- Hold progress meetings with the union and community groups.
- Conduct quarterly testing for employee exposure to methylene chloride.
- Make the search for a non-toxic alternative to methylene chloride a top priority.

Next, the MPCA held a hearing, requested by CAN, on renewing Sheldahl's air permit. CAN lobbied for faster reductions than those in the agreement, and they also continued to lobby for a recapture process, despite union opposition. As it turned out, the MPCA issued a new permit that locked in the collective bargaining agreements, and further required Sheldahl to eliminate all methylene chloride use by 2000.

As of January 1992, implementation was ahead of schedule (methylene chloride use was down 75%, instead of just 64%), and the facility was developing a water-based, non-toxic substitute.

Success Factors and Challenges

The involvement of the ATSG aided success by helping the CAN members make sense of the technical aspects of the issue, serving as a moderating influence, and suggesting safety measures the plant could take.

However, the main key to success in this case—and also the main challenge—was the cooperation between the union and CAN. It was challenging for several reasons.

- While they all shared an interest in reducing toxic exposure, the workers also worried about losing their jobs, and thus were reluctant to push the company to take the drastic measures some community activists were urging.
- People tend to think of "workers" and "community" as separate entities. Government also tends to treat them as separate entities, so their concerns are handled by separate government agencies (for example, the TRI data did not address worker exposure).
- In this instance, social class may have widened the divide between the workers and the affluent community surrounding the plant.

Despite these difficulties, the community and the union achieved a significant degree of cooperation. This resulted from the following:

- A shared belief that collaboration could be beneficial, and a commitment to build on common interests.
- The personal visit by Eric Frumin of the ACTWU's national office. He persuaded many in the community that the toxic-use reduction strategy would best serve the long-term interests of both the workers and the nearby residents.
- Frequent meetings between the groups.
- Inclusion in each other's efforts. CAN routinely invited someone from the union to attend its meetings, and the union's collective bargaining agreement included a provision for community representatives to monitor Sheldahl's implementation progress.

While they never were in 100% agreement—evidenced by the community groups' continued agitation after the collective bargaining agreement was signed—their cooperation helped bring about important environmental results.

Outcomes

In summary, the cooperation among the union, the two community groups, and the facility resulted in a collective bargaining agreement comprising environmental commitments and community involvement. These were reiterated and strengthened in the air permit. To varying degrees, these outcomes benefitted all parties:

- *The facility's original plan of toxic-use reduction was accepted and codified* in the collective bargaining agreement and the air permit.
- *Sheldahl would be investing long-term in the Northfield facility and keeping jobs there,* rather than moving them elsewhere.
- *The union advanced an approach that would benefit workers as well as the community.*
- *The community was guaranteed a reduction of methylene chloride emissions,* with complete elimination by 2000.

Sources

Casper, Barry M., "Citizen-Worker Alliances Are Key to the Success of the Environmental Movement," unpublished draft. (*Note: Barry (Mike) Casper is a professor at Carleton College and was a member of the Air Toxics Study Group.)*

Casper, Barry M., "Methylene Chloride and Northfield, Minnesota" in U.S. Environmental Protection Agency, *Proceedings of the Toxics Release Inventory (TRI) Data Use Conference.* Washington, DC: U.S. EPA Office of Pollution Prevention and Toxics, 1993.

Lewis, Sanford J., et al., "Sheldahl Inc., Northfield, Minnesota," *The Good Neighbor Handbook: A Community-Based Strategy for Sustainable Industry."* Acton, MA: Center for the Study of Public Policy, 1992.

2 • appendix 2

Background on the Constructive Engagement Resource Guide

Genesis of the Guide

The proposal for the Constructive Engagement Resource Guide was developed by the Alternative Strategies Work Group of the Computers and Electronics Sector Subcommittee of the EPA's Common Sense Initiative (CSI). The CSI served as a model for integrating activities across the EPA, including developing new rules, reviewing existing rules, and designing innovative enforcement and compliance approaches.

In 1996, the Subcommittee agreed on a vision for a facility-based alternative system of environmental protection that results in enhanced environmental, health, and safety performance; increased regulatory flexibility; and increased engagement of, and accountability to, communities and workers. The specific objectives of this vision are shown in the box below; one of the objectives is constructive engagement among industry, workers, communities and government.

The CSI Computers and Electronics Subcommittee's work led to this resource guide. The guide is a resource for industry, community groups, workers, and government agencies to strengthen partnerships for a cleaner environment. CDR Associates wrote the guide, as EPA subcontractors under a contract administered by RESOLVE, Inc., under the auspices of the Computers and Electronics Sector Subcommittee Alternative Strategies Work Group. Work Group members guided the development of the guide and reviewed the multiple drafts that were prepared in the development of the final document.

Alternative System of Environmental Protection Objectives

Superior performance based alternatives to the existing system that includes flexibility, reduced regulatory burden, and cost effectiveness to achieve cleaner, cheaper, and smarter results. A superior performance based alternative is one that produces environmental and health outcomes that meet or exceed performance required by existing regulatory standards and thresholds. An alternative performance based system encourages creative, innovative, cost-effective, and adaptive solutions that shift resources from permit management and regulatory reporting toward technical, managerial, and consensus process solutions that directly increase environmental protection and reduce human health risks.

An environmental management systems approach that sets performance objectives and targets and stresses continuous improvement. An environmental management systems approach is one in which facilities evaluate the impacts of its activities, processes, and products and establishes clear and measurable objectives and targets to improve environmental, health, and safety performance. Facilities participating in an alternative system approach commit to continuous improvement both in reducing community and worker exposure to harmful chemicals and in improving management systems that gather, assess, and respond to information regarding facility impacts on the environment, workers, and the community.

Integration of environmental, health, and safety (EHS) programs into product design and production processes. An integrated environmental, health, and safety (EHS) program is one that ensures that beneficial changes in one program area (such as environmental) do not cause detrimental changes in another area (such as safety or health). It is a program that stresses communication between those responsible for improving environmental, health, and safety performance and encourages facility personnel to consider EHS issues at all stages in product and process design, procurement, production, use, and disposal on the same level as issues such as cost, quality, and time.

Constructive engagement between industry, workers, communities, and government to achieve alternative system goals and objectives. Constructive engagement means representatives of the facility's management and employees, the relevant Federal, State, and local regulatory agencies, and the community striving to develop and continuously improve a cooperative partnership. Through this partnership, these parties jointly work to assure that each of them has the capacity to participate, and does participate, in establishing facility environmental management system goals and objectives, in monitoring the effectiveness of the system, and in evaluating facility performance. The capacity to effectively participate includes each party having timely access to relevant information, sufficient technical understanding and expertise, and the resources to effectively participate.

Prevention of adverse environmental and human health consequences through business planning and product development and use. Prevention means the use of environmental and occupational risk information in business planning and product development to identify opportunities for pollution prevention and a preference for source reduction over recycling, treatment, and disposal. Prevention includes effective stewardship practices to prevent adverse effects and promotes effective customer-supplier relationships that identify pollution prevention opportunities and share pollution prevention technology, and promotes precautionary principles.

Proportionality between improvement in regulatory flexibility; environmental, health, and safety; and the engagement of and accountability to communities and workers. Proportionality means that facilities seeking operational flexibility must also demonstrate comparable achievements in both environmental, health and safety performance and in involvement of communities and workers in defining facility environmental management system goals and monitoring performance.

Methodology

The primary method used to develop this guide was the study of Constructive Engagement cases. The purpose of using the case study approach was to uncover practical lessons concerning *whether* to embark on Constructive Engagement and *how* to effectively structure and manage the process. Once lessons were derived from the cases, interviews were conducted with a number of people who had experience as Constructive Engagement participants. This step served to test the initial findings of the research. The information gathered from interviews subsequently helped to refine the final conclusions.

Through conference calls and meetings, the Work Group participated in each step of the research process. Work Group members shared their feedback concerning the case studies, lessons, text of the guide, and the research process itself. Generally, they worked in close collaboration with the authors at every major step of the process, which consisted of the following:

Case Study Identification. The first step was to identify examples of Constructive Engagement through telephone inquiries, a literature review, and an Internet search. Individuals involved in Constructive Engagement activities were asked to send written materials. While examples in the computer and electronics sector were preferred, cases from other industries were welcomed as well. The search yielded 25 cases.

Case Study Selection. The next step was to narrow the list down to fewer cases, selecting diverse examples with respect to:

- Participants
- Issue(s)
- Geography
- Model/Type of Process
- Initiator of the Process
- Duration of the Process
- Goal or Purpose of the Process
- Corrective or Preventive
- Outcome
- Degree of Conflict
- Cross-cultural Issues.

Whether written accounts of the examples existed was also considered because time permitted only a few primary case studies to be researched. From the original 25 examples, 11 cases were selected to develop; eight from existing reports and three from reviews of primary material and participant interviews.

Case Study Development. For the primary case studies, a review of primary materials was conducted and participants were interviewed. A schedule of interview questions was used to conduct the interviews, but it was followed loosely. This allowed the information gathering process to be standardized, while remaining flexible enough for interviewees to openly speak about their experiences. The interview schedule was also used as a tool to analyze the secondary sources for the other eight cases. The interview schedule included the following key questions:

- What were the initial goals and objectives of the collaboration?
- What was the process of collaboration?
- Who were the parties involved?
- What type of mandate did the group have?
- What procedures were established?
- Why did you decide to participate in/initiate a community engagement process?
- What were the major challenges you faced?
- What do you see as the major outcomes of the collaboration?
- What were the costs and benefits incurred from participation in the collaboration?
- If you were to advise someone new starting a similar collaboration, what advice would you give them? What were the main lessons you learned?

- Is there a question I should have asked you that I didn't, or anything else you feel I should know?

The outcome of this step was a set of 11 written case studies, averaging 1,500 words each. The case studies were structured to highlight the questions asked during the information gathering process.

Lessons Development. As the case studies were developed, a list of recurring themes and trends was maintained that led to a list of "Lessons Learned"—a summary of key points and conclusions.

Drafting of Text. In addition to the case studies, the resource guide consists of advice and how-to information to help stakeholders decide whether to participate in and how to create a Constructive Engagement process. From the case studies, lessons learned, input from Work Group members, and the authors' experience as mediators and facilitators, Chapters 2, 3, and 4 were drafted and submitted to Work Group members for their comments.

Interviews. After drafting the three central chapters, interviews were conducted with potential readers of the resource guide, particularly those with some experience participating in Constructive Engagement as well as individuals with a background in the computer and electronics industry. The purpose of the interviews was to "ground-truth" or test the initial set of lessons by asking interviewees with practical experience in the field to give their views and reactions.

In selecting individuals to interview, the goal was to find people from various stakeholder groups (community, government, and industry) with experience in Constructive Engagement. A representative cross-section of Work Group members were initially approached. They were interviewed and asked to recommend others who should be interviewed. This yielded a few valuable contacts, and the list was supplemented with names encountered during the case study research. The emphasis was on interviewing people who were not involved in any of the situations used for the case studies, because the intent was to get the benefit of a broader base of experience.

Interviews were conducted in September 1998 with the following people:

Rick Abraham, Texans United

JoLani Hironaka, Santa Clara Center for Occupational Safety and Health

Steve Hoover, EPA Headquarters

Bern Johnson, Director, Environmental Law Alliance Worldwide, Eugene, Oregon

Dave Jones, EPA Region IX (San Francisco)

Daphne McMurrer, Texas Natural Resource Conservation Committee

Liz Moyer, Texas Instruments

Mary O'Brien, Community environmental activist in Eugene, Oregon

Ted Smith, Silicon Valley Toxics Coalition

Many potential interviewees were not available, so fewer interviews were conducted than hoped. Nevertheless, the interviews were valuable and the range of individual opinions was diverse. Each interviewee was given a list of the preliminary "Lessons Learned" as a basis for discussion. The interviews provided substantive feedback for the resource guide and for the final list of lessons (presented in Chapter 5), serving as an informal type of "peer review" and lending additional validity to the material presented in the guide.

Final Compilation. The complete draft of the resource guide was submitted to the Work Group and then distributed to the entire Computers and Electronics Sector Subcommittee. Their feedback and recommendations were integrated to create the final version of the Constructive Engagement Resource Guide.

3 appendix 3

Sample Forms

Table of Contents **Page Number**

The Costs and Benefits of Constructive Engagement

AN INDUSTRIAL PERSPECTIVE

Prepared by Liz Moyer, Safety, Environmental, and Health Staff, Texas Instruments

Note: This approach assumes a Constructive Engagement activity that addresses either the siting of a new facility or the expansion of an existing one that requires some permitting process. It could also be applied when a renewal action is necessary.

Attaching concrete costs and benefits to Constructive Engagement is difficult. These are the questions we need to ask ourselves and the issues to consider in determining if Constructive Engagement is a good idea. In doing so, we need to think carefully about our specific situation.

In discussing and planning a community outreach program, we must speak to management in terms of management, and that means money. Our credibility is very important, so we must use judgment in making these calculations. If permitting is not a factor in facility startup schedule, then we should not use that part of this document; if it is, we should be sure to include it.

Potential Benefits:

A. Faster permitting due to support of community and absence of hearing requests. How much faster can permits be obtained with community support?

   What is the expected revenue per day for the facility affected by this permitting action? Get this from the capital authorization, financial controller, or manufacturing manager for the facility.

   Now, what is community support really worth to us?

   $_____ per day expected revenue X _____ working days = _____ additional revenue due to reduced permit cycle time

   Be cautious in using this calculation not to reduce cycle times below the construction schedule.

B. Reduced cost of permit hearings. Contact your legal department to generate an estimated cost for permit hearings.

C. Community support will make zoning change and building permits go faster. How can these affect the construction schedule and cycle time from design to revenue-producing operations?

   $_____ per day expected revenue X _____ working days = _____ additional revenue due to reduced zoning or building permit cycle time. Careful! Don't double-dip savings in environmental permitting and zoning cycle time—your credibility is important!

D. Reduced cost of permitting or zoning hearings. Contact your legal department to generate an estimated cost for hearings.

E. Community support may enable you to negotiate a more flexible permit—one allowing caps by chemical family rather than individual chemical, for example. Does your facility expect to change chemistry often? How could the time lag before a new chemistry can be included in your permit affect cycle time to market for a new product?

$_____ per day expected revenue for new product, or cost savings from chemistry change
X _____ working days = _____ additional revenue, or savings.

$ _____ estimated cost of handling permit amendments.

F. Community support could reduce abatement/waste handling/operations restrictions. What abatement are you installing beyond the legal requirements? Is it possible that community support could eliminate this expenditure? What materials will the facility be using? Are there other operations in the area that could use your used materials if the community supported this re-use? Are operating hours being restricted due to perceived community concerns? If the community supported extended hours, could the facility generate more revenue?

Improved community image is hard to quantify, but there are a couple of factors that might help you do it: Is your facility hiring workers? If so, what are the advantages of hiring local workers who already have some knowledge about the facility, harbor goodwill, and will remain stable, long-term employees? In other words, how much does hiring locally reduce turnover and related cost? How about reduction in relocation costs when you hire locally? Talk to your human resources department about this issue. Obviously, having a community outreach program will not guarantee availability of potential employees, but having a bad reputation for environmental, safety or health issues will certainly limit your company's ability to hire locally.

Costs

A. Start-up: How much time will it take to locate and retain a third-party facilitator, if one is to be used? What is their initial start-up fee? How much time will the company champion spend recruiting community participants? Setting up meetings?

B. Ongoing administrative costs: How much time will the company champion spend setting up meetings, notifying participants, setting up the meeting room? How about recording the results of the meetings and distributing them to participants? What about distribution to the rest of the community?

Hours:

Develop agenda _____ hours

Notify participants _____ hours

Room set-up _____ hours

Minutes generation and distribution _____ hours

Total hours/meeting _____ X # meetings/year _____

X $_____ /hour = $ _____administrative labor cost

What about printing, postage, etc.?

$ _____ administrative materials cost

C. Logistics: Will there be refreshments at the meetings? Will you have to pay to rent space? Are you providing child care?

meetings/year _____ X $_____ / meeting = $ _____ refreshments cost

meetings/year _____ X $_____ / meeting = $ _____ facilities cost

meetings/year _____ X $_____ / meeting = $ _____ child care cost

D. Internal Labor: How many representatives of your company are going to attend the meetings, and how do you account for their time? Include management, public relations, workers, human resources, facilities, environmental & safety.

meetings/year _____ X $_____ / meeting = $ _____internal labor cost

External labor and expenses: Will you be paying an outside facilitator? A translator? How about special technical assistance? Agency compensation? Travel for community members?

meetings/year _____ X $_____ / meeting = $ _____facilitator cost

meetings/year _____ X $_____ / meeting = $ _____translator cost

meetings/year _____ X $_____ / meeting = $ _____agency cost

meetings/year _____ X $_____ / meeting = $ _____technical assistance cost

meetings/year _____ X $_____ / meeting = $ _____community travel cost

Summary:

Benefits:

A. Increased revenue due to faster permitting $ _____

B. Reduced expense of permitting hearings $ _____

C. Increased revenue due to faster zoning $ _____

D. Reduced expense of zoning hearings $ _____

E. Increased revenue due to faster process change $ _____

F. Reduced cost of permitting for process change $ _____

G. Elimination of abatement/operation restrictions $ _____

H. Workforce $ _____

Costs:

A. Start-up $ _____

B. Ongoing administrative $ _____

C. Ongoing logistical $ _____

D. Internal labor $ _____

E. External labor $ _____

Local Environmental Advisory Group Charter*

Purpose

As a part of a national regulatory reform effort and to support *Lucent Technologies*' certification in the International Standard Organization ISO 14001, Lucent has formed a Local Environmental Advisory Group (LEAG), specifically for the *Lucent Technologies Microelectronics* Allentown, PA facility.

The purpose of the LEAG is to gather a diverse group of community representatives and facility personnel in order to exchange ideas and respond to concerns regarding environmental activities at the facility. The group will:

- Provide the opportunity for the community to learn more about the facility and its operations,
- Act as a forum to identify and prioritize community interests and concerns,
- Review Lucent's objectives and targets for improving the facility's environmental performance and offer advice and recommendations for continually improving the environmental quality for the surrounding community,
- Provide community input and oversight for any regulatory reform proposed under the US Environmental Protection Agency's (EPA) Project XL.

Environmental issues are expected to be the topics of most interest to the group; however, most any other questions or concerns can be considered by the group. Issues associated with confidential business information or trade secrets, personnel information or legal questions will be outside the group's scope of discussion. The groups will not be given decision-making authority over day-to-day facility operations and business decisions; however, they will be kept informed as to how their concerns were considered and addressed on those issues.

Ground Rules

The following guidelines will serve to help the group engage in effective discussion and consideration, while providing community input on environmental and technical issues:

1. Share relevant information. Members will share all of the appropriate information they have that might affect the way the group solves a problem or makes a decision. This includes sharing information that does not support one's own position.
2. Focus on interests, not positions. A position is a solution that meets your needs. Interests are the reasons why that solution is attractive to you. Often there are many different ways to satisfy your interests.
3. Be brief and clear in your comments. Use examples whenever possible to give other members a concrete way of understanding your comments. Define important words and check with the group to make sure everyone has the same understanding of those words.
4. Explain the reasons behind your statements, questions and actions. Tell others why you are doing what you are doing. For example, if you want information, explain why it is important to you.

---

* *Developed by Winsor Associates, Ardmore, PA. Used with permission.*

5. Make statements, then invite questions and comments. When you express a point of view, explain your reasons, and then ask others to respond directly to your statement to find out whether they agree or disagree. This helps turn the discussions into a dialogue rather than a series of monologues.
6. Focus the discussion. Members will discuss relevant issues, focus on the same issue, and make sure everyone fully understands the issues.
7. Listen and consider the opinions of others.
8. Treat each member with courtesy and respect.
9. Exchange relevant information with non-group constituents. Members need to communicate the group's progress to their constituencies and gather ideas from them as well.
10. Make decisions by consensus. Consensus means that all members present at a meeting can live with a proposal as stated. Everyone may not be 100% satisfied with the decision, but they agree to let the decision be implemented.
11. Debrief at the end of each meeting. To learn from its successes and mistakes, the group will spend a few minutes at the end of each meeting reviewing what worked well and what could be improved.

Membership

The members of the LEAG are chosen to represent a broad range of interests from the immediate Allentown/Bethlehem area, as well as the wider community of Lehigh and Northampton counties.

To maintain a balanced range of community perspectives new members may be proposed in response to the needs of a particular project. In the event that a particular organization's representative resigns, the organization will be approached first to appoint a new representative. A *Lucent Technologies* selection committee will confirm the selection of a new member.

LEAG members are expected to make an initial one year commitment, with the opportunity for extending membership for an additional one or two years.

If a LEAG member is unable to attend a meeting, an alternate may be sent to represent the organization or interest group and to participate in the consensus process. The member is responsible for keeping the alternate informed so that s/he is able to participate meaningfully. The group is not expected to backtrack to update alternates.

Observers

Most meetings of the LEAG will be open to the public. Only LEAG members or their alternates will be called upon to participate in discussions and make recommendations. Observers from the public will be invited to offer comments or ask questions at a specified time during the meeting.

Company Role and Participation

The Manufacturing Director and representatives of the two unions employed at Lucent will serve as members of the LEAG. They will participate in the discussions, but not in consensus decision-making.

Company representative are expected to bring issues to the group for their consideration, provide necessary background and technical information, assist the group in gathering other information, and respond to questions or issues raised by the group. Additional *Lucent Technologies* personnel may attend meetings as necessary when there is a special topic or questions that would benefit from their expertise.

Meetings

Initially the group will meet approximately every six weeks to allow members to become acquainted with each other and oriented to the facility. Thereafter, it is expected that the group will meet at least four times per year. The group's meeting frequency and format can be changed to meet the needs and interests of the group or the facility.

Group meetings will be approximately two hours long and held at a time and location convenient to its members.

A neutral facilitator will be provided by the company to assure that meetings are conducted efficiently and effectively. The facilitator's responsibilities include: managing the group's agenda, keeping the committee on task, and assisting with the development of consensus. The facilitator will not offer his/her own opinions. Draft meeting agendas will be circulated to the LEAG prior to the meeting. Revisions to the draft agenda will be taken at the beginning of each meeting.

Media Contact

Individual LEAG members will not discuss or represent the group's work to the media. The group will appoint a spokesperson who will work with the LEAG to prepare and distribute press releases as the group sees fit.

Changes to the Charter

Changes to the LEAG Charter will be made with the consensus of the group at any meeting.

PROPOSED AGENDA FOR

Introductory Community Advisory Panel Meeting*

I. Getting Acquainted

   A. Social Situation with Refreshments

   B. Facilitator and Scribe Introduction

   C. Participant Introduction

II. Statement of Purpose

   A. Definition of Facilitator's Role

      1. Responsible for creating an environment for team building, by focusing on processes and dynamics.

      2. Plans and leads the processes the group uses to deal with its content.

      3. Makes sure that the members of the group achieve and maintain agreement on what they are doing and how they are doing it (staying together on content and process).

   B. Reasons for Participant Selection

      1. Community, Environmental, Employment, Governmental

III. Guidelines of Task Force

   A. Define Guidelines

   B. Develop Consensus on Guidelines

IV. Process For Identifying and Acting on Issues of Concern

   A. Identify Issues for Consideration (General)

   B. Define Issues for Consideration (General)

   C. Discuss Issues for Consideration (General)

      1. Panel Takes No Action—Resolved

      2. Panel Takes an Action—Discuss Specific Issue

         a. Set Priority for Discussion

         b. Schedule for Agenda

D. Discuss Specific Issue

      1. Background Information

         a. Speakers/Presentation

         b. Handouts/Visuals

---

* *Developed by Dynamic Networking, Martinez, CA. Used with permission.*

2. Discussion

a. Panel Takes No Action - Resolved

b. Panel Takes an Action

(1) Further Discussion (Return to Discuss Specific Issue)

(2) Recommendation to Company

(a) Company Takes No Action

i) Communicate to Panel

a) Panel Takes No Action

b) Panel Takes an Action—Further Discussion (Return to Discuss specific Issue)

(b) Company Takes an Action

i) Company Communicates to Panel

ii) Panel Monitors Action—Resolved

iii) Panel Takes an Action—Further Discussion (Return to Discuss Specific Issue)

V. Action By Group

A. Identify Issues

B. Set Priorities

C. Scheduled for Agenda

VI. Additional Comments and Questions

VII. Adjourn

Sample Guidelines For Dialogues And Negotiations*

The following guidelines have been found to be effective in encouraging productive negotiations. If the group is willing to adopt these guidelines or ground rules, meeting participants must commit themselves to "best efforts" at following them, and give the facilitator(s) authority to enforce them.

- Disagreement in discussions and negotiations is often inevitable and can be constructive. In this dialogue, *discussion should be focused on the issues involved, rather than perceptions of motives, relationships and personalities.*
- It is absolutely crucial that *everyone have a chance to be heard and to hear others*. Therefore, side conversations or interruptions while someone is speaking should be avoided.
- In order to give everyone a chance to talk, participants should *be sensitive about the length of comments and encourage equal participation* from all group members.
- *Once an agenda has been agreed upon, it is important to stick to it in terms of both time and topic*. If it appears that the agenda should be changed, this should be done by a group decision.
- Meeting participants will often have strong opinions about the items under discussion, but it is important to *remain open-minded about proposals, ideas, concerns*, etc., while different points of view are being presented and discussed. It often helps to *stay focused on the underlying concerns or interests that need to be addressed* rather than on whether any particular proposal is "good" or "bad." This makes it easier to evaluate the ideas that are presented.
- In general, each group member should work to *create an open and frank dialogue, that allows for a full and respectful exploration of similar and different points of view.*
- In order to maximize the productive time available, people should also *avoid repeating points* that have already been adequately made by oneself or others.

We hope these guidelines will maximize the opportunity for this group to reach a consensus decision that will address key interests, and be mutually satisfactory. Remember, consensus does not mean unanimity, but rather, the best agreement that can be reached at this time, which each member of the group can live with and/or support.

* *Developed by CDR Associates, Boulder, CO. Used with permission.*

Sample Agreement To Mediate*

This is an agreement between _____ and _____ (hereafter referred to as the "parties") and _____ as represented by _____(the "mediators"). The parties have entered into mediation with _____ with the intention of reaching a consensual settlement regarding _____. The provisions of this agreement are as follows:

1. The mediators are neutral facilitators who will assist the parties to reach their own settlement. The mediators will not make decisions about "right" or "wrong" or tell the parties what to do.
2. It is understood that open and honest communications are essential for mediation to work. Because concern for future reprisal or retaliation can interfere with communication and the mediation process, the parties agree not to take such actions.
3. The parties agree to make full and honest disclosure to each other and to the mediators of all relevant information and documents. This includes providing to each other and the mediators all information that would be available through the civil discovery process. Failure to disclose this information may result in this agreement being set aside.
4. The parties and mediators agree that all written and oral communications, negotiations and statements made in connection with mediation will be treated as privileged settlement discussions and are absolutely confidential. Therefore:
    a. The mediators will not reveal the names of the parties or matters discussed in the course of mediation unless expressly requested to do so by all parties. It is understood that the mediators are not required to maintain confidentiality if there is reason to believe any party is in danger of bodily harm.
    b. The parties agree that they will not, at any time before, during, or after mediation, call the mediators or anyone associated with them as witnesses in any legal or administrative proceeding concerning this dispute. To the extent that any party may have a right to call the mediators or anyone associated with them as witnesses, that right is hereby waived.
    c. The parties agree not to subpoena or demand the production of any records, notes, work product or similar materials from the mediators in any legal or administrative proceeding concerning this dispute. To the extent that any party may have a right to demand these documents, that right is hereby waived.
    d. If, at a later time, any party decides to subpoena the mediators, the mediators will move to quash the subpoena. That party will reimburse the mediators for the expenses (including attorneys fees), plus $100 per hour for the mediators' time, associated with responding to that subpoena.
    e. The sole exception is that this agreement to mediate and any written agreement made and signed by the parties as a result of mediation may be used in any relevant proceeding, unless the parties make a written agreement not to do so.

* *Developed by CDR Associates of Boulder, CO. Used with permission.*

5. While the parties intend to continue with mediation until they reach an agreement, it is understood that any of them may choose to withdraw from mediation at any time. It is agreed that if this occurs, best efforts will be made to discuss this decision in the presence of all parties and the mediators.
6. If the mediators determine that it is not possible to resolve the issues through mediation, the process can be terminated once this determination has been conveyed to the parties and confirmed in writing.
7. The mediators do *not* offer legal advice or provide legal counsel. In the event that legal advice is appropriate, each party is advised to retain his/her own attorney in order to be properly counseled about his/her legal interests, rights and obligations. This includes, but is not limited to, reviewing any written agreement between the parties that results from the mediation.
8. The parties agree to share the costs of mediation according to the terms of the Fee Agreements that accompany this Agreement to Mediate.
9 Copies of this agreement may be executed separately by the parties and the mediators.

I have read, understand and agree to each of the provisions of this agreement.

Party	Date	Party	Date
Party	Date	Party	Date
Mediator	Date	Mediator	Date

Criteria For Recruitment of Mediators*

The criteria presented below should be viewed as general guidelines. Not everyone will match all criteria. In terms of personal attributes and skills, we all work to develop these abilities over time. Few people have mastered all of them, but the potential should be there.

A. CRITERIA BASED ON PERSONAL ATTRIBUTES/ABILITIES

People who:

- Are good listeners and communicators
- Are open to a variety of viewpoints
- Are not rigid in their own positions, but willing to be persuaded by others
- Can see shades and nuances, rather than stark or polarized views
- Can generate or consider multiple possible solutions to a problem
- Are able to allow others to come up with their own solutions, rather than imposing their own ideas or leaping in too soon with a solution
- Are able to listen carefully to the expression of strong feelings and discover the interests contained in them
- Are not afraid of conflict, willing to let conflicts happen and not shut it off without resolution
- Are perceived by others as fair and relatively objective
- Are interested in being a mediator

B. CRITERIA BASED ON EXPERIENCE

People who:

- Have worked with a diverse range of people: white, Black, Hispanic, working class, wealthy, educated/not, women, men, students, etc.
- Have background in communications, counseling, or human resource management
- Have worked with third party conflict resolution programs and have training in mediation
- Know the relevant law or can learn it

C. CRITERIA BASED ON DIVERSITY & ORGANIZATIONAL DYNAMICS

People who:

- Represent a variety of viewpoints and experience, in terms of race, gender and other aspects of diversity important to the organization
- Reflect the different groups who will use the mediation services (organizational units, unions, management, professional, non-professional, technical, clerical, support, etc.)

---

* *Developed by CDR Associates of Boulder, CO. Used with permission.*

4 appendix 4

Resources

This appendix contains a listing of useful resources for stakeholders in constructive engagement. The list is organized according to the following broad subject areas:

Public Participation and Partnership Development
Mediation Resources
EPA Hotlines
Clearinghouses and Websites
U.S. EPA Offices
Worker Health and Safety Resources

Public Participation and Partnership Development

A Citizen's Guide to Achieving a Health Community, Economy and Environment, 1996. The Nature Conservancy, Center for Compatible Economic Development, 7 East Market St. Suite 210, Leesburg, VA 20175, (703) 779-1728.

Citizen Participation Handbook, Institute for Participatory Management and Planning, 1995. IPMP, P.O. Box 1937, Monterey, CA 93942-1937.

Environmental Partnerships: A Field Guide for Government Agencies, 1993. A handbook reference to help both the novice and experienced stakeholder successfully use partnerships as an equitable, effective, and efficient means of achieving results. Management Institute for Environment and Business, 10 G Street NE, Suite 800, Washington, DC 20002, (202) 729-7600.

Involving Citizens in Community Decision Making - A Guidebook, 1992. Program for Community Problem Solving, 915 Fifteenth St. NW, Suite 600, Washington, DC 20005, (202) 783-2961.

Management Institute for Environment and Business, World Resources Institute, 10 G St. NE, Suite 800, Washington, DC 20002, (202) 729-7600, *http://www.wri.org/meb/*. Helps companies improve environmental quality through business success. Seeks to demonstrate and communicate to the business community the opportunities of sustainable development through direct industry outreach and training.

National Civic League, 1445 Market St. #300, Denver, CO 80202-1728, *http://www.ncl.org/*. A non-profit organization that works directly with communities to foster cross-sector collaboration and grass roots problem solving.

Public Involvement Manual, 1998. Bureau of Reclamation, U.S. Department of the Interior, Denver Federal Center, Denver, CO, 80225-0007. Concentrates on the practical aspects of setting up and running a public involvement program or project.

Public Meeting Survival Guide, U.S. Fish And Wildlife Service. A user-friendly workbook for getting into—and out of—meetings. U.S. Department of the Interior, Fish and Wildlife Service, Portland, OR.

Renew America, 1200 18th St. NW, Suite 1100, Washington, DC 20036, (202) 721-1545, *http://www.solstice.crest.org/environment/renew_america/*. A non-profit organization that coordinates a network of community and environmental groups, businesses, and government leaders to exchange ideas and expertise for improving the environment. Renew America's *Environmental Success Index* chronicles environmental programs nationwide that measurably protect, restore or enhance the environment.

SALTA: An Environmental Justice and Community Organizing Training Manual, 1996. Training manual written in both English and Spanish aimed at developing and empowering community activists in their struggle for environmental justice. Environmental Health Coalition, San Diego, CA 92101, (619) 235-0281, *http://www.environmentalhealth.org.*

Mediation Resources

A Consumers Guide to Selecting a Mediator, State Justice Institute, Alaska Judicial Council, 1029 W 3rd St., Suite 201, Ankorage, AK 99501.

Mediation Information and Resource Center. Everything from defining mediation to guidelines for choosing a mediator. An international searchable directory with links to mediator's Web pages. *http://www.mediate.com/*.

EPA Hotlines, Clearinghouses, and Websites

EPA

http://www.epa.gov

EPA's Web site contains a vast array of information. The home page provides a list of categories that links users to more specific menus. Through the home page users can: get in-depth information about EPA's projects and programs; find out about laws and regulations; locate EPA offices, labs and regions; browse through EPA publications; get the latest news and upcoming events; discover new databases and software tools; or see what grants and fellowships are available. In addition, the home page provides links to a range of other resources both inside and outside EPA.

Chemical Assessment Desk

202-260-3998

EPA's Chemical Assessment Desk is available to EPA personnel to answer questions on existing chemicals regarding health and environmental risk, toxicity, environmental persistence, exposure potential, production, use, and regulatory status. Inquiries from the general public are usually referred to the appropriate EPA hotline.

Chemical Testing and Information
http://www.epa.gov/opptintr/p2home/index
The Chemical Testing and Information home page provides an overview of the Toxic Substances Control Act (TSCA) with links to more specific information on TSCA's Chemical Testing Program.

Community-Based
Environmental Protection (CBEP)
http://yosemite.epa.gov/osec/osechome
This EPA site includes resources, case studies, and links to other related sites.

Hazardous Waste Ombudsman
(800) 262-7937
Assists the public and regulatory community in resolving hazardous waste issues. The ombudsman handles complaints from citizens, conducts investigations, undertakes site reviews, and issues reports relating to hazardous waste sites. (In metropolitan Washington, DC: (202) 260-9361.)

Office of Environmental Justice Hotline
(800) 962-6215
Coordinates public communication and provides technical and financial assistance to outside groups on environmental justice issues. (In metropolitan Washington, DC: (202) 260-6359.)

Office of Pollution Prevention and Toxics
http://www.epa.gov/opptintr
OPPT's home page has several broad categories that users can click on to link to sites that provide more in-depth information on topical areas in each category. OPPT's programs and projects, publications, databases and software can all be accessed through the home page. A section for Concerned Citizens provides information designed to help consumers and communities.

Pollution Prevention Information Clearinghouse
(202) 260-1023
http://www.epa.gov/oppintr/p2home
Provides answers and referrals in response to questions from the public concerning pollution prevention.

Printers' National Environmental
Assistance Hotline
(888) 877-6322 (888-USPNEAC)
Addresses the needs of small printers nationwide by providing information on how to achieve compliance by reducing wastes and emissions.

Resource Conservation and
Recovery Act (RCRA) Hotline
(415) 744-2074
Responds to requests for information on hazardous waste identification, generators, transporters, treatment, storage, and disposal facilities, and recycling sites.

RCRA/Underground Storage Tank,
Superfund, and Emergency Planning and
Community-Right-to-Know Hotline
(800) 424-9346
provides information about the title programs and referrals for obtaining documents about these programs. Translation is available for Spanish-speaking callers. (In metropolitan Washington, DC: (703) 412-9810.)

Small Business Ombudsman
Clearinghouse/Hotline
(800) 368-5888
Disseminates regulatory and other environmental information to help small businesses enhance voluntary regulatory compliance and pollution abatement and control. (In metropolitan Washington, DC: (703) 305-5938. TDD: (703) 305-6824.)

Safe Drinking Water Hotline
(800) 426-4791
email: hotline-sdwa@epamail.epa.gov
Available to help the regulated community, state and local officials, and the public understand the regulations and programs developed under the Safe Drinking Water Act.

Stakeholder Web Page
http://www.epa.gov/stakeholders
This web page, from EPA's Office of Reivention, contains links to key information about EPA's efforts to develop policies and related materials regarding stakeholder involvement. (Includes links for downloading this Resource Guide.)

STORET Water Quality System Hotline
(800) 424-9067
Provides assistance in the use of the STORET System. STORET is a repository for water quality and biological monitoring data, and is used by state environmental agencies, EPA staff, federal agencies, and many others. STORET is an information management system housing data gathered as a result of ambient monitoring performed by state, tribal, and federal agencies at over 800,000 sites throughout the US.

Toxic Substances Control Act (TSCA)
Assistance Information Service
(202) 544-1404
TDD: (202) 544-0551
Furnishes TSCA regulatory information.

Toxic Release Inventory -
Community Right-to-Know
(800) 535-0202
EPCRA Hotline
email: tri.us@epamail.epa.gov

WASTEWI$E Helpline
(800) EPA-WISE
Provides information about EPA's voluntary program encouraging businesses to reduce solid waste.

Wetlands Information Hotline
(800) 832-7828
Disseminates information about the Wetlands Protection Program; answers questions and provides referrals concerning the value, function, and protection of wetlands; and accepts requests for certain wetlands publications. (In metropolitan Washington, DC: (703) 525-0985.)

EPA Offices

U.S. EPA, 401 M Street SW, Washington, DC 20460, (202) 260-2080, *http://www.epa.gov.*

Office of Air and Radiation, 401 M Street, SW, Washington, DC 20460, (202) 260-7400.

Office of Air Quality Planning and Standards (OAQPS), Research Triangle Park, NC 27111, (919) 541-5616.

Office of Enforcement & Compliance Assurance, Ariel Rios Bldg., Washington, DC, (202) 564-2440.

Office of Solid Waste and Emergency Response (OSWER), 401 M Street SW, Washington, DC 20460, (202) 260-4610.

Office of Water, 401 M Street SW, Washington, DC 20460, (202) 260-7018.

EPA Regional Offices:

Region I, John F. Kennedy Federal Building, I Congress Street, Boston, MA 02203-2211, (617) 565-3400.

Region II, 290 Broadway, New York, NY 10007-1866, (212) 637-3000.

Region III, 841 Chestnut Street, Philadelphia, PA 19107, (215) 566-5000.

Region IV, 100 Alabama Street SW, Atlanta, GA 30365, (404) 562-8327.

Region V, Robert E. Metcalfe Federal Building, 77 West Jackson Boulevard, Chicago, IL 60604-3590, (312) 353-2000.

Region VI, First Interstate Bank Tower at Fountain Place, 1445 Ross Avenue, Suite 1200, Dallas, TX 75202-2733, (214) 665-2100.

Region VII, 726 Minnesota Avenue, Kansas City, KS 66101, (913) 551-7000.

Region VIII, 999 Eighteenth Street, Suite 500, Denver, CO 80202-2466, (303) 312-6308.

Region IX, 75 Hawthorne Street, San Francisco, CA 94105, (415) 744-1305.

Region X, 1200 Sixth Avenue, Seattle, WA 98101-1128, (206) 553-1200.

Worker Health and Safety Information

Occupational Safety and Health Administration. OSHA offers a Web site —*http://www.osha.gov/safelinks.html*—that provides a list of safety and health information sources.

Rocky Mountain Center for Occupational and Environmental Health (a NIOSH Education and Research Center). Dedicated to the assessment and prevention of occupationally and environmentally related disease. *http://www-rocky.utah.edu/*.

Committees on Occupational Safety and Health (COSH) by State:

Alaska
Alaska Health Project
218 East 4th Avenue
90 Anchorage, AK 99501
907-276-2864
Fax: 907-279-3089

California
Worksafe/Francis Schreiberg
c/o San Fran. Labor Council
1188 Franklin St, Suite 203
San Francisco, CA 94109
415-433-5077(messages only)
Fax: 510-835-4913
fcs@kmes.com

LACOSH (Los Angeles)
5855 Venice Blvd.
Los Angeles, CA 90019
213-931-9000
Fax: 213-931-2255

SA-COSH (Sacramento)
c/o Fire Fighters, Local 522
3101 Stockton Blvd
Sacramento, CA 95820
916-442-4390
Fax: 916-446-3057
akatten@mother.com

SCCOSH (Santa Clara)
760 N. 1st Street, 2nd Fl.
San Jose, CA 95112
408-998-4050
Fax: 408-998-4051
sccosh@igc.org

Connecticut
ConnectiCOSH
77 Huyshope Ave., 2nd floor
Hartford, CT 06106
860-549-1877
Fax: 860-251-6049
connecticosh@snet.net

Illinois
CACOSH (Chicago Area)
c/o Mike Ross,UIC School of Public Health
Great Lakes Center,M/C-922
2121 West Taylor Street
Chicago, IL 60612-7260
312-996-2747
Fax:312-413-7369
ross-mc@uic.edu

Maine
Maine Labor Group on Health
Box V
Augusta, ME 04330
207-622-7823
Fax: 207-622-3483 or 207-623-4916
mlgh@mint.net

Maryland
Alice Hamilton Occupational Health Center
1310 Apple Avenue
Silver Spring, MD 20910-3354
301-565-4590
Fax: 301-565-4596/97
bc74@telnet.umd.edu

Massachusetts
MassCOSH
555 Amory Street
Boston, MA 02130
617-524-6686
Fax: 617-524-3508
masscosh@shore.net and
71112.600@compuserve.com

Western MassCOSH
458 Bridge Street
Springfield, MA 01103
413-731-0760
Fax: 413-731-6688
Masscosh@external.
umass.edu

Michigan
SEMCOSH (Southeast Michigan)
1550 Howard Street
Detroit, MI 48216
313-961-3345
Fax: 313-961-3588
semcosh@mich.com

Minnesota
MnCOSH
c/o Lyle Krych
5013 Girard Avenue North
Minneapolis, MN 55430
612-572-6997
Fax: 612-572-9826

New Hampshire
NHCOSH
110 Sheep Davis Road
Pembroke, NH 03275
603-226-0516
Fax: 603-225-1956
nhcosh@totalnetnh.net

New York
ALCOSH (Alleghany)
20 West 3rd Street, Suite 21
Jamestown, NY 14701
716-488-0720
Fax: 716-487-0968
alcosh@netsync.net

CNYCOSH (Central NY)
615 W. Genessee Street
Syracuse, NY 13204
315-471-6187
Fax 315-471-6193

ENYCOSH (Eastern NY)
c/o Larry Rafferty
121 Erie Blvd
Schenectady, NY 12305
518-372-4308
Fax: 518-393-3040

NYCOSH (NYC Metro)
275 Seventh Ave, 8th Floor
New York, NY 10001
212-627-3900
Fax: 212-627-9812
nycosh@compuserve.com

ROCOSH (Rochester)
46 Prince Street
Rochester, NY 14607
716-244-0420
Fax: 716-244-0956
SPULA@DBI.cc.
Rochester.edu or
BillBenet@aol.com

WYNCOSH (Western NY)
2495 Main Street, Suite 438
Buffalo, NY 14214
716-833-5416
Fax: 716-833-7507
ce385@freenet.buffalo.edu
jbieger@pce.net

North Carolina
NCOSH
P.O.Box 2514
Durham, NC 27715
919-286-9249
Fax: 919-286-4857
ncosh@igc.apc.org

Oregon
c/o Dick Edgington
ICWU-Portland
7440 SW 87 Street
Portland, OR 07223
503-244-8429

Pennsylvania
PhilaPOSH (Philadelphia)
3001 Walnut St, 5th Floor
Philadelphia, PA 19104
215-386-7000
Fax: 215-386-3529
philaposh@aol.com

Rhode Island
RICOSH
741 Westminster Street
Providence, RI 02903
401-751-2015
Fax: 401-751-7520

Wisconsin
WisCOSH
734 North 26th Street
Milwaukee, WI 53230
414-933-2338
Fax: 414-342-1998
wiscoshm@itis.com

5 appendix 5

Contributor Contact Information

Computers and Electronics Sector
Subcommittee Alternative Strategies Work Group

Dan Bartosh
Southwest Building Complex Facility
Texas Instruments, MS 910
13536 North Central Expressway
Dallas, TX 75243
972-995-2841
bartosh@ti.com

Sheri Fairbanks
South Coast Air Quality Management District
21865 East Copley Drive
Diamond Bar, CA 91765-4182
909-396-2383
sfairbanks@aqmd.gov

Nan Freeland
Clean Water Fund of North Carolina
11B Glenwood Ave. Cooper Square
Raleigh, NC 27603
919-832-7491
cwfnc2@igc.org

Ken Geiser
Toxic Use Reduction Institute
University of Massachusetts
One University Avenue
Lowell, MA 01854
978-934-3275
kgeiser@turi.org

Steve Harper
Intel Corporation
Government Affairs
Suite 300
1634 Eye Street, NW
Washington, DC 20006
202-626-4399
stephen.harper@intel.com

JoLani Hironaka
Santa Clara Center for Occupational
Safety and Health
760 North First Street, 2nd Floor
San Jose, CA 95112
408-998-4050
sccosh@igc.org

Roger Kanerva
Illinois EPA
1021 North Grand Avenue, East
Springfield, IL 62702
217-785-5735
EPA8500@epa.state.ill.us

Lee Lockie
South Coast Air Quality
Management District
21865 East Copley Drive
Diamond Bar, CA 91765
909-396-2390
llockie@aqmd.gov

Raphael Metzger
National Coalition of Hispanic Health & Human
Services Organizations
1501 16th Street, NW
Washington, D.C. 20036
202-797-4338
metzger@cossmho.org

Timothy Mohin
Corporate Environmental Affairs
Intel Corporation
CH 10-22
145 South 79th Street
Chandler, AZ 85226
602-552-3465
Timothy_J_Mohin@ccm.intel.com

Liz Moyer
Corporate Safety, Environmental,
and Health Staff
Texas Instruments, M.S. 8363
8330 LBJ Freeway
Dallas, TX 75265
972-997-5380
lizmoyer@ti.com

Christopher Rhodes
Institute for Interconnecting and
Packaging Electronic Circuits
2215 Sanders Road
Northbrook, IL 60062-6235
847-509-6135
rhodch@ipc.org

Ted Smith
Silicon Valley Toxics Coalition
760 North 1st Street
San Jose, CA 95112
408-287-6707
tsmith@igc.apc.org

Dave Stangis
Corporate Safety, Environmental Health and Safety
Intel Corporation
CH10-22
145 South 79th Street
Chandler, AZ 85226
602-552-2135
Dave_Stangis@ccm.intel.com

EPA Staff

John Bowser
U.S. EPA Headquarters-OPPTS
401 M Street, SW-7405
Washington, D.C. 20460
202-260-1771
bowser.john@epamail.epa.gov

Joe Callahan
U.S. EPA Headquarters
401 M Street, SW-7406
Washington, D.C. 20460
202-260-2436
callahan.joseph@epamail.epa.gov

Judy Kendall
U.S. EPA Headquarters
401 M Street, SW-7408
Washington, D.C. 20460
202-260-1802
kendall.judith@epamail.epa.gov

Karen Hoffman
U.S. EPA Headquarters-OPPTS
401 M Street, SW-7405
Washington, D.C. 20460
202-260-3454
hoffman.karen@epamail.epa.gov

Steve Hoover
U.S. EPA Headquarters
401 M Street, SW-2223A
Washington, D.C. 20460
202-564-7007
hoover.steven@epamail.epa.gov

Sylvia Horowitz
U.S. EPA Headquarters-OGC
401 M Street, SW-2388
Washington, D.C. 20460
202-260-5169
horwitz.sylvia@epamail.epa.gov

David B. Jones
U.S. EPA Region IX
75 Hawthorne Street (H-6)
San Francisco, CA 94105
415-744-2266
jones.davidb@epamail.epa.gov

Mike McDonell
U.S. EPA Headquarters-CBPB/EAD
401 M Street, SW-7408
Washington, D.C. 204 60
202-260-1477
mcdonell.mike@epamail.epa.gov

Janet Remmers
U.S. EPA Headquarters-CBPB/EAD
401 M Street, SW-7408
Washington, D.C. 20460
202-260-1583
remmers.janet@epamail.epa.gov

Tom Tillman
U.S. EPA Headquarters-CBPB/EAD
401 M Street, SW-7408
Washington, D.C. 20460
202-260-7605
tillman.thomas@epamail.epa.gov

The Authors

CDR Associates
100 Arapahoe Avenue, Suite 12
Boulder, CO 80302
303-442-7367
http://www.mediate.org
cdr@mediate.org

Frances M. Lynn,
Environmental Resource Program
University of North Carolina-Chapel Hill
262 Rosenaw, CB-7400
Chapel Hill, NC 27599-7400
919-286-2703
franlynn@mindspring.com