



Ecuador

Research for the Environment

During 1995 and 1996, GreenCOM was asked to provide communication assistance to support USAID/Ecuador's Environmental Strategic Objective: "Promote the sustainable use of natural resources, the conservation of biological diversity, and the control of pollution." This assistance went to five USAID-funded projects dealing with issues such as:

- Environmental education and communication
- Biodiversity
- Solid waste management
- Participatory evaluation
- Environmental policy development

GreenCOM's primary role was to conduct formative research to help these projects develop comprehensive communication strategies. Each project is discussed in the following pages.



Halting Introduction of Exotic Species

The uninhibited introduction of exotic species was increasingly threatening the unique ecosystem of the Galapagos Islands. To address this problem, GreenCOM was asked to assist the Charles Darwin Foundation and Research Station in creating a communication strategy to increase awareness of and compliance with a proposed quarantine system. GreenCOM provided technical assistance and training to research station staff in formative research, communications planning, and participatory processes. Project staff also conducted an assessment of the environmental education and communication activities of the

Darwin Foundation and Galapagos National Park and provided recommendations on how to strengthen their education and communication capacity.

To develop the communication strategy, in-depth interviews were first conducted with 40 decision makers representing key Galapagos stakeholder groups—government institutions, NGOs, the private sector, military, fisherfolk, and residents. The objectives of this research were to:

- Identify and describe how exotic species were introduced to the islands.

- Identify factors that affected (supported or impeded) the introduction of exotic species.
- Initiate a participatory communication process to involve Galapagos residents in developing and implementing the new quarantine system.

The results of this initial study helped GreenCOM and its partners make informed decisions as they developed the communication strategy for the quarantine system. The research also spawned a participatory process, facilitated initially by GreenCOM, that involved Galapagos residents from the beginning in creating the proposed quarantine system.

Research participants and other key decision makers and opinion leaders were invited to take part in a series of workshops to develop the first draft of a quarantine system implementation plan. More than 70 participants from three of the Galapagos Islands participated, including government and military officials, representatives of the transportation, tourism, and fishing industries, and other stakeholder groups. The result was a five-year quarantine system implementation plan and the creation of an inter-institutional team that would collaboratively develop, implement, and evaluate the education and communication strategy.



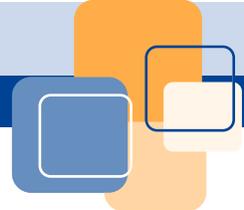
GreenCOM also conducted an assessment of the obstacles and opportunities for environmental education and communication interventions conducted by the Darwin Foundation and Galapagos National Park. The purpose of the assessment was to develop a framework for a process that would result in a collaborative environmental education and communication strategy that complemented, reinforced, and built on existing initiatives that promoted biodiversity conservation in the archipelago. The assessment report provided recommendations for immediate low- or no-cost actions, as well as long-term suggestions for increasing the impact of environmental education and communication in the Galapagos.

Machala: Innovations in Solid Waste Collection

In December 1994, the city of Machala began a pilot plan to collect solid waste with tricycles in four neighborhoods. Residents were required to put their trash in plastic containers on the street in front of their homes on the two days each week that were designated for collection. In March 1995, the tricycle collection service was extended to six neighborhoods.

USAID's Regional Housing and Urban Development Office for South America asked GreenCOM to support this initiative by conducting a market study and assisting in the development of a marketing strategy.

The market study, which was conducted a few months after the pilot site expansion, was designed to provide information for city decision makers on



the knowledge, attitudes, and practices of three distinct target audiences: pilot system clients, clients with regular trash collection service (by truck), and potential clients who did not have any collection service. The sample consisted of 300 people, 48 percent women and 52 percent men. The study objectives were to:

- **Explore** perceptions of the importance of solid waste collection in relation to other community problems.
- **Identify** factors that helped or hindered the adoption of practices needed to comply with the new system.
- **Determine** whether these target audiences knew how their current collection systems were paid for and how much they would be willing to pay for a regular garbage collection system.
- **Identify** the most appropriate and effective communication channels for the marketing campaign.

The results of this study were used to develop a marketing strategy for the new service the city developed, which was known as the Municipal Solid

Waste Collection and Street Cleaning Enterprise (MSWCE). The MSWCE was designed to apply commercial management principles to improve solid waste collection and disposal. An innovative part of this new enterprise included the development of three community-based businesses that would use tricycles to collect trash. The MSWCE was to work with neighborhood leaders to form the businesses, which were to be managed by up to 15 community members. The businesses would be incorporated and provided a \$40,000 loan to buy tricycles and a tractor for hauling trash to the landfill.

GreenCOM worked with the municipality to develop an MSWCE promotion, public relations, and publicity plan. Activities outlined in the plan included:

- **Support** the launch of the new municipal enterprise and community-based businesses.
- **Promote** compliance with collection services among clients.
- **Promote** direct payment for trash collection services over the long term.



SUBIR: Participatory, Community-Based Evaluation

The largest project in USAID/Ecuador's portfolio was SUBIR (Sustainable Use of Biological Resources), an initiative designed to develop and test economically, ecologically, and socially sustainable resource models in Ecuadorian parks and their buffer zones. GreenCOM supported this initiative in two ways. First, it designed the SUBIR project's creative strategy and promotional materials. Second, it developed and implemented a participatory community-based methodology to evaluate project impact.

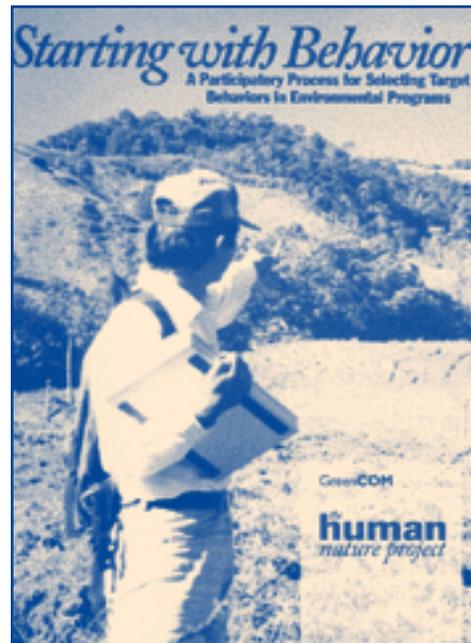
The methodology was developed in Cuellaje, a community in the buffer zone of the Cotacachi-Cayape Ecological Reserve. GreenCOM facilitated a participatory process involving SUBIR staff, extension agents, and stakeholders to develop behavioral objectives and indicators for the component on improved land use in the Cuellaje project site. GreenCOM then trained a team of local extension agents and farmers in designing, implementing, and analyzing the research needed to measure the level of behavior adoption and

identifying factors that could impede or facilitate their adoption in future project work.

The research was conducted in two communities where the project had been working—Magdalena, where the project had been for three years, and La Esperanza, where the project had operated for only one year. It consisted of structured observation developed from the list of ideal behaviors and through in-depth interviews that probed the problems participants had encountered when trying to adopt these practices and solicited their suggestions to resolve the problems. The interviews also asked participants which activities they wanted the project to support in the next phase.

GreenCOM trained the local team to analyze and present the research results at a workshop with community members from the villages where the research was conducted. The team graphed the observational data in colorful bar charts on large sheets of paper to make the information more understandable to community members. The workshop participants used the results to fine-tune and finalize the objectives and indicators and to develop recommendations for the project work plan and communication strategy.

In 1993, the municipality of Quito initiated a pilot



A detailed account of GreenCOM's work with the SUBIR project is found in *Starting with Behavior*.

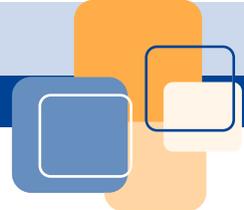
(Available online, <http://www.greencom.org>)

Quito Recycling Program Research

recycling program in several lower-middle and lower class neighborhoods. The goals of this program were to:

- **Establish** waste collection services in previously unserved areas.
- **Provide** employment opportunities to local people through microenterprises and non-profit
- **Generate** funds for neighborhood improvement projects.

The program required participating households to separate solid waste into three categories: organic, recyclable, and unusable waste. Each type of waste was picked up on a different day of the week. By 1995, the program was being implemented in 11 neighborhoods providing services to approximately 4,500 families, and the municipality planned to expand coverage to 40,000 households. Nevertheless, recycling levels in the pilot program neighborhoods had fallen over time. Estimates were



that, at best, only one-third of neighborhood residents actively participated in the program. The suspension of free garbage bag distribution had reportedly generated further resistance among customers.

Confronted with dwindling levels of recycling in pilot neighborhoods, the municipality of Quito wanted to understand the reasons for the decline and find ways to improve the system, including development of a communication strategy to promote recycling in the original neighborhoods and the new expansion areas. At the request of the municipality, GreenCOM worked with Corporación OIKOS, a leading Ecuadorian nonprofit organization, to conduct a study that would help determine:

- Why **compliance with program guidelines** had decreased over time.
- **Factors, including gender**, that influenced residents' decision to recycle.
- How to make the **benefits of participation** in the program more equitable for women.
- Appropriate **communication channels** that could be used to disseminate program messages.

The study was conceived in two phases: a qualitative phase and a quantitative phase. During the qualitative research phase, individual interviews and focus group discussions were conducted with



three types of residents in pilot program neighborhoods: members of neighborhood organizations, microenterprise personnel, and household members. The household members were also divided into two categories: recycling program participants and recycling program non-participants.

The results of this study indicated that women's involvement in program promotion would be a critical element in its success. Although men had more leadership positions in neighborhood committees, women performed most of the committees' daily activities and maintained relationships between the various committees within a municipality. The qualitative study also revealed that people's perceptions about the benefits of solid waste separation and recycling were shaped by four factors:

1. Whether they would **benefit financially** from recycling solid waste. (Before the pilot program began, many households had been selling glass and paper products directly to intermediaries who solicited door to door.)
2. Which **community development** projects were supported and how.
3. Whether participating would damage their **self image**. (Separating and recycling garbage were perceived by some as low-status behaviors).
4. How much **time and effort** were required to separate the waste.

Findings from the qualitative research resulted in the formation of several general hypotheses about which factors most influenced waste separation practices. These hypotheses, in turn, served as the conceptual basis for designing the quantitative study. Approximately 400 individuals in six neighborhoods were surveyed for the quantitative research (in four neighborhoods served by the pilot program and two proposed for future expansion.)

The study indicated that the most important factors influencing residents' decision to recycle were:

- **Knowledge** of the pilot program guidelines.
- **Satisfaction** with the waste collection service, particularly its reliability
- **Agreement** on giving waste with commercial value to collectors

- **Perceptions** of social pressure about separating waste

The results of this study were later used to develop the business and marketing plans for the recycling service.

"We Protect What We Value"

GreenCOM also supported Corporación OIKOS in developing a creative strategy for the "We Protect What We Value" campaign. The goal of that campaign was to promote the debate and passage of a new environmental law by the Ecuadorian legislature in a period of one to five years.

The GreenCOM/OIKOS creative strategy was designed primarily to influence 78 legislators, as well as the individuals and groups with influence over them (advisors and friends, private sector leaders, environmental NGOs, the president of Ecuador and his advisors, and middle and upper class opinion leaders).

The strategy proposed promoting environmental protection as a "permanently returnable investment." To counter the widespread perception that environmental protection hinders economic development, part of the strategy was to involve the private sector in the development and passage of the law. Specifically, the plan called for meetings with private sector representatives to involve them in writing the actual legislation. It also outlined private sector partnerships (with banks, local and

transnational industries, etc.) to sponsor advertisements that promoted passage of the law.

Another proposal described in the strategy focused on motivating secondary audiences to call or write their congressmen or sign a petition supporting passage of the law. An attractive flyer outlining salient points of the law and its benefits would be distributed at central locations such as banks, supermarkets, and pharmacies. Radio spots would encourage people to obtain a copy of the law (see box on page 7 for sample radio script) and a television spot would be used to motivate secondary audiences to take action (call, write, or sign a petition) to voice their support of the law.

To counter the widespread perception that environmental protection hinders economic development, part of the strategy was to involve the private sector.

Sample Radio Spot: “We Protect What We Value” Campaign

Sound effects: Bank sounds

Man: Is this where I make my investment?

Female bank teller (BT): Yes sir, right there at the counter.

Man: But there’s no one there to take my money.

BT: We don’t want your money, sir.

Man: Don’t want my money? Isn’t this a bank?

BT: We just want a few moments of your time to read the new environmental law, sir.

Man: Do I have to pay for it?

BT: Only if it doesn’t pass, sir.

Announcer: Pick up your free copy of the new environmental law at a bank or newsstand. Then call your congressman today.

Man: What’s in it for me?

BT: A cleaner, safer future for you and your children, sir.

Man: All for so little?

Announcer: The new environmental law. Investing today provides profits for the rest of your life.

BT: You can leave those bags of money on the way out if it makes you feel any better, sir.

Results and Lessons Learned

GreenCOM’s role in Ecuador was to conduct formative research to help USAID projects develop communication strategies. The projects were responsible for implementing, monitoring, and evaluating the strategies. Staff from the Darwin Foundation, SUBIR, and “We Protect What We Value” projects reported the following results and lessons learned.

Charles Darwin Foundation and Research Station

The Darwin Research Station created a communication and participation department that collaborated with the Galapagos National Park’s communications unit on a new program called Participation and Awareness for Invasive Species Control. This program targeted both national and international audiences and used environmental education, environmental communication, and community participation to achieve its goals.

SUBIR

As a result of their collaboration, GreenCOM and SUBIR staff published *Starting with Behavior: A Participatory Process for Selecting Target Behaviors in Environmental Programs*. This book describes the participatory evaluation methodology developed with Cuellaje community residents. *Starting with Behavior* proved to be one of GreenCOM’s most requested publications. SUBIR also requested training to help its staff apply this participatory evaluation methodology to all project sites and activities. The humanitarian organization CARE also used the methodology in its Latin American and African projects.

“We Protect What We Value”

Corporación OIKOS reported that the campaign strategy developed with GreenCOM was partially implemented over a period of two years. Specifically, a mass media campaign using radio,

television, print materials, and video focused on the campaign slogan and primary messages. Because of funding constraints, OIKOS was unable to conduct a pre- or post-implementation evaluation. Based on his own observations, the director of OIKOS felt that the mass media campaign did not have sufficient reach or frequency to achieve the intended impact. OIKOS continued to utilize the protect-value concept and slogan in other programs, including a communications campaign for Ecuador's Condor Bioserve., to motivate people to value natural resources.



Selected Publications and Products

Booth, Elizabeth Mills. *Starting with Behavior: A Participatory Process for Selecting Target Behaviors in Environmental Programs* (also in Spanish: *Todo empieza con el comportamiento: un proceso participativo para la selección de comportamientos en programas ambientales*). Washington, DC: Academy for Educational Development (AED), 1996.

Booth, Elizabeth Mills, and Orlando Hernandez. *Principal Results of a Market Study for a New Garbage Collection Service* (also in Spanish: *Principales resultados del estudio de mercadeo para un nuevo servicio de recolección de basura*). Washington, DC: AED, 1995.

Grieser, Mona, and Barbara Rawlins. *Issues in Urban and Rural Environments: GreenCOM Gender Reports*. Washington, DC: AED, 1996.

Hernandez, Orlando, and Barbara Rawlins. *Recycling by Men and Women in Quito Neighborhoods: Findings and Implications*. Washington, DC: AED, 1996.



GreenCOM

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