# Ecuador MEE: Indicadores para el Monitoreo y Evaluación del Manejo de las Áreas Naturales

### Organisation/ Affiliation

Instituto Equatoriano Florestal y de Areas Naturales y Vida Silvestre (Ecuador Institute of Forest, Natural Areas and Wildlife).

### **Primary reference**

Valarezo V., Andrade R., Díaz R., Celleri Y., Gómez, J. (1999) Informe sobre la Evaluación de la Eficiencia de Manejo del Sistema Nacional de Áreas Naturales Protegidas del Ecuador. Instituto Ecuatoriano Forestal y de Áreas Naturales y Vida Silvestre. Dirección Nacional de Áreas Naturales y Vida Silvestre/Proyecto de Protección de la Biodiversidad. Unidad Técnica de Planificación para Áreas Naturales Protegidas. Quito, Ecuador.

#### **Purposes**

√ for accountability/ audit (internal)

# **Brief description of methodology**

The methodology was developed to evaluate the management of Ecuador's national system of protected areas (SNAP), according to the objectives, legislation and regulations in the country. Themes, variables and parameters were adjusted to suit the country's conditions, and the indicators were grouped in three major areas: required resources, products achieved in the administration, and compliance of objectives, which allowed the introduction of the concepts of efficiency and efficacy.

Each aspect comprises several themes:

- Required resources: organization, cognition, knowledge, political, economic and technical-administrative
- Products achieved: ordering of the SNAP, organization, protected area protection, participation in the management and benefits and self-management.
- Compliance of objectives: according to the national conservation objectives establish in the strategy for the SNAP Ecuador.

Every theme has variables and every variable has indicators, so the methodology comprises four levels of organization.

The methodology encourages the involvement of all sectors related to the protected area management and the identification of key actors and informants through a thorough process to ensure the information is impartial and reliable.

# Objectives and application

The methodology was developed for Ecuador, with the objectives to identify the degree of compliance to the objectives and actions planned on the 1976 and 1989 Conservation Strategies and to understand the status of the SNAP administration as a basis to define the actions of the new Strategic Plan of the SNAP.

The methodology was applied in 1999 to 24 protected areas in Ecuador.

## **Origins**

The methodology was adapted from the methodology developed by de Faria (1993), Izurieta (1997) and the Manual for Assessing Management Effectiveness of the National Park of Galapagos (Cayot and Cruz 1998).

### Strengths

The methodology encourages the involvement of all sectors related to the protected area management and the identification of key actors and informants through a thorough process to ensure the information is impartial and reliable (Valarezo *et al.* 1999).

## How the methodology is implemented

Valarezo (1999) recommends that follow-up is needed to further improve the methodology and to establish ways to verify information through automatic systems and other available tools such as Geographic Information Systems. He also recommends that the monitoring should be done periodically and should involve all interest groups.

#### **Elements and indicators**

Every theme has variables and every variable has indicators, so the methodology comprises four levels of organization. In Valarezo *et al.* (1999), Annex 1, there is list of 11 themes, with a total of 33 variables and 124 indicators.

### Scoring and analysis

The score varies from 0 (absence or deficiency) to 4 (optimal condition) for each indicator, with the following percentages:

Level 1	0 to 30%;
Level 2	31 to 50%
Level 3	51 to 70%
Level 4	71 to 90%
Level 5	91 to 100%

#### References

Cayot, L. and F. Cruz (1998) Manual para la Evaluación de la Eficiencia de Manejo del Parque Nacional Galápagos. . SPNG- Servicio Parque Nacional Galápagos. Instituto Ecuatoriano Forestal y de Áreas Naturales y Vida Silvestre. Puerto Ayora, Islas Galápagos., Puerto Ayora, Galápagos, Ecuador.

de Faria, H. (1993) Elaboración de un Procedimiento para medir la efectividad de manejo de áreas silvestres protegidas y su aplicación en dos áreas protegidas de Costa Rica Tesis Mag. Scientiae. CATIE, Turrialba, Costa Rica.

Izurieta, A. (1997) Evaluación de la Eficiencia del Manejo de Areas Protegidas: Validación de una Metodología Aplicada a un Subsistema de Areas Protegidas y sus Zonas de Influencia, en el Area de Conservación OSA, Costa Rica. Tesis Mag. Scientiae. CATIE, Turrialba, Costa Rica.

Valarezo, V., R. Andrade, R. Díaz, Y. Célleri and J. Gómez (1999) Evaluación de la Eficiencia de manejo del Sistema Nacional de Áreas Naturales Protegidas del Ecuador INEFAN (Instituto Ecuatoriano Forestal y de Áreas Naturales y Vida Silvestre. Dirección Nacional de Áreas Naturales y Vida Silvestre/Proyecto de Protección de la Biodiversidad. Unidad Técnica de Planificación para Áreas Naturales Protegidas), Quito, Ecuador.