

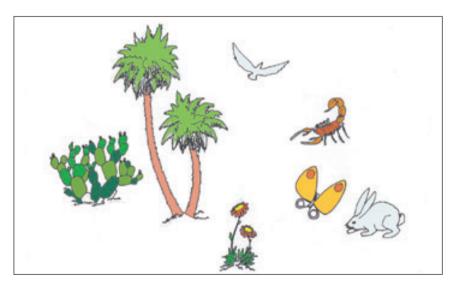
برنامج شمال إفريقيا مشروع التربية والمحافظة على التنوع البيولوجي

Programme pour l'Afrique du Nord Projet Education et Conservation de la Biodiversité

North Africa Program
Education and Biodiversity Conservation Project

02 L

## BIODIVERSITY



It is often said that variety is the spice of life; that any intelligent investor will not put all his eggs into one basket; that one cannot sit on a two-legged chair; and that man cannot live on one food alone. This is all obviously true; the great truth is that the diversified platform necessary for preserving the human race has not yet been given its just recognition.

# What is biodiversity?

Biodiversity in an area means the multiplicity of various spe-

cies, the genetic wealth of each species, and the relations between species and natural environments within which these beings evolve. This diversity, which it is possible to see and enjoy in our environment, is one of the great divine miracles. Unfortunately, it is gradually but constantly dwindling due to human activity, and this will have dangerous consequences for the future of mankind.

#### **Collective extinction**

Amazingly, we do not know how many living species there are. The number of known species is over 1.4 million, whilst the total number is thought to be between 5 and 30 million species! The destruction of these species' natural environments is dangerous - millions of these species will disappear without even being known.

The biodiversity existing on earth is the result of 3.6 million years of existence and evolution. Disappearance is part of the life process, in the sense that well-defined species die out because they fail to adapt to changing ambient conditions. But recently the rate of extinction has speeded up considerably. It is now between 1,000 and 10,000 times higher than the natural - that is, without man's intervention - rates.

### What are the reasons for species' dying out?

Many factors contribute to the extinction of species, mainly:

- 1. The decline or suppression of the natural milieu or environment: all flora and fauna depend on the environment where they live to procure their food and water nourishment, their shelter and their living space. These environments are increasingly disappearing because of the space requirements of a growing population for agricultural and industrial purposes and for urban expansion.
- 2. Pollution: various types of pollution are contributing to the disappearance of both flora and fauna. Turtles, for example, eat floating plastic bags, mistaking them for jelly-fish. They die or suffocate, because they have difficulty swallowing their food. Similarly, birds are likely to eat toxic products which farmers

spray to get rid of harmful insects.

3. Trade in wild animals: trade in big game threatens with extinction a number of species around the world. Although many laws have been passed to protect these endangered species, the tempting profits this trade holds out encourage traders to take the risk.

For example, the rhinoceros is hunted for its horn; in eastern countries this is used to make traditional daggers and is believed to have medicinal value.

The cactus and many other succulents are sold illegally, as are many species of parrot, whose marketing is against the law.

- 4. Exogenous species: when an alien species is introduced into a given area, it may have advantages which allow it to survive better than the native species. It may well thus threaten local species with extinction. In certain cases, the local species cross with the intruders, as happened with the African wild cat.
- 5. Unauthorized hunting: this practice is usually but not always linked to the sale of a determined species. The African wild dog, for example, has become one of the African carnivores most likely to become extinct because for a long time herders have hunted it down pitilessly.

# The importance of biodiversity

The diversity of life on this earth constitutes a vast collective gene bank; on these genes depends the natural selection of continuing creation processes, which engender increased diversity. This collective source also constitutes an important resource for humanity - of food, fuel, clothing, housing and health. Biodiversity also improves our lives in countless ways - new crops, of better quality; new medicines; the unforgettable sight of a flight of geese against the sunset. At a time when modern technology has considerably increased man's capacity to exploit nature, it has not done much to lessen our dependence on nature.

Living beings are not independent of each other, nor are they anaerobic. They are in fact linked to each other in various ways: think, for example, of the food chain. Starting from organic matter such as the soil, water and air it ends up with the basic systems for creation and supporting life, like water and carbon cycles.

Thus life's storehouse is far greater than the sum of its elements taken individually.

### What can you do?

- 1. The need for goods and services puts a strain on the environment. The less the use, the less this strain and the less the rate of use and consumption of the various resources and materials.
- 2. When a question is discussed about preserving biodiversity make sure your voice is heard: write a petition, contact the person concerned, write to the specialist institution, make your opinion public.
- 3. Add information on the subject and spread this among your friends, colleagues and family.
- 4. Take part in the activities of bodies concerned with protecting biodiversity.
- 5. A lot of people are certain that every living thing has the right to exist and that our role as protector of this planet is to make sure this existence is secured.

# Do you know?

That the equatorial wet forests are the world's most important areas from the point of view of biodiversity? That they contain over half the world's living species, in an area which covers only 7% of the world's surface not under the sea?

**References:** Environmental Facts (7 - sustainable agriculture), published by a group of non-governmental environmental organisations.

Realised by: National Centre for Environmental Protection

National coordinator: Dr. Abdelkader Abou Faed, National Centre for Environmental Protection, P.O. Box 83618, Tripoli, Libya

Tel: (218-21) 444 8452 - Fax: (218-21) 333 8098



Coordinateur Régional: Prof. Dr. Abdelhamid BELEMLIH

Société Protectrice des Animaux et de la Nature «SPANA» 41, Résidence Zohra, Harhoura 12 000 Témara - Maroc - Tél : (212-7) 74 72 09 - Fax : (212-7) 74 74 93 - E-mail : spana@mtds.net.ma