APES ACTIVITY: Interrelationships in Ecosystems

"THE DAY THEY PARACHUTED CATS INTO BORNEO"

About Borneo...

Borneo (politically divided between Indonesia, Malaysia and Brunei) is the third largest island in the world. It has an area of 743,330 km² (287,000 mi²), and is located at the centre of the Malay archipelago and Indonesia. Borneo is considered part of the geographic region of Southeast Asia.

The island historically had extensive rainforest cover, but the area is shrinking rapidly due to heavy logging for the needs of the Malaysian plywood industry and also multinational companies take their share. One half of the annual tropical timber acquisition of the whole world comes from Borneo. Furthermore, palm plantations are rapidly encroaching on the last remnants of primary rainforest. The rainforest was also greatly destroyed due to the forest fires in 1997 to 1998 which were started by humans and coincided with an exceptional drought season of El Niño.

This is a fun and quick activity that demonstrates the importance of the connections among the different components (both abiotic and biotic) in an ecosystem. It also illustrates how difficult it is for humans to identify all these components and their relationships. Arrange the following 13 events in chronological order. When you think you have the correct sequence, ask me for the answer. This is based on a real situation.

- 1) Rats brought the plague.
- 2) Rats increased.
- 3) Cats died.
- 4) Caterpillar numbers went up.
- 5) WHO (World Health Organization) sent DDT to Borneo.
- 6) Mosquitoes were wiped out.
- 7) Caterpillars ate grass roofs.
- 8) Cats were parachuted in.
- 9) Cats caught lizards containing DDT.
- 10) Roaches stored DDT in their bodies.
- 11) Lizards disappeared.
- 12) Lizards slowed down physically.
- 13) Lizards ate roaches and got DDT.