

EXHIBITING ANIMALS IN LARGE NATURALISTIC EXHIBIT: WITHOUT PREY OR PREDATOR

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Abstract

Modern zoos are increasingly inclined to exhibit animals in more naturalistic surroundings, often in large mixed species exhibits, and the Biodôme de Montréal is no exception. The Biodôme is subdivided into four sections representing specific ecosystems. The First ecosystem, the tropical rainforest, represents Amazonia and all species of trees and animals are from South America. The Laurentian forest, the St. Lawrence river, and the Polar world are the three other ecosystems similarly re-created. Trying to represent these ecosystems as realistically as possible is constant challenge.

Over the years, we have dealt with a fair number of problems resulting from interspecific encounters. Some of these interactions have led to the loss of valuable individuals while others have created challenges in disease control. For example, some digenea can be very hard to control in marine fish when the intermediate mollusc or bivalve hosts are also present in the exhibit.

Another problem with complex and large exhibits is that mortalities may go undetected, particularly if the specimens are small like passerine birds. At the Biodôme we have large colonies of ants that are quite effective at cleaning carcasses. The remaining bones are hard to identify. Without a carcass for necropsy, the cause of death can be difficult to ascertain!

Complex exhibits are also very attractive to pests such as mice and cockroaches. Even though we have invested in a good and expensive pest control program, problems can occur such as fatalities in callimicos due to lymphocytic choriomeningitis virus transmitted by mice. Insect control is a special challenge as birds are inclined to eat the parasiticides.

Finally, nutrition is another considerable concern in mixed species exhibits. How would you feed tortoises who share their quarters with greedy capybaras or prevent tanagers from eating the oranges intended for the tamarins?