

Abstract

There is generally accepted assumption that the probability of extinction risk increases with decreasing population size. But it's not sure at all, to what extent does this relation really work in real populations. The amount of studies dealing with this topic is on the increase, but still it's necessary to carry on researching. Previous results indicate that inspected connection is indeed true in many populations, in other words, preferential extinction of less abundant populations functions properly. Yet the dependence isn't as unambiguous and strong as expected. Many exceptions are known as well, which demonstrate that low number of individuals doesn't always have to be a disadvantage in terms of survival chance. Such deviations can be found both in paleontological papers and among current populations. For example, mass extinctions represent that kind of a special exception because each of them was probably driven by a different mechanism, so in one case the abundance could be an advantageous trait, whereas in another it was rather disadvantage.

In my work, I briefly mention themes referring to extinction in general and subsequently I try to summarize findings about the phenomenon of population size and its connection to extinction risk. On the basis of explorers' ideas and by means of particular populations of plants and animals I state both points of view representing pros and cons of that theoretical assumption.

Key words: extinction, population size, extinction risk, verification, assumption, connection