

GEOHAZARDS IN AZORES AND MARITIME ANTARCTICA

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Abstract

The Earth is going through a set of climate changes which constitutes a recent general hazard that has to be considered; it is a geohazard in the sense that it creates an effect that will be felt in the entire Earth; as a consequence, it has the power to create harder living conditions to humans. Two aspects will be considered in the talk. First, some geohazards associated with the Azores volcanic archipelago will be discussed and presented; second, the influence of the global warming will be discussed and presented in terms of the perils it represents for the entire Earth as well as to research activities in Antarctica.

The Azores volcanic archipelago is located in the triple junction of the Eurasian, North American and African plates. Its location makes the region ideal for studying earth sciences and, in particular, geohazards related with geological and meteorological phenomena. Since the XV century, when the first settlers arrived to the islands, several natural catastrophes happened and were responsible for thousands of deaths. To try to study and understand the geological and meteorological phenomena generating those catastrophes the research Institute for Volcanology and Risk Assessment (IVAR) was created in 1997 in the Azores University.

For the Antarctica and, in particular, for Maritime Antarctica the geohazards that will be considered have to do with the deterioration of research conditions and manmade structures that risk to collapse as a result of global warming.