Investigating the habitat suitability of the summer population of Bamdaj Wetland birds

Qasem Mansouri Fallahi¹ Olyagholi Khalilipour^{2*}

1. Master's student, Department of Environment, Faculty of Marine Natural Resources, Khorramshahr University of Marine Sciences and Technology, Khorramshahr, Iran.

2. Assistant Professor,
Department of Environment,
Faculty of Marine Natural
Resources, Khorramshahr
University of Marine Sciences and
Technology, Khorramshahr, Iran.

*Corresponding author: O.khalilipour@kmsu.ac.ir

Received date: 2020.06.24 Reception date: 2022.02.16

Abstract

Understanding the habitat needs of wildlife species, especially endangered species, is of great importance in wildlife management. The purpose of this study is to investigate the suitability of the summer population of birds in Bamadj wetland of Khuzestan province. In this study, all terrestrial and aquatic birds passing through Bamadjeh wetland in 49 stations in the whole wetland were identified and the factors affecting them were studied. Using field studies and reports of local communities and experts of the Environment Organization, the presence points of different bird species were identified. Environmental factors used as variables affecting the habitat suitability of the bird community included water depth, water temperature, air temperature, electrical conductivity, acidity, dissolved oxygen content and distance from the village. Habitat suitability was also determined by CCA analysis. The results showed that habitat suitability was significantly related to habitat characteristics and human disturbance. Also, among the eight environmental variables measured, acidity in the first affected variable and then water temperature and air temperature are important variables that affected on habitat suiability, respectively. The central axis and axis number one of Bamadj wetland with all their stations identified as more suitable places for summer birds.

Keywords: Bamdaj Wetland, Habitat, Migratory Birds, Environmental Factors and CCA.