Assessment of Bioclimatic comfort using different methods in the Chaldran Region's (in Iran)

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Abstract

Climate is one of the factors shaping the environment that directly affects human activities. The use of climatic elements in most planning, including planning for tourism, is of great use. So that tourists are looking for leisure time in areas that have a favorable climate. Favorable climatic conditions attract tourists and lead to the development of tourism. In this research, the natural and historical features of Chaldran were first introduced. And the Chaldran climates were categorized in the climatic classification of the De Martonne and Emberger. Then, the bioclimatic comfort of Chaldran city were analyzed using tourism climate index (TCI) and Thermo-hygrometric index (THI) in order to plan tourism development according to appropriate tourism seasons. For this purpose, the 13-year data of the Chaldran Synoptic Station between 2004 up to 2016 was used. The results of the TCI model indicate that April, May, and July, respectively, with a final coefficient of 72, 77, and 72, are very good conditions, and the months of June, August, September, and October, with a factor of 90, 82, 82, and 81, respectively, are excellent climatic conditions for tourists. The results of the THI model also showed that the month of May is cool and the months of June, July, August, and September have favorable climate conditions for tourism. In total, the comfort of climate for tourism in the Chaldran region, with a 75 percent coverage of the year, shows a special ability and special talent for tourism development.

Keywords: Climate Classification, Bioclimatic Comfort, TCI model, THI model, Chaldran, Tourism