

Desert Ecosystem Engineering Journal

Journal homepage: <u>http://deej.kashanu.ac.ir</u>



## Modeling of Land Degradation Assessment and EWSs of Desertification

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Received: Nov/01/2014

Accepted: Feb/04/2015

## Abstract

Land degradation is known in dry land as physical-environmental and economic-social phenomena that eventually lead to declining of soil fertility. Several processes are caused this as well as one of them is desertification. In this research attempted to modeling the process of desertification with use IMDPA model in a ten-year period in southeast coastal of Iran desert, the first. Finally, with define a threshold for each indicator of this model was presented an early warning system (D-EWSs). We concluded from the results of the warning map in climate criteria that study area has been in a non-linear trend for the cross thresholds. So that in the period of 2001-2004 the region has been crossed from thresholds and located in a range warning and then followed a rising trend. It should be noted that the results of the analysis in water benchmark indicated that in the 2001-2004 period the first had an upward trend and during the 2004-2005 year the ground water table increase enhanced dramatically. Ultimately according to improvement of precipitation in 2006 year it did reduce from its intensity.

Keywords: Assessment, Land degradation, Desertification, Early Warning System, IMDPA.

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