

عنوان مقاله:

Comparing Indices of NDBI, NDSI, SI, VSSI and BI to identify saline areas of Malayer plain

محل انتشار:

چهارمین کنفرانس بین المللی چالش های زیست محیطی و گاهشناسی درختی (سال: 1393)

تعداد صفحات اصل مقاله: 8

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خلاصه مقاله:

Salinity and soil salinization is one of the most important environmental hazards in arid and semi-arid areas. In recent years the use of satellite imagery and remote sensing methods to separate the saline areas is highly regarded Due to saving in time and costs. In this research, Landsat 8 Image, which was launched in February 11th 2013, was used to determine saline areas of Malayer plain. Five salinity indices were calculated using ENVI 4.7 software and the results were visually interpreted. The results showed that the best indices for separation of lands with intense salinity in Malayer plain area, were SI and BI indices respectively, which were well able to differentiate the lands with intense salinity. VSSI index also showed favorable results with less accuracy than SI and BI, but NDSI and NDBI couldn't differentiate the lands with intense salinity well and not recommended for separating saline soil in Malayer plain area.

کلمات کلیدی:

Saline soils, Salinity indices, Malayer plain, Remote sensing

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