

Analysis of the State of Degradation of the Endemic Argan Tree (*Argania spinosa* (L.) Skeels) in Morocco

Said Laaribya[✉]

Ibn Tofail University, Laboratory of Territories, Environment, and Development, Kenitra/MOROCCO

[✉]*Correspondence:* said.laaribya1@uit.ac.ma

Abstract: The argan grove is one of Morocco's most emblematic and endemic forest ecosystems, covering an estimated 871,210 hectares. Despite the low average density of its stands, the exceptional qualities of the argan tree (*Argania spinosa* (L.) Skeels) have made it a focus of attention for scientists, local communities, foresters, tourists and others. The aim of the study is to present a spatial remote sensing diagnosis of the forestry situation. The methodology adopted focused on the use of spatial remote sensing using high-resolution satellite images and field checks, which is proving to be a highly valuable tool, providing a synthetic overview and highly accurate spatial measurements. An analysis of the dynamics of argan areas reveals several indicators of degradation. Indeed, in addition to human activities, the de-densification of stands and the reduction in cover, the argan forest provides only a limited quantity of ecosystem services and retains only limited biological diversity. The urgent need to conserve the argan tree plantation urges the public authorities to take the necessary steps to reverse the degradation of this endemic specie in Morocco.

Keywords: GIS, Remote sensing, Vegetation indices, Degradation, Argan tree.