Poster Presentation

Phoenix species in Asia: A systematic review on research trends, status, distribution, ethnobotany and pharmacological activities

Santosh Ayer (Presenting and Corresponding author: ayer.sant@gmail.com)

College of Natural Resource Management, Agriculture and Forestry University, Katari, 56310, Nepal

Abstract

Phoenix species, with profound ecological, economic, and cultural significance, have garnered substantial attention in research across Asia. However, comprehensive study regarding research trends, status and distribution, ethnobotany and pharmacological activities of phoenix species especially in Asia is lacking. Therefore the objective of this study is to compile the relevant information on the research trends, status, distribution, ethnobotany and pharmacological activities of different *Phoenix* sps in Asia. We used the Preferred Reporting Items for Systematic Reviews and Meta Analyses (PRISMA) method for systematically reviewing the literature related to *Phoenix* species in Asia. This comprehensive review analyzes research trends on Phoenix species in Asia from 2000 to 2023. A total of 42 studies were identified, showcasing a growing interest, with a notable peak in publications in 2019. The temporal distribution suggests fluctuating attention over the years. Geographically, the concentration of studies is limited to 12 out of 48 Asian countries, emphasizing the need for more extensive exploration given the widespread availability of *Phoenix* species. The research primarily focuses on pharmacology, followed by ethnobotany, morphology, taxonomy, material science, environmental engineering, and ecology. Notably, studies disproportionately concentrate on Phoenix dactylifera, leaving other species underexplored. The analysis of research focus, species distribution, and geographical representation underscores the importance of diversifying research themes and exploring the ecological, economic, and cultural significance of lesser-studied Phoenix species across Asia. The findings highlight both the growing interest and existing gaps in our knowledge, urging for a more comprehensive exploration of the entire genus to unravel its full potential and significance across Asian landscapes.

Keywords: Phoenix species, Research trend, Ethnobotany, Multipurpose plant, Asia