

Avian diversity and species composition along elevation at Doon valley forest of Dehradun district (Garhwal Himalaya) in Uttarakhand state, India

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ABSTRACT

Species diversity and community composition of birds change rapidly along elevation gradient, particularly in tropical and subtropical regions. Total 118 species (18082 individuals) belonging to 41 families were reported along the elevation at Doon valley forest of Dehradun district. Avian species composition exhibits fluctuation along the elevations. Diversity indices in terms of diversity, richness and non parameter estimator values (Chao I, Chao II and Jackknife) indicate the same patterns and the indices values were found highest at (1358m) mid elevation zone of the study range (325 m- 2300 m asl). Increase species richness at 1358m asl in our study be connected to the vegetation variety which emerge to retain the presence of Shelter and other food resources. However, poor abundance of galliformes (Red jungle fowl, Kaleej and Indian pea fowl) is due to hunting in the Doon valley region and the presence of two new records like White rumped munia, Red whiskered bulbul and endangered species Egyptian vulture and two near threatened species viz. River lapwing and Alexandrine parakeet concerns the conservation of birds in this area.

Key words: Diversity, Richness, Chao I, Chao II, Jackknife