Research Article

Population size and factors affecting the distribution of *Pelecanus philippensis* (Pelecaniformes: Pelicanidae) in Colombo district, the Western province of Sri Lanka

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ABSTRACT

Spot-billed Pelican (*Pelecanus philippensis*) is a near-threatened bird found only in South and Southeast Asia. Colombo, the commercial capital of Sri Lanka, holds a naturalized population of *P. philippensis* released from captive collections of the National Zoological Gardens, Dehiwala. This study was conducted to investigate the distribution of *P. philippensis* and assess its population size in the Colombo district. We measured environmental variables and counted the number of birds foraging in all the water bodies with surface area $>0.05 \text{Km}^2$. The rest of the water bodies were also observed to record the presence of pelicans. A roosting count of pelicans was conducted from April to December 2020 to assess their population size. *P. philippensis* was distributed in 14 lentic water bodies within the Colombo district and its minimum estimated population size was 193 individuals. Land-use patterns around the water body did not significantly impact (P>0.05) the distribution of pelicans. They were not recorded in water bodies with more than 10% vegetation cover. The abundance of *P. philippensis* in foraging sites was positively related to the chlorophyll-a content of the water (P<0.05). As it is the flagship faunal species in Colombo, its conservation needs immediate action from relevant authorities.

Keywords: Spot-billed Pelican, Abundance, Urban, Water bodies, Environmental variables

