

## News Release

# Rapid declines of waterbirds in Perur Lake, Coimbatore

Parameswaran, G., Sivashankar, R., & Vridhi, R. 2023. Rapid decline of waterbirds in urban wetlands: A case study from Perur-Sundakamuthur Lake, Coimbatore, Tamil Nadu, India. *Indian BIRDS* 19(3) 67-74.

Link to the published article: [https://indianbirds.in/pdfs/IB\\_19\\_3\\_ParameswaranETAL\\_UrbanWetlands.pdf](https://indianbirds.in/pdfs/IB_19_3_ParameswaranETAL_UrbanWetlands.pdf)

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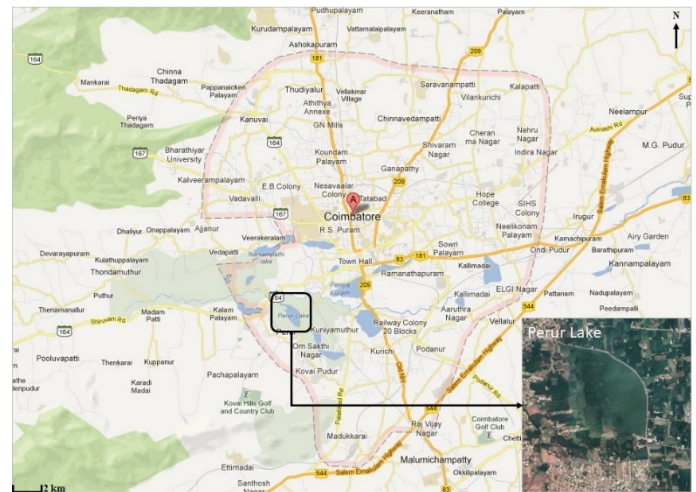
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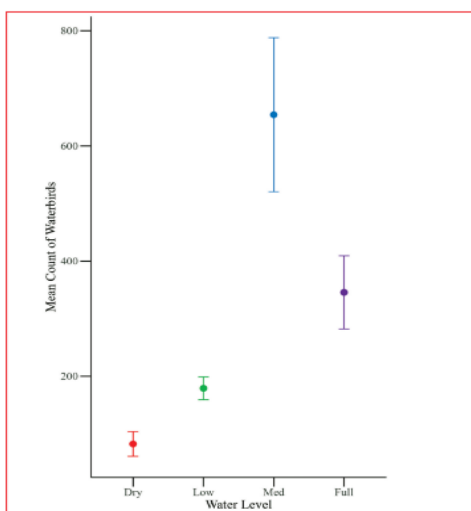
<sup>(4)</sup> Associated with “Perur Lake Forum,” a volunteer organization that is involved in community-based Citizen Science in Coimbatore (<https://perurlakeforum.org/>).

**Introduction & Methodology:** This paper presents the result of the first six years of our ongoing long-term systematic monitoring of birds in an urban wetland, Perur-Sundakamuthur Lake (hereinafter, Perur Lake), conducted between 2014 and 2020. Perur Lake (10.97°N, 76.93°E) lies in the southwestern corner of metropolitan Coimbatore, Tamil Nadu in the vicinity of the Noyyal River.

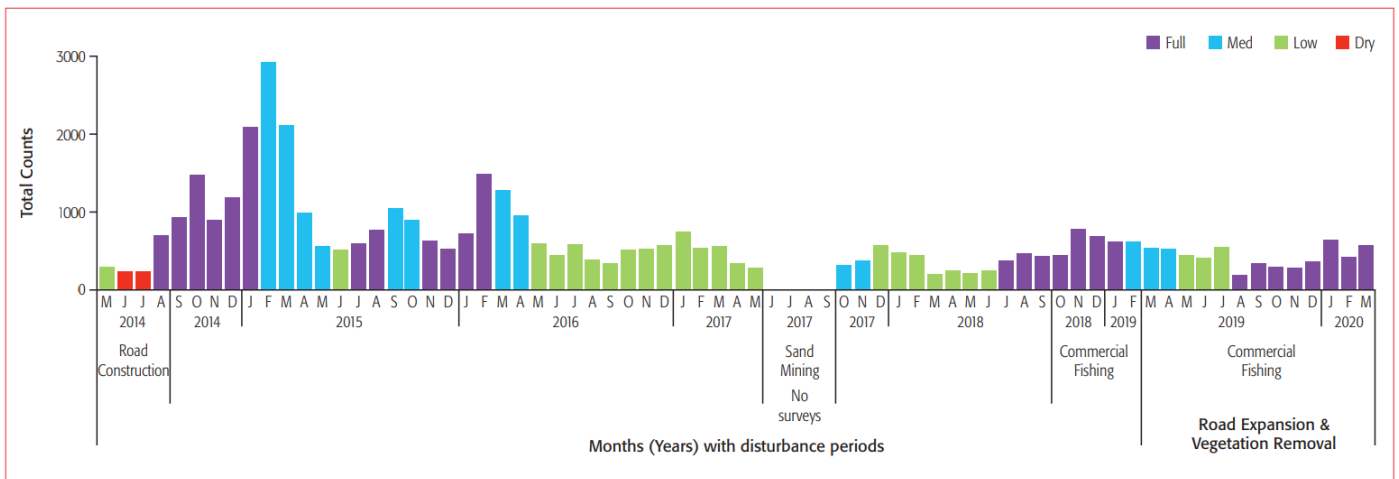
This monthly survey was usually done on second Saturdays by walking around the fixed 2 km transect and recording the birds in a checklist. During the six years, there were 67 actual monthly counts conducted amounting to c.540 hours of volunteer time. We also developed a method to quantify the status of birds in the lake based on our field experience.



**Results:** We recorded 125 species in Perur Lake; including 49 residents, 21 winter migrants, 15 local migrants and 40 of uncertain status. Of the 49 waterbird species documented, we observed that 29 thrived when water levels were medium. Several waterbirds declined steeply during our study period, especially the twelve representative species, which varied from 41% to 100%.



**Conclusion:** Our study emphasizes the importance of the population of common waterbirds for assessing the wetland ecosystem. We observed that the sand mining activity disfigured the wetland, and the commercial fishing maintained the water levels artificially high by disrupting its natural flow. In addition, the road expansion removed vegetation and encroached into the wetland area. Our data analysis indicates that the above-mentioned human actions played a significant role in the decline of common waterbirds in Perur Lake.



The functions of the wetland are storing water for agriculture, flood control, groundwater recharge, water purification, nutrient retention, and biodiversity conservation. India currently is home to 17.8% of the world population living in an area of only 2.42% of the Earth’s surface. Therefore, even a small loss of wetland area has a larger impact within the country.

We urge the administrative institutions whether they be national, state, or local to manage our wetlands as responsible stewards rather than enablers for unsustainable resource extraction that seriously disrupts its ecosystem.