



Short Review Paper

First record of black-headed ibis (*threskiornis melanocephalus*) in Virar, Taluka Vasai, District Palghar, Maharashtra, India

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Abstract

Virar, a small town; located in the sub-urban area north west of Mumbai, is a quiet and peaceful place compared to its adjacent metropolitan city. In the lap of nature this city is blessed with exquisite flora and fauna and comparatively with its neighboring metropolitan region of Mumbai it has been a slow in development of infrastructure, which is one of the main reasons behind the huge numbers of birds seeking refuge in this heaven of a place. The climate here is tropical in nature and suits well for a number of birds and animals. The town is blessed with an abundance of wetlands, mud pits, grasslands, marshy swamps and mangroves widespread across the coastal regions. There are a few hilly areas and dense forests too. Located approximately 61kms from Mumbai, Virar; has become a safe haven for wading birds because of its rich natural water and food source. Birds (waders especially) migrating above this town usually land here for a few months and some decide to become migratory- residents as well, because of the abundance of wetlands and grasslands. They nest here; some have even started breeding here and now – a day's one can spot birds here in their multiple forms i.e. right from being a juvenile – to their breeding plumage state -- to their fully grown mature state. The soil here is rich in Nitrate and wetlands are filled with crabs, bees, frogs, snails, fishes, underwater plants, algae, earthworms, mangrove trees in the salty marshy mud pits and trees with fruit(berries like black currant, white currant etc.) and flowers. Foraging food out of this nutritional soil is very easy for birds as they have complete safety here as only a few or none of humans visit the wetlands. Rice fields in between the patches of wetlands create a perfect hideout for these birds giving them complete privacy and safety from predation by other larger birds of prey. Over the past few years there has been a substantial increase in the numbers of the migratory birds. The main reason behind this is the better air quality and less pollution than the major cities located nearby. Birds here are able to scavenge food very easily as they don't have to fight for it due to its abundance. Thus they are getting healthier and growing perfectly in an unmonitored environment. Over the past 2 decades many birds have visited and migrated here in huge number of flocks and the numbers are increasing every year with newer species coming to visit every year. As the wetlands remain untouched by humans and no heavy construction or expansion of urban life is being imposed on the birds. They have their independence here to fly, forage and live uninterruptedly. Before 2019 there has been no record yet of Black-headed ibis sitting in the rice fields and grasslands of Virar. This year was the first ever year they decided to visit and stay; and documented record shots were taken of their arrival.

Keywords:

Introduction

The black-headed IBIS (*threskiornis melanocephalus*) also known from its various other aliases like the Asian White ibis, the Oriental white ibis or the Indian ibis or commonly known as the Black – necked Ibis, belongs to the wading species of birds; from the ibis family Threskiornithidae. They breed right from Japan to India in Southeast Asia. This is the only Ibis species in this range which has white plumage overall with a Black neck. Their legs are pitching black in color as well. They have a down-curved beak which is also black accompanied with their black colored head. They have unique features and designs which make them easy to spot yet differentiate among other waders and their rest of Ibis family. Monsoon is the nesting

season of Ibis and this year they chose to nest in Virar because of its abundance in food resources and safety. Ibis are naturally shy birds and very aware of their surroundings. While they can survive in humanly developed cities and manmade habitats they prefer the naturally available wetlands and grasslands. They are on the larger sized ratio of the water bird wading species in Asia and Southeast Asia. The Adults Measure up to 67-73cms lengthwise. Their white plumage stands out with contrast to their black neck and head. They are silent in nature and very aware and alert. They have a very poor voice producing mechanism which makes it even difficult for a birder to spot them as their calls are often unheard of and go as an undertone among other waders, so their presence is unnoticed at times when they wade alongside of herons spoonbills and other

wading birds. They nest on trees or in grass (rice fields preferably). The Majority of their population is Native to China, Hong Kong, Vietnam, Bangladesh, Russia, Pakistan, Philippines, Myanmar, Bhutan, India and as west as Sumatra and Sri-Lanka. In India they breed and reside in the state of Rajasthan and Uttar Pradesh mainly among other few places.

The Black Headed ibis is categorized in “Schedule IV” under the Indian Wildlife Protection Act (1972), while as “Near Threatened” by IUCN (International Union for Conservation of Nature) because of decreasing population status from the last few decades. There are only 22000 of them left in the world as of total currently. And almost half of this population resides in Southeast Asia. The Black headed Ibis chose to reside and refuge in the wetlands of Virar because here there is no visible human threat to their life, the purity of water and a abundance of flora giving them proper sources for survival also since all the

nearby wetlands near Mumbai and other places are exhausting and depleting due to encroachments and Industrial wastes thrown into creeks and wet lands, Virar has turned out as a Oasis for these birds, since the pollution here is at its lowest. This was the First time Oriental Ibis were recorded sitting and flying in flocks and staying here over a quarterly period in the middle of monsoon rains. The Sightings started this year around June 2019 and by the mid of August 2019 the number kept on increasing. We got a closer look into their habitat by daily travelling to these wetlands and observing them for more than 60 days, everyday doing their daily activities. The flock that was first recorded by us flying was one of the largest flocks of ibis to be ever seen flying in India. The number was in the 3000's easily. The Flock included Glossy Ibis with a few spoonbills And a Few Black – Headed Ibis. The number of mature Black headed ibis is less than 12000 in the whole world and decreasing drastically.



Figure-1: Migratory Flock of 3000 Ibis (mixed Glossy Ibis and Black Headed) flying over the wetlands in Virar on June 3rd 2019.



Figure-2: Flock in Search of a perfect spot to land and nest in the wetlands of Virar on June 7th 2019.



Figure-3: Record shot of a landed flock in the wetlands of Virar on July 4th 2019.



Figure-4: Flock that arrived on 9th July 2019.



Figure-5: A Juvenile with a fully mature ibis arrived on 9th July 2019.



Figure-6: Shot (close up) of a 3 Black Headed Ibis just about to land and in Virar wetlands on July 11th 2019 in rains.



Figure-7: Shot of Oriental ibis (juvenile) wading in wetlands of Virar on 23rd July 2019.



Figure-8: Shot of Oriental ibis (juvenile) alongside cattle egret in its nesting place among grass made nest on 10th August 2019.

Distribution and Lifestyle

We as birders will always welcome such beautiful birds to our humble town and try to help in conserving them by keeping our surroundings pollution free for them. We were fortunate enough to witness them and we also have records of them wading in

waters flying all over the city and settling down on our cameras in photographic as well as video graphic formats. To pin point the exact locations as to where these birds have taken refuge and settlements here are some aerial shots of our wetlands of Virar from Google maps along with the Distribution explained in pictorial format:

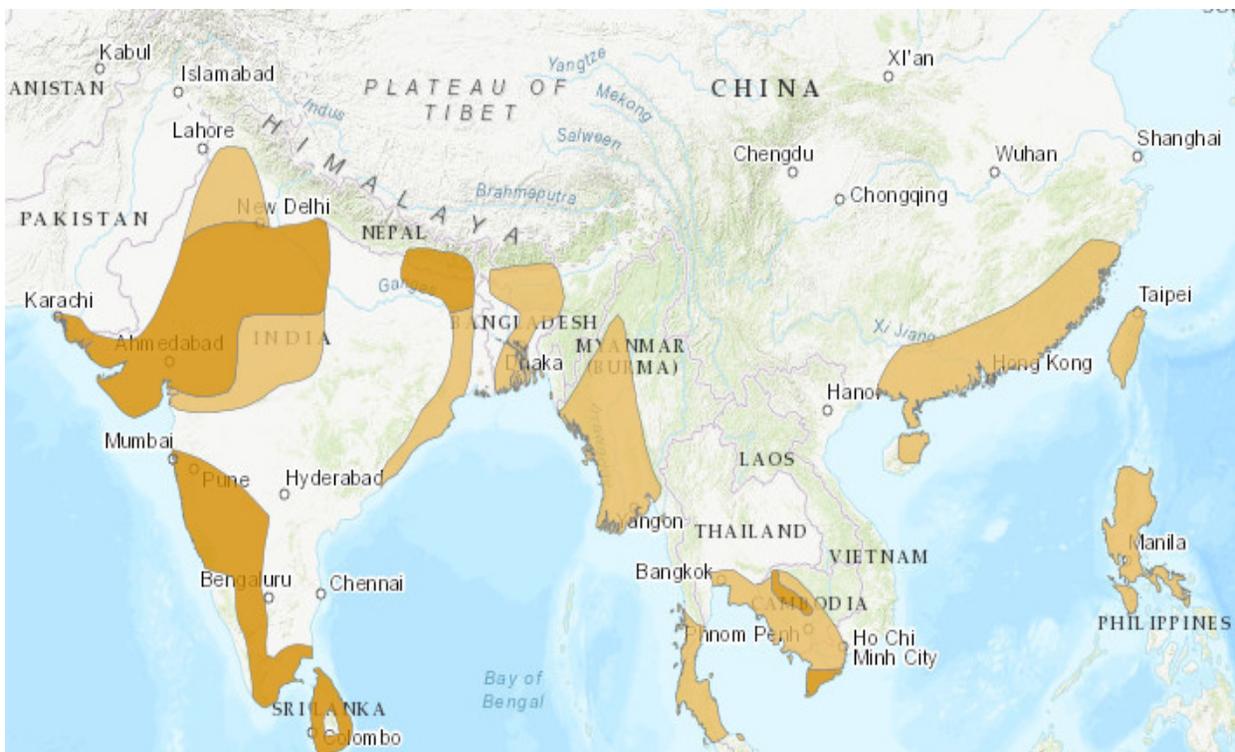


Figure-9: Map of Asian Distribution of Black-Headed Ibis (Yellow highlighted regions are the distribution hotspots of oriental ibis).

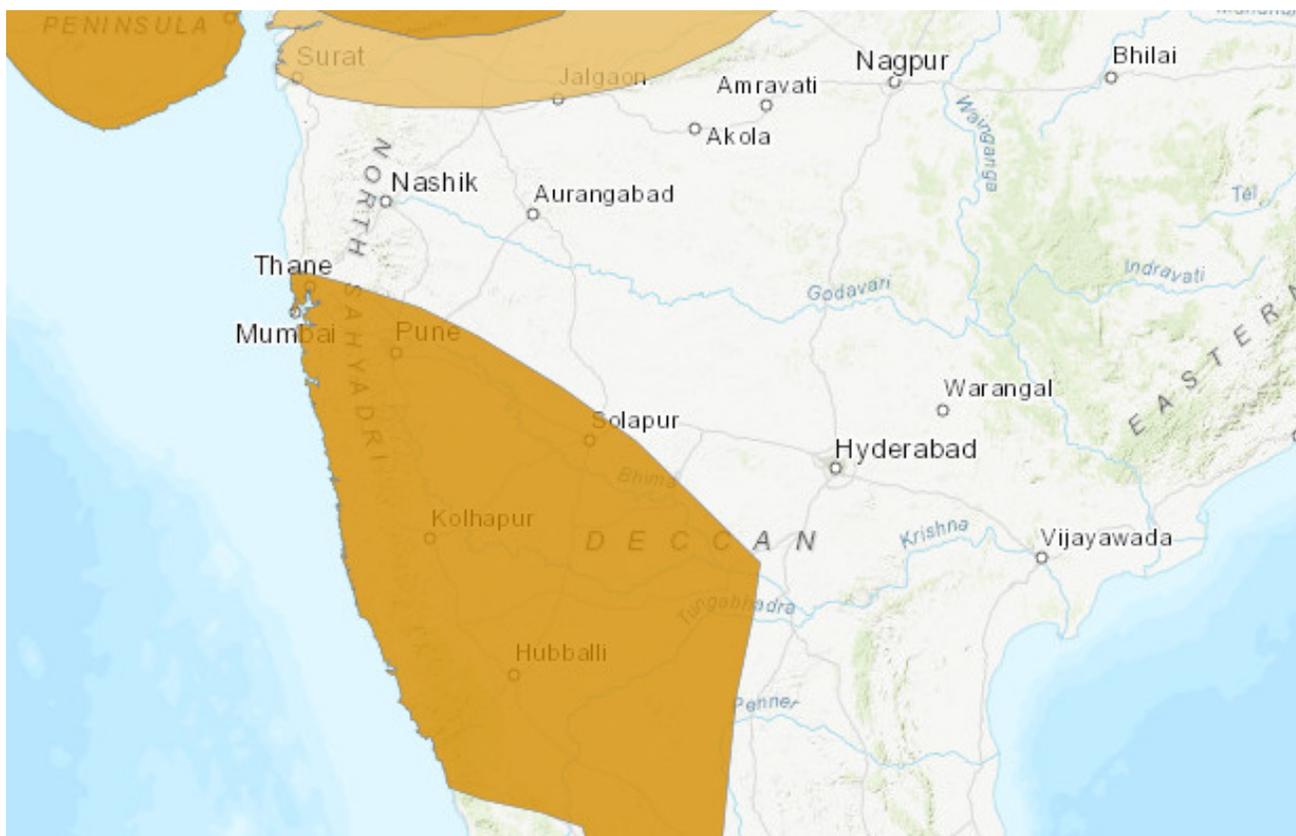


Figure-10: Map of Maharashtra, India alongside distribution.



Figure-11: Map of Virar Satellite view Real time.



Figure-12: Ibis Residence spots (Green area of the map).

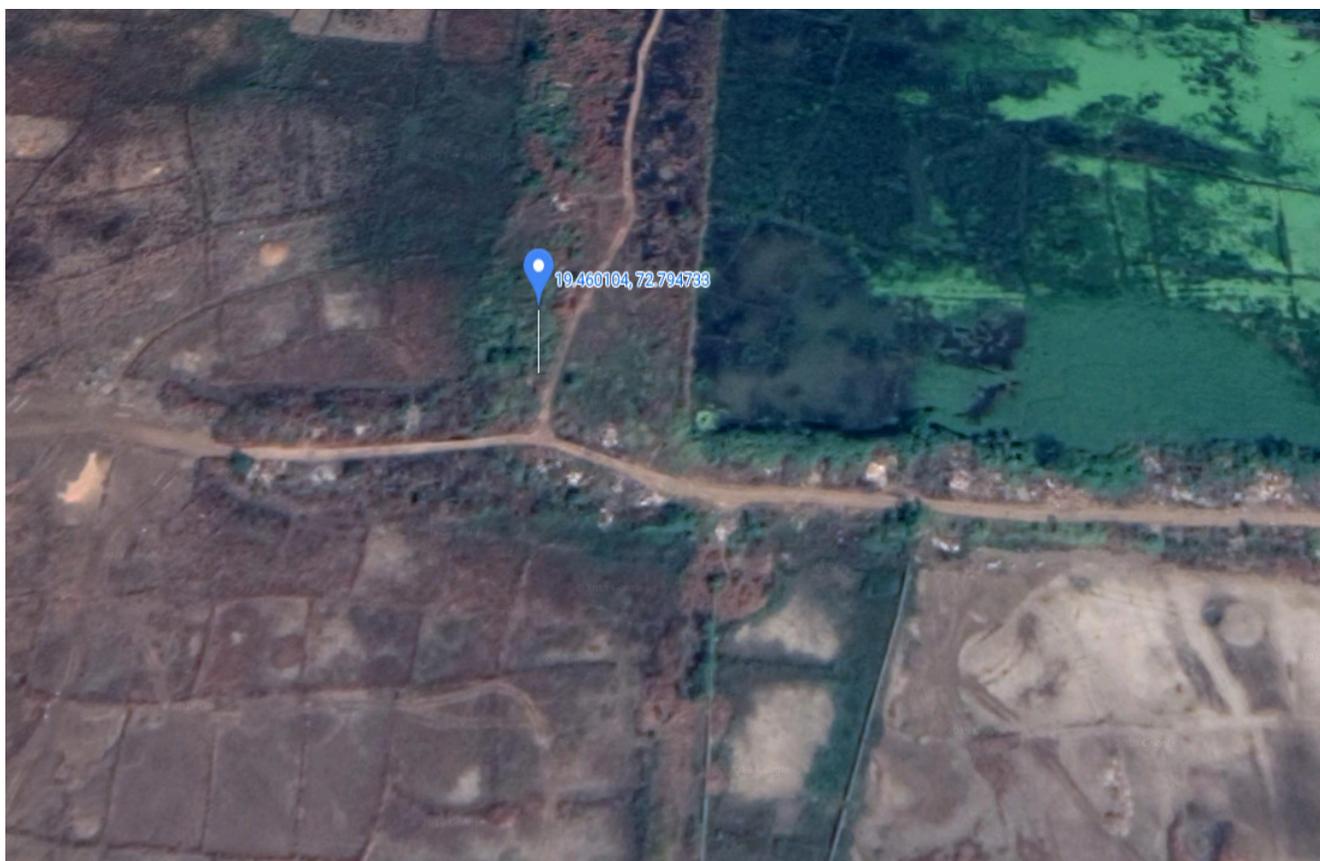


Figure-13: Exact pin pointed coordinates of Oriental Ibis record sightings and Nesting area (Via Google maps).

The study area was located behind the new viva college where this grassland is located. The exact coordinates of the record were 19.460301, 72.794652. To get to this place is a 15minute walk from Virar Station. There are a lot of different species of waders and perching birds as well as birds of prey that live in this area. Walking everyday to this place we finally found the Oriental Ibis sitting in the rains eating frogs and fishes as we recorded it on our Cameras. This was the first time ever a black headed was spotted and recorded sitting on the wetlands of Virar. This was a historically remarkable spotting as it was the only and First ever record of a sitting Black headed ibis to be captured and photo video graphed in Virar Oriental Ibis are a near threatened species and for such a rare species to chose residing here in our hometown which is not even on the world distribution map for them residing here , nesting here and breeding here, just shows the amount of potential the wetlands of virar hold if they can refuge a rare neat threatened bird like Black headed Ibis, it is completely natural and possible that someday if we conserve the nature and lands that we have here, we might make this eco system suitable for other wading birds such as cranes and pelicans too.

Observation

In the three months that we observed their behavior and habitat in the tropical wetlands of Virar we learned a lot about them.

They mainly chose this place to visit and nest and breed and reside because of abundance of food in fresh water as well as saltwater pans, as Virar is on the coastal stretch of Maharashtra. Also no human hunting or killing or trafficking of any kind takes place here. So they are safe from human encounters. Also the Air quality and water quality here is, much better than other places because of low carbon footprint the eco system in Virar is flourishing and deteriorating at very much slower rates than the metropolitan regions of Mumbai. So if preserved well this could well be a proper breeding ground and nesting refuge for such rare birds in the near future.

References

1. Tiwari J.K. and Rahmani A.R. (1998). Large heronries in Kutch and the nesting of Glossy Ibis *Plegadis falcinellus* at Luna jheel, Kutch, Gujarat, India. *Journal-Bombay Natural History Society*, 95, 67-70.
2. Ali S. and Ripley S.D. (2007). Handbook of the birds of India and Pakistan. Bombay Natural History Society and Oxford University Press.
3. Bird Life International (2012). *Threskiornis melanocephalus*. The IUCN Red List of Threatened Species 2012, e.T22697516A37830989.

4. Chaudhury S. and Koli V.K. (2016). Carcass feeding by Black-headed Ibis *Threskiornis melanocephalus*. *Indian Birds*, 12, 26.
5. Frederick P.C. and Bildstein K.L. (1992). Foraging ecology of seven species of neotropical ibises (Threskiornithidae) during the dry season in the Llanos of Venezuela. *Wilson Bulletin*, 104(1), 1-21.
6. Kushlan J.A. (1981). Resource use strategies of wading birds. *The Wilson Bulletin*, 145-163.