Syllabus subtopic: Conservation, Environmental Pollution and Degradation, Environmental Impact Assessment.

Prelims and Mains focus: about the report: key findings and recommendations

News: The State of India’s Birds 2020 (SoIB), a new scientific report was jointly released by 10 organisations that included ATREE, BNHS, Foundation for Ecological Security, NCF, National Biodiversity Authority of India, National Centre for Biological Sciences, SACON (Salim Ali Centre for Ornithology and Natural History), Wetlands International, WII and WWF.

About the report

- The SoIB was produced using a base of 867 species (among 1,333 birds ever recorded in India), and analysed with the help of data uploaded by birdwatchers to the online platform, eBird. Adequate data on how birds fared over a period of over 25 years (long-term trend) are available only for 261 species. Current annual trends are calculated over a five-year period.

- The report is built on a large-scale collaborative effort between thousands of citizen birders and a consortium of researchers across multiple institutions.

Key findings of the report

- Over a fifth of India’s bird diversity, ranging from the Short-toed Snake Eagle to the Sirkeer Malkoha, has suffered strong long-term declines over a 25-year period, while more recent annual trends point to a drastic 80% loss among several common birds.

- The report raises the alarm that several spectacular birds, many of them endemic to the sub-continent, face a growing threat from loss of habitat due to human activity, widespread presence of toxins including pesticides, hunting and trapping for the pet trade.

- Diminishing population sizes of many birds because of one factor brings
them closer to extinction because of the accelerated effects of others. For every bird species that was found to be increasing in numbers over the long term, 11 have suffered losses, some catastrophically.

- **Of 101 species** categorised as being of High Conservation Concern — 59 based on range and abundance and the rest included from high-risk birds on the IUCN Red List — endemics such as the Rufous-fronted Prinia, Nilgiri Thrush, Nilgiri Pipit and Indian vulture were confirmed as suffering current decline, and all except 13 had a restricted or highly restricted range, indicating greater vulnerability to man-made threats.

- Among widely known species, the common sparrow, long seen as declining in urban spaces, **has a stable population overall**, although the data from major cities such as Mumbai, Delhi, Kolkata, Bengaluru, Hyderabad and Chennai confirm the view that they have become rare in cities and urban areas. Among the possible reasons for this is a decrease in insect populations as well as nesting places, but there is no conclusive evidence in the scientific literature on radiation from mobile phone towers playing a part.

- **Peafowl (peacock)**, on the other hand, are rising in numbers, expanding their range into places such as Kerala, which is drying overall, and areas in the Thar desert where canals and irrigation have been introduced. **Stricter protection for peacocks** under law also could be at work.

- One of India’s major conservation concerns, the **Great Indian Bustard (GIB)**, is being brought back from the brink. Having **lost about 90% of its population and range** over a five-decade period, a viable population of GIB at Jaisalmer in Rajasthan is the focus of programmes run by the Bombay Natural History Society (BNHS), Wildlife Institute of India (WII), Birdlife International and other agencies, to eliminate the threat of fatal collisions with power lines.

- **Raptors**: Looking at the health of avifauna based on scientific groupings such as raptors (birds of prey), habitat, diet, migratory status and endemicity (exclusively found in an area), the analysis concludes that
raptors overall are in decline, with ‘open country’ species such as the Pallid and Montagu Harriers, White-bellied Sea Eagle and Red-necked Falcon suffering the most. The severe long-term decline of vultures, recorded and analysed for years now, is underscored by the report.

- **Migratory shorebirds**, along with gulls and terns, seem to have declined the most among waterbirds, the report states, consistent with population trends among Arctic-breeding shorebirds based on independent assessments. **Within India, the losses suffered by resident waterbirds**, particularly in the past five years, calls for detailed investigation.

- From a dietary viewpoint, meat-eater populations have fallen by half, and birds that depend on insects exclusively have also suffered over the long term. But there has been some stabilisation for omnivores, seed and fruit eaters in recent years. Habitat impacts have decimated ‘specialist’ birds, which need specific environmental conditions to survive, particularly those dependent on forests. This is followed by declines in numbers of grassland, scrubland and wetland species, the researchers said, calling for urgent investigation into the causes.

**Suggestions given in the report**

- Forward-looking actions suggested by the report include an update to the Red List of endangered species published by IUCN (International Union for Conservation of Nature) using the SoIB, collaborative research by scientists and citizens aided by policy with special emphasis on removing gaps in data, and urgent emphasis on habitats of species of high concern, notably grasslands, scrublands, wetlands and the Western Ghats.