

- **Reader Digest**
- **Magazine**
- **True Stories**
- **Inspirational Stories**
- **May 2017**

## Everyday Heroes: Eco-warrior Extraordinaire

*A one-man army fights for the East Kolkata Wetlands that hold the key to the city's survival*

By Devalina Mookerjee



If heroism is measured by the number of people it impacts, the act of trying to save an entire metropolis from itself must rank quite high on the list. This is what Dhrubajyoti Ghosh, 70, engineer, ecologist and defender of the East Kolkata Wetlands (EKW) has been doing since the early 1980s.

"Why is the cost of living so low in Kolkata?" Ghosh asks. He explains that this is because of the EKW, an approximately 12,500-hectare system of transformed wetlands comprising waterbodies, vegetable gardens and paddy fields that fringe the eastern edge of the city and act as its kidneys, filtering out toxins from the waste. The cost advantage is wide-ranging-

vegetables grown here have a short distance to travel to market; around 10,000 tons of fish, a staple of Bengali cuisine, are farmed annually here; the trash of the entire city is sorted and recycled by hand, and sewage cleaned naturally, for free.

If this is not enough, he says, there is another lesson. That of Chennai, which, like Kolkata, is a low-lying city and was saved from the perils of rising water by wetlands that acted as a buffer zone. During floods, the wetlands took the brunt of excess water, protecting the city behind it. But Chennai permitted extensive real estate expansion into the wetlands-only 27 of the original 650 surrounding wetlands remain-and the floods of 2015, inflicting damages worth \$3 billion (roughly Rs 20,000 crore), displacing 18 lakh people, and killing 347, were a direct consequence of this decision.

To put things into perspective, an optimistic forecast of just 20 cm of sea-level rise by 2050 would still make Kolkata the third most exposed city in the world to the risk of flooding, according to the World Bank. This is the danger that now faces Kolkata, the one from which Ghosh, along with a group of campaigners, is trying to save the city. Property developers in Kolkata have eyed the financial rewards of expanding into the wetlands, and are employing unscrupulous and dangerous tactics to displace the one lakh farmers of fish and vegetables, ragpickers and recyclers living there. People who live and work in the EKW are threatened by goons, and offered illegal deals to sign away use of their land. Kolkata seems hardly aware of the fact that these people on the margins of the city are essential to its survival, says Ghosh. He is still hopeful, though, that things will change as the importance of the wetlands becomes as clear to the city authorities as it is to him.

Ghosh, soft-spoken and erudite, started his journey to becoming the principal defender of the EKW in the early 1980s, when he followed the twin sewage outflow canals from Kolkata to the river Kulti into which they drain. On the way, he saw the large natural ponds of water that his training in ecology allowed him to identify as oxidation ponds. In tropical areas, these ponds use a combination of sunlight, algae and fish to clean waste water, which is 95 per cent water and 5 per cent faecal matter, so thoroughly that only 0.01 per cent faecal bacteria remain. Convinced that he was witnessing a miracle of the natural world-the waste water of a city cleaned naturally at no cost or investment of energy, in a self-contained ecosystem-he now faced the challenge of educating legislators on the benefits of the wetlands and the need to preserve the area.

An environmental engineer with the Government of West Bengal, Ghosh took this up as he rose through the ranks. In 1986, he requested the then chief minister Jyoti Basu to visit the

EKW. "He was a serious man," says Ghosh, and was worried that he may not be able to convince the CM of his claim. "So I took a glass of water from one of the ponds and drank it to show him how safe it was. I didn't have a lab to demonstrate this, so I had no other way but to drink the water." The CM was convinced, and for a short time afterwards, the EKW was safe. Kolkata, however, has not received any funds from the Government of India for treating sewage till date.

The encroachment continues, with local brokers selling incremental parcels of land in the wetlands to unsuspecting buyers. This has gone on despite the 1992 high court verdict, which stated that the wetlands should be preserved for farming and fishing. It has continued despite recognition from the Ramsar Convention (an international treaty for the conservation and sustainable use of wetlands) in 2002. The Ramsar provides no additional legal protection but demands that the local government draw up a management plan for every wetland area within six months of its designation; there is yet to be one 15 years on. And this has gone on despite the East Kolkata Wetlands (Conservation and Management) Act, 2006, which declared the area closed for building.

In an article published in *The Economic Times*, Sukanta Chaudhuri, professor emeritus at Jadavpur University, Kolkata, asks, "How will they dispose of 750,000,000 litres of sewage a day, not to speak of 2,500 tons of garbage?" He clarifies, "Funds might be obtained for sewage treatment plants on a gigantic scale. But besides the transitional and operational challenges, the sheer retrogression in terms of environmental management would be indefensible, with incalculable effects on citizens' lives and probably on climate change. The wetlands are a mini- biosphere with threatened and even unique species."

The battle to protect the EKW is ongoing, and Dhrubajyoti Ghosh, eco-warrior extraordinaire, stands close to the centre, a position he has held for more than three decades. As encroachment grows in the wetlands, a figure like him will become ever more significant in the fight against the unplanned, and often illegal, urban development in India.