

Traditions sustaining fig trees in rural Assam

STAFF REPORTER

GUWAHATI, May 4 – A recent conservation and research project on fig trees and fruit-eating birds, has found that local cultural traditions and perceptions play a key role in sustaining fig trees in Assam's rural landscape.

At least three species of figs – *F. benghalensis* (Bor Goch or Banyan tree), *F. religiosa* (Ahot Goch or Peepul tree) and *F. virens* (Jori Goch) – have religious and cultural value, and they frequently encourage building of temples or shrines close by.

Under the project, supported by Rufford Small Grants for Nature initiative, survey among the rural populace in different areas of Assam showed that the economic value of fig trees was low, but people were keen to have them in the landscape because of their religious significance.

The project measured and mapped over 470 mature trees, found fig trees with temples or shrines to be significantly larger than figs that did not have similar structures,

implying a link between their size and people's perceptions.

"Fig trees are like sacred groves dotted across the rural landscape. They provide an excellent opportunity for harnessing culture to sustain biodiversity outside protected areas in Assam," Maan Barua, project investigator, currently based at the University of Ox-

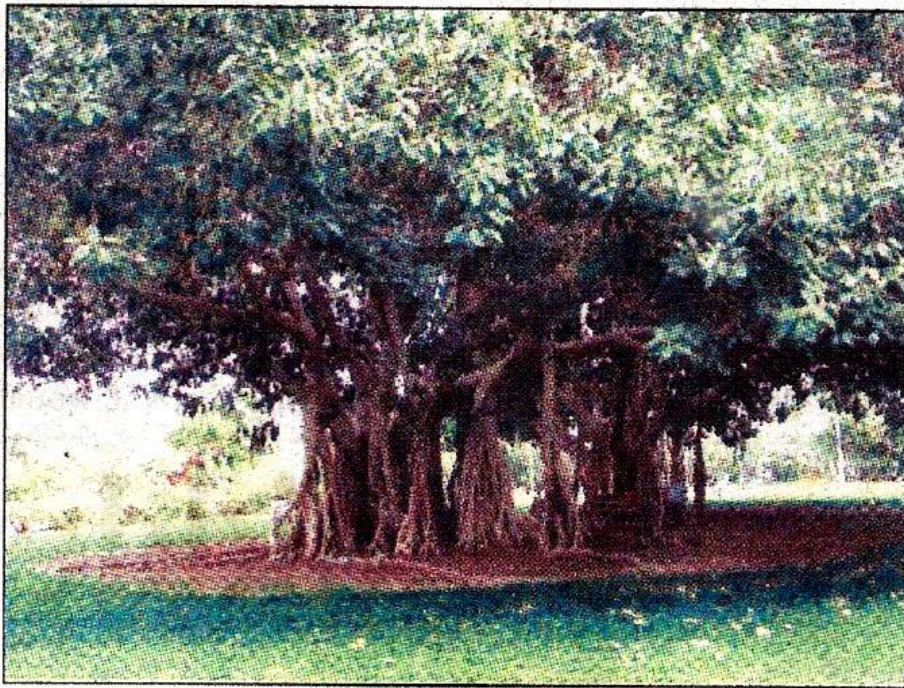
in Assamese) was found to be the most important seed disperser of figs.

The study revealed that seeds of trees with smaller fruit (*F. religiosa*) could be dispersed by small birds, but for those trees bearing larger fruit (*F. benghalensis*), large-bodied fruit-eating birds, such as hornbills and pigeons, were more

important. Unfortunately, these larger birds were more vulnerable to hunting pressures.

Interestingly, the study found the number of birds visiting fig trees declined as distance of trees from forests along with agricultural intensity

increased. "Isolation of fig trees and anthropogenic pressure on fig-dependent birds leads to a decline in seed dispersal. This may threaten the survival of monumental fig trees in our rural landscape," said Jatin Tamuly, key project researcher. The findings are important for biodiversity conservation in Assam as they indicate how existing cultural traditions can be used to ensure that biodiversity is conserved outside protected areas.



ford, told *The Assam Tribune*.

The trees provide food supply for birds and mammals, and the number of fig-dependent species is quite high. Fig trees are accepted as keystone species – species whose impact on the ecosystem is disproportionately higher than their biomass. Barua mentioned that in Assam's rural landscape, over 65 species of birds rely on fig trees. The Yellow-footed Green Pigeon (*'haitha'*