



Common Property Resources: Concepts and Country Experiences. Sridhar Krishna and Sumitra Acharya (eds). The Icfai University Press, 52, Nagarjuna Hills, Punjagutta, Hyderabad 500 082. 2008. x + 247 pp. Price: US\$ 17.

According to the National Sample Survey Organization (54th Round), the percentage of common property land resources in relation to the total geographical area in our country is 15%. Nearly 48% of rural households reported that they depend on Common Property Resources (CPR) for their needs of fuel, fodder, grazing land, etc. A study in West Bengal showed that CPR contributes 12% of household income in the case of the rural poor. Fuel accounted for 60 to 80% of the resources collected, and fodder between 5 and 20%. The CPR of India is now in great distress due to anthropogenic pressures as well as pressure from excess grazing by farm animals. Both the ocean and groundwater resources are also getting polluted. CPR has thus become an euphemism for degraded land and depleted and contaminated water resources.

Sridhar Krishna and Sumitra Acharya have rendered valuable service by compiling this book. The book has a comprehensive set of essays written by experts not only from India, but from other countries familiar with conditions in Bangladesh, Ethiopia, Brazil, Mexico, Zimbabwe, South Africa, Kenya, China and several South Asian countries. Examples of sustainable management of CPR, as for example CAMPFIRE (Communal Area Management Programme for Indigenous Resources) in Zimbabwe, which involves commercial partnership between safari operators and rural communities have been described. There are also many depressing examples relating to the tragedy of the commons.

In a comprehensive overview of the papers included in the publication, Sridhar Krishna has summarized the various dimensions of CPR management in India and outside. He has highlighted the danger of privatization of national parks and other public lands. The loss of CPR leads to the further deprivation of marginal communities, particularly of women. Methods of achieving harmony between forest dwellers and the authorities in charge of forest management are cited. Emphasis is placed on groundwater ethics, citing the example of Delhi. A recent article in *Science* (vol. 325, 14 August 2009) has drawn attention to the alarming state of aquifer exploitation in the heartland of the green revolution. There is a detailed paper in this book on marine resource management in the complex world. Seawater constitutes 97% of global water resources and is one of the most important social resources to humankind. This is why Mahatma Gandhi started the Salt Satyagraha to emphasize that sea water is a social resource and that its use should not be subjected to tax. Recent research work has shown that sea water farming involving the cultivation of halophytes together with marine aquaculture (agri-aqua farms) will open up sustainable livelihood opportunities to coastal communities. It is important that such scientific methods of sea water use are popularized to relieve the demographic pressure on coastal resources.

In the early 1970s the practice of Joint Forest Management (JFM) involving the forest dwellers and foresters was started in West Bengal. JFM is now the official policy of forest departments throughout the country. It has to some extent reduced the pressure on wood based forest products. Access is being promoted to non-wood forest products including gums and medicinal plants. The Government of India has also enacted a law conferring land and other rights to forest dwellers and scheduled tribes. Such measures have helped to halt the further degradation of prime forest land. Scientists of the M. S. Swaminathan Research Foundation have also developed detailed guidelines for Joint Mangrove Forest Management involving concurrent attention to the land and the ocean. The tsunami of 26 December 2004 as well as the super cyclones in Orissa and Sunderbans have highlighted the importance of mangrove bioshields in coastal areas to serve as speed breakers during heavy storms

and seawater penetration to the inland. There are several issues relating to CPR Management which have been highlighted in the paper of Sumitra Acharya. She has referred to people's movement like the Chipko in Garhwal.

All in all, this book is a timely contribution worthy of being read both by policy makers and professionals involved in safeguarding the remaining CPR for the benefit of present and future generations. CPR management involves concurrent attention to intra- and inter-generational equity. It needs for its success integrated action in the areas of conservation, sustainable use and equitable sharing of benefits. We owe a deep debt of gratitude to Sridhar Krishna and Sumitra Acharya for this timely contribution. The book has been published in a reader-friendly manner.

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Karanakutuhalam of Bhaskaracharya II with Notes. S. Balachandra Rao and S. K. Uma (eds). Indian National Science Academy, Bahadur Shah Zafar Marg, New Delhi 110 002. 2008. xv + 220 pp. Price: Rs 400/US\$ 150.

Eclipses have remained awe-inspiring events from the remote past. As a first step in understanding the phenomena, our ancestors studied the movements of sun and moon meticulously. They arrived at the exact calculations that are responsible for the celestial dramas. Their studies were based on strong mathematical foundations which were again based on rational thoughts and logic. When it comes to understanding the techniques they used, especially in the Indian context, we face major difficulties like (i) non-availability of texts, (ii) the available texts are beyond the comprehension of lay persons and even postgraduates in mathematics or physics.

These difficulties are fortunately being overcome by the efforts of a small group of schools who are well-versed in mathematics, astronomy and Sanskrit. The book under review is one such grand addition to a small list.