Indian Journal of Ecology (2018) 45(3): 479-482

Manuscript Number: 2706
NAAS Rating: 4.96

Carbon Sequestration by Trees-A Study in the Western Ghats, Wayanad Region

P.J. Jithila and P.K. Prasadan*

Kannur University, Mananthavady Campus, Wayanad-670 645, India
**E-mail: pkprasadan@gmail.com*

Abstract: The carbon sequestration of 610 trees belonging to 45 species was estimated. Diameter at breast height (DBH) and the approximate age of trees were documented to measure the rate of carbon sequestration. The average carbon content of these trees was 50.391t/tree. The total carbon sequestered by these trees was 138.367t/year. Highest (33709 kg/year) sequestration was observed in *Artocarpus heterophyllus* and the lowest (52.69 kg/year) in *Spondias pinnata*. *Melia azedarach* showed the highest average DBH and more carbon sequestration potential, whereas *Azadirachta indica* showed the minimum carbon sequestration potential. The regression analyses indicated that both DBH and number of trees have a positive relation with carbon sequestration rate of tree species.

Keywords: Carbon, Sequestration, Trees, Wayanad, Western Ghats