## (IV)

## NOTE ON BLYTH'S REED WARBLER FEEDING NECTAR OF PALAQUIUM ELLIPTICUM FLOWERS

Blyth's reed warbler (*Acrocephalus dumetorum*) is a medium-sized small passerine bird of 12.5-14 cm in length. It has a plain brown back and pale under parts. Insectivorous, it is a rare bird in Silent Valley and is a winter visitor found from December to April (Ali, 1996; 1999). Most of the time they search for and feed on insects in thickets and lower branches of trees. While studying pollination aspects of *Palaquium ellipticum* (Sapotaceae) in the Silent Valley National Park in Western Ghats, Blyth's reed warbler was observed feeding on nectar of *P. ellipticum*.

Palaquium ellipticum is a tree endemic to the Western Ghats and an important component of the medium elevation (600 - 1300m) tropical evergreen forests. Palaquium flowers during February – March and flowers are medium sized (2.5x1cm) and borne in the axils of leaves towards the tip of branches. Mature flowers are pendulous in nature. Flowers in *P. ellipticum* do not open fully and so, released pollen grains remain trapped inside the flowers. It is after anther dehiscence the flowers begin to secrete nectar at the base of the corolla tube. A flower has  $15 - 22 \mu l$  of nectar which is thick and highly viscous.

On 25th March 2010 at Sairandhri around 11.40 hr, it was observed that a Blyth's reed warbler with its characteristic sound started searching for insects in the nearby thickets of *Maesa indica*, *Clerodendron viscosa* and *Celastrus paniculatus*. After some time it appeared on a lower branch of the *Palaquium* tree. It searched insects for a minute and then suddenly it inserted its beak into a mature flower in the nearby branch. As soon as the bird inserted its beak into the flower cloud of white pollen grains released into the air from the corolla. After taking out its beak from the flower it raised its head so as to swallow the nectar easily. After this the bird continued its activity of searching insects. After some 40 minutes, it again inserted its beak into another flower and raised its head to swallow the nectar. Next day another Blyth's reed warbler was sighted on another *Palaquium* tree feeding nectar in the same way.

Nectar feeding behaviour of Blyth's reed warbler plays an indirect role in the pollination process of *P. ellipticum*. As the birds probe flowers for nectar using its pointed beak, closed petals open and release pollen grains trapped inside the petals into air. Thus the pollen grains, once trapped inside the corolla tube were released in to the air and carried by wind. This airborne pollen may trapped into the stigma and/or further transported to distant places by wind and resulted in long distance pollen dispersal and cross pollination in *Palaquium*.

Although Ali and Ripley (1983) and Ali (1996, 1999) reported that Blyth's reed warbler fed only on insects, Balasubramaniyan (1996) observed that the birds fed on fruits of *Salvadora persica* at Point Calimer Wild Life sanctuary. Balachandran (1991) mentioned their feeding nectar on *Erythrina indica* at Ponmudi in southern Western Ghats. Our observations together with the above observations showed that nectar may be a regular diet of this bird besides insects in southern part of India during its winter visit.

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