



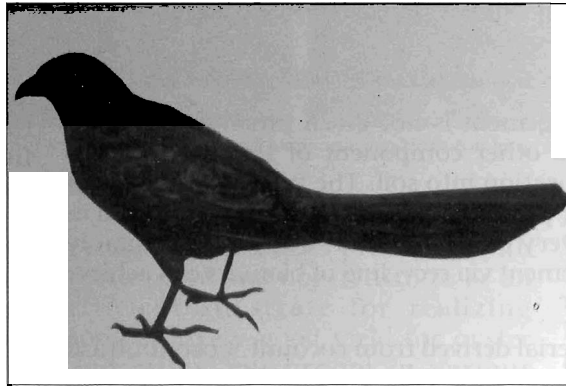
Crow-Pheasant and Red Palm Weevil

The crow pheasant which is an inhabitant on the crown of coconut palms is not a destructor of the palm but a friend of coconut farmer. Dr. K. N. Ponnamma highlights that crow pheasant, which is a predator of insects and pests, acts as an effective biocontrol agent as well as indicator of red palm weevil attack on palm

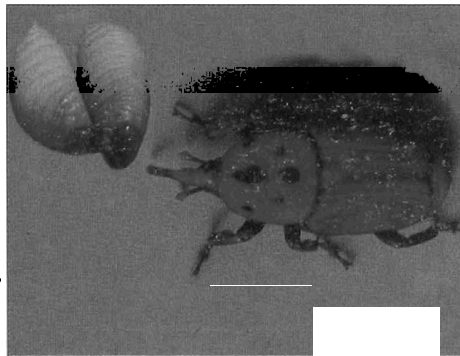
Crow Pheasant is neither a crow nor a pheasant but belongs to the cuckoo family. Its resemblance to Koel is marked by its blood red eyes. This bird has a notorious reputation as a nest thief, while it devour eggs and young ones of ground nesting birds and those nesting in shrubs. It destroys beetles, grasshoppers, locusts, mice, lizards, numerous insects and their larvae and is considered to be an useful bird. Birds do the hunting using its foot, making use of its broad wings and long tail to flush out animal life lying concealed in the grass. It builds nest on the crown of trees covered with creepers during monsoon season.

There is a common belief among the farmers of Kasaragod district that if crow pheasant visits coconut garden then the coconut palms will be ruined by the bird. In Kunjathur area of Kasaragod district a farmer noticed a good population of crow pheasants inhabiting on the crown of the palm in his well maintained garden having 200 healthy palms (10-15 years old). Subsequently the crown of 12 palms toppled down and the palms were found dead. These palms were cut down immediately and uprooted from the field. He was under the impression that the palms were damaged due to the bad effect of the urine of crow pheasants inhabiting on the crown of the palms. Then he reported the matter to Krishi Vigyan Kendra, Central Plantation Crops Research Institute, Kasaragod.

Fortunately a team of scientists from CPCRI visited the plantation hearing about this mishap. They knew very well that the crow pheasant is a predator, feeding on insect larvae, beetles, weevils, etc., and its excreta do not adversely affect the palms. Usually the crown of the palms topples down due to the attack of red palm weevil, the dreaded enemy of coconut. The adult weevils lay eggs



Crow-pheasant



Red palm weevil

in wounds near the crown of the palm and the emerging larvae bore into the interior for feeding the soft tissues of the meristem. The crown was damaged completely and the death of the palm occurred due to the unnoticed pest attack. Based on this information, the scientists persuaded the farmer to cut open the crown of the dead palms and found large number of red palm weevil (larvae, pupae and adult) in different stages. The inner portion of the crown was almost hollow. Then the scientists asked the climber to examine the crown of a dead palm, which has not cut down and he found remnants of the larvae fed by the crow pheasant. It was a convincing proof for the farmer that the crow pheasant was only helping to reduce the population of the weevils. This helped him to consider the bird as a friend and not as a foe. It can be presumed that they have the ability to locate the palms infested by red palm weevil and visit the palms only to feed the larvae.

The scientists suggested an integrated pest management strategy to the farmer. First one was field sanitation. Crown of all the dead palms (which harbour all stages of the pest) were cut open and burnt using kerosene. This was followed by placing alternating traps (log traps) using sugarcane, jaggery and banana macerate (fermented) in the gardens to catch the floating population of weevils. The macerate was put inside coconut petioles (60 cm length) and loosely tied with rope and placed in different locations during dusk. The farmer was able to collect a large number of weevils from the plantation. Since then, for the past two months no fresh incidence was noticed.

From the above incidence it is evident that the crow pheasant is an effective biocontrol agent i.e., a friend of farmer and an indicator of red palm weevil attack.

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