species is not commonly found in its range.

Moyar river originates in the Nilgiri hills at an altitude of about 1800 m and drains into the Lower Bhavani dam at 280 m. It cuts the Sigur plateau from the Mysore plateau to the north and forms a natural boundary between Tamil Nadu and Karnataka. It flows through the well-forested areas of Mudumalai Wildlife Sanctuary, Sigur reserve forest and Moyar Reserve Forest, for almost its full length. Hitherto, four individuals of *Nukta* species of fish have been recorded from this river. Occurrence of *Tor khudree*, a rare and threatened fish and *Puntius mudumalaiensis*, an endemic species of Moyar river of Mudumalai Wildlife Sanctuary here is remarkable. Downstream, poaching pressure is high and this river needs to be protected for its fish diversity.

Earlier records:

Sykes (1841), Day (1877, 1889), Hora (1942), Suter (1944), Kalawar and Kelkar (1956), Yazdani and Singh (1990), Singh (1990), Talwar and Jhingran (1991) recorded this species from the rivers of Deccan, viz. River Inderanee, River Indrayani (type locality), River Krishna, Ujni wetland etc., but mostly from Maharashtra, and it has not been reported from Tamil Nadu earlier. Therefore, the present record of this fish in the Moyar river extends its range of distribution in southern India.

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29. DUNG BEETLE (COLEOPTERA: SCARABAEIDAE: SCARABAEINAE) FAUNA OF BANGALORE, KARNATAKA

India, like other tropical countries, has a rich scarabaeid fauna, but in spite of overwhelming numbers they rarely make their presence felt. Not much work has been done on the fauna of this group of beetles after Arrow (1931)in his comprehensive account on Indian scarabs, reported four tribes, 26 genera and 354 species. A survey was conducted in and around Bangalore to study the dung beetle fauna during 1981-1985. This survey revealed the presence of 61 species (Table 1) of Scarabaeinae belonging to three tribes. Of these, 33 are being reported for the first time from Bangalore. Members of the tribe Panelini were not encountered. The great majority of the species belong to the genus *Onthophagus*. Seven species viz., *Heliocopris gigas. Onthophagus ramosellus, O. negligens, O. vividus, O. faveri, O.*

Table 1
DUNG BEETLE FAUNA AND THEIR ASSOCIATED MAMMALIAN EXCREMENT FROM BANGALORE, KARNATAKA, SOUTH INDIA.

No.	Species	Associated Mammal dung
Tribe Scarabaeini		
1.	*Scarabaeus (Kheper) sanctus* (Fabricius)	Sheep, Cow
2.	*S. gangeticus* (Castelnau)	Cow
* 3.	*S. brahminus* Castelnau	Cow
4.	*S. erichsoni* (Harold)	Cow, Sheep
* 5.	*Gymnopleurus cyaneus* (Fabricius)	Cow, Sheep
6.	*G.spilotus* (Macleay)	Man,Cow, Sheep
7.	*G. koenigi* (Fabricius)	Sheep, Cow
* 8.	*G. dejeani* Castelnau	Cow
9.	*G. gemmatus* Harold	Man,Cow, Sheep
10.	*G. miliaris* (Fabricius)	Man,Sheep, Cow
Tribe Sisyphini		
* 11.	*Sisyphus crispatus hirtus* (Wiedemann)	Sheep, Cow
* 12.	*S. longipes* (Oliver)	Sheep, Cow
* 13.	*S. neglectus* Gory	Sheep,Cow, Monkey
14.	*S. hirtus* Wiedemann	Sheep, Cow
Tribe Coprini		
* 15.	*Helicopris bucephalus* (Fabricius)	Elephant, Cow
16.	*H. gigas* (Linnaeus)	Elephant, Cow
17.	*Copris signatus* Walker	Sheep
18.	*C. repertus* Walker	Cow, Elephant
* 19.	*C. fricator* Fabricius	Cow, Sheep
20.	*C. andrewesi* Waterhouse	Sheep
21.	*C. indicus* Gillet	Cow
22.	*Catharsius molossus* (L.)	Cow, Elephant, Pig
23.	*C. pithecius* (Fabricius)	Cow
24.	*Onitis philemon* F.	Cow, Elephant
25.	*O. subopacus* Arrow	Cow
* 26.	*O. siva* Gill	Elephant
* 27.	*Drepanocerus setosus* (Wiedemann)	Cow, Elephant
* 28.	*Oniticellus pallipes* (Fabricius)	Cow
* 29.	*O. cinctus* (Fabricius)	Cow
30.	*Caccobius meridionalis* Boucomont	Cow, Sheep, Dog, Pig
31.	*C. volcanus* (Fabricius)	Cow, Sheep, Dog
* 32.	*C. unicornis* (Fabricius)	Cow
* 33.	*C. inermis* Arrow	Cow, Dog
34.	*C. indicus* Harold	Cow, Dog
* 35.	*Onthophagus gazella* (Fabricius)	Cow, Elephant
36.	*O. rectecornutus* Lansberge	Cow
* 37.	*O. duporti* Boucomont	Cow, Dog
* 38.	*O. amplexus* Sharp	Cow
39.	*O. ramosus* (Wiedemann)	Cow
40.	*O. dama* (Fabricius)	Cow, Elephant, Horse
41.	*O. pactolus* (Fabricius)	Cow, Sheep
* 42.	*O. unifasciatus* Schaller	Cow, Sheep, Dog, and carcass of Crow, Frog, Tenebrionid Beetle
* 43.	*O. turbatus* Walker	Cow, Horse
* 44.	*O. spinifex* (Fabricius)	Cow
45.	*O. quadridentatus* (Fabricius)	Cow, Elephant
46.	*O. igneus* Vigors	Elephant
47.	*O.pygmaeus* (Schaller)	Dog,Cow, Sheep
* 48.	*O. tarandus* (Fabricius)	Cow
* 49.	*O. centricornis* (Fabricius)	Horse, Cow
* 50.	*O. laevigatus* (Fabricius)	Cow
* 51.	*O. ludio* Boucomont	Cow, Sheep
* 52.	*O. pusillus* (Fabricius)	Cow, Sheep
* 53.	*O. tritinctus* Boucomont	Sheep,Cow, Dog
54.	*O. ephippioderus* Arrow	Cow
55.	*O. kchatriya* Boucomont	Cow,carcass of Crow Sheep
* 56.	*O. gratus* Arrow	Cow, Sheep
* 57.	*O. abreui* Arrow	Cow
58.	*Onthaphagus* sp.	Cow
* 59.	*Phalops divisus* (Wiedemann)	Cow
* 60.	*Liatongus rhadamistus* (Fabricius)	Cow
* 61.	*Tiniocellus modestus* Arrow	Cow, Elephant

Note: * indicates species being reported from Bangalore for the first time.

brevicollis and *O. brahma* reported by Arrow (1931) from Bangalore were not found during this study.

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30. FIRST RECORD OF *DIRHINUS ALTICORNIS* (MASI) AND *ANNECKEIDA ANGUSTIFRONS* BOUCEK (HYMENOPTERA: CHALCIDOIDEA) FROM INDIA

(*With three text-figures*)

During the faunal exploration of tropical rainforests of Western Ghats by Zoological Survey of India, Western Ghats Field Research Station, Calicut, two interesting chalcids were collected from semievergreen forest patches in Coorg district (Karnataka) and Kannur district (Kerala).

Dirhinus Dalman, one of the most distinctive genera of the family Chalcididae is distributed in all warmer countries of the world, Africa, Europe, Asia, Australia and Pacific islands. Members of this genus are parasitic on puparia of various Diptera, especially Calliphoridae, Sarcophagidae, Muscidae and also of certain Tephritidae.

Dirhinus alticornis (Masi), a remarkable species of the genus was originally described from Philippines by Masi (1927) under the name *Pareniaca alticornis*. Narendran (1989) examined a male specimen of *alticornis* from Philippines. One female specimen of the species was collected by me from a semievergreen forest patch at Aniyad, falling under the Kannavam RF of Kannur district, Kerala. The present record of *D. alticornis* (Masi) from the Western Ghats proves the further extension of its distribution to peninsular India and the third record from the Oriental Region.

D. alticornis is a characteristic species having the anterior inner edge of its frontal horn crenulate with an additional tooth on the outer edge. It has a strong facial tooth, and the posterior median area of pronotum depressed with an impunctate shagreened area. In males the antenna is peculiar with a spatulate club.

Specimen examined: 1 FEMALE. INDIA: Kerala, Aniyad (Kannavam RF), 1. ii. 1995, Coll. P.M. Sureshan *et al.*

Anneckeida Boucek, an African genus of Torymidae is represented by four Oriental species from West Malaysia, Thailand, Laos, and East Malaysia, apart from the type species from Rhodesia (Africa). *A. angustifrons* was originally described by Boucek (1978) based on a female specimen collected from Thailand. One female specimen of this species was collected by me from a forest patch at Chitekanum, falling under the Sampage reserve forests of Coorg district, Karnataka. This record constitutes its rediscovery from the Oriental Region subsequent to the original description and proves the extension of its distribution to Peninsular India.

Like all other Oriental species *A. angustifrons* also has hind femur with a ventral comb of teeth which begins with a conspicuous larger tooth. The species is also characterised by a face with inner orbits, distinctly converging upwards frons only 0.25 x the breadth of head and the ocelli in acute angular triangle, with lateral ones virtually touching the eyes.

Specimen examined: 1 FEMALE. INDIA: Karnataka, Chitekanum (Samapge R.F.), 4.iii. 1994, Coll, P.M. Sureshan *et al.*