

Development Characteristics of Dung Beetle, *Copris tripartitus* Waterhouse (Coleoptera: Scarabaeidae) in Indoor Rearing

Hea Son Bang, Young Il Mah, Suk Jo Hwang, Tae Won Goo
and Jin Il Kim¹

Dept. of Sericulture and entomology,
National Institute of Agricultural Science & Technology,
¹Dept. of Biology, Sungshin University

Copris tripartitus is a native dung beetle species in the South-Korea. In the early summer, the over-wintering adult lay eggs. In autumn the new adult emerged and it overwinters. Adult *Copris tripartitus* Waterhouse constructed brood cells 15 to 20cm below dung pad. Dung was brought into an underground and consumed some of dung to form two or three brood balls for egg laying and an egg was laid into each ball. The female stayed near in the nest while the brood developed. She repaired any damage of the nest or brood balls which were attacked by other insects. Oviposition took place from June to August under the laboratory condition. The size of brood balls averaged 8.01 ± 1.142 mm long and 5.51 ± 0.413 mm wide. Adult females deposited a single egg in the egg chamber of each brood cell. Eggs sized 4.72 to 5.67mm long and 2.39 to 3.17mm wide. Incubation period took 7.68 ± 1.97 d., larval period(three instars) 29.7 ± 2.45 d. and pupal period 18.4 ± 1.44 d. The total life cycle lasted 53.8 ± 2.17 days under the laboratory condition.