Abstract

The development stages of male and female gonads in the freshwater crab Sylviocarcinus pictus (H. Milne Edwards, 1853) were described through macroscopic and microscopic (histology) examinations. The histological description was based on 40 specimens (20 each sex). Four gonadal development stages were found for females: immature, ripening, mature and spawned. The following female cells were found: ovogonia, oocytes in initial vitellogenesis, oocytes in advanced vitellogenesis, follicular cells and post-ovulatory follicles. Three development stages were found for males: immature, maturing and mature, with the indication of: spermatogonia, spermatocytes, spermatids, spermatozoids and spermatophores. These data suggest the pattern described in the literature. Size at sexual maturity was 32.3 mm of carapace width for males and 31.5 mm for females. The gonadal stages observed macroscopically by volume and color were validated through histological analysis and proved to be useful method for the rapid identification of sexual maturity in the species. The present study offers previously unpublished data on the reproductive biology of Sylviocarcinus pictus.

Keywords

Amazon estuary, Gonadal histology, Reproduction.