

**XII EUROPEAN CONGRESS OF ICHTHYOLOGY
ECI XII**

9 – 13 September

ORGANIZED BY:

Croatian Ichthyological Society
Croatian Ecological Society
Department of Zoology, Faculty of Science, University of Zagreb
University of Dubrovnik
European Ichthyological Society

CONGRESS VENUE:

Hotel Croatia,
Cavtat, Croatia

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Book of abstracts

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Printed by: TIPOMAT doo

Zagreb, September 2007.

epithelium containing numerous mucous folds. Stomach is not present but intestine is relatively long (about 1.2 of body length). The anterior segment of the intestine is S-shaped and showed mucosal folds in varied sizes. In this part, the mucous layer is thicker than the outer layers (submucosa, muscularis and serosa). The liver is composed of two lobes, the right lobe is two-segmented and larger than the left one. The pancreas is red or orange and observed as scattered masses of cells over the mesentery.

(POSTER)

Structure of the epidermis of salmonids

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The morphology of the epidermis during the non-spawning period was studied in 4 species of salmonids: brown trout (*Salmo trutta fario*), rainbow trout (*Oncorhynchus mykiss*), brook trout (*Salvelinus fontinalis*) and grayling (*Thymallus thymallus*). The basic structure (presence of secretory goblet cells, absence of secretory club cells and pigment cells (melanophores) was the same in all species. Differences were found in the thickness of the epidermis (*Salmo trutta fario* 110 µm, *Oncorhynchus mykiss* 170 µm, *Salvelinus fontinalis* 130 µm, *Thymallus thymallus* 50 µm) and in the size and representation of goblet cells (*S.t. fario* 29%, *O. mykiss* 11%, *S. fontinalis* 23%, *T. thymallus* 6%). In contrary to previous observations from the spawning period in brown trout and grayling, conclusive differences between males and females were not found.

Supported by the grant I QS500450513 by the GAAV.

(POSTER, *EISSA)

Comparative morphometry of the neurocranium of two roach species: *Rutilus rutilus* and *Rutilus pigus* (Actinopterygii: Cyprinidae)

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A comparative morphometrical study of the neurocrania of two cyprinids, viz. *Rutilus rutilus* and *Rutilus pigus*, has been made in order to understand their individual, intersexual and interspecific variability. A total of 80 (30+50) neurocrania were examined and 27 measurements were taken. As members of the same genus, both fish species share many common features, however species-specific differences were observed in some measurements (i.e. in the relation of height of rostral and occipital part of the neurocranium, or of preoccipital and basal length of neurocranium, or of basal length of neurocranium and body length, etc.). Pronounced intersexual differences were not observed.

(POSTER)

Shaping up: eco-morphology and growth patterns in coral associated fishes

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There are numerous specialized fishes that exploit a variety of spatially restricted habitats in coral reefs, for example gobiids which live in association with live corals or coral rock. In the Gulf of Aqaba (northern Red Sea), 21 species belonging to seven genera of tiny reef-associated gobies were found. Some of these genera are among the most habitat-specialized fishes in coral reefs and show various adaptations. In particular, body shape appears to fit the preferred microhabitats. Species of the genus *Gobiodon* for