THE SNAKES OF MALAYA. Tweedie, M. W. F. 1983. Third Edition, Singapore National Printers (Pte) Ltd., 303 Upper Serangoon Road, Singapore 1334, 167pp.

Snakes have always fascinated man since the earliest times and have been portrayed significantly in folklore and superstition throughout the world. While numerous scientific accounts of snakes exist, there remains until more recently, very few books written for the public that will enable them to recognise the different snake species. Tweedie's book however serves both, the scientific community and the public. It has withstood the test of time, this third edition being published 24 years after the second edition (in 1957), which is itself considerably revised over the first edition. It remains to this date, the classic reference text for snakes of the region.

The material in this third edition has been reorganised and substantially revised and updated with the latest information. Taxonomic changes have been incorporated and revisions are made to the species descriptions as well as to the useful identification keys, some of which have been totally rewritten. The book also carries an entire chapter on "Snakebite" contributed by the late H. A. Reid whose extensive experience is shared with the readers. Missing from the introduction of the third edition but which appeared in the second edition are sections on "collecting and preserving snakes" and "snakes in captivity", as well as the synopsis of the families. The inclusion of new information is evident such as the discussion on the diet of the slug snakes (*Pareas*) in the introductory section on "food". The chapter on "Identification of Malayan snakes" remains fairly the same except for the taxonomic updating. The identification key has only minor changes which demonstrates Tweedie's keen powers of observation when he first constructed it. The chapter on "Systematic list" in the second edition is also excluded from this edition.

Almost 140 species of snakes belonging to nine families from Malaysia and Singapore are discussed. The descriptions are simple enough even for the educated layman. The black-and-white photographs of the snakes are indeed useful, although one cannot help noticing that four black-and-white plates (red-tailed pipe snake, striped racer, painted mock viper and banded Malayan coral snake) and the only colour plate of the yellow-ringed cat snake, seen in the second edition are not included with the third edition. The book remains as an important source of reference on the venomous and non-venomous snakes of the region, particularly Peninsular Malaysia and Singapore.

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LABYRINTHFISCHE FARBE IM AQUARIUM. Ein Handbuch für Bestimmung Pflege und Zucht. 1990. Horst Linke. ISBN 3-89356-110-2. Tetra-Verlag, Tetra Werke Dr. rer. nat. Ulrich Baensch GmbH, 4520 Melle 1, Postfach 1580, Germany. 174 pp.

The popularity of the anabantoid fishes as aquarium pets has resulted in the release of many books on the subject, almost all by aquarists. The most recent such release by Horst Linke, in effect a revision and update of his 1980 book, dealing with the world Anabantidae, Belontiidae, Helostomatidae and Osphronemidae is certainly one of the better ones. Although the text is entirely in German, it will nevertheless prove useful for scientists and amateurs in this part of the world.

What is perhaps good about the book is that it is unpretentious as to it's objectives - i.e. to show the diversity of the anabantoid fauna, help identify them visually, give useful tips to aquarists how it is kept, its natural habitats, preferences ete. No attempts have been made to name new taxa, resolve systematic problems or hypothesise about anabantoid evolution and biogeography. Linke's avoidance of these aspects is to his credit. Unless carefully done, such "scientific ventures" often result in even more problems for others in the future. The colour photographs of the species, almost all by the author, serve to identify the species very effectively. In anabantoids, meristic or morphometric characters, more often than not, are not very useful. Live adult or breeding colours and habits are often more valuable. It is well known that preserved specimens, particularly of females or juveniles, are notoriously difficult (if not impossible) to identify. The excellent colour photographs are thus very valuable for aquarists and ichthyologists alike. Almost all the labyrinth fishes of Asia and Africa are dealt with. Thirteen Asiatic genera and 73 species, as well as one African genus and 16 species are discussed. Each species is provided with at least one colour photograph, a distribution map, type data, description of the natural habitat, water requirements etc.

Almost all the species known to occur in Peninsular Malaysia and Singapore have been treated, including recently described taxa like *Betta tussyae* Schaller, *B. persephone* Schaller, *B. waseri* Krummenacher, *Parosphromenus nagyi* Schaller and *P. harveyi* Brown. *Betta cocccina* Vierke has also been reported from Malaysia, but it is unclear if they are really *coccina*, *tussyae* or an undescribed form. Some records are rather dubious. Linke (p. 37) followed Schmidt (1988) in regarding *Betta waseri* as *B. macrophthalma* Regan, 1910, but has not been clearly demonstrated as yet. *Betta macrophthalma* was described on the basis of one specimen from Singapore (Regan, 1910) whereas *B. waseri* was from Pahang (Krummenacher, 1986). Certainly, no *B. waseri*-like species exists in Singapore. The only forest *Betta* species that is present is *Betta pugnax*, although Singapore is not figured in the distribution of this species (p. 44).

In recent years, my colleagues and I have sampled in almost all the areas listed by Linke, and it is unfortunate that many of the sites cited by him and his aquarist colleagues, including type localities for many of the recent species, have already been developed or disturbed so badly that the fishes are very scarce or no longer there. The type locality of *B. persephone* is now adjacent to a new highway, whereas the forest surrounding the streams where *B. tussyae* is being cleared. Similarly, the forest where *P. harveyi* occurs is now being opened up and gradually developed.

Trichopsis pumilla (nec *pumillus*) was described as occuring in many parts of Peninsular Malaysia (p. 139), but there are no other known records of this species so far south (it is primarily a Thai/Indo-Chinese species). Certainly, the reviewer and his colleagues have not obtained this species in their collections. The presence of *Sphaerichthys osphromenoides* in Singapore (p. 123) is incorrect. Despite some old and recent reports of this species from Singapore, no authenticated wild records exist.

The presence of *Pseudosphromenus dayi* in southern Thailand is rather surprising (the species is native to southwestern India). Linke probably followed the older records (e.g. Regan, 1910) which may not be reliable. The Bornean species figured as "*Betta* spec. von Anjungan", "*Parosphromenus* spec. von Pudukuali", "*Parosphromenus* spec. von Mandor", "*Parosphromenus* spec. von Anjungan", have been recently described as *B. rutilans*, *P. linkei*, *P. anjuganensis* and *P. ornaticauda* respectively (see Kottelat, 1991). Certainly, Linke has illustrated more new species from Borneo. His "*Betta* spec. von Pulau Laut" and "*Betta* spec. von Tarantang" are likely to be undescribed taxa. That Linke has refrained from officially naming them until more specimens avail themselves and detailed studies by competent ichthyologists can be made speaks very well for Linke's working philosophy.

A reference section should have been included at the end, especially in tracing some of the citations. This is also considering the amount of work that has been done by German aquarists over the years to which the author certainly has complete access. Such references are usually not known or easily available but nevertheless useful for both interested laymen and scientists alike, especially those in Southeast Asia. A short section highlighting the taxonomic problems with genera like *Betta* and *Parosphromenus* would also have been welcomed, if nothing else, to warn prospective "overzealous" aquarists against "sloppy" systematic procedures.

The growth in number of aquarists over the years has been both a boon as well as bane to more professional ichthyologists. Their "explorative" skills are well known, and in the arena of anabantoids, most of the new species described in recent years has been a direct result of their collections. Unfortunately, some species have been named by over zealous aquarists not familiar with the procedures and rules of zoological nomenclature. Species have been very poorly described, necessary comparisons not made and older synonyms ignored. The lax rules of zoology however, inevitably validate these names, creating confusion for scientists and aquarist alike when allied taxa are found and need to be identified.

Like many other German aquarium books, Linke's will probably be translated into English to cater for the large and growing international market. It will certainly be one useful edition for all fish enthusiasts, amateur and professional, to look forward to.

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