valuable information on how these species are causing problems within Australia.

An insightful section is the Stowaways. I found this interesting with its details on how species get into Australia and with detailed illustrations provided alongside.

The book is finished off with checklists of genera and species, common names and a helpful glossary of words to guide readers in difficult areas. The citable work is accurately utilised throughout the guide and will allow the reader to undertake further reading.

A worrying point that I realised from reading the guide was the dire need for research on the anurans of Australia. Thirty-nine species in the guide are probably extinct, or have not been seen for many years or are unknown as their status and behaviour is vaguely documented. Two prime examples are *Litoria cavernicola* and *Uperoleia orientalis*.

Although well-written, 'Field Guide to the Frogs of Australia' is not without a few minor omissions. On page 13 *Cyclorana australis* foot adaptation is shown within the four diagrams. However, the use of this adaptation is not explained. On page 58, *Litoria phyllochroa*, explains that *L. pearsoniana* is a similar species but not the same in geographical distribution. However, within both species distribution information and mapping, they appear sympatric in distribution. Moreover, on page 100, *Austrochaperina robusta* claims to have only *A. pluvialis* within its geographic range, but *A. fryi* (page 102) explains that both *A. robusta* and *A. pluvialis* are similar species and exist in the same geographic distribution.

The field guide has a UK price averaging £35 to £40. Therefore, for anyone about to buy this book they would have to have a penchant for Australian anurans. That said, any field guide that attempts to decipher taxonomic and field characteristics in a purposeful and clear manner should be celebrated. On this account alone I would recommend the book to those interested in Australia's batrachology.

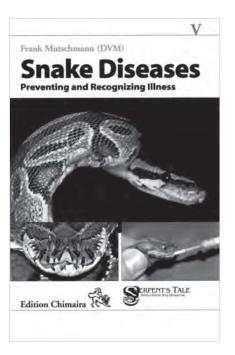
STEVEN PIGGOTT

92 Northfleet road, Peelgreen, Manchester, M30 7PQ, UK. stevepiggott@hotmail.co.uk.

Snake Diseases: Preventing and Recognizing Illness

Frank Mutschmann

2008, Edition Chimaira, Frankfurt am Main, 306 pp.



When this book arrived, I eagerly looked forward to reading and reviewing it. Snake diseases is a topic that has always interested me as my background is a reptile keeper in a zoological society.

'Snake Diseases' is a hardback book covering a wide range of snake ailments. It specialises in recognising symptoms of disease and hopefully preventing them from ever occurring. I would like to make it clear to anybody who may want to purchase this book that it does not include any information pertaining to the treatment of diseases so as not to encourage readers to experiment with technical veterinary procedures.

As one would expect from Edition Chimaira the book is very reader friendly. At 306 pages, it is crammed full of information. There are lots of colour plates and photos to peruse through at your leisure. These are much needed in such a book in order to help recognise symptoms of illness.

Information relating to the numerous diseases is often presented in detailed tables, which are very useful to use at a glance and help to separate areas of importance. The author has highlighted points of interest (in a yellow background with black text) and key elements of the chapters throughout the text. This assists in recognizing key points if a reader decides to merely glance through the book during a spare half-hour.

The book opens with a contents page and a preface. The preface gives a great background into the author's love and knowledge of snakes gained through many years of experience as a practicing veterinarian. The first main chapter in the book (actually chapter 2) is called 'What Are Snakes' and gives a brief history of reptile evolution and snake biology. There is a whole page dedicated to the systematics of reptile (particularly snake) classification and by this point, I thought I was reading an encyclopaedia of snakes and not a book about snake diseases.

Chapter 3 is one of my favourites because it covers a lot of ground when discussing 'preventing illness' in snakes, with sections on vivarium set ups and requirements for enclosures, which is further broken down into sections on water, humidity, temperature, substrates, cleaning, disinfecting and quarantine. The section on 'responding to bites' will be of interest to anyone who keeps venomous snakes. Throughout this book there are a lot of references and photos of venomous snakes, presumably as a result of the large numbers of amateur and professionals who are now keeping them in captivity whether in zoological collections or in the home.

Another favourite section in this book is chapter 5. It is certainly the largest and one of the most important chapters - entitled 'Special Section on Diseases'. Subjects that are discussed in the chapter include; illness caused by inappropriate husbandry, improper diet, malnutrition, foreign bodies, poisoning and medical abuse. These sections are short and concise and I learned a great deal of valuable information from them. In particular, the section on improper diet has lots of information about related issues such as vitamin deficiencies, whether a lack or excess of. There is some much needed information here for any Garter Snake (Thamnophis spp.) keepers that highlights the need for vitamin B1 and thiamine. Preventing the lack of this vitamin is very well explained.

The chapter then gets more in depth about bacterial, viral and fungal infections, as well as endo and ecto-parasites. I was particularly excited about the section on viruses. Now don't get me wrong, I'm not a virus lover but there is a virus out there called ophidian paramyxovirus. I know only too well that this is a horrific viral infection as one of my Green Tree Pythons (Morelia viridis) was diagnosed with it. I was ecstatic to finally see the mention of this virus in a book. There was good information about the symptoms and the outcomes that are almost always fatal, and can threaten an entire collection of snakes. However, I did consider the information on it to be a bit rushed. I wanted to know more and think it needed to be made clear to people who are going to read this book, that ophidian paramyxovirus is one of the most serious viral infections. I also expected a mention about quarantine procedures with such a prolific virus. However, this may be an artefact of the lack of knowledge surrounding the subject. I found it misleading that the author stated that ophidian paramyxovirus affects 'giant snakes' and brackets the family (Boidae), since not all members of this group are classed as 'giant snakes' (my specimen of *M. viridis* being a case in point).

This is certainly not a book that one would want to read whilst having a bite to eat as it may make a reader feel nauseous due to the large number of graphic photographs. Four in particular that shocked me were: 1) a Royal Python (Python regius) that had been savagely attacked by a rodent that had been left in the enclosure for the snake to eat; 2) another Royal Python that had died from stomach and intestinal obstruction from eating its cage mate during a feeding session; 3) a case showing the advanced stages of mouth rot in which the snake's mouth is deformed and heavily inflamed. The mouth is so deformed in fact that without the caption it would have been nearly impossible to identify it as a Boa; and 4) a Corn Snake (Elaphe guttata) with a destroyed cloacal area and no tail as result of inflammation of the hemipenes caused by incorrect probing. The most shocking thing about

these examples is that they are all easily avoidable and should never have occurred in the first place.

'Snake Diseases' is a book for amateur reptile keepers and professional herpetologists as well as student or qualified veterinarians. The book is very reasonably priced at around £40/£45, particularly when considering the quality of the content. This book will probably not interest people who just keep the one snake as a pet but I think it is extremely valuable to anybody who has a large collection of snakes and who may want to gain

knowledge in helping to safeguard it. 'Snake Diseases' has aided me and my veterinarian (who incidentally has since purchased this book) in the last couple of months. It is a welcome addition to my ever growing herpetological library, and one that I will use in the future.

ADAM RADOVANOVIC

7 Rowan Close, Wythall, Birmingham, B47 5RW, UK.