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Encyclopedia of Sediments and Sedimentary Rocks**,** edited by Gerald V. Middleton, 2003. Kluwer Academic Publishers, P.O. Box 17, 3300 AA Dordrecht, The Netherlands; xxx + 821 pages, hardbound; € 399.00, US$ 390.00, GB£ 250.00. ISBN 1-4020-0872-4.

A work like this can no longer be handled by one author, not even one editor. The Editor of the volume, Gerald V. Middleton, had the help of four Associate Editors, and it seems only appropriate to mention them here: Michael J. Church, Mario Coniglio, Lawrence A. Hardie, and Frederick J. Longstaffe. They obtained articles from almost 200 contributors.

The editors state in their preface that the volume - which is part of Kluwer's 'Encyclopedia of Earth Sciences Series'—is a thorough revision of the 1978 Encyclopedia of Sedimentology, which was edited by Fairbridge & Bourgeois. I had the pleasure to review that volume, too (in 'Geologie en Mijnbouw,' volume 59), and I can only deduce that this new work is much more than a thorough revision. 'An entirely new work' is a better description, in my opinion: not only are the individual articles almost all written by entirely different authors, and not only is the material adapted to the present state-of-the art (both these aspects seem only logical), but the approach is also different. It is, as stated by the editors, narrower than its predecessor (in the sense that it pays less attention to topics that are now considered stratigraphical rather than sedimentological in character), but it is also wider (in the sense that many more interdisciplinary topics and new developments are included).

One thing has, essentially, remained the same: the encyclopedia is not built up of thousands of entries with small explanations forcing the reader to go through a jungle of cross-references before getting an idea of the topic that he wants something to know about, but by a—still large—number of articles that can, as explained in a table in the most useful 'Guide to the Reader,' be classified into three main categories: (1) geochemistry, mineralogy, petrology; (2) sedimentary environments and facies; (3) sedimentary processes. Each of these categories is subdivided into sub-categories, and most of the subcategories have some kind of introductory article at the end of which the reader can find (yes, they are here unavoidable, too!) cross-references that will help him find his way further.

The encyclopedia can, nevertheless, not be considered as a systematic work, because the individual articles are sorted alphabetically. This makes such a work not easily accessible. I'm currently working, among other items, on heavy minerals; no problem, there is an entry 'heavy minerals.' But I'm also working on seismites. There is no such an entry; should I consult the categories 1-3 mentioned above? They do not give a clue. What to do? Then I realize that there may be an index, and there is one, indeed, referring me to page 57, where I find myself in the middle of an article with the title 'Bedding and internal structures', where two lines (!) are devoted to seismites under the heading

‘Structures related to deformational processes.’ I would never have found these two lines without the index. This 17-page index is, however, relatively small (considering the wide variety of sedimentological terms), even smaller than the - in my opinion—entirely superfluous 24-page ‘Index of Authors Cited’. The limited size of the index becomes apparent when I look for another of my favourite topics: pebbly mudstones. This famous rock type is well known from mass movements in, particularly, flysch areas, but the term is not present in the index. This encyclopedia is not the type of work that you start reading from the very beginning until you find what you are looking for; or to the end of the volume, thus finding out that such a topic is not been dealt with at all. Can it really be that a simple check like I did reveals several - in my opinion importantly—omissions? It looks, indeed, whether there are numerous omissions, and this approach of a systematic check by the editors should be considered a serious shortcoming.

It is more than the unavoidable shortcoming of all works of this type: as soon as you are interested in a specific subject, it seems that the work pays hardly any attention to it. On the other hand, all those topics that are not of much interest, get incredibly much space. I am well aware: every user tends to get this feeling; it only proves that the authors and editors have tried to get the right balance between a wealth of information and the financial consequences (still, I find two lines about seismites too little; and why do allophane and imogolite deserve an entrance of their own and over one page of space? Apparently I am an incorrigible user).

What about the contents themselves? The editors appear to have managed bringing together a group of well known specialists and fairly unknown researchers. They all appear to be well qualified, for I found few flaws in their text— if any—and most authors present an interesting list of references at the end of their article. It thus seems that the editors have put much more effort in the quality of the articles included, than in an effort to cover all relevant items. It makes it even more amazing that some silly (but fairly irrelevant) mistakes are present, such as references in an incorrect alphabetical order in a reference list.

I like reference works, and I use them. Frequently, and in the course of time they become not only outdated but also physically old. I’m glad with this replacement of the 1978 edition. This volume will be one of my favourites, in spite of its distinct shortcomings with respect to completeness. It has, however, certainly also its merits: it is well printed, on fine paper and with well-readable illustrations, although many should have been printed on column width rather than on page width (see, for instance, p. 590-591). Whatever I may think of the book for my personal use, it is not a work that is aimed at the private user: it is essentially a book for libraries. Its price is high, but certainly not too high for a book of this size and with such contents. It should be present in the library of each university and each company where sedimentological research plays - or should play - a role and where not all specialistic fields are covered by employees who can inform you about the tiniest details. This encyclopedia might show you the way how and where to find such details.

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