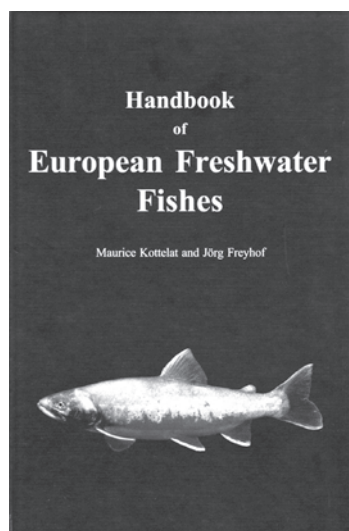


## BOOK REVIEW

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**Handbook of European Freshwater Fishes.** M. Kottelat & J. Freyhof. 2007. 626 pp. ISBN 978-2-8399-0298-4

Europe is generally considered the birthplace of ichthyology, having a lineage of ichthyological research that traces itself back to Aristotle. It is therefore logical to assume that the freshwater ichthyofauna of Europe is one of the most well-studied. Unfortunately, a

close examination of this problem reveals that this is not the case, that the taxonomy of European freshwater ichthyofauna is mired in much confusion, and that the true diversity of European freshwater fishes is grossly underestimated. This hefty volume on European freshwater fishes (there are 646 pages) by Maurice Kottelat and Jörg Freyhof goes a long way to addressing this problem, and represents the most authoritative work on European freshwater fishes to date (although the authors provide a caveat that the work is by no means complete, but that a practical trade-off had to be considered between publishing the results now and further delays to await results of more in depth investigations). The fact that previous works on the freshwater fishes of western Europe have revealed about 170 species, while this book has revealed 546 native and 33 introduced species in Europe west of the Ural mountains is a testimony to the depth of the work.

The book is divided into sections, beginning with the Introduction (pp. 1–4), followed by a section on how to use the book, which consists of brief explanations of what is covered in each section of any given species account (pp. 5–15). This is followed by a glossary defining morphological features in fishes (pp. 15–21), a section briefly introducing nomenclatural conventions (pp. 22–23), one on how to preserve fishes for scientific study (pp. 23–25), and finally a section discussing the conservation issues dealing with European freshwater fishes (pp. 25–30). The heart of the book is an account of all species of freshwater fishes known

from Europe, with each species account being illustrated, usually with one or more colour photographs of the fish. Each species account covers the diagnostic characters, geographic distribution (supplemented by a map), what we know of its biology and conservation status. The last is often overlooked in many similar works, and this is perhaps one of the more valuable aspects of the work, given that the conservation of European freshwater fishes has been given short shrift (to be fair, this is often the result of the previously unrecognised diversity in European freshwater fishes). Preceding the species accounts are family accounts that are immediately followed by user-friendly keys. I can see this book easily becoming the definitive guide to European freshwater fishes, but even so, there are several shortcomings that I wish to highlight below.

The first is that I would have enjoyed this work even more if there had been a section outlining the history of European ichthyology. I could not find a good account of the history of European ichthyology anywhere, given that most texts that deal with the history of ichthyology tend to view it from a global perspective (even if much of the early history deals exclusively with European ichthyology). This book seems the ideal place for one (alas lacking). Another shortcoming I found was the lack of a section on biogeography of European freshwater fishes, which would have been useful in outlining larger-scale patterns and perhaps benefited readers not intimately versed in European geography. Finally, I would have liked to see a key to the families of European freshwater fishes, as it would be more convenient for the reader who cannot tell the difference between a coregonid and a salmonid to be able to key it out, instead of having to refer to the familial descriptions in the text.

These shortcomings are minor, and hardly detract from the fact that this book will become the standard textbook on European freshwater fishes for years to come. It certainly belongs on the bookshelf of ichthyologists, anyone with a passing interest in fishes, or like the authors, self-confessed ichthyomaniacs.

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