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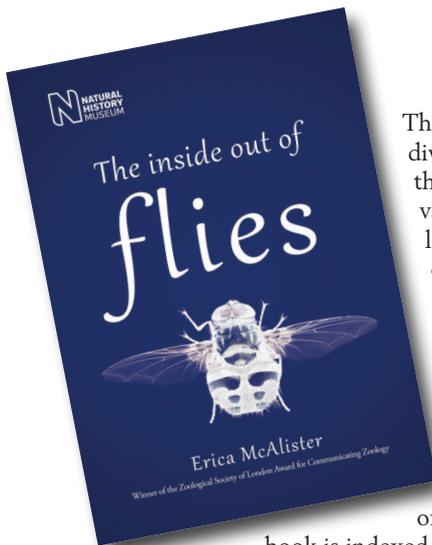
The Inside Out of Flies

Erica McAlister

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This is *The Secret Life of Flies* Vol. 2. Where Erica's first book presented an overview of Dipteran diversity and ecology, her second book is a Haynes Manual that presents the inner workings of this order. Chapter one deals with pre-adulthood, and then subsequent chapters explore the various sections of the body, ranging through the head, antennae, mouth parts, thorax, wings, legs, abdomen and, finally, the terminalia. In these chapters, Erica outlines our understanding of the mechanics of each of these sections of the dipteran body. Using the most recent research as a starting point, she details the physiological and biochemical processes that have made this insect order one of the most successful groups in the biosphere.

While the writing style of *The Secret Life of Flies* had an informal edge to it, this volume is pure McAlister. Anyone who has attended one of her talks will instantly recognise the irreverent informality. The text is densely informative, but her refusal to be entirely serious generates a very readable and entertaining text.

Embedded within these chapters are snippets of the history of dipteran science, which offer a fascinating counterpoint to the recent advances that are detailed in each section. The book is indexed and also contains a list of references for further reading.

While *The Inside Out of Flies* explores the mechanical and physiological solutions that the Diptera have evolved to solve the many problems that they face, it can also offer a broader appreciation of how these solutions apply to insects in general. If *The Secret Life* did not convince you that flies are truly amazing, then *Inside Out* certainly will. Scattered through the book is a collection of excellent photographs, which complement and enhance the text, adding a curious beauty to the narrative.

Inside Out is a comprehensive overview of dipteran biology. It is a must for anyone who would like a better understanding of how flies in particular, and insects more generally, work.

Peter Smithers