"You’ll learn that the best interface is the one that lets users do what they want to do, when they want to do it, and how they want to do it" (p. xi). With this statement of philosophy, Mandel begins dissecting software user interfaces. The book is divided into four parts, which cover foundations, object-oriented user interfaces, the design process, and advanced techniques and technologies. The author defines and discusses quality; designers’, programmers’, and users’ mental models; user friendliness; action-object versus object-action interaction styles; the evolution of interface style, from command line to object-oriented interfaces; direct manipulation; the look-and-feel iceberg; human cognition; usability engineering; help and training, including wizards and advisors; and future computer interface metaphors.

Mandel candidly addresses designers, developers, technical writers, usability engineers, managers, project leaders, and students when he says, "Know thy users, for they are not you." Users should be able to control their own computer worlds. Mandel places the burden on designers and developers to enable users by understanding them and providing tools that support their grasp of a computer world.

The author also has a message for operators, reviewers, evaluators, and instructors, which is presented delicately using the image of the look-and-feel iceberg. The iceberg depicts real-world interfaces as comprising two parts: the 40 percent above the surface (presentation and interaction, which are visible to the user) and the 60 percent below the surface (object relationships, which are hidden from the user). He points out that users of interfaces, while integrating their knowledge with that of the computer, must be aware that developers’ choices may have created results that are not always obvious on the surface. For the best results in user perception, performance, and satisfaction, both users and developers must know both what users want and what developers have provided.

Throughout the book, Mandel emphasizes object orientation. Without neglecting more traditional approaches to interaction, he moves readers gently into the object-oriented mindset. New designers and developers just entering the field will find this orientation essential. Experienced workers moving to object-oriented concepts and methods will benefit from the clear comparisons between traditional concepts and object orientation that he provides.

I recommend this book both as an excellent introduction to concepts and principles related to interfaces and as a low-key introduction to object orientation. It would be difficult to use as a textbook because it lacks exercises, but it would be valuable in both undergraduate and beginning graduate courses because Mandel clearly distinguishes users from developers, action-object from object-action styles of interaction, and object orientation from application orientation. These distinctions are likely to be among the most enduring and valuable information readers take with them.