Annotated Bibliography

User Interface Design

Blair-Early, A., & Zender, M. (2008). User Interface Design Principles for Interaction Design. *Design Issues*, *24*(3), 85–107.

This article by Adream Blair-Early and Mike Zender appeared in the journal *Design Issues* in 2008. The article addresses the issue of vague user interface design standards. Blair-Early and Zender begin by discussing the main issue of interface design as being a lack of clarity or even direction in most cases. They then examine the process of developing an interface and the effect that different requirements and parameters can have on the design itself. They then delve into types of interface structure and the implications of each. The most informative part of the article however is a section titled design principles where the authors layout a step by step approach to designing a user interface that can be applied to various problems. Overall this article is highly informative and defends each and every point in a succinct and clear manner. The authors have created a wonderful guide to designing interfaces that, while not technical, manages to provide more than enough information upon which to build.

Bowman, D. A., Kruijff, E., Laviola Jr, J. J., & Poupyrev, I. (2001). An Introduction to 3-D User Interface Design. *Presence: Teleoperators & Virtual Environments*, *10*(1), 96–108.

Butow, E. (2007). *User Interface Design for Mere Mortals*. Addison-Wesley Professional.

This book by Eric Butow provides an excellent introduction to user interface design. Regardless of the amount of background you have in design this book is very informative and builds from the ground up. The easy to read book contains simple examples and informative pictures to further explain topics that could otherwise be very complicated. However it has some odd quirks, it talks extensively about Windows Vista, and while it does discuss Linux and Mac OS, and obviously favors Microsoft products. It also argues back and forth about JavaScript and PHP, and it becomes clear that the author is very one sided in his opinion, often stating that PHP is the obvious choice due to its “superior power” yet never expands upon this. Additionally, this book does not delve into the deeper and more complicated implementation of user interface design. Despite this, the book remains tremendously educational and provides an excellent base introduction to user interface design.

Clifton, I. G. (2013). *AndroidTM User Interface Design: Turning Ideas and Sketches into Beautifully Designed Apps*. Addison-Wesley Professional.

Galitz, W. O. (2007). *The essential guide to user interface design: an introduction to GUI design principles and techniques* (3rd ed.). Indianapolis, IN: Wiley Pub.

In this 2007 book , author Wilbert Galitz provides a highly informative and easily accessible book detailing the importance of interface design, and the execution of that design. Unlike previously discussed articles and books, Gaulitz dives into great detail when discussing user interfaces and GUIs, and as such his book becomes a wealth of knowledge and information for the development of many different interfaces. In addition to this, he discusses how the interface being designed can be affected by the user, client and method in which it will be used. By discussing these factors in detail, Gaulitz sets his book apart from others exploring the same topic and provides far more insights and helpful tips. The book is long, yet easy to navigate with each section concise and to the point with no fluff to dilute the main point. All-in-all this book is a treasure trove of information to those will little to no interface design background as well as those looking to broaden their knowledge.

Grimes, J., Ehrlich, K., & Vaske, J. (1986). User Interface Design: Are Human Factors Principles Used? *SIGCHI Bull.*, *17*(3), 22–26. doi:10.1145/15671.15672

Lee, Y. C., Chao, Y. H., & Lin, S. B. (2010). Structural approach to design user interface. *Computers in Industry*, *61*(7), 613–623.

Martinez, W. L. (2011). Graphical user interfaces. *Wiley Interdisciplinary Reviews: Computational Statistics*, *3*(2), 119–133.

This article provides an introduction to Graphical User Interfaces or GUIs. The main purpose of GUIs is to allow for computers and humans to interact more effectively. This article discusses GUIs in a way that people who are not GUI developers can understand. A brief history of GUIs as well as types and components of GUIs is discussed before the author turns to the topic of GUI design. The topic is not covered in great detail however, nor is this article intended to be used by everyone. This is most specifically evident when the author talks about creating GUIs in MATLAB. Prior to this the article was informative and accessible to anyone with some computer or math background, yet as the article progressed the information became more and mofe specific. Despite this fact the content was overall very informative and supplies a nice base upon which further exploration of GUIs can be conducted.

McAlindon, P. J. (1992). Computer interface design: A user-centered approach. *Computers &amp; Industrial Engineering*, *23*(1-4), 205–207.

In this simple article author Peter McAlindon discusses the importance of user-centered design. In years past it was often the practice to design programs that were solely based on what would be quickest and simplest for the computer. As computers have gotten more powerful, this practice has been thrown by the way side. Nearly all interfaces today are designed with the user in mind, and McAlindon’s article discuses just this. He also makes the questions that must be asked and the problems that need to be solved in order to create a truly user friendly interface. This straightforward article is an easy read and is highly accessible, and despite its age, remains extremely truthful and applicable to interface design.

Mussio, P., Finadri, M., Gentini, P., & Colombo, F. (1992). A bootstrap approach to visual user-interface design and development. *The Visual Computer*, *8*(2), 75 – 93.

Nilsson, E. G. (2009). Design patterns for user interface for mobile applications. *Advances in Engineering Software*, *40*(12), 1318–1328.

Shneiderman, B. (1987). *Designing the user interface: strategies for effective human-computer interaction*. Reading, Mass: Addison-Wesley.

Singh, G., & Green, M. (1992). Visual user interface design tools. *The Visual Computer*, *8*(2), 71 – 74.

Tennant, R. (1999). User Interface Design: Some Guiding Principles. *Library Journal*, *124*(17), 28.

Zetie, C. (1998). User Interface Design: Bridging the Gap. *SIGCHI Bull.*, *30*(3), 45–46.