

# Microsoft powerpoint evaluation

[Technology](#), [Internet](#)



This report outlines the features of HCI and the associated functions of the surrounding peripherals of a system. It shows how the user of an application is more important than the application being used and that the latest applications are designed with the user in mind foremost. The report also describes how HCI can help develop an efficient and effective application. Failures of systems that have had bad HCI design are also outlined and the outcomes of these are listed.

Two applications have been evaluated and are included in the report. These show how they have been through the process of HCI design in the stages of their development, as they are easy to use and functional. Human Computer Interaction, or HCI, is the study, planning, and design of what happens when a user and a computer work together. As its name implies, HCI consists of three parts: the user, the computer itself, and the ways they work together.

**The User** By user, we may mean an individual user, a group of users working together, or even a series of users in an organisation, each involved with some part of the job or development. The user is whoever is trying to get the job done using the technology. An appreciation of the way people's sensory systems (sight, hearing, touch) relay information is vital to designing a first-class product. For example, display layouts should accommodate the fact that people can be sidetracked by the smallest movement in the outer (peripheral) part of their visual fields, so only important areas should be specified by moving or blinking visuals.

**The Computer** Desktop computers, to large-scale computer systems and even a process control system or an embedded system could be classed as

the computer. For example, if we were discussing the design of a Website, then the Website itself would be referred to as the computer. The

Interaction There are obvious differences between humans and machines. In spite of these, HCI attempts to ensure that they both get on with each other and interact successfully. In order to achieve a usable product, you need to apply what you know about humans and computers, and consult with likely users throughout the design process.

You need to find a reasonable balance between what can be done within the schedule and budget, and what would be ideal for your users. Computers are now present in the majority of households, as children use them for homework and parents use them for work and pleasure. The type of users of computers has changed along with this increase. The expenses of the Internet have encouraged this change and increase in use, as it allows people to use e-mail, chat rooms and also visit websites. Computers are becoming more and more complex, as they develop faster and bigger products that require compatible hardware.

An efficient HCI is now viewed as a competitive edge in today's business activities, where it can save time and money for the company that operates an efficient system. Often, when software and hardware are first designed and built, emphasis might be given to the functionality - what it can do. Sometimes little thought is given to what actions will be required from the users who want to make use of this functionality. So, the required actions may be difficult to carry out, or even difficult to figure out - they may not be intuitively obvious.

This might be alright if the intended operators are 'technical experts' who understand the computer and how it functions and are willing/able to be trained thoroughly in its operation. An example might be the very earliest computers where the 'interface' with users was complex and difficult to use. The only people who could or would operate them were a small group of mathematicians and scientists who could understand and deal with this; who could adapt their own behaviour to fit in with the requirements of the machine. In any case, very little was known about how to make computers easier to use. The technology was not there to provide many of the easy-to-use devices that we now take for granted - VDUs, keyboard, mouse, and so on.

However, as computers developed in speed, capability, memory etc, and as the price reduced, a wider range of people (data processing professionals, engineers and other non-computing specialists) began to find a use for them. But they complained that the machines were still difficult to use, the techniques then available (eg punched cards) took too long to produce results, and the machines were quite inflexible in their operation. Something had to be done to improve the usability of the computers. In the 1970s, the quest for ideas such as 'user friendliness', 'user interface', and the study of 'man-machine interface' was started.

From this developed, in the 1980s, the field of study known as HCI. In HCI, consideration of users and their environment is given as much emphasis as the technical aspects of getting the machine (ie the program) to perform certain functions. Foremost is the idea that in a well-designed system, users

should not have to adapt to the interface; it should be designed so that it is natural and intuitive for them to learn to use it. In modern systems analysis and software engineering 'Usability' is given as much importance as the other criteria for software quality such as functionality, reliability, efficiency, maintainability, portability.