

User interfaces

Technology, Information Technology



User interfaces USER INTERFACES: Technology has revolutionized itself during the passage of time. Computers have had a drastic impact on the lives on individuals and have shaped the lifestyle of people globally. A new field has emerged during the passage of time that deals with how humans communicate and interact with computers. (Obendorf, 2009) This form of interaction is required in most areas of psychology, graphic designing, engineering etc. having drastic implications. User interfaces are used very commonly in our everyday routine. Some interfaces are complex and designed to cater a specific purpose. The complexity of the system depends upon the usage while some our user friendly while others require skill to manage. The only way to communicate with a computer is thus by using a user interface which is designed according to the requirement of the product. Thus interfaces are quite manageable, easy to use and comprehend to. They are designed accordingly to suit the need of the user and assist them in the task that needs to be performed. The three most prominent user interfaces are: Command line interface –CLI, Menu driven interface –MDI, Graphical user interface –GUI (Doyles& Penrose, 2001) Here I would like to mention one of the most popular user interfaces that is being used by almost all individuals that have access to computers that is Graphical User Interface (GUI). The Graphical User Interface is one of the most used and easiest interfaces of recent times. The graphical user interface is user friendly and provides ease to the user. In the previous time the users of various interfaces like the Command line operating system had to memorize various commands in order to perform certain tasks. This user interface on the other hand provided opportunities for individuals to easily interact with the

computer by the use of graphics, menus, windows etc. to perform certain tasks. This involves the use of input devices such as the mouse and keyboard which helps them to access their desired command. Thus " As a common practice, a user-friendly interface is associated with graphical objects like windows, icons, menus, etc." (Zhang, 1996) The graphical user interface is the most convenient and user friendly interfaces available. It confronts to the golden rules set by Mandel. Firstly the graphical user interface gives priority to its user. Since it is very easy to use and does not require any efforts such a memorization and has easy graphics that make the task comprehensible giving the user control over the software. It is quite flexible as it incorporates the use of input devices. It is that user interface which is responsive and allows user to overcome mistakes or any unnecessary command given. It works on a way that involves a system of immediate feedback and response hence making it helpful for users. It allows users having various skills to use making it accessible for all individuals. In the GUI the user can customize the interface according to their preference and requirement. The GUI also adheres to the second rule set by Mandel which reduces the load on human memory. Since this is a user interface that involves the use of graphics and visual cues to perform tasks it is reduces human effort and does not lay any stress on the human memory.

Furthermore this interface also is quite consistent and shows affiliation in the results. The results are similar and precise of all interactions performed. It is also aesthetically compatible as it can be customized to suit the need of the user. Thus in a nutshell, when it comes to interfaces the GUI is the most efficient interface available which adheres to the rules set by Mandel.

Because of its easy accessibility it is now being used on large scale by many individuals as well as professionals to perform their desired task. The second interface that I would like to mention is a COMMAND LINE INTERFACE or CLI. This user interface is quite tricky and confusing as compared to the graphic user interface. It requires individuals to type commands in order to perform certain task. This interface is not quite user friendly as individuals have to be skilled to handle this software. The CLI is a very efficient and prompt interface but requires efficiency and skill to perform tasks. The CLI does not confront to the rules set by Mandel as it requires skilled professionals to control the interface. Secondly one has to be quite prompt with the commands as a single error can cause failure of the task. Lastly it is not quite aesthetically appealing too and follows a simple monotonous monochrome pattern. Thus the reservations limits the use of this interface to a certain group of skilled workers required to perform specific tasks. The most common CLI interface is DOS which is quite negligibly used on daily basis. Hence " For general users, such a command-line interface is not convenient to use and a more intuitive and easy-to-use graphical interface is preferred." (Guo, 2003) Thirdly I would mention the MENU DRIVEN INTERFACE which is lets users to interact by using a series of menus. The menu driven interface is quite popular in recent times and is used by individuals to carry out their daily activities. Mobile phones, ATM'S etc. all come under the category of MDI which comprise of menus and screens that help users to perform their task. " The main disadvantage of menu-driven systems is that they can be quite 'long-winded'." (Evans, 2001) This form of interface is also confronting to the

standards set by Mandel as it user friendly. Gives individuals the power to control and perform the task. It does not require the involvement of memory as all the options are provided and the user just merely has to choose his task. The only problem with this interface is that one cannot customize quite easily. Thus the user has to limit himself to the options provided by the developer. Thus in order to make it more effective the MDI should be made the option to customize and not limit the user to the menu provided. These are the most common and effective interfaces used on daily basis to perform tasks at various occasion depending on the requirement. In order to make these interfaces more users friendly certain amendments can be made depending on the limitations of the interface. APPENDIX Graphical user interface (GUI) Command line interface (CLI) Menu driven interface (MDI) WORKS CITED Obendorf, Hartmut. Minimalism designing simplicity.

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