A Full Review on E-Ball Technology

NAVURU HEMANTH KUMAR*, ** P. KARTHIKEYAN MCA., M.E
*P.G. Scholar (M.C.A), Siddharth Institute of Engineering and Technology, Puttur-517583.
**Department Of MCA

Abstract - The word computer comes from the "compute" that means to calculate or influence, so that generally people consider that the computer is a device which is used to calculate or manipulate any job within a less amount of time. The computer was invented in 19th century. A new concept of pc is coming now that is E-ball concept pc it was developing by APOSTOL TNOKOVSKI. The E-ball is a new concept of pc which is have all the features like a traditional chip as some components such as laser, keyboard, and mouse. E-ball pc is nothing but full computer within the ball shape. E-ball is very attractive and unique. E-ball is possible to change the life of people completely in future. E-ball is innovative hand-hold computer with the properties of existing with the spontaneous design.

Keywords:Virtual keyboard, Paper Sheet holder, LCD Projector, DLP Projector

1. INTRODUCTION

It is spherical in shape and smallest one among laptops and desktops. Due to little in size, It is easy to operate, handle and move. The diameter of this computer is 6 inches only which also make it very good-looking and unique. Only Microsoft Windows Operating System is well-matched with this E-ball computer. E-ball computer is designed in such a way that it can be located on multiple stands, opened by pressing and holding two buttons which are located at each side of this computer at same instant. The E-ball concept uses virtual keyboard which is activated by pressing exact button. Next opening the E-ball computer, optical mouse can be disconnected from body of E-ball computer by pressing detaching mouse button. This computer preventionhave any external display unit. It uses a projector for the determination of display which is simply pop up by pressing and holding the button. The software allianceof this computer is iconic, unique and user friendly. This computer can be used in appropriate place like home, office.

Figure 1: The E-ball image

2.Starting the E-Ball

The first thing previously starting the E-ball is to put it into standing position. For this we have to press the dual buttons on thesides of E-ball for 5 seconds and the stands are mechanically opened and adjusted so as to hold the E-ball Pc in position. After this the on/off button shown in top of the E-ball must be pressed to turn on the PC and then the Projector

pops up. After this the focus, direction can be adjusted using the celestial navigation buttons.

Figure 2: power on E-ball

3. ELEMENTS OF E-BALL COMPUTER

A) Size Of E-Ball

E-ball is a spherical sphere shape ball of 6-inch in diameter and contains a motherboard of size of 120x120mm.Eball is made up of aluminium and plastic body.

B) RAM

Random Access Memory (RAM). RAM is a volatile memory.it is a storage device but the data is not store perpetually-ball pc is basically uses the 5GB of RAM. RAM is measure by bits.8bits equal to 1 byte. It has two types of RAM. SRAM &DRAM

C) Processor

Intel core is a brand name used for various mid-range to high end consumer on business micro- processor made by Intel.The current line-up of core processors include the latest processor: Intel core i7, Intel core i3, Intel core2 solo, intel core i5, intel core2 duo, intel core2 quad. The E-ball basically uses Intel core2 duo processor

D) Speakers

The E-ball has two inbuilt 50W speaker. The E-ball pc speakers work in very high speed and aureate. The two speakers are very loud.

E) Holographic Display

Holographic is the best way of displaying the true 3Dimension displays. It is a type of diffraction based displays technology which reconstructs the light field of 3D in space with the light.

F) Hard Disk Drive

In every pc the hard disk drive is the key part it is a secondary storage device. It is a volatile in nature. It consists of oxide coated metal platter that can be magnetized to characterize data,The E-ball pc has a 350-500GB hard disk drive

G) HD-DVD Recorder

HD is the expansion of high definition.HD-DVD recorder is an self-determining unit which dwells the functions of video holder recorder. It accounts into a DVD disc or in the internal disc.

H) Webcam

Webcam is extensively used by all the computers. It can be connected to E-ball through USB.

I) LAN&WAN Card

LAN is used to connect the user to LAN through wireless connection.WAN is used to links the user to a WAN. WAN is a network interface card.

Figure 3:COMPONENTS OF E-BALL

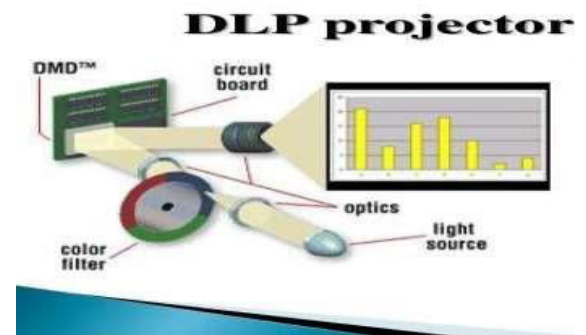**4.SOMEIMPORTANT COMPONENTS OF E-BALL**

I) PROJECTOR:

There are two types of projector for E-ball computer

a). Liquid Crystal Display:

It is used to display graphic data like some kind of videos, image, computer data and some other outcome or output. It does not produce light itself. It uses light of other source. It takes help of meta-halide lamp to send light through prism or a sequence of dichroic that divide the light into three polysilicon pieces. I.e. red, blue and green for video signal.

b). Digital Light Processing:

It is a projector is uses digital micro-mirror device. It is built on micro-electro-mechanical technology. The image is created by minor mirror. These mirror can be that much small Digital Micro Mirror pixel pitch may be 5.4 micrometre or a smaller

.

Figure 4: Digital Light Processing Projector

II) OPTICAL MOUSE:

It is wireless device which uses the light emitting diode for determination of tracking movement of optical mouse. It completes the demand of E-ball computer correctly. It can be easily carried from one place to another place

Figure 5: Optical Mouse

III) PAPER SHEET HOLDER:

If there is no wall for projection of computer screen. Then, use paper sheet as screen for that determination. This paper sheet is kept in paper holder which is place at back of E-ball computer. It is unbolted by pressing its minor part.

Figure 6: Paper Sheet Holder

IV)VIRTUAL KEYBOARD:

It is not a physical device. It simply appears on flat surface. It is happening by pressing specific button and use laser ray technique for its implementation. When user of E-ball computer drops the virtual key the optical device detect stroke and send it to E-ball computer. There are many compensations of using virtual keyboard. For occurrence, text pass is fast, no external hardware and more secure.

Figure 7:virtual keyboard

Reasons to use the Virtual Keyboard.:

• When connected to your handheld computer it is more suitable to carry round than your laptop.
 • It takes up a smaller amount desk space than a conventional keyboard.
 • You could use it through your desktop, laptop or handheld computer.
Three components of virtual keyboard are:-

a). Sensor Module:

The sensor module work for as the eyes of the Keyboard Perception technology. The Sensor Element operates by locating the user's space and tracking the future keystroke.

Figure 8:Sensore module

b).IR-Light source

The IR-light source is not observable by the user. The IR-light basis emits a ray of infrared light. It is invisible to human eyes, but people can feel itby way of heat. The light which is made from IR-Light source is not observable to the user. The IR-Light source emits a ray of infrared light.

Figure 9: IR-Light source

c).Pattern Projector

The pattern projector is used to display the keyboard is projected on a flat surface. The projected image is that of a typical keyboard with all the keys and control functions.

Figure 10: Pattern projector

V) PROS OF E-BALL

- The E-ball PC is smaller in size so, it is portable and each to carry from one place to another.
- E-Ball has large memory so we can store large amount of data in this computer.
- E-Ball is useful for making video presentation
- The speed of E-ball is high
- It Supports user-defined keyboard layouts
- It is efficient.
- It is more secure than other computer
- We can use E-ball where there is no wall also its not a problem

VI) CONS OF E-BALL

- Normal OS can't work in these computers
- Cost of E-Ball is very high
- It is difficult to understand any problems occur in hardware components and to recover it

VII) CONCLUSION

Today the technology is out there our thoughts and it is at peak point. As the year passes the size of computer is becoming slighter and smaller andnow the time came that we can have the computer in our pocket and move from one place to another. E-ball is just like a ball and does all the function of old-style computer.As the year passes, the computer. As, year passes, the computer size is becoming slighter. The world has come to our compact because of E-ball pc device. The new concept of E-ball pc that has been proposed few years back but yet has not almost implemented for use in any field. The E-ball has taken the computer technology to new prospects.E-ball computer is very beautiful and easy to use and handle. It has high internal complication which might be resolve in future. It can be broadly used in few years. It will take time to come in market and use for general persistence but Truly, It is future of new computers world.

REFERENCES

[1] http://www.slideshare.net/jominz/E-ballseminar. http://smarttech.com

[2] Ashish Tanwar1, Litty Thomas2 , http://www.ijarse.com/images/fullpdf/1412875273_8_Research_Paper.pdf

[3] "Overhead Projectors". National Museum of American History. Retrieved 7 January 2015

[4] http://google.co.in/EBALL

[5] http://dukedk666.wordpress.com/2013/04/12/eballconcept

[6] http://www.google.com

[7] http://www.tuvie.com/e-ball-pc-concept-by-apostol-tnokovski/

[8]Lawler, Richard (2006). "LG's 100-inch LCD set for mass production", Engadget

[9] http://www.scribd.com/doc/177282692/FULL-SEMINARREPORT-ON-E-BALL#logout

[10]http://www.ijarse.com/images/fullpdf/1412875273_8_Researc h_Paper.pdf

[11]https://www.google.com/search?q=e+ball+technology+images&rlz=1C1SQJL_enIN800IN800&oq=e-ball+technology+imag&aqs=chrome.1.69i57j0l2.17055j0j8&sourceid=chrome&ie=UTF-8

(Images and information from Google.)