

5 PC PEN TECHNOLOGY

(Review Paper)

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Abstract: P-ISM (“Pen-style Personal Networking Gadget Package”), which is nothing but the new discovery, which is under developing, stage by NEC Corporation. P-ISM is a gadget package including five functions: a pen-style cellular phone with a handwriting data input function, virtual keyboard, a very small projector, camera scanner, and personal ID key with cashless pass function. P-ISMs are connected with one another through short-range wireless technology. The whole set is also connected to the Internet through the cellular phone function. This personal gadget in a minimalist pen style enables the ultimate ubiquitous computing.

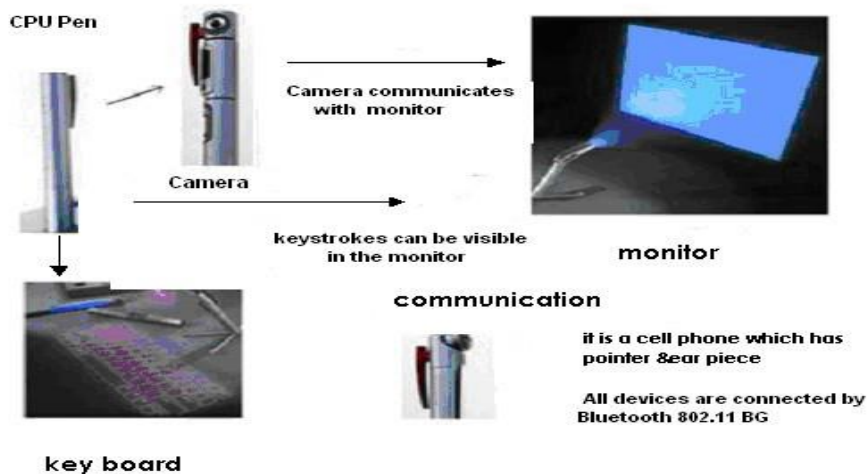
Keywords: P-ISM, display, camera, CPU pen, Battery, Virtual Keyboard, Bluetooth, Wireless Connectivity, etc.

1. INTRODUCTION

Five pen pc shortly called as P-ISM (“Pen-style Personal Networking Gadget Package”), is nothing but the new discovery, which is under developing stage by NEC Corporation. P-ISM is a gadget package including five functions: a CPU pen, communication pen with a cellular phone function, virtual keyboard, a very small projector, and a camera. P-ISM’s are connected with one another through short-range wireless technology. The whole set is also connected to the Internet through the cellular phone function. This personal gadget in a minimalist pen style enables the ultimate ubiquitous computing.

2. P-ISM INCLUDES FIVE FUNCTIONS

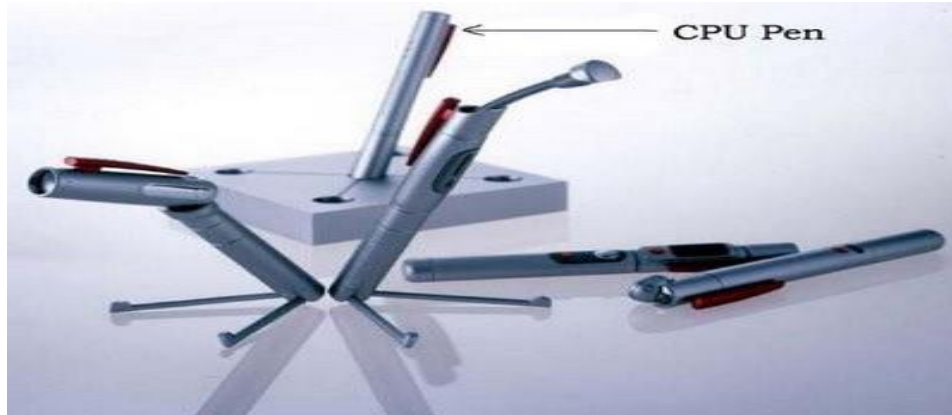
1. CPU PEN.
2. COMMUNICATION PEN.
3. VISUAL OUPPUT.
4. VIRTUAL CAMERA.
5. CAMERA.



Block diagram of 5 pen PC.

1. CPU PEN:

One of the pen out of 5 pens does cpu work, which is also known as computing engine. The processor used in this pen is of dual core processor. The window operating system is pre-installed in it.CPU does all the functions of a computer in a systematic and sequential manner.



2. COMMUNICATION PEN:

It has a wireless Bluetooth technology. We can access internet through cellular phone function. Wi-fi technology is also available in this pen. It can be used to transfer data or information with wireless connection.



They are connected through Tri-wireless modes (Blue tooth, 802.11B/G, and terabytes of data, exceeding the capacity of today's hard disks.2.4GHz of frequency is adopted in it.

3. LED PROJECTOR:

One of the pen out of 5 pens used is used for display purpose.The display is of LED projector.The size of LED projector is A4.The resolution capacity is 1024*678 approx.The clarity of LED is good and visual images are of good quality.



4. VIRTUAL KEYBOARD:

One of the pen out of 5 pens is used for keyboard display. virtual laser keyboard is a new gadget. A laser is emitted on to the desk by the pen. Laser beam is used to generate full size keyboard. The VKB settings can be changed.



5. DIGITAL CAMERA:

As of web cam it is used in video recording and video capturing. It is a portable and connected with other devices. The visual communication device is 360 degree.



3. BATTERY

The battery life is of 6+ i.e., it comes for nearly two weeks.

MERITS:

- Portable.
- Feasible.
- Wi-fi technology.
- Pens produce both monitor and keyboard on a surface from where we can use it.

DEMERITS:

- Cost.
- Battery.
- Keyboard concept is not new.
- Positioning is main and unclear.

4. CONCLUSION

The communication devices are becoming smaller and compact. This is only an example for the start of this new technology. We can expect more such developments in the future. It seems that information terminals are infinitely getting smaller. However, we will continue to manipulate them with our hands for now. We have visualized the connection between the latest technology and the human, in a form of a pen. P-ISM is a gadget package including five functions: a pen-style cellular phone with a handwriting data input function, virtual keyboard, a very small projector, camera scanner, and personal ID key with cashless pass function. P-ISMs are connected with one another through short-range wireless technology. The whole set is also connected to the Internet through the cellular phone function. This personal gadget in a minimalistic pen style enables the ultimate ubiquitous computing.

REFERENCES

- [1] <http://www.computinghistory.org.uk/history.html>
- [2] http://en.wikipedia.org/wiki/pen_computing
- [3] http://www.softwaretoolbar.com/virtual_keyboard.html
- [4] http://www.compinfo_center.com/ledprojector.html
- [5] <http://users.erols.com/rwseries/biblio.html>
- [6] http://rwservices.no._ip.info:81/pens/biblio70html#gray1888b
- [7] www.scribd.com/doc/67990223/report_on_5_pen_pct_echnology.