

Varndean Case ICT
Varndean e-Learning LTD.

After hearing the talk with John Burton a Director from the Varndean e-learning company. I have learnt that Varndean is a fairly small company compared to other large manufactures.

John's Role in Varndean e-Learning is a shared one. As the company is a relatively small one they all share roles. But John writes interactive Learning materials (such as the one we are working from) He also has a small role with finances, but his main role is working with selling the product.

John will try to sell his programs in many ways. They include Websites, where the customers can view screenshots of the product and order a CD for more information, or they can actually buy the product its self. Varndean also run large marketing campaigns, they have a huge database of all the schools in the country. They use this to help distribute letters to or leaflets or any other way of selling their products. Also they invite them to a seminar where they can show them the products in far more detail.

To accomplish all this the company would have to use different software and hardware. Without the use of some software there is no way they could produce enough letters to distribute letters between thousands of schools. Also with out such web authoring tools such as Macromedia Dreamweaver no way could they make their websites. Also Microsoft excel and access keeping databases of all the schools addresses. With out software and hardware there is no way the sales department at Varndean could hold its ground well. Also Varndean and nearly all company little or large use email. John says, "they receive 10-15 emails a day asking for more detail or information about their programs."

So without hardware and software the sales department probably would work. Here is a list of all the things that makes this company work.

Purchasing Department

Another director at Varndean e-Learning is Andy Legget. He is more concerned with the purchasing department. His job can be as small as

buying paper clips or paper for the printer or to buy 2 servers to power a website and an office from.

They make all their purchases using a company bank account. They use debit cards quite a lot because they purchase a lot of equipment over the Internet. (Especially from the U.S) All of the suppliers that are purchased from are recorded in a SAGE instant account package. They keep track of who the suppliers are what we've bought from them.

By listening to Andy talk about the purchasing department I know that the purchasing department have:

- PC'S
- An internet Connection
- SAGE Instant Accounts
- They Work from there office in the Varndean company building
- They use 1 server to power there Network
- They use 1 server to run their website from

As Andy doesn't give a list of hardware or software he uses it is hard to see what equipment they use. So by reading what he says I can think that the Purchasing department runs on 2 servers. One run their website and the other powers the network. They use the Sage Instant accounts package, using this they can track their suppliers. Also we know that they use a Debit card to pay for things over the Internet.

Andy and his purchasing department staff would normally work in a office, here the advantage of ICT is shown as they use it to their advantage, without it they would not be able to surf the web and buy the products needed to make the purchasing department useful. With ICT the purchasing department can run a lot more quicker, smoother and efficient. Also with the aid of ict they can communicate with other companies Via email and other software, E.g. Msn Messenger, AOL Instant messenger.

The Finances Department

The Finances runs mainly on the use of ICT, the use of ICT in the Finances department is absolutely vital, they use it to follow the accounts, money coming in, and money coming out. This software allows them to keep track of any money due in and at the same time keep control of the amount of money being spent by the purchasing department. Once again all of the software and hardware and probably used in a designated office or set of rooms. They would have to use broadband to be quicker and carry out tasks faster. Individuals in the Finances department are

given a great advantage over other rival companies who have no ICT. Without it they would have to use pen and paper and search through catalogues. Not only would this take much longer, less efficient and harder to get information on the items and users.

At Varndean the 2 main people that control the Finances department are John and Sue. They send out invoices and inform people of the amount of the days they have left to pay, this will start from 30 days. With the use of SAGE instant accounts package they can follow their customers or buy around the world and follow their bank accounts. In this their details like Name, address and other contacts details are stored. Another piece of software used is the BACS this is an electronic system that can send any money straight to their bank account. The last main piece of software used is the SAGE payroll. Each month either Sue or John will enter the details of the workers at Varndean. This then (Every 3 weeks) will automate print out each check for each worker.

Once again the Finances department would use Macromedia DreamWeaver to create websites to distribute information on their products. Also from the internet they can communicate with other companies and also search the web for the purchasing department to buy. They get information from forums and the products website.

Operations Department

The Operations department is run by Andy, this is the part of the company which creates the products and creates the websites. To create the software they sell, they need to first use several pieces of hardware to create it, for example their software includes Video, so to get this video they need to use a Digital Camcorder to record images, they then upload it to their computers then with the use of ICT they can edit what they have recorded and place them into their software. Operations department is mainly in control of the creating of the software and websites. Once again the advantage of ICT is shown here mainly because the Operations department prove that without any of these software whether it's SAGE or if it's Macromedia Dreamweaver the company wouldn't exist, as every piece of software where is VITAL to the company and is used in its own way, mainly Varndean runs from offices in a large company building. So this means that their Hardware is protected from

thieves and is in a non-practical area, For example is doesn't share a building with a office of a Indoor football training pitch or a workshop.

One of the most important pieces of ICT used in any company or maybe The most important has to be the Internet or the World Wide Web (WWW). This is used everyday, every week and always on. I think that a huge company like Varndean would have to use broadband or a Business connection of a least 1mb. I think this because they have to run heavy tasks over the Internet of Download large files from the Internet in a short time. They also may have to be using the Internet while they speak on the phone to a customer directing them to a website, you don't want to be waiting 3 minutes for the website to load. Also downloads other piece s of software or maybe other files would take little or no time at all with a high 1mb connection. Also if the company was to have a internet collapse this would mean, Customers can't visite their website and purchase their products, they can't order new hardware to improve there current systems. The list of problems that could occur is very long.

(This Information was supplied by Varndean) on their website
www.varndean.net)

Main Operations, Sales, Finance

PCs x 2

Pentium 4 3.06 GHz Processor
1 Gb Ram
80 Gb Hard Disk
Video Card, Sound Card
Network Card

Operating System

Windows XP Professional

Peripherals

17" Flat Screen Monitor

Tablet PCs x 3

Pentium 3 1.3 Ghz Processor
256Mb Ram
80 Gb Hard Disk
Wireless Network Card

Operating System

Windows XP Professional

Network

Server 1

Dual Xeon 2.8Ghz Processors
1Gb RAM
RAID 5 Disk Array
3 x 36Gb SCSI Disks
Network Card

Operating System

Windows 2003 Server

Server 2

Dual Xeon 2.6Mhz Processors
1Gb RAM
RAID 5 Disk Array
3 x 36Gb SCSI Disks

Operating System

Windows 2003 Server

Other Equipment

Digital Video Camera (Via
Firewire Card)
Digital Stills Camera (Via USB
2.0 Card)
CD Copier (Copies 50 CDs -
connected to network)

Hardware Firewall (For Internet
connection)

Router (For Internet Connection)

Software Used In Company:

Macromedia Dreamweaver
Macromedia Author ware
Microsoft Active Server Pages
SAGE Instant accounts
SAGE payroll
Microsoft Word
Microsoft Access

Without These VITAL pieces of Software Varndean wouldn't be as big and as efficient as it is now.

The Software

In the interview with John he mentions many different types of Software that his companies uses. These are:

- Microsoft Word, a word processing unit. This is used a lot in companies it is used to write letters etc. (This work was written on Microsoft Word)
- Macromedia Dreamweaver a web Authoring tool. Allows you to create and website.
- Microsoft Access, this contains the name and addresses of all the schools.
- Adobe Photo Shop, They use this software to create flyers or leaflets to hand out at seminars or at open days etc.

Software would be used every day in Varndean to create all the documents needed or to keep up to date with all the latest buyers and sellers. This is a lot more reliable source than pen and paper. So it can be backed up and double backed up and printed to be stored in filing cabinets. Some software Varndean could not do without such as DreamWeaver this is used to make their programs and websites, with out these there products wouldn't be able to be sold or advertised on the Internet. So you can see how important software is to large companies. Just as much as the hardware that makes the computers works.

Varndean uses their software if a variety of different areas, these can range from a conference hall to an office in a company building. Differ

ent types of hardware are used to run the software. These also range from such things like a hand held PC to a PC.

Hardware

The varndean server uses a Dual Xeon system. Running at 2.8Ghz. The Xeon processor is normally best used in a Dual Xeon system. According to intel.com there is a possibility that as this Xeon processor is 2.8Ghz, that it probably has 512k cache. But there is a chance it can have up to 1mb.

The two operating pcs, both use a Pentium 4 processor. These work at a total of 3.06Ghz. They use 1mb of RAM, and power the whole LAN. Both of the master computers use Sound and Video cards, they are also linked up to LAN with 50 cd copiers. This means they can make up to 50 CDs at one time, Very useful when you are creating software for PC's.

On the master stations and on the LAN computers, they use 17" Flat screen monitors, these are easier on the eyes, this is very practical seeming as the job of someone that works at Varndean is to stare at a monitor for 12 hours.

All of these computers can be found in a office of a huge Varndean building, no doubt without the Use of ICT Varndean wouldn't exist, they need ICT too so much extent that if their computer system was to be broken or destroyed then Varndean would be useless until the computers are back up and running. Also with the aid of ICT they can communicate whether it be a Phone and a broadband connection or whether it be an email sent from Outlook Express.

School Office ICT Cliff Park High School Office

I have sent a questionnaire around the cliff park school office so I can get a good idea on how or if they use ICT in the office and how and new merit system will help or hinder. Results of the questionnaire can be found at the end of this document. At the current time the school office uses a very basic hand documented merit system. With the data base on Microsoft Access I am making I hope to make the office's job of dealing with the merit system a lot easier. With my new merit system the school will be able to keep an accurate count of all the pupils info. The school at the current time, as I said, uses a very basic ICT system. Using

Microsoft Word for Written documents and excel for simple spreadsheets, e.g. Forms of all students. Hopefully with the aid of my new system the school office can get around to understand how Microsoft access works, and can make other more detailed data bases, for example student attendance. Here is a list of the software:

Software	Use	How it helps...
Microsoft Word	Type up written documents.	Things like mail merging letters can help and other documents can be permanently saved.
Microsoft Excel	Easy simple spread sheets can be made.	Simple spreadsheets can be used, like forms of all students.
Microsoft Publisher	To create quick detailed flyers, posters, leaflets.	The school can give out Leaflets or posters to pupils or to be posted around the school.

Pheonix	Used to record all of the students previous records. Attendance, detentions, etc.	Every single piece of information that a pupil can have is stored on here and can be kept.
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The school office uses a vast variety of hardware and would be pointless to state all the hardware used. So I have constructed a table with the most important pieces of hardware the office uses.

Hardware	Uses	How it helps...
Monitor 17" TFT	To view the information	Large and clear enough to view the information.
Keyboard Logitech Ps/2 Standard	To piece of equip that you type onto.	Quick and easy to use, typists can type a letter very quickly.

Printer HL-5130	Prints out the documents that have been made on the PC, this now can be kept on paper.	Hundreds of copies can be printed out and distributed.
Base Unit	The piece of equipment that makes the whole PC work. The Mother Board and other hardware devices are kept inside.	With out it the PC would not work.

The Results of the questionnaire I sent around is easy to understand, the school office understands how ICT is used and the office workers can use it easily. Some exceptions are that some members of the staff are unsure on how to use some pieces of software but after time they could learn more about it. They think mostly that the hardware and software is easy to use. As the school office is very resourceful the workers in the office have purchased only the software and hardware that is needed for their daily tasks, this means that they are not having a debate on which piece of software to use depending on looks or which bit of hardware looks the best. They are using the easiest software for them too use. For example Microsoft word is a very simple and easy to use that any one could use. My next table will show in-depth information on each of the schools hardware.

Hardware	In-Depth Information
Monitor Output Peripheral	17" TFT Flat Screen 1280X1024 Maximum Resolution Plug and Play 175mm Height 454mm Depth 6kg Weight

	<p>These all add up to give a very easy on the eyes professional look.</p>
<p>Keyboard Input Peripheral</p>	<p>Logitech Cordless Usb or PS2 Connectivity</p> <p>A basic simple keyboard that does not have any unneeded Function buttons EG. Volume Control.</p>
<p>Printer HL 5130 Output Peripheral</p>	<p>Quick and easy to install, the HL - 5130 printer has state-of-the-art interactive animations to help you get the most from this machine. And that 'most' includes an impressive 8MB of memory, up to 17ppm print speed and a 250 sheet paper capacity</p> <p>An appropriate printer for a school office, has many features including Duplex, where the computer prints of both sides of the paper.</p>
<p>Base Unit Processor</p>	<p>Intel Celeron 2.7 GHz Processor 512 Mb RAM 80Gb Hard drive 64Mb Geforce FX5200 graphics</p> <p>512MB DDR Ram will give fast loading time and with a 2.7GHz processor the pc will be at a very comfortable speed for office work. And the 80Gb of hard drive allows the office to save lots of large files.</p>

Workers and Their Jobs in the Office

Mrs Glover:
Accountant, Finance officer

Mrs Trudgill:
Secretary, heads Pa.

Mrs Payne (Until 11:30)
Attendance, Absence ring round

Mrs Rowland:
Assisting curriculum team leaders and senior staff

Mrs Shuman
Attendance, school dinner money, school finance, general finance

Mrs Hamen:
Telephone, reception

Summary

In short Cliff park high school uses a very easy to use school system. They use some software that people use at home and they use some software which is specific for the jobs they need doing for example, Phoenix, this keeps track of all the children's attendances. The hardware the school use is very simple, they have not got hardware that is not needed for example 1024 DDR Ram or a 168meg graphics card. As these types of hardware are unpractical for their jobs. The Input hardware such as mice and keyboard are all simple to use and can provide a good enough service.