## Year 10 I.C.T Coursework – I.C.T in Society

I am studying how I.C.T has affected our society in recent years. To find out how I.C.T has affected our lives I am going to explore how the entertainment industry, education, and communication industry greatly depend on I.C.T, and then I will predict how I think I.C.T will affect our future.

Firstly the entertainment industry relies on the use of I.C.T throughout most of its divisions. In this section I am going to explore how the music, television and film industries use I.C.T.

The music industry has evolved greatly with the use of I.C.T. Firstly Compact Discs (CD's) have taken over from the use of cassettes. Although cassettes are still widely used and still available to buy and record on the majority of music listeners prefer the use of Compact Discs. The added advantage of using Compact Discs results in better sound quality without the "hiss" sound often heard on cassettes. Once a Compact Disc has been created there are still more advantages. Instead of fast forwarding and rewinding to find the track you want to listen to which takes ages, you can just skip song by song by the touch of a button with a Compact Disc. A Compact Disc would cost more than a Cassette but only by a couple of pounds and for the better quality of music it is worth it.

Downloadable music is now the biggest and most popular form of gaining music now days. Peer to Peer software such as Kazaa, WinMX, and Napster all provide peer to peer software free from the internet which ables a user of their product to type in the name or artist that they are searching for and they can download their chosen tracks with no cost. With peer to peer software not only can music be downloaded for free, but so can TV programmes, films, pictures and even Pc Software. Although using the service is a form of illegal piracy, it is widely used and will be extremely hard to stop as the services are set up from unknown locations with some 7,115, 596 users sharing approximately 701,707,489 files. As a result of free downloadable music from the internet the record companies have announced a loss in sales, therefore lowering the prices of Compact Discs and Cassettes.

Radio is the forth industry which has evolved greatly with the use of I.C.T. The main factor that changed the image of radio was the launch of DAB digital radio. DAB digital radio is not satellite radio. DAB digital radio is not internet radio. DAB digital radio is a new way of broadcasting radio via a network of terrestrial transmitters. It provides listeners with more choice, better sound quality and more information. DAB digital radio is like analogue radio, only better. With DAB digital radio Listeners in most major towns and cities in the UK can receive between 30 and 50 radio stations with a digital radio, in many cases that's more than double what's available on analogue. And it's not just more of the same - the content within that choice of stations is unique and exciting, delivering station formats that just don't exist on analogue. The FM spectrum is so clogged right now that there's no room for new stations that would expand listeners' choice with, for example, soul music, or country music, or big band swing, or any of the other 100+ brands that are available uniquely to DAB, giving listeners more of a choice on what they want to listen to.

DAB digital radio delivers improved sound quality. The technology allows the receiver to lock on to the strongest signal it can find and ignore everything else. This eliminates the hiss, crackle and fade so familiar on analogue radio, providing a crystal clear radio reception. Also with DAB digital radio there are no frequencies to remember and sets are tuned by station name, therefore DAB digital radio has lots to offer and these new and exciting services were all created with the use of I.C.T.

The Television has evolved recently by going digital, like radio. Digital television in the UK is only available from one of the four digital television operators, Sky digital, Ntl, Telewest and Freeview. Digital Television provides a range of new services for its viewers making it much better viewing than terrestrial television. The extra features that the digital operators provide for their viewers are; interactive programmes, access digital text (BBCi), skip programmes, shop from your TV, email and surf the web, find out information such as train times and cinema listings aswell as keeping in touch with sports news and the weather, pause live TV and rewind / fast forward it and also select your favorite channels so you don't have to spend ages wading through all the other channels that you don't like and set parental controls so that children only have access to channels that they should see like; children's and educational channels and not adult porn channels. The downside to digital television is that it costs. Depending on what channels / package you choose the cost could vary from as little as £7.99 to a massive £65.00 per month. Some operators also charge an installation fee to set up your digital set top box and dish,

where as some packages don't even need an installation engineer to come out as you can set it up yourself. Digital Television is one of the main divisions that have used I.C.T greatly in a range of different ways. Digital television is also one of the main forms of entertainment now days as people don't even have to leave their sofa to enjoy the latest films and programmes. Digital television is now in over 90% of homes around the United Kingdom.

Television programmers have also adapted to the use of CGI (computer generated images) in a succeeding attempt to create a sense of realism and special effects throughout their programmes. For example; "Walking with Dinosaurs" was a ground breaking programme in which the viewers were taken back to the age of the dinosaurs to encounter how they lived and provide information on the different kinds of dinosaurs. This programme was probably the only television programme made so far that has used so much computer generated images to show how the dinosaurs looked with every exact detail. These computer generated images are made on specialist computer software and can really generate images extremely well and accurately.



An Example of the Computer Generated Images Used In "Walking With Dinosaurs"

The film industry has been using Computer Generated Images for a while now but they are still always improving the ways they use their software and create better software to make the films that they produce even better and more realistic. For example "Disney Pixar" used Computer Generated Images throughout their hit films, "Toy Story" and "Shreck". Both of these films are computer animated cartoon movies based but the cartoon characters have been created in 3D and with the use of computer generated images special effects they move around just like people,

therefore making the construction of the films very realistic and not boring like an ordinary cartoon. There is a huge cost involved within the making of a computer animated film but as far as the critics and viewers are concerned it is worth it and one of the best films they have seen as it is just not like a normal film with people playing the roles of various characters.

Toy Story," the first feature film made entirely by computer, creates a universe out of a couple of kids' bedrooms, a gas station and a stretch of suburban highway. Its heroes are toys, which come to life when nobody is watching. Its conflict is between an old-fashioned cowboy doll who has always been a little boy's favorite toy, and the new space ranger who may replace him. The villain is the mean kid next door who takes toys apart and puts them back together in macabre combinations. The result is a visionary roller-coaster ride of a movie. For the kids in the audience, a movie like this will work because it tells a fun story, contains a lot of humor and is exciting to watch. Older viewers may be even more absorbed, because "Toy Story" achieves a three-dimensional reality and freedom of movement that is liberating and new. The more you know about how the movie was made, the more you respect it.



Computer Animated Hit Film "Toy Story"

Although there are more aspects within the entertainment industry that relies on the use of I.C.T I am now going to explore how I.C.T is greatly depended on within the Education industry. To explore how I.C.T is used within education I am going to look at how my school "Francis Combe School & Community College" relies on the use of I.C.T

Firstly, the school office relies two main resources which are I.C.T related. The switchboard telephone is an essential for any office / reception as when telephone calls are received they can

be directly transferred to the person the call is intended for. The switchboard can also handle a couple of calls at once, so if one person is busy someone else can answer the phone and calls can be put on hold. The school office secondly relies greatly on the computer which consists of a database containing all their pupils' information, such as their name, address, telephone numbers, allergies, medical issues, and other information about each child. This can be used when a teacher needs to find a child's home telephone number to speak to their parents or if the child is ill and needs to be sent home. Filters can also be set up, for example; if a teacher needs to find all the children suffering from asthma, he or she can type in asthma as a key word and all the children who suffer from asthma can be found easily.

Vital equipment within the school is I.C.T dependent, such as photocopiers, Over Head Projectors, Laminators and even Cameras.

Photocopiers are needed within nearly all business establishments but a school relies on photocopiers probably the most. They are used when for example a teacher needs every child to see a worksheet, then multiple copies can be made of the same sheet so everybody receives a copy. The most common photocopies needed to be made in a school would be letters to parents, worksheets, lesson plans and leaflets.

Cameras are I.C.T dependent. The are usually placed around the school grounds and some even within the school to catch intruders, vandals or to later review an incident that took place. The cameras around a school are linked to a control room where they can be closely monitored and viewed on large television screens. All the cameras record 24 hours a day so therefore if an incident takes place when someone isn't watching the camera screens then it can be later be rewound for later viewing. They are also recorded so of a copy of an incident needs to be sent on the police then it can be.

The I.C.T department within a school obviously uses I.C.T the most. In "Francis Combe School" there are four I.C.T suites which are all connected together via a network. The network is greatly depended on as pupils work is saved on it therefore making sure it is still accessible whenever they log on to a school computer, providing they remember their school user name and password. The ICT department also requires two servers which run the school networks and an administrator computer which can enable and disable user accounts aswell as adding and removing resources from the network. The administrator can also allow internet use and ban

inappropriate sites so that children cannot surf porn or other unacceptable sites during school time.

Every lesson that takes place within a school can be used in conjunction with I.C.T from producing graphs and tables for science or math's, producing a p.e.p for PE, and for researching for all the other subjects' aswell as typing up pieces if work. Therefore all school lessons need an input of I.C.T for added research or information or just for professional presentation.

Different types of software that I used during I.C.T lessons are; Microsoft Word, Microsoft Excel, Microsoft Access, Microsoft Power Point, Microsoft Front Page and Paint. Each of these packages helped me throughout my I.C.T work from basic typing exercises to creating databases, mail merging, plotting graphs, drawing and creating a high tech state of the art website. The toolboxes help with things such as spelling and you can also change your text and the colour, head your work, underling and highlight parts which need to stand out. You can also hyperlink parts of your work and cut and paste so you can move things around easily without loosing your work.





A Look at Some of the I.C.T Dependent Features At "Francis Combe School"

As well as the education department, it isn't known that I.C.T actually plays a big role in communication these days. I.C.T is the reason why we have so many communication features such as mobile phones, answer phones, online chat services, and services such as "1471".

Firstly in this section about how I.C.T is used in the Communication industry I am going to explore how I.C.T is behind the technology of Mobile Phones. Nowdays mobile phones were created to be able to talk on the move and that is the main feature of them but nowdays as new

technology has emerged Mobile Phones now offer new and exciting services such as Text Messaging, Photo Messaging, Video Calling, Downloadable Ringtones and Operator Logos and Hands Free Solutions.

Text Messaging is the Second most common mean of communication after normal voice calls over the telephone. A text message allows you to send a letter type message to the recipient for a mere cost of only around 10 pence. Some mobile networks also allow you to send text messages for free depending of your tariff. A text message is ideal when you are unable to speak on the phone, such as if you are in a meeting or school. The service is fast, efficient and cheap. This service is available on every new mobile phone launched as is rapidly becoming the number one for of communication between to parties.

One of the most recent developments in mobile messaging is known as multimedia messaging service (MMS). The photo message service allows Just as the traditional short message service (SMS); multimedia messaging provides automatic and immediate delivery of personal messages. Unlike the SMS however, MMS allows mobile phone users to enhance their messages by incorporating sound, images, and other rich content, transforming it into a personalized visual and audio message. But MMS technology offers more than just a broadening of message content. With MMS, it is not only possible to send your multimedia messages from one phone to another, but also from phone to email, and vice versa. This feature dramatically increases the possibilities of mobile communication, both for private and corporate use. Multimedia messaging isn't as popular as texts messaging yet as only the latest mobile phones are equipped with the service. Soon though as more people update their phones this service will soon be as equally popular as text messaging is.



Send More than Just Words with a Multimedia Photo Message

Hands free sets have been around for some time now, but they have now been replaced with the new ground breaking launch of "Bluetooth" technology. As a new technology for wireless connectivity, Bluetooth cuts the wires that used to tie up digital devices. Based on a low-cost, short-range radio link, Bluetooth can connect many types of digital devices without a single cable in sight, giving you more freedom to roam. And that, after all, is what mobility is all about. To establish a connection, two Bluetooth-equipped devices simply have to come within a 10 meter range of each other. And because Bluetooth utilizes a radio-based link, it does not even require a line-of-sight connection in order to communicate. Your laptop could send information to a printer in the next room, or you could use your mobile phone to control your home alarm system. Bluetooth has already become a global de facto standard for wireless connectivity. In the future, Bluetooth is likely to be a standard in tens of millions of mobile phones, PCs, laptops, and a whole range of other electronic devices. As a result, the market is going to demand new innovative applications, value-added services, and end-to-end solutions.

The possibilities Bluetooth has given us for wireless connectivity is practically limitless. Additionally, because the radio frequency used is globally available, Bluetooth can offer fast and secure access to wireless connectivity all over the world. With potential like that, it's no wonder that Bluetooth is set to become one of the fastest adopted technologies in history.



Free Up Your Hands With A Bluetooth Headset.

The latest mobile phones also offer new and exciting services such Wap, GPRS and Java.

Many people have begun to personalize their mobile phones with downloadable ring tones and screen savers. Thanks to Java<sup>TM</sup> technology, you can further enhance your phone by downloading life management tools, travel-related applications, information tools, and interactive games.

When they are no longer needed, removing them is as simple as saving them.

Enabled by Java technology, phone users can now not only decide what applications they want on their phones, but also the look and feel of them. Developers can customize the user interface (UI), giving users the freedom to download the application versions they prefer.

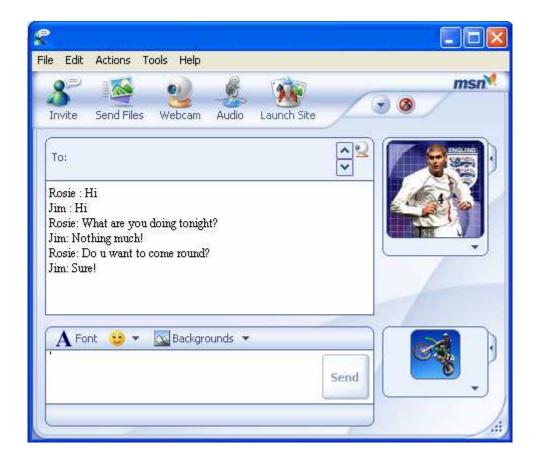
Applications can be searched using the wireless application protocol (WAP) browser, and bookmarks and push messages are provided to direct the user to sites with Java applications. New Nokia handsets have an Applications folder where applications can be downloaded and stored. The possibilities are virtually limitless with Java technology, and countless application developers are using the opportunity to put their creative skills to work for the world of wireless communication.

Wireless application protocol (WAP) is a protocol that has successfully established a de facto standard for the way in which wireless technology is used for Internet access. WAP technology has been optimized for information delivery to thin-client devices, such as mobile phones.

With General Packet Radio Service (GPRS) you can enjoy a continuous wireless connection to data networks and accesses your favorite information and entertainment services. GPRS technology allows mobile phones to be used for sending and receiving data over an Internet Protocol (IP)-based network. GPRS as such is a data bearer that enables wireless access to data networks like the Internet. The applications using GPRS are WAP, MMS, SMS, Java and the PC dial-up (for example, Internet and e-mail).

As well as mobile phones being the most popular form of communication, Internet messenger services from companies such as Msn, AOL, Lycos and Yahoo allow you to chat, Flirt, banter, gossip, or just catch up without saying a word. New on screen conversations that are more instant than e-mail and more discreet than phone calls. The most popular attraction to this service is that it is free. Well there is a cost of the internet connection from your ISP, but once you have an internet connection the service is free to download and it's free to use as much as you want whenever you want. As well as chatting to your friends you can Show how you really feel with animated emotions, set a mood with rich, colorful backgrounds, Share your unique style: pick an image to suit you, and play online games against your friends when they are online and send and

receive files. The service is mainly used by children who have no money to call their friends for hours every night. The only risk from this is pedophiles do use the service to talk to children so you have to be extremely careful for your own safety. Other than that one put down to the service the rest of the service is extremely brilliant and I can vouch for that as I use it myself.



Send Online Instant Messages To Your Friends With MSN Messenger.

Although you probably don't know but it is I.C.T behind features such as BT's "1471" and "1571" services.

BT's "1471" tell you the last number that called while you were away from your phone. It also lets you return the call straight away, by simply pressing 3. "1471" is always active and useful even if you have an answering machine.

BT Answer 1571 helps to ensure that you don't miss a call - whether you're away from home or engaged on the phone or internet. You'll know there's a message waiting for you because you'll hear an interrupted dial tone when you next pick up the phone. To retrieve your messages simply dial 1571 for free.

In conclusion to my report on how I.C.T is used with society I feel that our society today relies on the use of I.C.T very much. It is used from basic television programmes which we watch every day to our mobile phones which is one today's most needed essentials for communications. Also I.C.T is the result of free services such as "1471" which people take for granted. Computers basically run our lives nowdays and if we resorted back to the days when computers weren't used then we would struggle to lead as good lives as we do today, people wouldn't be able to communicate as fast and as efficiently and music wouldn't be widely available as it is. I am unsure how I.C.T will affect our future but I definitely will do. It will definitely change our future for the better, because if we review some of the products and services that it has already changed for us they have all worked out for the better and we hope that I.C.T will continue its role in improving of lifestyles for the better.

## **Bibliography**

Here is a list of resources I used in aid to helping me with my report on how I.C.T is used in Society.

- 1. www.yahoo.co.uk/movies
- 2. http://www.suntimes.com/ebert/ebert\_reviews/1995/11/1007976.html
- 3. <a href="http://www.bbc.co.uk/dinosaurs/dig deeper/faq sfx.shtml">http://www.bbc.co.uk/dinosaurs/dig deeper/faq sfx.shtml</a>
- 4. www.google.co.uk
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- 7. www.franciscombe.herts.sch.uk
- 8. www.bluetooth.net
- 9. www.bbc.co.uk/digital
- 10. www.drdb.org

Also I had used aids from my school I.C.T lessons and Worksheets given out in the lessons.