1. Paper Based Payroll System

The paper based system was used before ICT took over. It involved workers "clocking in/out"; all workers had a card which they put into a machine when they come to work, and put in when they leave. This makes a record of their working hours. The cards are stored above the record device in alphabetical order; this ensures that all the cards are safe and easily accessed. The system is slow and it may take a while to find out if someone hasn't been working as long as required. Also, if a card is lost then the work can't clock in or out ergo he is unable to make a record of his hours. However, this system can operate at any time, even during blackouts if need be and is also simple so anyone could manage the data. Wage slips were also filled out manually and were done by one person at the end of each week/month (varied from establishment to establishment) for every employee. This method is reliable as the employee whose job it is to fill in the wage slips can focus on his task making sure to make no errors and, once again, can operate without power. However, because one (or possibly more) people have to fill in many wage slips, they may become tired and so are more likely to make a mistake. If an error occurs, it is rather easy to rectify as the paper records just need altering.

2. ICT Based Payroll System

The quality of documents is higher than traditional (handwritten) documents because all the boxes etc are equal in size and alignment. My wage slip system would work using a combination of spreadsheets and mail merging; this allows me to fill in all the employees' data quickly. The advantages of using mail merge and spreadsheets are: it is much faster: it acts as back-up should the physical copy (printout) be misplaced; it allows for more than one copy to be printed whereas handwritten slips were usually one of a kind and would take time to copy/redo; because everything is now done digitally, there is no longer any need to keep large sums of money on the premises and is therefore safer. There are however some disadvantages: if an error occurs, it takes time to locate the source of the error and rectify it; data is easily altered on a computer so someone could hack in and change their details, with traditional slips you could compare handwriting and an alteration would be easy to spot; also if the network or computer breaks then the data is inaccessible ergo unusable. Another disadvantage would be the cost of the system, stocking the practise with computers would be expensive; in addition, employees would need to be trained in order to correctly use the computer if they did not know how to already; and there would need to be maintenance training (or hiring a qualified IT technician).

3. <u>How the new ICT based system will affect existing and future practices in the health service</u>

Peoples roles won't change too much as there will always be someone to create the wage slip and input the data, however the method will change. Because of this change, there will be training needed for people who are unable to use a computer. Some employees will take it onboard and continue their job as normal (but with less work) and some people won't understand or accept the switch over to computers and so lose their job. The new system will however save a great deal of time.

4. How working practices have changed in the health service due to the introduction of ICT

Computers have vastly improved medical practices and patient support. Appointments are now are a lot easier to book as the computer can immediately find out which dates are free as opposed to traditional date books which would take time to search through. Patient records are a lot easier to store as thousands of records can be stored on one computer rather than in filing cabinets that can take up a lot of space. Hospitals can now keep in contact with patients/other hospitals via email. It is easier to produce repeat prescriptions as the computer will allow the doctor to printout a copy. Networks allow for the easy transfer of files within the network however if the network is down then no computers will be able to connect to the internet. Online self diagnosis has become easier with the dawn of wikipedia, an online encyclopaedia full of medical knowledge. Xrays and incubators can now be controlled with a computer allowing for and automatically stores the results. Computers more precise control allow cloning and genetic modification to be done automatically rather than having a person in control of the machines. Finally, medication is measured out by computers, which therefore gives a very precise amount of the drug and a computer is less prone to mistakes like a person would be. Computers can also be used to simulate the effects of a drug on a virtual replica of a human.

5. Use of ICT in the Wider World

ICT has affected many people across the globe with such things as the internet or mobile phones. People can now keep in touch with friends and family even if they live in another country thanks to e-mail (electronic mail) which is basically a digital letter that is sent to the other person via the internet. Satellite TV has enriched peoples' lives by providing them with many channels, even foreign ones! Only a few years ago the number of available channels was a measly five, now there are well over five hundred to choose from! Business transactions can now be done without any human contact thanks to telephones and the internet; a lot of call

centres are based abroad showing just how global communications have grown. Robots are vastly used in industry, primarily in factory lines; in fact many jobs which were previously done by people (such as an assembly line) are done with the use of machines. However this has caused more unemployment and many are unhappy with this mechanisation.