

HCI Week 8 – lecture 7 on SLE [click here for link](#)

When you are identifying the user you have to state the obvious and make sure you have all the information no matter how daft.

General strengths and weaknesses slide is about humans and what we do well and what we do badly.

Physical constraints – user's environment and ergonomics, device design, this includes light position etc.

Cognitive capacity – knowledge and memory.  
Interaction is a dialogue between user and computer

We receive input through our senses, for example, sight hearing and touch.

When designing screen displays, we should consider that our brain screens out a lot of inputs and selects what we actually want to take in. See example slide saying 'A bird in the the bush' in a triangle. We only see one the, because our brain automatically discards the second the. We interoperate things due to our experience and former knowledge. We automatically fill in missing detail – look at slide that we think there is a triangle and there really is no triangle. Also look at the image of a woman and a saxophone player all in one.

Our brain when it sees a picture will discard bits of it until it makes sense or sometimes stretch reality to make the picture work.

This all ties in because we want the user to not discard any of the information we display them in our software. We can't have the user missing any detail that we want to send to them.

It is unwise to rely on subtle colours if we want something to stand out. We are not as likely to see it. We need to make certain things bold and underline to make them stand out.

Total colour blindness is out there just not a lot of people have it. Therefore we can't have colours blending in to each other. Most colour blind people cannot tell the difference between green and red so it is unwise to use these colours to separate different types of information

Should make sure the program works well in monochrome first and make sure that works well before adding the colour.

Attention grabbing mechanism, usually flashing or something dramatic. This doesn't want to go on so long; it can become irritating and can put users off.

Sense of touch – haptic perception – this is the sense of touching something. This is like when you press a key you know when you have pressed it.

Kinesthesia – this is how you're perception of you boys and its location and awareness of what is around you, for example where your keys are on the keyboard.

We need to think about what type of burden we are putting on the user's memory. If this is too much, then users will forget things. There is a slide detailing times and capacity of memory of typical people. Recognition is easy but recalling is very difficult.

Chunking is when we want to remember things we put them into chunks and remember the chunks not all of the data at once. Just like Bite size revision for GCSE's.

Want to help users a much as possible in the way you design things e.g. lost of consistency within menus and familiarity.

Interface agent – For example this is the paperclip in word it tries to help you in what you are trying to do.