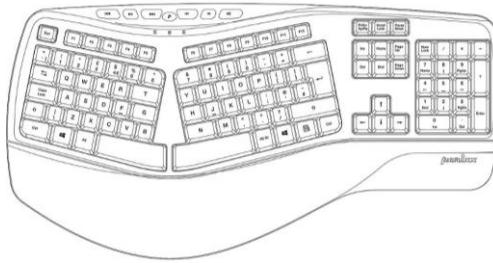
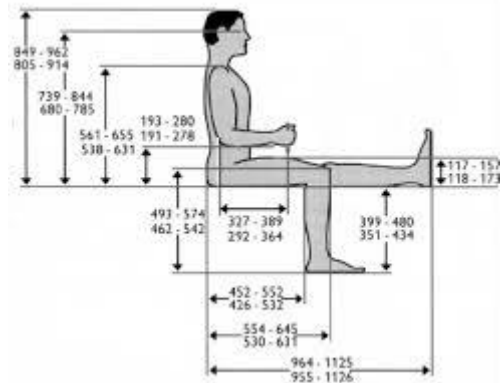


1. Product Development And Improvement

Study And Critical Analysis Of Existing Products

1	Fitness For Purpose	Something that is fit for purpose is good enough to do the job it was designed to do.
2	Aesthetics	Refers to the visual attractiveness of A product . Studies have proven that creating good aesthetics in A product leads to better usability and user experience.
3	Ergonomics	The study of people and their relationship with the environment around them.
4	Anthropometrics	Use of body measurements to determine the optimum size for products for comfortable and efficient use: ♦ how far people can reach; ♦ how much space people need???
5	Inclusive Design	Its ethos is that products , systems and environments should be designed to be used by as many people as possible , regardless of disability , age, gender or other demographic. The idea is, if you make things accessible for disabled people, you automatically make things easier for everyone. Disabled, Children And The Elderly



2. ACCESS FM – Product Analysis

ACCESS FM is an acronym **used** in Design and Technology when analysing products and ideas.

- What is the function and purpose of the product
- What are the different parts of the product and how do they work together
- How does the product use shape, form, colour, texture and decoration
- What materials and components are used to make the product
- Which processes were used to make the product
- Who would buy this product
- How well does the product do its job compared with other similar products
- What is unique about the product?

1	A	Aesthetics How does the product appeal to the five senses?
2	C	Cost How much does the product cost to make or to buy?
3	C	Customer Who will buy or use the product?
4	E	Environment How does the product affect the environment? Is it made from recycled materials?
5	S	Size What is the length, width and height of the product?
6	S	Safety Is the product safe to use?
7	F	Function How does the product work? What does it do?
8	M	Materials What materials and components have been used to make the product?



Aesthetics means **what does the product look like?**
What is the: Colour? Shape? Texture? Pattern? Appearance? Feel? Weight? Style?



Cost means **how much does the product cost to buy?**
How much does it: Cost to buy? Cost to make?
How much do the different materials cost? Is it good value?



Customer means **who will buy or use your product?**
Who will buy your product? Who will use your product?
What is their: Age? Gender?
What are their: Likes? Dislikes? Needs? Preferences?



Environment means **will the product affect the environment?**
Is the product: Recyclable? Reuseable? Repairable? Sustainable?
Environmentally friendly? Bad for the environment?
6Rs of Design: Recycle / Reuse / Repair / Rethink / Reduce / Refuse



Size means **how big or small is the product?**
What is the size of the product in millimeters (mm)? Is this the same size as similar products? Is it comfortable to use? Does it fit?
Would it be improved if it was bigger or smaller?



Safety means **how safe is the product when it is used?**
Will it be safe for the customer to use? Could they hurt themselves?
What's the correct and safest way to use the product? What are the risks?



Function means **how does the product work?**
What is the product's job and role? What is it needed for? How well does it work? How could it be improved? Why is it used this way?



Material means **what is the product made out of?**
What materials is the product made from? Why were these materials used? Would a different material be better? How was the product made? What manufacturing techniques were used?

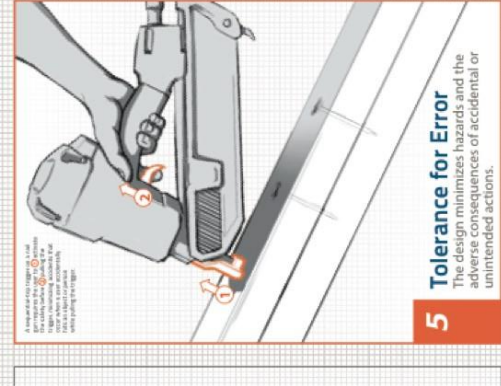
The Principles of

Universal Design

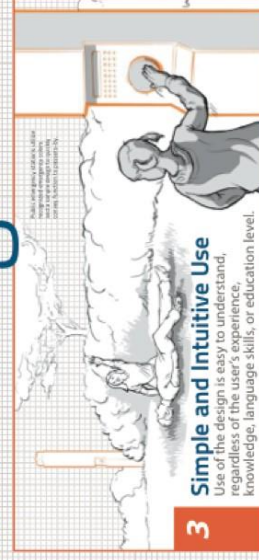
The design of products and environments to be usable by all people, to the greatest extent possible, without the need for adaptation or specialized design.



1 Equitable Use
The design is useful and marketable to people with diverse abilities.



5 Tolerance for Error
The design minimizes hazards and the adverse consequences of accidental or unintended actions.



3 Simple and Intuitive Use
Use of the design is easy to understand, regardless of the user's experience, knowledge, language skills, or education level.



4 Perceptible Information
The design communicates necessary information effectively to the user, regardless of ambient conditions or the user's sensory abilities.



7 Size and Space for Approach and Use
Appropriate size and space is provided for approach, reach, manipulation and use regardless of user's body size, posture, or mobility.



6 Low Physical Effort
The design can be used efficiently and comfortably and with a minimum of fatigue.