

2000 WORD REPORT ON USER EXPERIENCE DESIGN

In this project I researched into categories in people had problems and difficulties with products. Where I then had to develop a design solution to aid people with the

In the beginning of this project, we were informed about common types of activities in people's everyday lives that have common problems, in the user experience design module. I found the brief quite interesting because it enabled me to design with and learn to empathise with people in similar, same or slightly different scenarios, living conditions and circumstances. This allowed me to discover new research methods and techniques which aided the design thought process where I eventually would find a problem and attempt to solve the issue with a solution that aided the obstruction. It had to be 3 product solutions in which everyone had to complete in order to assist the users' struggles in the specific provided categories in which the class condensed down into a definitive theme where we then utilised out of three choices each into one. It turned out that I was in the group that selected meal preparation. In this group, we had a group discussion based on all the information that we were proposing to undertake in terms of what we perceived to be the most appropriate researching methods to commence. This consisted of selecting the most suitable IDEO Research method cards in tandem with the subject that we all chose which meal preparation was. In conclusion to this we came to a definitive range of cards which contained the appropriate research method principles that we were essentially proposing to undertake. These included empathy tools, cognitive task analysis, activity analysis, narration and a day in the life. I chose Meal preparation because it was what I at the time considered to be one of the most suitable projects for what I personally could have had access to with family members and friends.

I undertook my research methods firstly by interviewing a range of people who were different ages, different living conditions, impairments, included a profile about myself to convey that not only are most people in similar situations but also the same when it comes down to my own personal experiences myself. This is a form of empathy being provided and considered for all participants associated in the project because I can relate to it in some kind of way, which was because I tend to go for easier options of meal choices that are more efficient, less time consuming and easier to prepare compared to fully cooking a meal. For example I mentioned that I prepared quick minute ready meals such as pot noodles as I am a student and I also live in the same house as my father who is a single parent who works long hour shifts in his job 5 days a week in which is very exhausting and leads to a busy life. This means that he is required to be up, out of bed early as 5:00 am and comes home at around 5:00pm-6:00pm which results in him just wanting to eat the meal and go straight to bed afterwards and continue the same process every single day on Monday-Fridays. This means quick and easy meals are more appealing and suitable for the situation, so we end up eating less healthy meals due to this a significant amount of the time. I have justified that I understand this to an extent of observing, living around this lifestyle and association with more people in this situation or very similar scenario which causes the problems that I identified throughout the project. However, came up with a design solution after initial sketches to visually convey my design ideas and concepts, I also developed mock ups and then continued the process into 3 final design outcomes from experimenting with the materials in which I was going to utilise in the manufacturing processes of my functional concept prototypes in order to test, experiment and evaluate my solutions to the best of my ability with the people in which I had to test the products with in order for me to gain understanding that they functioned as intended for utilisation purpose in the process of justifying my points of conveying how the items would solve the problems I observed, noticed and researched into.

I initially had catalogued the activities and contexts that users experience throughout an entire day as this was a beneficial method to expose unexpected problems essential in the procedures and circumstances that people experience on a daily basis.

In the narration element of my research methods, is where I asked participants to describe to me what they were thinking. This is because it was a very valuable methodology to influence users' perceptions, anxieties, motivations and justifications.

In the cognitive Task analysis, I listed and summarised all of the user's sensory inputs, decision points and their actions. The justification behind why I undertook this research method was because it is an excellent technique for gaining comprehension of user's attentional, Perceptual and informational requirements and to recognise blocks where mistakes might happen.

In the activity analysis, I wrote about testing

During the activity analysis, I found it was key to ensure that what I was designing, followed my final outcome of portion control and living to eat a healthier balanced diet. This involved me in researching into packaging GDAs in portion.

I was focused mostly on the portions of the food in order to ensure that people eat healthier and also co-existent product in which consumer were not satisfied due to the quality and ergonomics/health & safety of some of the product. This was because these elements were most relevant to the research in which I was required to obtain. In tandem with this, I was focused on the testing in which you can see I have carried out in many activities in the same context as they were three separate utensil products that separated portion amounts into sections for the users to reduce the amount of waste being disposed and to reduce the length of time in the procedure of meal preparation such as the amount of saucepans being utilised for one or two people, rather than using a dozen of saucepans. Instead you have one saucepan featuring the saucepan dividers. My first product was customizable with slider slots which I had demonstrated well enough through the functionality of how I designed my working prototype. This was slightly amended to suit the restricted and available manufacturing processes in the workshop facility accessible to me. For my first product design, I only contained enough of the intended feature that would in theory be manufactured out of stainless steel, featuring silicone handles. However, mine was manufactured out of a polymer in which I understood that was required to be tested as I needed to research into by experimenting testing realistically through the actual heat of the boiling hot water inside a saucepan for 45 minutes as this was plenty of time for a meal to be tested utilising this material if it were to function as intended to justify my final solution a intended successful based on what elements I primarily focused on. This is where I then learnt that acrylic Perspex can withstand the heat of a boiling water in a saucepan, on a hob for 45 minutes without

deforming. This surprised me initially due the fact that it's a thermoplastic and usually in theory it could have melted or deformed in shape as. This is because thermoplastics can't withstand up to a particular temperature because it can be reshaped once heated up, whereas with a thermoset polymer, this would be the opposite in theory. Regardless of this, it worked so I developed two of my product designs utilising this exact same sheet of material trimmed into equal divided sections where I joined them together inside a MDF(MEDIUM DENSITY FIBREBOARD) profile in order to accurately construct and bond the sheet acrylic components together effectively, accurately and more precisely. For my remaining other two products I decided to carry forward in the design development, a similar design as the first. However, I incorporated a shell base into the design so that it encases the divider on interior feature to enable the food to be separated and stored inside the saucepan effectively and also featuring a handle clip on device which I didn't actually design, however utilised a pair of pliers to clip onto the separators/exterior &interior of near the top edge of the shell in order to justify that I also considered heat being an issue for anyone utilising any pan on a hob because not only can the boiling water caused harm to the skin if approached contact with the user's skin, however also the steam being a heat hazard. So regardless of the fact that I never designed an actual handle for that clips onto the device, I have still justified my argument that it can be made possible as there is a Tefal clip on product similar to this which I previously researched into. The objective of using pliers was to only demonstrate the concept of reducing the chances in being harmed from boiling hot steam and boiling hot splashes being transferred into contact with the skin, as it enables hands to not be required to reach and touch any of the hot utensils being utilised. My MDF four section product was designed specifically so that you could fit an average approximated portion onto the two equal smallest separation compartments and the larger ones are for larger portions for people who may only require one or two of each section to cook inside. The justification behind why I decided to include silicone into the four sectioned product and have a clip on handle concept if it were to be mass produced out in industry, is that this material is more heat repellent which will prevent heat from burning the user once been disassembled out of the saucepan and also provides the utiliser with the option of which one they prefer to use. For example in my testing, 72 year old Margaret with arthritis struggled to lift the product with the shell exterior with the pliers which means that I would need to develop a design for a clip on handle if I were to develop this product's design in the future or perhaps a similar product. However, this was because of the weight and awkwardness of attempting to utilise pliers in the functionality. This is one reason justified for why I should never actually consider utilising the pliers in the product if it were to be mass produced because it isn't designed for the appropriate purpose. Regardless of this, it was only a concept prototype in which functioned well enough only to justify that my product can work from my main features of where there were problems occurring and where my core focus was based on. Each product has its reason behind why I have designed each individual one. I chose MDF as a material because wood can be utilised in a pan as you can purchase wooden spoons on the market which are utilised in the cooking process inside saucepans.

I simulated what is was like to be have arthritis through empathy modelling techniques and noticed a few things and learnt from them. I also justified that I understood what it was like to cook a full dinner to the best of my ability and learnt primarily first hand on how much effort, time, energy and work was involved in undertaking this, in conjunction with already providing evidence not only for this, but also an example on what my diet and typical process of meal preparation consists of, which I learnt that there were also a lot of other people who live in the same way and have similar conditions or different conditions, but only preparing meals for mainly two people including themselves which is where I identified this as a huge issue during the project. The empathy modelling taught me quite a lot about how much of a struggle it is that people face cooking meals that take long lengths of time with a lot of saucepans, etc. This is also because it is creating a lot of washing up for people which often consumes too much time and also too much hassle for anyone, especially somebody like Margret who I spoke to claiming that she had issues lifting up the plates to the draining board whilst undertaking any washing up. This is the reason for why she often just orders takeaway.

