

Business Plan for



MANNAKEY

Produced By

Ben Richards
Bibin Lukose
Carol Evans
Dafydd Smith
Jordan Davies

Phone: 678 136 7092
Email: MannaKey@gmail.com

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Introduction (Carol)

We are Five animation students studying at University of Wales Trinity Saint David campus, We have come together to plan a business, We have come forward with the idea to create a quick and easier way to animate by creating a '*rigging*' figure. Our overall startup target market is an educational establishment to give children the chance to learn a new skill and be more hands on with our product. We started by understanding by outlining the opportunities, threats, strengths and weaknesses. This way we can construct our business to the best of our talents and abilities to achieve the best production for our clients.

1. Executive Summary

Carol

Our company's name is MannaKey, we are a creative company of five animators based within Swansea, Wales. Our services include high standard quality rigging and animation product specifically designed for children. Our product was created so that children can be more hands on with more experience within animation. We are not just limited to children, in the long term we are also going to expand the product to clients within the industry.

Currently, We are mainly based within Swansea but are starting to expand around Wales and head towards UK. This will take more time and money as we will need to travel with all of our equipment, therefore we will give them additional information as to which service our client's would prefer. Our company will begin advertising locally to see the outcome of the target market. Our main goal is to build a relationship with our customers, this will help put business as we startup but also for the long term.

Our mid term goal is to target clients around Europe to gain a more customers and grow our business. After making profit we will be hiring people who will be able to help our business take off around Europe which will help increase our profit margin. We will maintain updating our website with any changes along with updating the advertising through any social media so our business will become known around Europe.

In long term we want to be targeting clients around the world who are within the industry as well as educational establishments. We will also look at funding to increase our equipment. We will increase the profit margin by continuing with good customer service and expand our audience.

In preparation for our business to launch, we have outlined the calculations to fulfill a financial plan in which we have concluded the outflows, inflows and the overall budget needed within the first year of operation. We can estimate the expenses within our business to make sure we are able to make a profit within the first year of business. We will also be going round to meet with potential customers face-to-face to discuss our product in more depth and answer any questions they may have.

Additionally, our plan is to outline the health and safety, potential risks and maintaining the income in which this will grow our management of the team and business.

Jordan

Other companies that provide a similar product don't count in the emotional side of it. Only providing the product that will help in aiding the customer in creating an animation is not

tethering the person with the product. Creating the emotional bond between the customer and their work. Being more hands on but bringing in that emotional tether by targeting it towards children that nowadays don't experience as much art in their primary learning. Having the children interact with this product bringing together the old techniques of art and the new technology that is taking over the world of art and animation.

In addition other companies don't come physically to their possible client to present their product and have the children interact with the product. We approach the possibility of new clients hands on and we want to ensure that we get the feedback from who we are presenting to and making sure that we bring the interest to both adults and the children. We aren't making this product strictly for profit, we want those who use the product to learn and develop a skill that can carry them into a career in their future, and the more we get our idea across the more we can get spread across the country and bring interests from all over.

(Dafydd)

	Year 1
Total employees (inc. Directors)	5
Turnover of Sales	£75,605
Total Expenditure	£44,513
Profit	£31,092

2. Mission Statement (Jordan)

To raise the creative drive to those who wish to animate, giving them the push that technology alone couldn't achieve.

3. Objectives (Dafydd)

Our objective with this company is not only to make this a successful business, but also to inspire as many people as we can into a world of creativity and freedom with animation, and also provide a product that will help people be able to animate easier.

	Objective	Timescale	Status
Pre Start			
1.	Successfully create 15 working MannaKey	01/01/19	Pending
2.	Get permission to hold the after school clubs in at least 3 schools	01/01/19	Pending
3.	Reach £10,000 of funding from kickstarter	01/01/19	Pending
Year 1			
1.	Teach 15 Sessions	10/06/19	Pending
2.	Reach a profit of £10,000	20/06/19	Pending
3.	Receive 50 total orders for a MannaKey	05/07/19	Pending
4.	Hit 1000 views on our website		
5.	Receive a total of 100 total orders for a MannaKey	01/09/19	Pending
Long-term			
1.	Teach 100 sessions	01/01/20	Pending
2.	Reach a profit of \$50,000	01/05/20	Pending
3.	Receive a total of 500 orders for a MannaKey	01/01/24	Pending

4. The Management Team

4.1 Owners/Manager/Directors:

Role:

Creative Assistant

Name:

Carol Evans

Age:

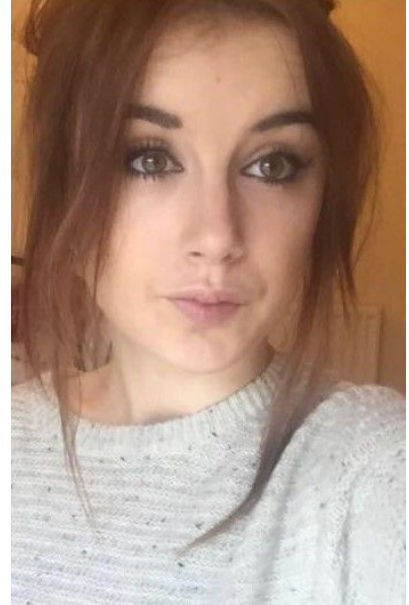
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Personal Profile

I am currently studying 3D Computer Animation at university. During my time at university I was able to gain lone and team worker. I am very outgoing and friendly and am able to follow clear instructions along with very good customer service skills. I am also very dependable.

Key Skills

- Advance knowledge in Maya, Zbrush, Substance Painter and Photoshop.
- Excellent management skills
- High Standard of Welsh



Role:

Creative Director

Name:

Jordan Davies

Age:

19

Personal Profile

Currently in university studying 3D Computer Animation. I have been able to build my confidence and communication skills throughout my course at university. I take on new opportunities and tasks that may challenge me. I can carry out the task with resilience and hard work.

Key Skills

- High level of skill in Zbrush, Photoshop and Maya
- High Artistic skill
- Can converse in Welsh
- Can communicate to others and lead



Role:

Finance & Operations

Name:

Dafydd Smith

Age:

19

Personal Profile

I am currently studying 3D animation and its more than just a future job for me but also a hobby of mine, and it's a hobby that i think more people would enjoy, if they just had better access, this is my goal with this company.

I will work my hardest to assure that the participants of the sessions get the most out of it and will try my best not to let them down with that.

I also have a lot to offer on the development part as I am very well educated in 3D software and will also do my best to make sure that the software is fun for everyone involved and can be used to create wonderful animations

**Key Skills**

- Very high skilled in Blender, Zbrush, Maya, Unreal engine
 - Also highly skilled in 2D software such as Photoshop
 - Good at working in a team and will try my best to help in any situation
-

Role:

Marketing/Advertising & Operations

Name:

Ben Richards

Age:

21

Personal Profile

At present, I am studying 3D Computer Animation in Trinity St Davids, Dynevor (Swansea) Campus. I have learnt animation more or less from scratch in the past year and know that I would have loved a device to make the process easier. The technical side of the course can, potentially, instantly kill the motivation to continue with it so it is my goal to get a product out there that can bypass the inspiration killing technical aspect.

**Key Skills**

- Highly skilled in Maya, Substance Painter, Z Brush.
 - Experienced in After Effects and 2D VFX compositing.
 - Team worker, problem solver and independent worker.
-

Role:

Logistics Operator

Name:

Bibin Lukose

Age:

21

**Personal Profile**

I am currently doing my 3D computer animation degree at the University of Wales Trinity Saint David, Swansea. I'm currently doing my second year and throughout the first year i have learned many new skills, such as creating a basic animation using all the relevant software. I am aiming to learn all the VFX skills that will be provided by the course which can later help me get into the visual effects industry. I like to be challenged and i am confident that i can take on any task and complete within the required deadline.

Key Skills:

- I am an highly motivated individual
- Communicate confidently
- Team Worker and Team Leader
- Acquired some skills in Maya and Zbrush
- Problem solver
- Basic knowledge and small experience with Houdini

4.2 Employees (Opportunities to employ others)

Jordan

Staff that would need to be hired would then have to fill the areas that we will not be able to complete alone. Such as, an employee who can handle the legal side of creating and running a business. It is such a key part of a business that it would be important to ensure that it will be covered. A SEO specialist would be crucial when it comes to putting our product out there, having a website that can be sourced by the first page search will benefit us when we are trying to bring in new customers. A higher recognition will help in spreading the word on our product and then build the customer base that we hope to grow further.

Bibin

Someone who has previous experience with toy production should be hired so that they could help us make the MannaKey Figures. Since the product will contain gyroscopes chips we will need to hire someone with knowledge on gyroscopes and wiring.

4.3 Training & Development Activities :

Jordan

Our product is highly technology based, meaning that we would have to keep on top of the always evolving technology. Training would be necessary to learn the software that our product would be need when we create it. The staff that would be involved in the creation of the software would possibly need the training to know how to use specific programmes and techniques to be able to handle the work needed to create the final product. Training in presenting would highly benefit us as this is a main element we want to use when getting our product out there. Being able to engage others when presenting is a key skill to have and having the training to do so will ensure that we will be our best and get the customer interesting in getting our product. As we are working with children and other people, having a first aid certificate can ensure that we are prepared if a child misuses a product and maybe chokes on a part or harms themselves in anyway.

Bibin

When it comes to training for employees, we should train individuals with all the skills to make a full MannaKey figure, so this means the basic toy making skills and wiring/gyroscope skills. This approach could allow the company to increase the making time of each MannaKey figure if one individual is making rather than 2-3 people working on it. This approach could also benefit the company with time management and production in the future because if each person works on a figure from start to finish we could increase the process speed.

4.4 Strategic Alliances (Jordan):

To handle the legal side of the business getting involved with a solicitors will help to fill the gap in where we lack in skill. Possibly getting involved with Marketing managers as we have an artistic background having the involvement of professionals will help to achieve the high standard in which we want to out whether that being on social media or within our own website.

5. The Product or Service

Jordan

Our product will be a figure that will assist you in creating animations. When the figure is moved or put in a certain position, the software in which it's linked with it will show on the screen. This will help in shortening the time that creating an animation takes, being able to have a character ready to animate, being able to manipulate in with your own hands can help in being able to put out exactly what you want to show in each movement. Bringing the user closer to their work, rather than just looking at a screen they can now be hands on, bringing back how we used to create using our hands and combining it with the greatness of technology.

Bibin

Our product will be manufactured using two materials, the main material being Polystyrene and the other is Fiberglass resin. The MannaKey figure will be carved out of Polystyrene and each of the joints will be separately carved out. Once assembled it will be coated with Fibreglass Resin so that the product is strong when handled by children. Another key piece

of item that will be included in the product is gyroscope chips, each figure will contain 11 chips that will capture all the figure's movements and display onto the animation software.

Basic Cost of Material:

Polystyrene - £9.50 per 1200mm X 450mm X 50mm sheet

Fibreglass Resin - £32.50 per kit

Gyroscope chips - £5.99 (11 chips will be £68.89)

The animation software that we can use to display our MannaKey animation can be through Blender. Blender is a free animation software which contains all the features needed to allow children to make simple animations using our products. Since our product will be demonstrated during school sessions we will need to make the software portable so that it can be accessed and opened quickly and easily at all the schools. The software we use can be stored onto a portable USB.

Jordan

The target for this product is towards intellectually challenged children, as we grow technology has been a great influence in all our lives including children. With this product we want to bring back the more traditional forms of art. Also, being able to bring art back to the classroom, something that has been seen to become less apparent will help bring more creativity into the children's life.

As animators we have experienced trouble with timing and software when we are animating a model, with this product we strive to create something that will lessen the time spent trying to fix a piece of software that then brings you out of your creative flow, once that has been broken it will be a struggle to get back into the flow of it all. This product will help to keep the flow from breaking and helping you take a step back from technology, it is something that has begun to dominate the animation industry. Even though this product needs the technology to function, the user would have to be hands on in order to create the animation bringing us back the times when being hands on was the way to create these pieces.

6. The Market

6.1 Market Description (Ben)

Our Market is based around Animators. According to the **Global Animation Industry Report 2017: The Most Authoritative Global Animation Industry Analysis**, the global animation industry was worth 244 billion US dollars. It is also stated by Research and Markets (<https://www.researchandmarkets.com/reports/4449895/global-animation-vfx-and-games-industry>) that in 2017, the industry was at \$254 billion. This same report states that it's projected, by 2020, to be worth \$270 billion. This is a very clear expansion, many of the major segments (United States, Britain, Canada, Germany, Japan, France, China and Korea) growing by as much as 5% YoY (Year over Year). This is a massive professional market and it is just getting bigger. While there are no clear statistics for how many animators are currently in this market, we are still provided with a prosperous consumer base that will only increase in time.

This, however, is not the end of our potential market as we also want to appeal to those that need assistance but still want to animate. We will also be thinking about how to get our

product into schools and into the hands of those that we want to give a chance to. There are many online stores that specialise in Assistive Technology. According to Global News Wire (<https://globenewswire.com/news-release/2018/09/04/1565309/0/en/Global-Disabled-and-Elderly-Assistive-Technology-Market-Worth-USD-30-82-Billion-By-2024-Zion-Market-Research.html>), the market, in 2017, was valued at around 18.70 billion dollars, projected to be at 30.82 Billion by 2024, with an estimate of over 1 Billion people requiring assistive technology. This does take into account the elderly and people who may suffer from other disabilities that our product are not aimed at however. This shows that there is a market out there for assistive technology and, again, this is also growing. Our advantage here is that there is no product similar to ours already in this market, meaning we would have little to no competitors in this market as we would in the Animation Market

6.2 Market Environment Considerations (Jordan)

When looking into the factors that may impact the business we looked at it through using a PESTLE analysis, doing this helped us to point out certain elements that then give different factors that will affect us.

Discussing the political element in all this, a key factor is that with what happening in the UK currently with Brexit may affects us greatly when it comes to communicating with countries outside of the UK. In the future when we wish to brand out and reach other parts of Europe, we are left in the dark as to how we will be able to achieve this and how difficult it may be. Being able to encounter partners overseas may also be affected and we would then have to decide on how we would want to sort out if that situation were to occur.

In terms of economy, for this business we will need the funding from government, for the grant once our business is eligible for applying. Without this we would not be able to get the business off the ground. Also discussing money, with the credit crunch the state of money will forever be changing and this is a subject that we as a group will have to keep on top off as it could greatly affect our business, as money is a crucial element. If the state of it changes we need to be prepared for it. Materials would need careful consideration and the use of them to their best abilities, in doing we will be helping the environment and not contribute to making it worse.

On the social side of things, we aim to target this product to an audience of different ages. From the young child in school to then in the future a more old and professional audience. The intention is to make a product that would spark an interest in animation itself or grow an interest that had already been there but may have had a struggle in terms of building and developing the skill without help.

Importantly the technology side is key for us as the product needs technology to be made and to use. Technology is forever changing, we would have to keep on top of it and ensure that we won't lost track of how it's evolving. The industry is changing and evolving with the new steps in technology, we as a business would have to ensure that we keep up with these changes. Knowing that technology is such a key part in running the industry worldwide, we must ensure that we keep bases throughout the world to know if changes are being made and how we use them toward our own business and develop our own technology toward the product.

The customer that we want to target first is children, meaning that the legal side of this is a highly crucial element. The factors we would have to key in would be Health and Safety. As children they are more prone to accidents, we would have to ensure that our product doesn't have any part that can become hazardous to a child which could then lead to problems with the business if a problem did occur with a child when using our product.

6.3 Competitor Profiles

Ben

Competitor 1 : SoftEther

Through research, we discovered that only one product similar to ours existed, meaning that we had one competitor. SoftEther is a Japanese company that designed the QUMARION device. A 3D pose capture device that was brought out in 2012. This Japanese product is being sold for between 91,000 and 131,500 yen which roughly translates as £620 - £896 depending on whether you purchase a single package or a software bundled and packages. There was no indication of how this product has fared in the east but it's lack of presence in the west provides us with an opportunity to bring this product to life here.



Competitor 1 : Wacom

A less direct competitor would be Wacom, a company that sells and provides tablets to help digital artists to input their art directly from pen to machine. They are particularly helpful with 3D modeling and sculpting especially with their pressure based input, making them used much more than the regular mouse and keyboard input by artists. These devices can be very expensive depending on which product the customer chooses. Basic tablets can start at around £60 while the Cintiqs sit at around £1.5k. These are primarily for general use however, essentially being pen- interactive screens, meaning that we have the advantage of having a specialised need to fulfil. It would also allow us to sell for cheaper as it's not as demanding of a product as a full screen.



Competitor 1 : Animation Softwares (Maya/Blender/3Ds Max etc...)

Maybe not so much of a competitor but something that we will need to keep in mind are the Animation softwares that we intend to use with our product. At a basic level, they are a rival as they do allow the users to animate. However, the very reason our product exists is to bypass the base softwares method of animating, as it can be technical and tricky. We will need to make sure that our product can sync in and cooperate with the software. These softwares differ in prices. Some can be free, some can be part of a subscription package.



7. The Marketing Strategy

7.1 Overview of Customers (Ben)

Our customers are generalised to anyone that wants to be creative, but not limited to those who can. Privately, we will sell to professional/amateur animators but we are also looking at workshops in schools where we can teach children how to animate easily, specifically those who are intellectually challenged so that animation can be that bit more accessible to them.

7.1.1 Key Customer Profiles (Jordan)

Customer 1:

Nickname: Harry the Headmaster

Age: 30+

Job: Headmaster of a school

Profile

Wants only the best for their pupils they're always his first thought when it comes to decision making, Is always open to the new and innovative, Tries to keep up with new technology as it may benefit the pupil as it evolves.



Customer 2:

Nickname: Tina the Teacher

Age: 25+

Job: Teacher

Profile

Wants to be hands on with the children, Strives for creativity to be experienced in the classroom as much as possible as it will keep them engaged in the learning, Wishes for the children to thoroughly learn and have fun in every activity.



Customer 3:

Nickname: Piper the Pupil

Age: 8+

Job: Pupil in school

Profile

Is intellectually challenged but still wants to learn what everyone else learns in their school experience, Wants to have fun while learning to be more engaged, Needs a push in order to learn, it may take them longer to understand but that won't stop them from trying but still enjoys new experiences



7.2 The Marketing Plan (Ben)

7.2.1 Price

Our price is worked out based on the cost of making the product and the price of our competitors products. The price that we have decided to proceed with is £550. It covers the cost of production per MannaKey and it is also cheaper than how much our Competitors would charge for their product.

7.2.2 Promotion

Our product will be shown on social media sites like Facebook and Instagram, as well as Youtube. These are the best places to start off as we are more likely to appear to artists and animators through these sites, especially Youtube and Instagram. Later on we can upgrade to advertising on ArtStation, a popular site for animators/3D artists. Our main method of promotion is also how we're raising the money, Kickstarter. With different tiers of payment, with different rewards, we're hoping to entice potential customers into funding and ultimately buying our products. We are hoping to raise a total of 10k from kickstarter, this is the budget that we have set for ourselves and what our goal is for raising money.

We will also be appealing to the schools to help in our campaign with broadcasting our sessions to their students/parents. Our main themes will be about encouraging storytelling and offering those that already do not have an after-school group to go to (For example, those that are only offered football or rugby sessions but are uninterested in sports.)

To start our campaign in schools, we will try and hone in on specific schools/teachers that we feel may want to push something like our product. It is a common shared thought that the Arts (Everything from painting to acting) are not thought highly of by the Government, and are usually the ones suffering from educational spending cuts. There are going to be teachers who will naturally have strong feelings about this and if we can get into contact with them, they would be our easiest connection to the school. The simplest method of getting them to know our product and who we are would be through Email Marketing, however getting them hooked enough to not immediately stop reading when they realise we're advertising a product will be difficult unless we come up with something that can keep them interested.

As well as any potential targets in the staff, we will also target the Headmaster and/or the main decision makers of the school, just to maximise the chance of our idea and concept making its way into the school. We also need to get the image of our product to the children that we want to use them, so that those that we want to actually use the product will know about it but also as a way of applying extra pressure to the decision makers. The children can be marketed in the same ways as the animators that we want to reach. Children are known to spend a lot of time on the internet, consuming content on YouTube in particular. Increased focus on spaces where children are the main demographics are our best way to introduce our product to them.

7.2.3 Product

Our product will be marketed at both kids and those interested in creating their own animations. This opens up our product to a plethora of different potential variations. For

instance, in future, we could pursue a deal with Marvel to make Spider-Man themed figures, Iron Man figures. We could seek to make custom figures based on customers preferences. Figures based on a thin build, big build, male, female. The creative opportunities of the figures visual aesthetic is only limited by the customers imagination.

7.2.4 Place

Our main place of custom will be online. Online orders will be the easiest way for both us and the customers. Our products will be distributed from where they are created. We have worked out that packaging that protects the product from being damaged in transit works out to 5p per package which can be bought in bulk (3,400) for £51. For first class delivery it would be 3.45 for every product we sell and as for boxing everything up, a cardboard box for £3 will get the job done.

7.2.5 People

The people in are business are passionate about the product. They believe in our mission to bring our customers an easy to learn and use product. Our culture is very much one of awareness. We want to be aware of everything that our customers have to say so that we can learn ways of how to improve our product and what they expect to see from us.

Conclusion:

When it comes to our business and our particular Market, our customers (The people who will be paying) are the parents of the children who will be attending our sessions. Alternatively, it could be said that our Customers (those that will benefit from our product and service), are the children. Either way, we have obstacles to overcome in the form of getting the teachers and the schools on board with our idea. They are the main ones that we will be advertising the need of our product to. If we can successfully market to them, they can help us with getting to the parents and getting them on board.

8. Operations

Trading Status (Ben)

We are a Limited Company.

Employment (Dafydd)

We will not need to employ many people. Only a single person will be need to be hired to make the mannakey and maybe a couple people to run the course, however this may not be necessary right away.

Insurance (Ben)

We will be taking out Product liability insurance to assure that, should any injury or damage happen that involves our product, we will be protected.

VAT Registration (Dafydd)

We will be VAT registered from the start allowing us to claim back 20% of materials. We estimate that this will save us around £4,711 a year.

Equipment and Vehicles (Ben)

We endeavoured to find suitable packaging and postage prices. We would desperately need these if we planned on sending products to customers. This was a relatively easy task in this department. We found cardboard boxes for £3 per box and could soften and secure them with polystyrene for what only worked out to be 5p per product. These polystyrene panels could only be bought in bulk for £51 but 1 pack included 3,400 panels so we would go far with that. Postage was also easy our products would not weigh enough to cause any problems with the regular delivery service (Under 20KG) and so we would be able to easily send products to customers with first class postage at 3.45 per package.

Banking Arrangements (Dafydd)

Right at the beginning of the first month we will take out a small business loan from NatWest of £8,000. This will be plenty to kick start us into creating MannaKeys, setting up advertisements, and training our staff. We will however be paying a 10.49% interest rate. Luckily we can afford this kind of interest due to us claiming back VAT. The loan will be paid back in monthly payments of £703.4 which i estimate we will easily be able to pay back with no problems.

Health and Safety (Ben)

Possibly the most important endeavour that we had to secure was any legal requirements. We would need certain training and qualifications to go ahead with our business plan, especially if we wanted to create a workshop learning environment for children. We accepted this and looked up course and training we'd need. We found an essential level 1 health and safety assessment that cost £11.95 per person and a children safeguarding course at £30 per person. We felt that both these were essential investments and so put forwards these training modules for all involved employees.

Equal Opportunities (Dafydd)

We will allow everyone a chance to come and work with mannakey and allow anyone to use our product whether that be in a group or an individual purchase.

Environmental Policy (Dafydd)

Making the MannaKey does not have too much effect on the environment so it won't cause a big issue, also we will be focusing a lot on the groups that we will hold and so we will be reusing the mannakeys as much as possible, causing us to not have to use as many materials.

9. Risk Factors and SWOT analysis

9.1 SWOT Analysis Findings (Carol)

Strengths

The Rigging Product allows for much quicker and more simple methods to animate opening the doors to all skill sets to have a go.

- Easier to Animate - The MannaKey product allows the client to quickly and efficiently get the rough poses in and also make alterations with a quick turn around
- Easier to get a final product at a much faster pace
- Excellent Customer Service - We have a dedicated team of specialists to assist with any issues you may have with our product. This includes a free to call phone number which is open 7 days a week
- We're targeting younger generations specifically primary schools and children with disabilities to be able to do something creative. As our interface is quite intuitive and simple, we believe that the younger children will be able to pick it up quite quickly with the aid of a helper in the classroom to rectify any issues the children might incur
- It benefits customers/children with disability, as the pace of technology is growing so quickly we'd like to start our clients off early to gain momentum as such that they might have a greater understanding of the animation world by the time they end up in College/University

Weaknesses

- If mis-handled the likelihood is that the project can break which would incur extra costs for the replacement
- Staff will be required to take a course in order to be trained with the software and hardware
- The product has to be developed therefore will need large upfront costs
- We're entering a market which has varied levels of competition
- Other products or services as alternatives that do not cost anything
- The cost may put off potential customers as the education sector is being put under strain with their budget

Opportunities

- The market we wish to enter ito is a rather new one with plenty of opportunity to grow into neighbouring markets
- There are promising signs that if our product takes off in the UK, it would likely take off worldwide and so our client base has expanded several times over
- Target new companies to help with advertising to get lower costing equipment

Threats

- Equipment compatibility - To work around this as much possible we would create the software to work around Windows 7,8,10 and MacOS systems initially as that would cover the majority of our client base. We would also attach some information as to the minimum system specifications needed to run our product
- As there is an already established competitor we expect some form of battle between them for newer and greater products
- As this is still a relatively new concept and has not been targeted toward educational purposes before this may take a while for potential customers to get it into the curriculum or as an after school club, this will take some time

9.1 SWOT Analysis Conclusion

Our biggest weakness is that the product will incur large upfront costs. We intend to approach government officials as this is a Wales based business we're certain we can get the grant from government to kick start our development process. We will look to a few key investors to get the rest of the capital to make our product happen. To minimise the risk to the company we will look for customers who are interested in the product prior to the product being completed. This way the risk of making too many and therefore not being able to sell as many as were made would decrease. The company intends to function only in the UK initially to build a strong foundation in order to launch worldwide. Our biggest strengths are that we believe we have a revolutionary product which can bring awareness and excitement to the animation industry from a young age. The entertainment industry is one of the biggest out there and is one of the industries saturated in profit which would increase our chances up thriving. Once our product has taken off in the UK we intend to roll out our product in different languages and push for other markets. Our competitors have primarily only released in Japan as so our aim is to spread our product before they're ready to do so.

9.2 Five Forces Analysis (Bibin)

Threat of New Entry:

- Other Animation software could make a product that is similar to the mannakey figure or how it works
- The market for children's and schools are a vast market which others can put their idea into
- Not too expensive to enter this market as long as the product can attract children

Competitive Rivalry:

- SoftEther already have a more customers who will be more loyal to them than us due to a lack of knowledge of our product.
- Other aspiring Animators
- People who can tell a story but can't explain
- Motion capture companies could get involved in our market buy allowing their features to be used by schools.

Supplier Power:

- They can change the price whenever
- If not careful the quality of the materials may be bad
- Suppliers large

Buyer Power:

- If they try and negotiate the set price
- Quantity of the purchase may increase through time (as the company grows)
- If our product does not make enough sales then the quantity of purchase may decrease
- Show loyalty buy purchasing from the same company

Threat of Substitutes:

- Using our products ability within the film and television industry
- The shape of the figure could be used on other toys.

To conclude our product is something can be copied and this can lead to our company gaining many competitors. If the 5 aspects are not explored before starting the company then we can lead the company into issues in the future. When it comes to buying and supplier power we have to make sure everything is done correctly or we could lose our valuable supplier.

10. Financial Summary (Dafydd)

The finance for the MannaKey works on a “per-mannaKey produced” system, meaning people get paid for every mannaKey that is produced. This has its upsides and its downsides. The upside being that if we don't do that well in a month period of time, we have nothing substantial that will need to be paid within this one month time

However this does mean that if there is a month period where nothing much happens we might personally suffer financially.

Using a cash flow graph I can predict the probability of this happening and plan for it, causing the least amount of problems in the case of this happening.

We will be Vat registered from the start as we will be buying a lot of resources right at the beginning, in order to create 15 mannaKeys, which is an estimate of how many we will need right from the beginning.

Because we will be Vat registered it means we will be able to claim 20% of the initial buying cost £3004 back to give us £620. This will continue to help us throughout the year.

After one year I estimate we would have saved £4,711 by being vat registered.

However this does have its downsides, being VAT registered means we have to charge 20% more and give the additional cost to HMRC, this could cost us as we may receive less customers due to slightly more expensive costs.

However, in the long run, I estimate that this will be a good decision.

We will be making our product “MannaKey” at the cost £200 per MannaKey (£110 going to materials, £90 going to the labour of making the product) while selling at £550 minus 20% VAT taking us to £440. This makes us a profit of £220 per MannaKey

We also offer another option in the form of after school sessions that would be carried out to teach people animation but also provide enjoyment at the same time.

The sessions will take place twice per week for 2 hours and have 10 participants. The session will cost the parents £25 per session.

This will give us an income of £500 a month in the earlier month, when we gain more customers we will also expand to 3 times a month and potentially more than 10 participants.

We will also be giving the school £40 to use their building to run the club in.

We will be relying on kickstarter for most of our funding in the beginning of the year. We will offer reward tiers on kickstarter offering;

£1 - "Tip Jar"

£20 - "We will keep you updated with early demos/videos of the MannaKeys in development"

£375 - "You will receive the very first versions of the MannaKeys as soon as they launch at a HUGE discounted price!"

£450 - "You will receive the very first versions of the MannaKeys as soon as they launch at a discounted price! As well as many hours of tutorials on how to best make use of your mannakey"

£500 - "You will receive the very first versions of the MannaKeys as soon as they launch STILL with a discounted price! As well as many hours of tutorials on how to best make use of your mannakey. ALSO a free lesson with one of us!"

We hope to reach a minimum of £8,000 but our main goal to be comfortable without position would be £10,000.

Of course we also have another option incase this doesn't work out

Right at the beginning of the first month we will take out a small business loan from NatWest of £8,000. This will be plenty to kick start us into creating MannaKeys, setting up advertisements, and training our staff. We will however be paying a 10.49% interest rate. Luckily we can afford this kind of interest due to us claiming back VAT. The loan will be paid back in monthly payments of £703.4 which i estimate we will easily be able to pay back with no problems.

Our advertising isn't that expensive and only costs us £240 a year for adverts on instagram and Facebook. We will also be advertising on Youtube which will cost us £2160. Which of course is quite a bit compared to the other but i estimate it will be worth it as the user base of youtube is in the billions and will bring us a lot of customers. This brings our total advertisement cost to £2,400

We will all be trained in; Level 1 health and safety, and children safeguarding. Which will cost £41.95 Per person.

Within the first year we only plan to have 5 people working for the business. Which makes the cost £209.75. This will be essential to make sure we have the necessary training while working with children.

It might also make the school and parents feel more comfortable knowing we are properly trained to be handling their children.

Appendices

Appendix A - Market Research

<https://globenewswire.com/news-release/2017/01/16/906012/0/en/Global-Animation-Industry-Report-2017-The-Most-Authoritative-Global-Animation-Industry-Analysis.html> - Global Animation figures

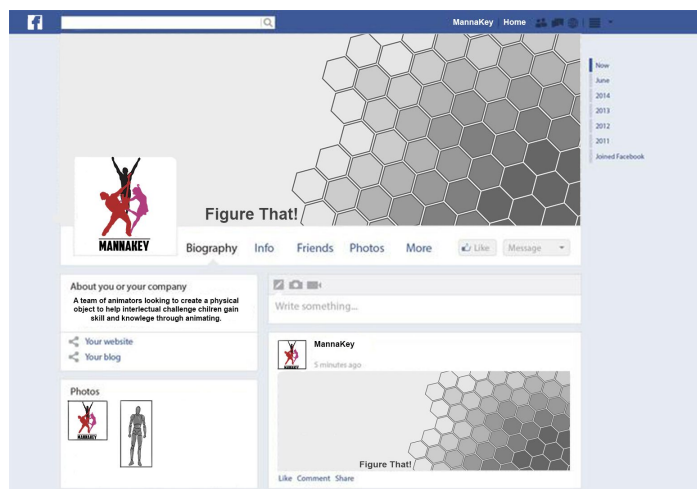
<https://www.researchandmarkets.com/reports/4449895/global-animation-vfx-and-games-industry> - Global Animation projections

<https://globenewswire.com/news-release/2018/09/04/1565309/0/en/Global-Disabled-and-Elderly-Assistive-Technology-Market-Worth-USD-30-82-Billion-By-2024-Zion-Market-Research.htm> - Global Assistive Technology figures

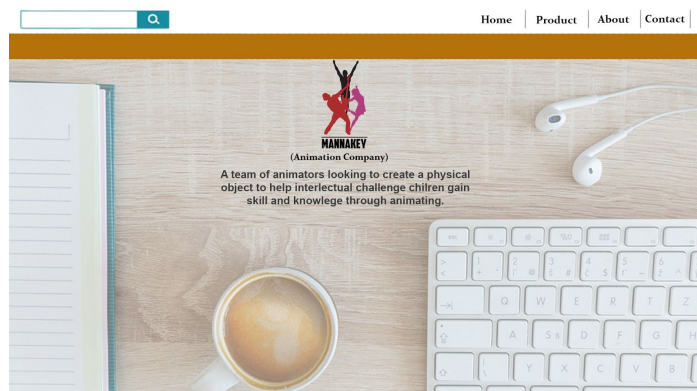


Appendix B

Facebook (Carol)



Website (Carol)



Business Card (Carol)



Appendix C

Product Design (Jordan)



Front



Back

Buttons
-Key frames

Appendix D

Material and Software Research - (Bibin)

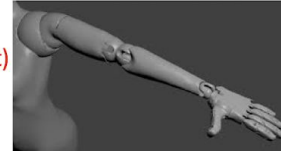
Sourcing Materials

- Typical Mannequin Materials:

- Wood
- Polystyrene
- Fiberglass

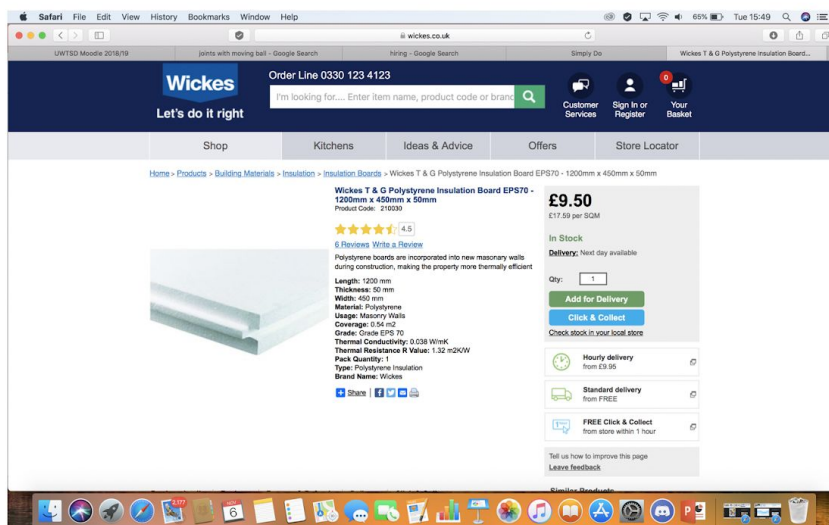
- Mannakey Materials:

- Polystyrene mixed with Fiberglass
- Ball in all the joints for free movement (Key aspect of our product)
- Gyroscopes



(Flexible material would be ideal and practical for children so that they can stretch etc.)

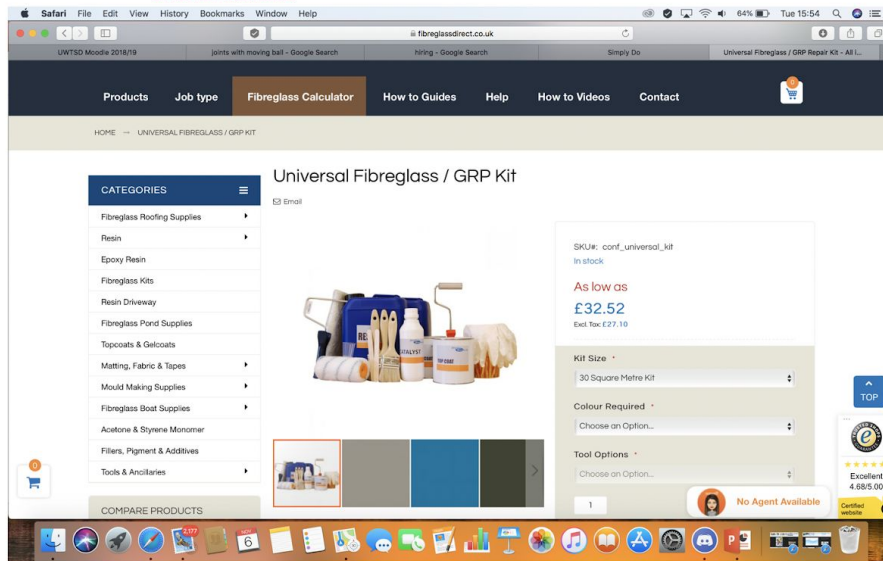
Price of Polystyrene



Around 4 Sheets of Polystyrene Sheets will be need to make a mannkey doll.
Remaining leftover polystyrene Can be reused.

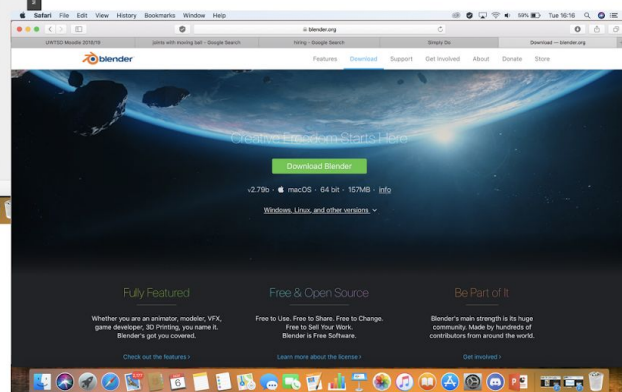
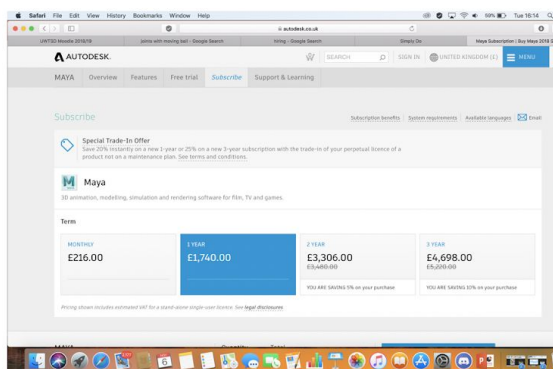
Total of 4 sheets: £38.00

Price of Fibreglass

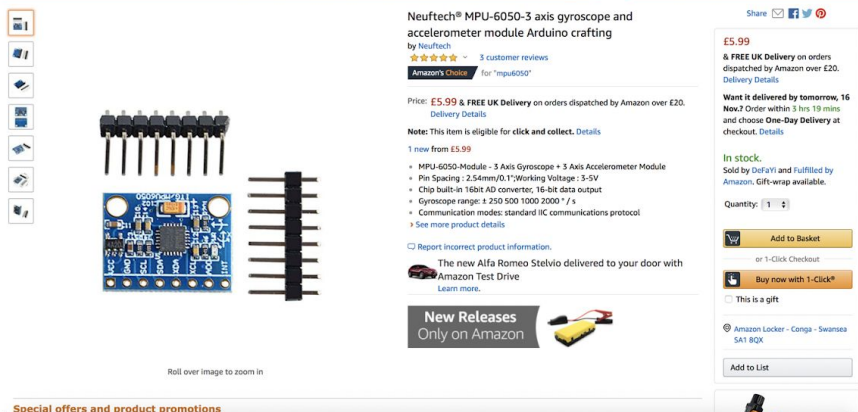


One tub of
fiberglass resin
can be used to
make up to 3
mannakey dolls

Software



Gyroscopes



Neutech® MPU-6050-3 axis gyroscope and accelerometer module Arduino crafting
by Neutech
3 customer reviews
Amazon's Choice for "mpu6050"

Price: **£5.99** & **FREE UK Delivery** on orders dispatched by Amazon over £20.
Delivery Details

Note: This item is eligible for **click and collect**. Details

1 new from **£5.99**

- MPU-6050-Module - 3 Axis Gyroscope + 3 Axis Accelerometer Module
- Pin Spacing : 2.54mm/0.1" Working Voltage : 3-5V
- Chip built-in 16bit AD converter, 16-bit data output
- Gyroscope range: ± 250/500/1000/2000° / s
- Communication modes: standard IIC communications protocol

See more product details

Report incorrect product information.

The new Alfa Romeo Stelvio delivered to your door with Amazon Test Drive. Learn more.

New Releases
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Share

£5.99
& **FREE UK Delivery** on orders dispatched by Amazon over £20.
Delivery Details

Want it delivered by tomorrow, 16 Nov? Order within 5 hrs 19 mins and choose **One-Day Delivery** at checkout. Details

In stock.
Sold by DeFyVI and fulfilled by Amazon. Gift-wrap available.

Quantity: 1

Add to Basket
or 1-Click Checkout
Buy now with 1-Click*
This is a gift

Amazon Locker - Congo - Swansea SAT BQX
Add to List

Roll over image to zoom in

Special offers and product promotions

The mannakey doll will consist of 11 computer chip gyroscope to capture all the motions.

11 gyroscope's: £65.89

Proceed to Checkout! >>>



- Total cost Per MannaKey doll (Inc Labour charge) = £200 Excl. Tax

Appendix E

Cash Flow (Dafydd)

One Year Cash flow Forecast

	January	February	March	April	May	June	July	August	September	October	November	December	Total Year 1
	£	£	£	£	£	£	£	£	£	£	£	£	£
Income													
Sessions Per week	2	2	2	2	3	3	3	2	3	3	3	2	
Sessions Participants Per session	5	6	8	9	10	10	10	10	10	10	10	10	
Sessions Income	150	180	240	270	450	450	450	300	450	450	450	300	4,140
Private Sales amount	1	3	5	8	6	9	10	6	8	12	15	20	
Private Sales income	550	1,650	2,750	4,400	3,300	4,950	5,500	3,300	4,400	6,600	8,250	11,000	56,650
Kickstarter	10,000	0	0	0	0	0	0	0	0	0	0	0	10,000
Vat Claim Back	601	82	204	326	244	366	407	244	326	488	611	814	4,712
Total Income	11,302	1,915	3,199	5,004	4,000	5,775	6,367	3,850	5,184	7,550	9,326	12,134	75,605
Costs													
MannaKeys Made	15	2	5	8	6	9	10	6	8	12	15	20	
Raw Materials	1,650	220	550	880	660	990	1,100	660	880	1,320	1,650	2,200	12,760
Labor	1,350	180	450	720	540	810	900	540	720	1,080	1,350	1,800	10,440
Packaging	4	11	18	28	21	32	35	21	28	42	53	70	361
Session Leader Payment	400	228	228	228	342	342	342	228	342	342	342	228	3,592
Travel	60	60	60	60	90	90	90	60	90	90	90	60	900
Website (Squarespace)	20	20	20	20	20	20	20	20	20	20	20	20	240
Insta and Facebook Advertising	20	20	20	20	20	20	20	20	20	20	20	20	240
Youtube Advertisement	2,160	0	0	0	0	0	0	0	0	0	0	0	2,160
Postage	2	7	12	20	15	22	25	15	20	29	37	49	252
Training	210	0	0	0	0	0	0	0	0	0	0	0	210
School Charges	80	80	80	80	120	120	120	80	120	120	120	80	1,200
Vat Charges	140	366	598	934	750	1,080	1,190	720	970	1,410	1,740	2,260	12,158
Total Expenditure	6,096	1,192	2,036	2,990	2,578	3,526	3,842	2,364	3,210	4,473	5,421	6,787	44,513
Net Cash Flow	5,206	723	1,163	2,014	1,423	2,250	2,526	1,487	1,974	3,077	3,904	5,347	31,092
Bank Balances													
Start of the month	0	5,206	5,929	7,092	9,106	10,528	12,778	15,304	16,790	18,764	21,841	25,745	
End of the month	5,206	5,929	7,092	9,106	10,528	12,778	15,304	16,790	18,764	21,841	25,745	31,092	