Fashion, The Engineering Behind

1. , L. (2019, September 12). Virgil Abloh: Engineer Turned Fashion Icon. Retrieved January 30, 2021, from https://sidedoormag.com/blog/2018/8/21/virgil-abloh-engineer-turned-fashion-icon

   This article talks about Virgil Abloh the CEO of Off-White and Creative Director of Louis Vuttion.

   Virgil is known as one of the most influential designers of the last decade. Abloh a graduate of UMichigan Ann-Arbor is a master degree engineering holder who left his job at his engineering firm to work alongside Kanye West at his company Donda. Virgil created album covers, clothing and creatively influenced Kanye for some time before he started to work on his own clothing company Off-White, a luxury streetwear brand.

   Virgil is often recognized for the engineering concepts he applies to his clothing. He is known for deconstructing the natural design of shoes,bags,pants and clothes and recreating them. This is something that Virgil admits he learned from his firm.

2. Papahristou, Evridiki, Evridiki PapahristouDr. Evridiki Papahristou is a devoted fashion engineer and an assistant professor in the scientific field of clothing 3D virtual prototyping. She began her studies at the University of Kent in European Fashion/Product development but a, Dr. Evridiki Papahristou is a devoted fashion engineer and an assistant professor in the scientific field of clothing 3D virtual prototyping. She began her studies at the University of Kent in European Fashion/Product development but after working as a fa, Lydia Mageean, Mark Harrop, and Yotam Solomon. “Fashion & Engineering in Product Development; a Science & Sensibility Affair.” WhichPLM, December 4, 2017. https://www.whichplm.com/fashion-science-sensibility-affair/.

This article is written by Dr. Papahristou, a fashion designer.

Over the course of this article Dr. Papahristou talks about how engineering concepts apply to fashion design and creation. The main argument is that fashion needs engineering for it to work correctly. Most articles of clothing are made to be wasted. Dr. Papahristou wants to counter this by creating more effective clothing, something she believes that engineering can accomplish. Similar to Virgil when he first began his working in fashion, Papahristou discovered that computer systems such as CAD could be useful especially when it comes to creating clothing.

This article is important because it touches on topics that directly relate to my capstone project, such as the usage of computer systems to semi-simulate what my clothing with look and feel like.

3. Mark Liu PhD Philosophy. “Why STEM Subjects and Fashion Design Go Hand in Hand.” The Conversation, November 8, 2018. https://theconversation.com/why-stem-subjects-and-fashion-design-go-hand-in-hand-63649.

Dr. Liu in this conversation article talks about the importance of STEM and fashion and why both subjects go hand in hand.

Argues against the school of thought that fashion and art in general should be separated from the technical and relative world of STEM.

Liu believes that STEM is more important now than ever before in the fashion industry, many brands/companies are quickly trying to move towards an environmentally friendly and more technologically inclined method to creating clothing, like the previous statements from Dr. Papahristou, Dr. Liu believes engineering can help keep fashion pushing forward.

4. Sardar, Shaheen, and Young Hae Lee. “Analysis of Product Complexity Considering Disruption Cost in Fast Fashion Supply Chain.” Mathematical Problems in Engineering. Hindawi, July 16, 2015. https://www.hindawi.com/journals/mpe/2015/670831/.

This article talks about how engineering concepts can be used to measure the disruption cost of fast fashion supply chains. The two previous annotations basically covered the same thing. This article essentially focuses on how to calculate the amount of waste created by fast fashion and how to counter it.

5. Colgrove, Debbie. “These Step-by-Step Techniques Will Have Your Sewing Your Own Clothing.” The Spruce Crafts. Accessed January 30, 2021. https://www.thesprucecrafts.com/techniques-for-sewing-clothing-2978471.

This is a step by step tutorial by Spruce Crafts that instructs you on how to construct clothing using a sewing machine. I plan on continuing to research further into how to use sewing machines, but this is a good starting point.

The article-instructionare is set up so that readers can follow along and start to properly use their sewing machine. This applies to my capstone project because I plan on creating articles of clothing.

6. says:, Missy, Linda Vee says: and Emily says: “How to Start Sewing Your Own Clothes.” Emily Lightly, October 2, 2020. https://emilylightly.com/2020/10/how-to-start-sewing-your-own-clothes/.

This article is another step by step kind of article that teaches you how to start sewing your own articles of clothing. I found this article a little bit more helpful than the last one because it helped me understand how to actually start to sew my pieces.

The previous article focused a little more on sewing in general, such as fixing ripped pieces of clothing.

7. Rodrigues, Helga. “How Fashion Designers Use Math.” SlideShare, October 24, 2014. https://www.slideshare.net/helgasrodrigues/how-fashion-designers-use-math.

This slideshow fouses on how fashion designers use math to create their pieces and schematics.

Some things I saw in these slides that I plan on implementing in my own capstone project are:

- Patterns
- Angles
- Geometry
- Symmetry
- Flip Tessellation

8. Menkes, Suzy. “RUNWAYS;An Equation Where Angles + Cutouts = Fashion.” The New York Times. The New York Times, April 14, 1996. https://www.nytimes.com/1996/04/14/style/runways-an-equation-where-angles-cutouts-fashion.html.

This NYTimes article talks about how geometry and angles are used in fashion at the most basic levels.

It covers the history of fashion trends and how it correlated with the geometric trends of those time periods.

9. https://www.youtube.com/watch?v=w2mgUYpoHeE
10. https://www.youtube.com/watch?v=bzZsGeyg3Kw