Bilkent University

Computer Engineering Department

CS 491 Senior Design Project I

Assessment of Innovativeness

Title of the project: Dressy. (Virtual Fitting Room)

Members of the team:

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Considering the definition of innovation as creation of better or more effective products, systems, services, or technologies that have the potential to be accepted by markets, governments, and society, please assess the innovativeness of the project below.

What is the nature of the innovation in the project?

The preference of online shopping among clothes shoppers has already increased much in the last decades due to the lack of time and the convenience of online shopping. With the effect of the coronavirus, this preference has become even more. However, shoppers do not have the advantage of trying on clothes and therefore, it is difficult to make good choices in terms of the appearance. The project team wants to develop an application that people can observe how the clothes fit on them.

The followings can be considered as the main innovations in Dressy application;

- Dressy is a **mobile app** that can fit clothes on 3D models
- Giving information whether the tried clothes fit user's measurements
- Recommending cloth size according to user's measurements
- State-of-art researches will be used in the application

Are there similar products, systems, services, or technologies in the market? If there are, what are the differences in relevant aspects, such as cost, efficiency, usability?

There are similar products in the market since the idea is applicable to the huge gap in marketing services. However, most of the applications in the market use 2D models in order to show how the clothes fit on people. In this project, we want to use 3D models. 3D models are more appropriate to make people understand the appearance of the clothes. Therefore, this approach increases functionality of the application.

Even if there are no 3D applications for virtual fitting rooms, there is research about how to fit the clothes on 3D human models. However, academicians writing papers on this topic use kinect cameras to transfer depth data to computers. By using mobile phones, we aim to increase usability of the application.

Our application also contains size predictions. There is research about this topic, too. However, they focus on advising the size in European standards. We want to advise the size in European, British, and American standards and we also want to give detailed size advice like pants waist and length. We also want to pay attention to the preference of the user while advising the size. For example, if the user likes the loose clothes, we want to recommend larger sizes. In this way, again, we aim to increase the functionality of the application.

Who are the potential users?

- Online clothes shopping customers
- Brand Owners
- Customers in Quarantine due to Covid-19
- Gift Buyers
- People with disabilities who seek to shop online

Innovation Expert

Name: Veysi İşler

Signature:…………………………………………..

Date: 10.10.2020

Degree of innovativeness: …..….. (out of 20)