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## THE USE OF THE "PATCHWORK" TECHNIQUE FOR RECYCLING CLOTHING AND THE EFFECTIVENESS OF ITS USE IN MASS PRODUCTION

The aim of this work is to investigate the "Patchwork" technique for clothing recycling and analyze its effectiveness in mass production.

The issue of clothing recycling is becoming more and more relevant every year due to the surplus of products on the market, affordability, and fast-moving fashion trends. Considering that the raw materials for modern clothing usually consist of artificial materials and their decomposition in the soil can take hundreds of years, the issue of ecology is of paramount importance.

A type of decorative art "Patchwork" is a patchwork sewing where products are created on the principle of mosaic, when stitching colorful scraps of fabric creates a single canvas with various patterns, pictures and even texture [1]. There are also different types of "Patchwork" such as:

- •- British (English) type
- •- Standard (classic) type
- •- Crazy patchwork
- •- Japanese type of patchwork
- •- Oriental type of patchwork
- •- Korean type of patchwork "Pojagi"
- •- Quiltin

If you take the recycling of clothes as your goal, then the best ones are "classic", "crazy patchwork", "Pojagi" and "quilting". These are the types that are applicable to different types of fabrics.

The classic type is a one-piece stitched fabric made of pieces in the form of different geometric shapes of two colors in a strict order, for example, "Chessboard", "Watercolor" and others [1]. In this technique, you can use dense fabrics, such as denim, corduroy, linen, cotton and others.

The most convenient method to use is "crazy patchwork". It has absolutely no restrictions, which in turn allows you to use any fabric, color, shape of fabric fragments and stitching method.

Considering the "Pojagi" technique, we can confidently say that it is the most exquisite, but rather expensive method, due to the fact that this method of processing the fabric is very laborious and time-consuming. This technique uses one piece of material and only transparent light fabrics such as silk.

Regarding quilting, the main difference is the multilayering of several fabrics (one on the front side, the other on the back), and between them there may be a synthetic winterizer or other insulation that is stitched [1]. This method will be useful for creating outerwear, but only dense fabrics are suitable for it.

Advantages of using the "Patchwork" technique in mass production:

- •- fabric pieces can be used as raw materials from a cut that does not require additional costs;
- •- the manufacturer indicating on the label that its product is made from recycled materials will attract the attention of new customers who care about the environment;
- - interesting design and uniqueness. To facilitate the selection of colors, specialized computer programs are used to calculate the range of colors of the future product[2];
  - •- care for the environment.

## Disadvantages:

- if used clothing is used as a raw material, it is necessary to carry out a number of manipulations to prepare it for use, namely first of all washing, then it is necessary to get rid of fittings and threads and other actions depending on the type of fabric;
  - •it takes a lot of time to prepare raw materials and sew parts together;
  - •products such as outerwear require a whole large-sized fabric, which will

lead to a higher consumption of threads to sew the pieces of fabrics before the cutting stage.

So, having analyzed the "Patchwork" method, its advantages and disadvantages, we can say with confidence that its implementation in production can be a profitable idea. Entrepreneurs should try it in mass production, because it is not only about caring for the environment and reducing costs, but also about making each product unique.

## REFERENCES

- 1. L.B. Bilotska (2024) Lecture notes "Creative technologies in the garment industry". Retrieved from: //msnp.knutd.edu.ua/pluginfile.php/520736/mod resource/content/.
- 2. Marc Higgins (2016) Designing research in education: patchworking methodologies with theory. Retrieved from: https://www.researchgate.net/publication/309167306\_Designing\_research\_in\_ed ucation\_patchworking\_methodologies\_with\_theory.