

Skills for Development Sustainable Fashion Products for Industry: the Case of Structured Garments

Marta Bicho

University of Beira Interior / UNIDCOM R&D / FibEnTech R&D, Portugal

Madalena Pereira

University of Beira Interior / UNIDCOM R&D / FibEnTech R&D, Portugal

Nuno Belino

University of Beira Interior / UNIDCOM R&D / FibEnTech R&D, Portugal

Paulo Martins

University of Beira Interior / UNIDCOM R&D / FibEnTech R&D, Portugal

Manuel Santos Silva

University of Beira Interior / UNIDCOM R&D / FibEnTech R&D, Portugal

Abstract

Currently, the textile and clothing industry develops strategies, technologies, and products, towards a more sustainable industry based on OECD goals (SDGs) and at the European level associated with policies for product development, waste, unfair trading practices, international trade, support to producing countries, alternative business models and a multi-stakeholder platform, and in the objectives defined by Europe for the climate neutrality of the European Green Deal 2050 EU. In the textile and clothing industry there is a growing concern for the development of increasingly sustainable products. In research area different studies analyze the problems, solutions, and the new skills for high education system in sustainability subject and digital and ecologic paradigm (Goldberg 2009; Flint, 2010; Fletcher, K. and Williams, D., 2013; Grose, 2017; Bertola et al. 2020; Conti and Motta, 2022; Inwood et al.2021; Janssens et al. 2022).

In this sense, the Textile Science and Technology Department of the University of Beira Interior, developed a new bachelor training proposal “Technology and Sustainable Fashion Product” to which we were given the challenge of contributing to its objectives, competences, contents and methodologies with the creation of curricular units, that contribute to new skills in students for the development of sustainable fashion product with knowledge in sustainable materials, technologies, digital tools, process, systems, services, market and

Corresponding author's email:

marta.fino.bicho@gmail.com

also knowledge in Portuguese textile and clothing Industry. The development of curricular unit in sustainable fashion product – complex garments was the subject of this research.

During the development phase we used interviews with industry, experts and ex-students, specifically for complex garments such as structured garments that often use trimmings such as interlinings, linings, buttons, etc. and questions arise:

How can we develop sustainable apparel products from complex and structured garments? What types of trims are used today? Do companies in Portugal in this category of products already have sustainable practices? Are designers and product developers concerned about selecting sustainable trims?

The strong environmental impact caused by the production of clothing is indisputable, where all those involved in the chain must pay particular attention.

As for the main materials, there is a range of sustainable and environmentally friendly fibers, however this concern must also be present in the use and selection of trims used in the construction and development of the product. The objective of this study is to assess, in terms of sustainability, the practices of the industry and suppliers of trim in the market, necessary for the construction of fashion products and present a model of good practices in terms of the selection of the technical production process, without compromising the sustainability of the final product. After the results obtained from the interviews and based on the scientific review were included in curricular units of the new training proposal. In view of the objectives of the EU and the OECD, it is concluded that the development of new training and skills proposals that contribute to the implementation of the EU's sustainability and circular economy strategies is essential for the future of Industry. The value of this proposes represent the contribute with new skills in new bachelor course in a country with 5300 million euros for export textile and clothing products.

Keywords: sustainability; fashion product; skills; structured garments; high education.

DOI: 10.57649/GFC.978-989-54263

ISBN: 978-989-54263-3-1

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