

Using microfibers to produce a one-layer warming-up sportswear

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Abstract:

Sportswear is the most diversified and fastest growing group in the functional clothing market. It increases the performance of the player while achieving a comfortable feeling. It also qualifies the sport to compete to the maximum performance using modern and advanced materials technology and creating a good design that supports the sport with physiological comfort. While training and ease of movement without adding an extra burden on the player. Recently increased the proportion of sales of sports clothing, which led to the attention of textile developers, manufacturers and designers of sportswear to the introduction of greater improvements and innovations on these clothes. Recently, modern micro fiber has become a major concern in the future of the textile industry, where it has become popular in the manufacture of outerwear and accessories, underwear and sportswear especially. The design of modern sportswear also deals with the physiological aspects of body behavior, where both sides of rest and function are of paramount importance.

Research problem:

The loss of the warm-up allowance for some of the desired characteristics in improving the efficiency of the players and protect them from some injuries that may occur to them because of not warm up enough or required. It is also possible to produce a one-layer warm-up coat of microfiber fibers with thermal insulation and sweat absorption characteristics to reduce warm-up time.

Research goals:

- 1 - The use of microfiber fibers in the production of warm-up sports suit one-layer helps to achieve the properties of comfort and facilitate the process of metabolism and allow the body to complete the process of cooling and sweating without tightness or stress.
- 2- Determining the required properties in microfiber fabrics to produce warm-up sport suit.

Research Methodology: Experimental Descriptive Methodology

search limits:

- 1 - The research is limited to warm-up clothes for athletes in the open stadiums and not in closed halls.
- 2- Technical textile fabrics and modern materials [Microfiber fibers].

Research hypotheses:

- 1 - The use of single-layer fabrics keeps the body dry and maintain the temperature acquired by the player.
- 2 - the use of microfiber fabrics that allow the presence of breathing to the skin and sweat affects positively on the players.
- 3 - The use of warm-up clothing provides comfortable comfort in terms of sweat absorption and appropriate thermal insulation
- 4 - The difference in the quality of microfiber fabrics, whether woven or knitting leads to different results in terms of thermal insulation and air permeability.

Keywords: Microfiber, Sports Warming- Up Wear.