

## ANTHROPOLOGY APPLIED TO DESIGN IN THE ROMANIAN LIGHT INDUSTRY

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Ergonomic anthropology became a priority of applied anthropology, thus introducing anthropology in the circuit of the sciences involved in industrial production processes. The big development of the ready-made clothes industry is connected to the concerns of anthropology to create "order" in the huge individual and population variability, particularly by its methodology and anthropometrical technique. A series of variability types are to be found in populations, that leave their mark upon this anthropological structure, as follows:

- 1) *Anthropological variability in time*: populations are subject to microevolutive type changes (secular trend) of a higher or lower significance. In this sense, in our paper we analyzed the microevolutive changes of the body mass in the population studied in the year 2004, compared with the one studied in 1980. The microevolutive changes are generated by the acceleration phenomenon reflected in the increase of the vertical dimensions from a generation to another and produce changes in the individual, hence population's dimensional ratios. These changes lead to alterations of the constitution typology, which are reflected in the clothes sizes, a fact that requires periodical reviews of the measures that constitute their basis.
- 2) *Anthropological variability in space, i.e., geographical variability*. In our paper we analyzed not only the geographical variability indices in the present population (2004), but also the geographical variability in time, comparing the data collected in 1980.
- 3) *Sex-related anthropological variability*.
- 4) *Age-related anthropological variability*, both in time (comparing the populations studied 2004 and 1980) and in space (as regards the population studied in 2004).

The ontogenetic changes involve a decrease of the subjects' vertical body dimensions (stature, leg length), after the age of 40, due to the subsidence of the vertebral column and collapse of the foot vault. An increase of the weight and circumferences, occurred after this age due to physiological changes, is also noticed. At the same time, we were concerned with the (BMI) of the body mass index, Quetelet variability in time and space, according to age and sex.

### INTRODUCTION

Anthropometry is the only universally applicable, economic and non-intrusive method that allows knowledge of the human body dimensions, of their relations and of the body mass, so it can be utilized for establishing human clothes