



BSI Standards Publication

**Ergonomics — Demands and availability
of anthropometric and strength
data of children in Europe**

National foreword

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Ergonomics - Demands and availability of anthropometric and strength data of children in Europe

Ergonomie - Demandes et disponibilité des données anthropométriques et de force des enfants en Europe

Ergonomie - Bedarf und Verfügbarkeit von anthropometrischen und Kraftdaten von Kindern in Europa

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COMITÉ EUROPÉEN DE NORMALISATION
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European foreword

This document (CEN/TR 17698:2021) has been prepared by Technical Committee CEN/TC 122 “Ergonomics”, the secretariat of which is held by DIN.

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Introduction

The European Committee for Standardization (CEN) has carried out, within CEN/TC 122 “Ergonomics” a project to acquire anthropometric and strength data of children in Europe, initiated by the lack of published data. These data have to be current and reliable being the basis for the safety, comfort and usability of products used for or with children. From the economic point of view, they are the prerequisite for a successful position of European stakeholders on the international market.

At present, there is no sufficient knowledge neither on the existing anthropometric data and its availability nor on the specific demand of data from the relevant stakeholders. Therefore, the project has been divided in two phases. This technical report is a consequence of the results of the first phase of the project entitled “Analysis of the Demand and Availability of anthropometric data of children in Europe”. This first phase of the project included an extensive research on the demands, necessity and existence of Anthropometric and Strength data of European population under 18 years old. Background information and summary of this research project is provided in Clauses 4 to 8 of this Technical Report.

1 Scope

This document contains guidance on identifying reliable sources of anthropometric and strength data published since 2000 for the European population under the age of 18 years. It does not contain the anthropometric data itself.

This document is intended to give guidance to the stakeholders such as the standard writers, designers and manufacturers of products for children on how to identify currently available sources of anthropometric data that are relevant to their needs in terms of age/gender groupings, types of anthropometric data. This document also identifies the lack of data for specific applications hence implicitly indicating caution for the stakeholders

This document also provides information about the sources of anthropometric data listed within it. This information includes:

- Date of survey;
- Organization who carried out the survey;
- Geographic limitations of the survey;
- Size and gender of the population measured or scanned;
- Types of anthropometric measurements included in them

This document has two annexes

- Annex A: Definition of body measurements;
- Annex B: Existing data sources.

2 Normative references

There are no normative references in this document.

3 Terms and definitions

No terms and definitions are defined in this document.

ISO and IEC maintain terminological databases for use in standardization at the following addresses:

- IEC Electropedia: available at <https://www.electropedia.org/>
- ISO Online browsing platform: available at <https://www.iso.org/obp>

4 Background of the project

Experts involved in several CEN Technical Committees (CEN/TC) and working for the standardization projects related to childcare products, toys and articles used by and for children have identified and emphasized the need of having precise and relevant up-to-date anthropometric data, related to the use of this kind of products.

Availability of correct anthropometric data and the use of updated data are important due to the changes in body measures and physical strengths of children along the past 30 years and no European-wide collection of data has been recently conducted to fill the gap in this population.