
Nuclear energy — Reference beta-particle radiation —

Part 2: Calibration fundamentals related to basic quantities characterizing the radiation field

Énergie nucléaire — Rayonnements bêta de référence —

*Partie 2: Concepts d'étalonnage en relation avec les grandeurs
fondamentales caractérisant le champ du rayonnement*



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Foreword

ISO (the International Organization for Standardization) is a worldwide federation of national standards bodies (ISO member bodies). The work of preparing International Standards is normally carried out through ISO technical committees. Each member body interested in a subject for which a technical committee has been established has the right to be represented on that committee. International organizations, governmental and non-governmental, in liaison with ISO, also take part in the work. ISO collaborates closely with the International Electrotechnical Commission (IEC) on all matters of electrotechnical standardization.

International Standards are drafted in accordance with the rules given in the ISO/IEC Directives, Part 2.

The main task of technical committees is to prepare International Standards. Draft International Standards adopted by the technical committees are circulated to the member bodies for voting. Publication as an International Standard requires approval by at least 75 % of the member bodies casting a vote.

Attention is drawn to the possibility that some of the elements of this document may be the subject of patent rights. ISO shall not be held responsible for identifying any or all such patent rights.

ISO 6980-2 was prepared by Technical Committee ISO/TC 85, *Nuclear energy*, Subcommittee SC 2, *Radiation protection*. It is the second of a set of three standards concerning the production, calibration and use of beta-particle reference radiation fields for the calibration of dosimeters and dose-rate meters for protection purposes. The first standard in this series, ISO 6980-1 (being prepared), describes the methods of production and characterization of the reference radiation. The third standard in the series, ISO 6980-3 (being prepared), describes procedures for the calibration of dosimeters and dose-rate meters and the determination of their response as a function of beta energy and angle of incidence. This standard, the second in the series, supersedes ISO 6980:1996 and expands upon the calibration information provided in it. This standard describes procedures for the determination of absorbed-dose rate to a reference depth of tissue from beta-particle reference radiation fields.

ISO 6980 consists of the following parts, under the general title *Nuclear energy — Reference beta-particle radiation*:

- *Part 1: Method of production*
- *Part 2: Calibration fundamentals related to basic quantities characterizing the radiation field*
- *Part 3: Calibration of area and personal dosimeters and determination of their response as a function of energy and angle of incidence*