DOC: CHD 30 (28525) WC
IS XXXX:XXXX
ISO 28218: 2010
August 2025

BUREAU OF INDIAN STANDARDS

DRAFT FOR COMMENTS ONLY
(*Not to be reproduced without permission of BIS or used as an Indian Standard*)

Draft Indian Standard

Radiation Protection — Performance Criteria for Radiobioassay

भारतीय मानक मसौदा

विकिरण से सुरक्षा - विकिरण जैव आमापन के लिए निष्पादन मानदंड

(ICS 13.280)

Nuclear Energy for Peaceful Applications Sectional Committee, CHD 30	**Last Date for Comments**: **7th October 2025**

Nuclear Energy for Peaceful Applications Sectional Committee, CHD 30

NATIONAL FOREWORD

(Formal clauses will be added later)

This standard establishes criteria for quality assurance, quality control, and performance evaluation of radiobioassay service laboratories.

It covers both in vivo (measuring radioactive materials within the body using phantoms, etc.) and in vitro (measuring radioactive material in biological samples such as urine or blood) radiobioassay methods.

The text of ISO Standard has been approved as suitable for publication as an Indian Standard without deviations. Certain conventions and terminologies are, however, not identical to those used in Indian Standards. Attention is particularly drawn to the following:

a) Wherever the words `International Standard' appear referring to this standard, they should be read as `Indian Standard'.

b) Comma (,) has been used as a decimal marker in the International Standard, while in Indian Standards, the current practice is to use a point (.) as the decimal marker.

In this adopted standard, reference appears to certain International Standards for which Indian Standards also exist. The corresponding Indian Standards, which are to be substituted in their respective places, are listed below along with their degree of equivalence for the editions indicated:

International Standards/ documents	*Corresponding Indian Standard*	*Degree of Equivalence*
ISO 5725-1 Accuracy (trueness and precision) of measurement methods and results	IS 15393 (Part 1):2003/ISO 5725-1:1994	Identical

— Part 1: General principles and definitions	Accuracy (Trueness And Precision) of measurement methods and results: Part 1 general principles and definitions	
ISO 5725-3 Accuracy (trueness and precision) of measurement methods and results — Part 3: Intermediate measures of the precision of a standard measurement method	IS 15393 (Part 3):2003/ISO 5725-3:1994 Accuracy (Trueness And Precision) of measurement methods and results: Part 3 intermediate measures of the precision of a standard measurement method	Identical

The technical committee has also reviewed the provisions of the following International Standards/ documents referred in this adopted standard and has decided that they are acceptable for use in conjunction with this Standard:

International Standards/ documents	*Title*
ISO 5725-2	Accuracy (trueness and precision) of measurement methods and results — Part 2: Basic method for the determination of repeatability and reproducibility of a standard measurement method
ISO/IEC Guide 99	International vocabulary of metrology — Basic and general concepts and associated terms (VIM)

In this adopted standard, reference appears to certain International Standards/documents where the standard atmospheric conditions to be observed are stipulated which are not applicable to tropical/subtropical countries. The applicable standard atmospheric conditions for Indian conditions are (27 ± 2) ℃ and (65 ± 5) percent relative humidity and shall be observed while using this standard.

In reporting the result of a test or analysis made in accordance with this standard, if the final value, observed or calculated, is to be rounded off, it shall be done in accordance with IS 2 : 2022 ‘Rules for rounding off numerical values *(second revision*)’.

FOR COMPLETE TEXT OF THE DOCUMENT, KINDLY REFER ISO 28218: 2010

Note: The technical content of the document has not been enclosed as these are identical with the corresponding ISO Standard. For obtaining the copy of the complete ISO Standard, please contact:

Scientist 'F'/Senior Director and Head (Chemical)
Chemical Department
Bureau of Indian Standards
Manak Bhavan, 9, Bahadur Shah Zafar Marg
New Delhi-110002
Telephone: 011-23236428

Email: chd@bis.gov.in or chd30@bis.org.in