



ICRP PUBLICATION 140
RADIOLOGICAL PROTECTION IN THERAPY
WITH RADIOPHARMACEUTICALS

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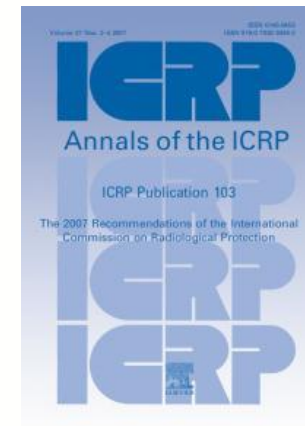
- Founded in 1928 “International X-ray and Radium Protection Committee”
- Renamed “International Commission on Radiological Protection (ICRP) in 1950
- Registered charity in UK
- Main Commission and four Committees
Chair: Dr. Claire Cousins (from 2009)
Scientific Secretary: Chris Clement



Mission and Publications

Advance for the public benefit the science of radiological protection, in particular by providing recommendations and guidance on all aspects of protection against ionising radiation

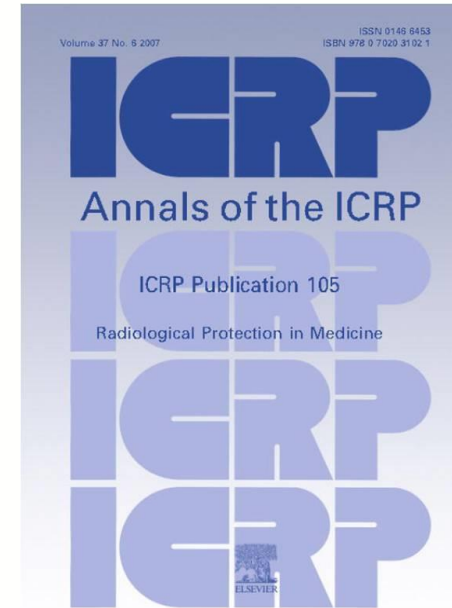
- Publication series since 1959
- *Annals of the ICRP* since 1977
- Task Groups and Working Parties





Committee 3

- Protection in Medicine
 - Patients (Diagnosis, IVR, Radiotherapy)
 - Comforters and carers
 - Volunteers in biomedical research
 - Staff (occupational exposure)
- Key publications
 - Publication 105: Radiological Protection in Medicine
 - Radiation and Your Patient: A guide for medical practitioners
 - <http://www.icrp.org/page.asp?id=32>



RADIATION AND YOUR PATIENT: A GUIDE FOR MEDICAL PRACTITIONERS

*A web module produced by Committee 3 of the
International Commission on Radiological Protection (ICRP)*

What is the purpose of this document ?

In the past 100 years, diagnostic radiology, nuclear medicine and radiation therapy have evolved from the original crude practices to advanced techniques that form an essential tool for branches and specialties of medicine. The inherent properties of ionising radiation provide mi





ICRP organisational structure & task groups

- Main commission (14 members)
- Committee 1 - Radiation effects
- Committee 2 - Doses from radiation exposure
- Committee 3 - Radiological protection in medicine
- Committee 4 - Application of the committees recommendations
- Task group 36 - Radiation Dose to Patients from Radiopharmaceuticals
- Task Group 64 - Cancer Risk from Alpha Emitters
- Task Group 79 - The Use of Effective Dose as a Risk Related Radiological Protection Quantity
- Task Group 91 - Radiation Risk Inference at Low-dose and Low-dose Rate Exposure for Radiological Protection Purposes
- Task Group 95 - Internal Dose Coefficients
- Task Group 96 - Computational Phantoms and Radiation Transport
- Task Group 101 - Radiological Protection in Therapy with Radiopharmaceuticals
- Task Group 111 - Factors Governing the Individual Response of Humans to Ionising Radiation



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- **Task Group 101 - Radiological Protection in Therapy with Radiopharmaceuticals**
- Task Group 111 - Factors Governing the Individual Response of Humans to Ionising Radiation



Timeline

- March 2011; Discussion on need for radiotherapeutics to be addressed
- October 2011; Initial proposal of WP
- April 2012; Main Commission approved WP
- October 2013; C3 decided to continue WP with Y. Yonekura (co-chair) and S. Mattsson (honorary co-chair).
- October 2014; Co-chairs assigned the role of each member, and asked the contributions by the end of March 2015.
- August 2015; The first draft submitted to C3.
- September 2015; Co-chairs and selected members (G. Flux and S. Palm) discussion in Malmö.
- October 2015; Proposed to C3 to establish TG
- February 2015; Approval of TG101 by MC
- July 2016; TG101 meeting in Malmö
- October 2016; Joint symposium with EANM



Timeline

- March 2017; TG101 meeting in Malmö
- May 2017; Draft 2.2 to C3 review
- August 2017; Draft 2.4 to C3 new members
- September 2017; Draft 2.5 to C3 and MC
- October 2017; FMU-ICRP workshop and AOFNMB-ICRP symposium
- October 2017; C3 approval and MC discussion
- Oct 2018 draft report sent for MC approval
- Jun 2019 – Draft published for consultation – comments received from organisations (e.g. IRSN and individuals in many countries)
- Oct 2019 Evaluation of comments received
- Jan 2019 – Further comments from working group members
- Feb 2019 – Report sent to publishers



Annals of the ICRP

ICRP PUBLICATION 1XX

Radiological Protection in Therapy with Radiopharmaceuticals

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ACKNOWLEDGEMENTS

Although ICRP has a number of publications on the use of radiopharmaceuticals, this is the first specific to radiopharmaceutical therapy. At its meeting in Bethesda, USA, in 2011, Committee 3 discussed the need for a report on this subject, and established a working party to undertake preparatory work. The Main Commission launched Task Group 101 on Radiological Protection in Therapy with Radiopharmaceuticals in 2016.

ICRP thanks all those involved in the development of this publication for their hard work and dedication over many years.

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* corresponding members

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Committee 3 members during preparation of this publication

ICRP and the members of Task Group 101 thank Katarina Sjögren Gleisner for her valuable contribution to this publication.



CONTENTS

GUEST EDITORIAL	3
ABSTRACT	5
MAIN POINTS	6
1. INTRODUCTION	7
2. RADIOPHARMACEUTICAL THERAPY METHODS: JUSTIFICATION AND OPTIMISATION	8
2.1. Introduction	8
2.2. Treatment of Hyperthyroidism and Other Benign Thyroid Conditions	8
2.3. Treatment of Differentiated Thyroid Cancer	10
2.4. Treatment of Polycythaemia Vera and Essential Thrombocythaemia	13
2.5. Treatment of Skeletal Metastases	14
2.6. Treatment of Neuroblastoma in Children and Young Adults	16
2.7. Treatment with Radiolabelled Peptide Receptor	18
2.8. Radioimmunotherapy	20
2.9. Intra-arterial Treatment of Hepatocellular Carcinoma and Liver Metastases by Selective Internal Radiation Therapy (SIRT)	23
2.10. Treatment of Arthritis (Radionuclide Synovectomy)	25
3. BIOKINETIC DATA COLLECTION	27
3.1. Whole-body Activity	27
3.2. Activity in the Blood	27
3.3. Organ and Tumour Activity	27
3.4. Quantitative Protocols	30
4. METHODS FOR ABSORBED DOSE CALCULATIONS	32
4.1. Purpose for Absorbed Dose Calculations	32
4.2. Data for Absorbed Dose Calculations	32
4.3. Absorbed Dose	34
4.4. Time-integrated Activity Coefficient in a Source Region	36
4.5. Uncertainties in Absorbed Dose Calculations	37
4.6. Biologically Effective Dose (BED)	38
5. SPECIFIC RADIATION PROTECTION ISSUES	41
5.1. Introduction	41
5.2. Requirements for Radiopharmaceutical Therapy Treatment Rooms and Wards	41
5.3. Patients (Medical Exposure)	42
5.4. Staff (Occupational Exposure)	46
5.5. Comforters and Carers (Medical Exposure), and Members of the Public (Public Exposure)	50
6. SUMMARY OF RECOMMENDATIONS	54
REFERENCES	55
GLOSSARY	66
ACKNOWLEDGEMENTS	71



- ICRP 140 in publication
- Question: What impact might this have?
- “A new scientific truth does not triumph by convincing its opponents and making them see the light, but rather because its opponents eventually die, and a new generation grows up that is familiar with it.”

- Max Planck

