

Advancements in
Cancer Research

Advancements in **Cancer Research**

Edited by

CONSOLATO M. SERGI, MD, PHD, MPH, FRCPC, FCAP
Anatomic Pathology Division, Children's Hospital of
Eastern Ontario, ON, Canada

The logo for Exon Publications features the word "exon" in a blue, lowercase sans-serif font. A green, stylized leaf-like shape is positioned behind the "x", overlapping the letters "e" and "o". Below "exon", the word "PUBLICATIONS" is written in a smaller, blue, uppercase sans-serif font.

exon
PUBLICATIONS

Advancements in Cancer Research

ISBN: 978-0-6453320-9-4

DOI: <https://doi.org/10.36255/exon-publications.advancements-in-cancer-research>

Edited by

Consolato M. Sergi, MD, PhD, MPH, FRCPC, FCAP, Anatomic Pathology Division, Children's Hospital of Eastern Ontario, ON, Canada

Published by

Exon Publications, Brisbane, Australia

Copyright© 2023 Exon Publications

Copyright of individual chapters belongs to the respective authors. The authors grant unrestricted publishing and distribution rights to the publisher. The electronic versions of the chapters are published under Creative Commons Attribution-NonCommercial 4.0 International (CC BY-NC 4.0). <https://creativecommons.org/licenses/by-nc/4.0/>. Users are allowed to share and adapt the chapters for any non-commercial purposes as long as the authors and the publisher are explicitly identified and properly acknowledged as the original source. The book in its entirety is subject to copyright by the publisher. The reproduction, modification, replication and display of the book in its entirety, in any form, by anyone, for commercial purposes are strictly prohibited without the written consent of the publisher.

Notice to the user

The views and opinions expressed in this book are believed to be accurate at the time of publication. The publisher, editors or authors cannot be held responsible or liable for any errors, omissions or consequences arising from the use of the information contained in this book. The publisher makes no warranty, implicit or explicit, with respect to the contents of this book, or its use.

First Published in August 2023

Printed in Australia

CONTENTS

Foreword	vii
Preface	ix
List of Contributors	xi
1 Challenges in the Radiological Diagnosis of Osteoradionecrosis of the Jaw in Head and Neck Cancer Patients	1
Busra Yilmaz, Efsun Somay, Ahmet Kucuk, Berrin Pehlivan, Ugur Selek, Erkan Topkan	
2 Definitions of Radiation-induced Trismus in Head and Neck Cancer: Current Concepts and Controversies	23
Efsun Somay, Busra Yilmaz, Erkan Topkan, Ahmet Kucuk, Berrin Pehlivan, Ugur Selek	
3 Assessment of the Impact of Osteoradionecrosis on Quality-of-Life Measures in Patients with Head and Neck Cancer	41
Efsun Somay, Busra Yilmaz, Erkan Topkan, Ahmet Kucuk, Berrin Pehlivan, Ugur Selek	
4 Combined Stereotactic Radiosurgery and Immune Checkpoint Inhibitors for the Treatment of Brain Metastasis	57
Ahmet Kucuk, Erkan Topkan, Nulifer Kilic Durankus, Sukran Senyurek, Eyub Yasar Akdemir, Duygu Sezen, Yasemin Bolukbasi, Ugur Selek, Berrin Pehlivan	
5 Preoperative Radiosurgical Management of Brain Metastases: Evidence and Challenges	75
Erkan Topkan, Ahmet Kucuk, Sukran Senyurek, Duygu Sezen, Nulifer Kilic Durankus, Eyub Yasar Akdemir, Yasemin Bolukbasi, Berrin Pehlivan, Ugur Selek	

6	Chronic Lymphocytic Leukemia: Current Knowledge and Future Advances in Cytogenomic Testing	93
	Lauren M. Wainman, Wahab A. Khan, Prabhjot Kaur	
7	<i>In Situ</i> Neuroblastoma: The Intriguing “Tumor” of Neuroectodermal Origin and the Putative Cancer Stem Cells	107
	Consolato M. Sergi	
8	Radiotherapy and Dental Implant Applications in Patients with Head and Neck Cancer	117
	Efsun Somay, Busra Yilmaz, Erkan Topkan, Berrin Pehlivan, Ugur Selek	
9	Cell Microarray: An Approach to Evaluate Drug-Induced Alterations in Protein Expression	133
	Mariana Nunes, Diana Nunes, Sara Ricardo	
	Index	145

Doi: <https://doi.org/10.36255/exon-publications.advancements-in-cancer-research.frontmatter>