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Judul	:	Survival Outcomes and Prognostic Factors in Patients with Meningioma: A Single-Center Study at the Indonesian National Cancer Center Dharmais Hospital (2019?2025)
Nama Media	:	Current Oncology
Penerbit	:	MDPI
Volume/Tahun	:	33/5/2026
URL Repository	:	https://www.mdpi.com/1718-7729/33/5/237

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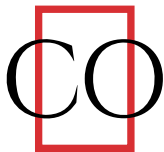
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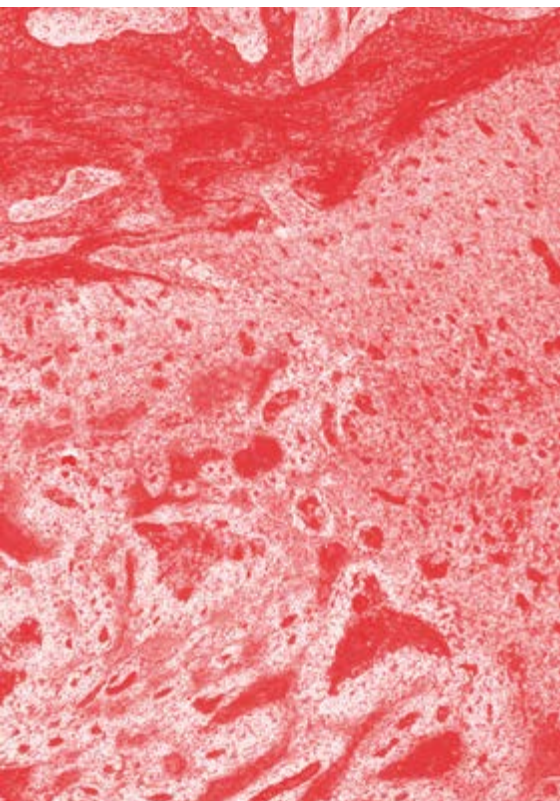
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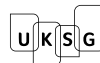
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by In Cheol Hwang, Youn Seon Choi, Hong Yup Ahn, So-Jung Park and Yoo Jeong Lee

Curr. Oncol. **2026**, 33(5), 301; <https://doi.org/10.3390/curroncol33050301><https://doi.org/10.3390/curroncol33050301> - 21 May 2026

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Abstract Family caregivers play a critical role in supporting patients with advanced cancer, yet their quality of life (QoL) is often adversely affected and remains insufficiently addressed in routine care. Although family relationships have been widely recognized as important in the caregiving context, their [...] **Read more.**

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by Thomas Breakell, Paolo Neri, Léonie A. N. Staats, Rafaela Kramer, Carola Berking, Michael Erdmann and Anke Hartmann

Curr. Oncol. **2026**, 33(5), 300; <https://doi.org/10.3390/curroncol33050300><https://doi.org/10.3390/curroncol33050300> - 21 May 2026

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Abstract Immune checkpoint inhibitors (ICIs) have substantially improved outcomes in advanced melanoma but are frequently linked to immune-related adverse events (irAEs). Vitiligo is a common cutaneous irAE and has been consistently associated with improved patient outcome, including prolonged progression-free and overall survival. It also [...] **Read more.**

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Early Neurological Improvement and Ambulation Recovery After Delayed Surgery in Surgically Selected Nonambulatory Metastatic Epidural Spinal Cord Compression: A Retrospective Cohort Study (</1718-7729/33/5/299>)

by Aydin Talat Baydar, Baran Taskala, Bahadir Topal, Muhammed Bayindir, Yunus Emre Batman, Ilhan Yilmaz and Ali Dalgic

Curr. Oncol. **2026**, 33(5), 299; <https://doi.org/10.3390/curroncol33050299>

(<https://doi.org/10.3390/curroncol33050299>) - 20 May 2026

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Abstract Delayed decompression for metastatic epidural spinal cord compression (MESCC) is a common real-world problem, yet short-interval recovery after patients have already remained nonambulatory for at least 48 h is poorly defined. We retrospectively evaluated 41 surgically selected patients with MRI-confirmed epidural MESCC (Bilsky [...]) [Read more.](#)

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Optimizing the Efficacy–Toxicity Paradigm in Pediatric Oncology: A Narrative Review of Immunotherapy and Survivorship Outcomes (</1718-7729/33/5/298>)

by Zaure Dushimova, Timur Saliev, Aigul Bazarbayeva, Kymbat Karimova, Abay Kussainov and Ildar Fakhradiyev

Curr. Oncol. **2026**, 33(5), 298; <https://doi.org/10.3390/curroncol33050298>

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Abstract Background: Childhood cancer survival now approaches 80% in high-income countries, yet most survivors face lifelong toxicity. This review examines the interplay between treatment efficacy, relapse prevention, and therapy-related complications. Methods: Narrative synthesis of landmark pediatric oncology trials (2000–2026), including AALL1731 (blinatumomab), ELLA1701 (CAR T...

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Factors Associated with Autopsy Consent in Pediatric Oncology: A 10-Year Review (</1718-7729/33/5/297>)

by **Meaghann S. Weaver, Jia Liang, Rachel Jalfon, Yimei Li, Abigail D. Cohen and Liza-Marie Johnson**

Curr. Oncol. **2026**, *33*(5), 297; <https://doi.org/10.3390/curroncol33050297>

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Abstract Purpose: Autopsy remains an important diagnostic and research modality in pediatric oncology. This study examined demographic and clinical factors associated with parental acceptance or decline of autopsy in childhood cancer. Patients and Methods: This study was a retrospective chart review of autopsy consent [...]
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Cancer During Pregnancy: Navigating Clinical and Research Challenges (</1718-7729/33/5/296>)

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Abstract The incidence of cancer during pregnancy is rising, yet scientific understanding and clinical management remain underdeveloped. Delayed diagnoses, limited therapeutic options, and lack of safety data exacerbate the clinical challenges of treating cancer during pregnancy. Further, the biology of gestational cancers is poorly [...]
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by Yiren He, Qian Zhang, Xinyang He and Wenyong Wu

Curr. Oncol. **2026**, 33(5), 295; <https://doi.org/10.3390/curroncol33050295> (https://doi.org/10.3390/curroncol33050295) - 19 May 2026

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Abstract Colon adenocarcinoma (COAD) is a common malignancy with substantial morbidity and mortality, and the identification of new therapeutic targets remains essential for improving patient outcomes. In this study, we investigated SHC SH2-domain binding protein 1 (SHCBP1) in COAD through two complementary components with [...] **Read more.**

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Toward Individualized Management: A Commentary on Perioperative Systemic Therapy Guidelines in Breast Cancer Surgery and Reconstruction. Comment on Galuia et al. Perioperative Drug Management of Systemic Therapies in Breast Cancer: A Literature Review and Treatment Recommendations. *Curr. Oncol.* **2025, 32, 154 ([/1718-7729/33/5/294](https://1718-7729/33/5/294))**

by Emily E. Zona and Jacqueline S. Israel

Curr. Oncol. **2026**, 33(5), 294; <https://doi.org/10.3390/curroncol33050294>

(<https://doi.org/10.3390/curroncol33050294>) - 19 May 2026

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Abstract The perioperative management of systemic breast cancer therapies is an increasingly important aspect of planning for breast cancer surgery and reconstruction. This commentary compares two recent sets of recommendations and explains why treatment decisions often need to be tailored to the individual patient. [...] **Read more.**

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Ruptured Wilms Tumor: Clinical Features, Diagnostic Challenges, and Survival Outcomes (/1718-7729/33/5/293)

by **Hiba Emadeldeen, Khalil Ghandour, Tamador Al-Shamaileh, Ahmad Kh. Ibrahimi, Nasim Sarhan, Iyad Sultan and Hadeel Halalsheh**

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Abstract Background: Wilms tumor (WT) rupture is a serious complication that upstages the disease and requires treatment intensification. This study evaluates clinical characteristics, radiological-pathological concordance, and survival outcomes of ruptured versus non-ruptured WT at a major Middle Eastern tertiary center. Methods: We conducted a [...] **Read more.**

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SLC39A13 Defines Myofibroblastic Activation and Immunosuppressive Tumor Microenvironment in Head and Neck Squamous Cell Carcinoma (/1718-7729/33/5/292)

by **Hideyuki Takahashi, Hiroyuki Hagiwara, Hiroe Tada, Miho Uchida, Toshiyuki Matsuyama and Kazuaki Chikamatsu**

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Abstract Zinc transport plays a critical role in cellular signaling, but its function in the tumor microenvironment remains poorly understood. We aimed to investigate the role of zinc transporters in cancer-associated fibroblasts in head and neck squamous cell carcinoma. Single-cell RNA sequencing data were [...] **Read more.**

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Incidence and Management Trends in Advanced Head and Neck Non-Melanoma Skin Cancer in Ontario (MDPI) (1718-7729/33/5/291)

by **Ka-Kit David Yeung, Gregory Pond, Isaac Kong, Han Zhang, Michael Gupta, Zejia Chen and Justin Lee**

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Curr. Oncol. **2026**, *33*(5), 291; <https://doi.org/10.3390/curroncol33050291>

(<https://doi.org/10.3390/curroncol33050291>) - 17 May 2026

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Abstract Head and neck non-melanoma skin cancers (H&N NMSCs) account for most head and neck malignancies. While primary treatment comprises surgery, adjuvant radiation is recommended in advanced tumors. Radiation oncology practice patterns for resected locally advanced (rLA) and locoregional (rLR) H&N NMSCs have not [...] **Read more.**

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19 pages, 258 KB

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Forward Planning: A Staffing Framework and Ratios for Psychosocial Oncology and Supportive Care Hiring Practices as Cancer Care Models Evolve (/1718-7729/33/5/290)

by **Carole Mayer, Marianne Arab, Kimberley Thibodeau and Celestina Martopullo**

Curr. Oncol. **2026**, *33*(5), 290; <https://doi.org/10.3390/curroncol33050290>

(<https://doi.org/10.3390/curroncol33050290>) - 14 May 2026

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Abstract Innovative models of cancer care have emerged in response to advances in cancer treatment, expanding technologies that bring care closer to home and address COVID-19-related challenges and concerns about a shrinking healthcare workforce. Despite the advancements made, the psychosocial impact on people affected [...] **Read more.**

(This article belongs to the Special Issue **Building Hope for the Next Decade of Psychosocial**

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18 pages, 715 KB

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Real-World Effectiveness of Capecitabine and Temozolomide Across Endocrine and Neuroendocrine Neoplasm Subtypes (ENENs): A Population-Based Cohort Study from Alberta, Canada (2011–2021) (/1718-7729/33/5/289)

by **Alda Aleks, Kaiden D. Jobin, Malek B. Hannouf, Patrik Husi, Heather Halperin, Chris White-Gloria, Tasnima Abedin and Dean Ruether**

Curr. Oncol. **2026**, *33*(5), 289; <https://doi.org/10.3390/curroncol33050289>

(<https://doi.org/10.3390/curroncol33050289>) - 14 May 2026

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Abstract Capecitabine plus temozolomide (CAPTEM) improves progression-free survival (PFS) in pancreatic endocrine and neuroendocrine neoplasms (PNENs), yet its real-world effectiveness across other endocrine and neuroendocrine neoplasm (ENEN) subtypes remains uncertain. We conducted a retrospective population-based cohort study including 159 adults with ENENs treated with [...] [Read more.](#)

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Supporting Advance Care Planning Among Mandarin and Cantonese Speaking Communities: A Qualitative Exploratory Study (</1718-7729/33/5/288>)

by Upma Chitkara, Ashfaq Chauhan, Ramya Walsan, Mary Li, Eric Yeung, Ursula M. Sansom-Daly and Reema Harrison

Curr. Oncol. **2026**, *33*(5), 288; <https://doi.org/10.3390/curroncol33050288>

(<https://doi.org/10.3390/curroncol33050288>) - 14 May 2026

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Abstract Whilst advance care planning (ACP) is important to ensure person-centred end of life care, there is sparse evidence about factors contributing towards engagement for people from Mandarin and Cantonese speaking backgrounds (MCSB) affected by cancer. This study aimed to establish barriers and facilitators [...] [Read more.](#)

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Applications of Artificial Intelligence in Endobronchial Ultrasound for Lung Cancer Diagnosis and Staging: A Scoping Review (</1718-7729/33/5/287>)

by Jacobo Echeverri-Hoyos, Jaime A. Echeverri-Franco, Nicole Bonilla, Gustavo Monsalve-Morales and Eduardo Tuta-Quintero

Curr. Oncol. **2026**, *33*(5), 287; <https://doi.org/10.3390/curroncol33050287>

(<https://doi.org/10.3390/curroncol33050287>) - 13 May 2026

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Abstract Introduction: Lung cancer remains highly lethal. Endobronchial ultrasound (EBUS) enables minimally invasive diagnosis and staging. Artificial intelligence (AI) improves image analysis and

diagnostic accuracy, though current evidence is limited by retrospective, small, single center studies.

Methods: A scoping review following Arksey–O'Malley, [...] [Read more.](#)

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Lenvatinib Combined with New FP Hepatic Arterial Infusion Chemotherapy for Unresectable Hepatocellular Carcinoma: Clinical Efficacy, Vascular Remodeling, and Implications for Immunotherapy–Systemic Combination Therapy (/1718-7729/33/5/286)

by Susumu Maruta, Yohei Koshima, Yuji Debari, Chihei Sugihara, Gou Takahata, Ryo Tamura, Tadashi Ohshima, Yuji Ono, Yuho Morita, Tomoki Chiba, Satoru Ishida, Hideto Imai, Keisuke Watanabe, Ryo Chinzei, Masanori Takahashi and Yoshihiko Ooka

Curr. Oncol. **2026**, 33(5), 286; <https://doi.org/10.3390/curroncol33050286>

(<https://doi.org/10.3390/curroncol33050286>) - 13 May 2026

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Abstract Background/Objectives: Patients with unresectable hepatocellular carcinoma (uHCC) refractory or intolerant to immune checkpoint inhibitor (ICI)-based regimens represent a growing yet therapeutically underserved population with limited treatment options. We investigated the efficacy, safety, and mechanistic underpinnings of lenvatinib combined with New FP hepatic arterial [...] [Read more.](#)

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Radioembolization Practice in North America Versus Europe: Results from a Global Survey **(/1718-7729/33/5/285)**

by Grace Keane, Marnix G. E. H. Lam, Arthur J. A. T. Braat, Rutger C. G. Bruijnen,
Nathalie Kaufmann, Hugo W. A. M. de Jong, Riad Salem and Maarten L. J. Smits

Curr. Oncol. **2026**, *33*(5), 285; <https://doi.org/10.3390/curroncol33050285>

(<https://doi.org/10.3390/curroncol33050285>) - 12 May 2026

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Abstract Purpose: The Cardiovascular and Interventional Radiological Society of Europe (CIRSE) conducted an international survey on the real-life application of transarterial radioembolization (TARE). This sub-analysis of the complete survey evaluates intercontinental disparities in TARE practices.

Materials and Methods: A survey of 32 multiple-choice questions [...] **Read more.**

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Temporal Clustering of Endometrial Cancer and Hyperplasia in HRT Users with Unscheduled Bleeding: A Retrospective NHS Cohort Study **(/1718-7729/33/5/284)**

by Mohamed Abdelwanis Mohamed Abdelaziz, Ahmed Mohamed, Ayodele Olaleye,
Nesma Hesham, Nazifa Tasnim, Oluwafemi Ogundiran, Lorna Sandison, Hazem Sayed and
Anita Juliana

Curr. Oncol. **2026**, *33*(5), 284; <https://doi.org/10.3390/curroncol33050284>

(<https://doi.org/10.3390/curroncol33050284>) - 12 May 2026

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Abstract Background: Unscheduled bleeding in postmenopausal women on hormone replacement therapy (HRT) represents a common but poorly characterised clinical challenge. Whilst endometrial cancer affects approximately 9% of women with unexplained postmenopausal bleeding, existing evidence in HRT users is largely restricted to women under 60 [...] [Read more.](#)

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High-Grade Glioma Tumoral Cells in a Case of Postoperative, Recurrent Subdural Hematoma... Where Did They Come From? (/1718-7729/33/5/283)

by Paul E. Constanthin, Arthur Durouchoux, Gianpaolo Jannelli, Mégane Le Quang, Guillaume Chotard and Julien Engelhardt

Curr. Oncol. **2026**, 33(5), 283; <https://doi.org/10.3390/curroncol33050283>

(<https://doi.org/10.3390/curroncol33050283>) - 10 May 2026

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Abstract Background: High-grade glioma (HGG), formerly known as Glioblastoma multiforme, can be complicated by hematomas, either at the initial presentation or after surgical removal. Rarely, postoperative bleeding can occur extra-axially, resulting in subdural hematomas (SDH) that might require surgical evacuation. Of note, little is [...] [Read more.](#)

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Spontaneous Regression of Clear Cell Renal Cell Carcinoma Metastases or Immune Restoration? (/1718-7729/33/5/282)

by Clara Vacheret, Fabien Moinard-Butot, Lucile Reberol, Alexandre Ciccolini, Roberto Luigi Cazzato and Philippe Barthélémy

Curr. Oncol. **2026**, 33(5), 282; <https://doi.org/10.3390/curroncol33050282>

(<https://doi.org/10.3390/curroncol33050282>) - 10 May 2026

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Abstract Spontaneous regression of metastatic renal cell carcinoma is a rare and incompletely understood phenomenon. We report the case of a 61-year-old man with biopsy-proven pulmonary metastases from clear cell renal cell carcinoma who experienced durable tumor regression without receiving any systemic therapy. The [...] [Read more.](#)

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Recording Medical Errors in Brain Tumor Surgery Can Facilitate Their Avoidance: Single Institution Comparative Cohort Analysis over 19 Years (/1718-7729/33/5/281)

by **Mohammed J. Asha, Patrick E. Steadman, Ashkan Samienezhad and Mark Bernstein**

Curr. Oncol. **2026**, 33(5), 281; <https://doi.org/10.3390/curroncol33050281>

(<https://doi.org/10.3390/curroncol33050281>) - 9 May 2026

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Abstract Objectives: Error-tracking studies have become an invaluable tool for gaining deeper insights into the patterns, causes, and clinical consequences of errors. In this paper, we examine the long-term impact of analyzing errors at the level of an individual surgeon. **Methods:** We [...] **Read more.**

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Open Access Review

20 pages, 917 KB

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Prostate Cancer Biomarkers with a Focus on Galectin-3: Emerging Clinical and Therapeutic Implications (/1718-7729/33/5/280)

by **Hiba Narvel, Mohammad Arfat Ganiyani, Adnan Gulam Nabi, Aman Goyal, Rohan Garje, Sanjay Srinivasan, Hafiz Ahmed and Deepak Kilari**

Curr. Oncol. **2026**, 33(5), 280; <https://doi.org/10.3390/curroncol33050280>

(<https://doi.org/10.3390/curroncol33050280>) - 9 May 2026

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Abstract Prostate cancer (PCa) management has evolved with biomarker-driven strategies, yet biological heterogeneity, adaptive resistance, and an immunosuppressive microenvironment limit their efficacy. Galectin-3 (Gal-3) has emerged as a central node in PCa pathobiology, influencing tumor survival, metastasis, and immune escape. This review comprehensively reviews [...] **Read more.**

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14 pages, 1283 KB

(/1718-7729/33/5/279/pdf?version=1778320598)

The Contemporary Role of Virtual and Augmented Reality in Radiation Oncology: A Review

(/1718-7729/33/5/279)

by Saad Mohssine, Marie-Ève Pelland, Stephane Bedwani and David Roberge

Curr. Oncol. **2026**, 33(5), 279; <https://doi.org/10.3390/curroncol33050279> (https://doi.org/10.3390/curroncol33050279) - 9 May 2026

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Abstract Purpose: Virtual reality (VR) and augmented reality (AR) are increasingly being explored as tools with potential applications in radiation oncology, with applications in education, patient care, and workflow optimization. This review evaluates the current landscape and future potential of immersive technologies in clinical [...] **Read more.**

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Significant Correlation of Dynamic Pan-Immune Inflammation Value and Magnetic Resonance Imaging Response in Patients with Locally Advanced Rectal Cancer Treated with Total Neoadjuvant Therapy (/1718-7729/33/5/278)

by Sukran Celikarslan, Duygu Karahacioglu, Bengi Gurses, Fatih Selcukbiricik, Emre Balik, Derya Salim Uymaz, Ahmet Rencuzogullari, Dursun Bugra, Sahin Lacin, Kerim Kaban, Perran Fulden Yumuk, Nil Molinas Mandel, Ayse Armutlu, Burcu Saka, N. Volkan Adsay, Metin Vural, Merve Duman, Caglayan Selenge Beduk Esen, Nulifer Kilic Durankus, Duygu Sezen, + **Show full author list**

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Abstract Background: Accurate identification of complete or near-complete responders after total neoadjuvant therapy (TNT) is critical for selecting candidates for non-operative management in locally advanced rectal cancer (LARC). While static inflammatory biomarkers have been widely investigated, the predictive value of dynamic changes in [...] **Read more.**

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Docetaxel in Non-Small Cell Lung Cancer: A Multi-Centre Real-World Evidence Analysis in the Immunotherapy Era (/1718-7729/33/5/277)

by Christopher F. Theriau, Yuchen Li, Deborah Akurang, Sára M. Moore, Rosalyn A. Juergens, Natasha B. Leighl and Paul Wheatley-Price

Curr. Oncol. **2026**, 33(5), 277; <https://doi.org/10.3390/curroncol33050277><https://doi.org/10.3390/curroncol33050277>) - 8 May 2026

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Abstract Docetaxel has been a standard second-line or later (2L+) treatment for advanced non-small cell lung cancer (NSCLC) for more than two decades and remains recommended in current treatment algorithms. However, real-world outcomes in the era of immune checkpoint inhibitors (ICI) are limited.This [...] **Read more.**(This article belongs to the Section **Thoracic Oncology**[\(/journal/curroncol/sections/Thoracic_Oncology/\)\)](#)**► Show Figures**https://pub.mdpi-res.com/curroncol/curroncol-33-00277/article_deploy/html/images/curroncol-33-00277-g001-550.jpg?1779178175**Forecasting Trends in Androgen Deprivation Therapy Intensification for Metastatic Hormone-Sensitive Prostate Cancer: A Retrospective Population-Based Cohort and Time-Series Analysis (/1718-7729/33/5/276)**

by Ealia Khosh Kish, Erind Dvorani, Refik Saskin, Andrew S. Wilton, Raj Satkunasivam, Khatereh Aminoltejari, Amanda Hird, Kasey Berscheid, Soumyajit Roy, Scott C. Morgan, Michael Ong, Di Maria Jiang, Geoffrey T. Gotto, Bobby Shayegan, Girish S. Kulkarni, Rodney H. Breau, Aly-Khan A. Lalani, David-Dan Nguyen and Christopher J. D. Wallis

Curr. Oncol. **2026**, 33(5), 276; <https://doi.org/10.3390/curroncol33050276><https://doi.org/10.3390/curroncol33050276>) - 8 May 2026**Cited by 1** ([/1718-7729/33/5/276#metrics](#)) | Viewed by 987**Abstract** Treatment intensification with androgen receptor pathway inhibitors (ARPIs) and/or docetaxel in addition to androgen deprivation therapy (ADT) improves survival for men with metastatic hormone-sensitive prostate cancer (mHSPC), yet real-world uptake has historically been low. We conducted a population-based retrospective cohort study of Ontario [...] **Read more.**(This article belongs to the Section **Genitourinary Oncology**[\(/journal/curroncol/sections/Genitourinary_Oncology/\)\)](#)**► Show Figures**https://pub.mdpi-res.com/curroncol/curroncol-33-00276/article_deploy/html/images/curroncol-33-00276-g001-550.jpg?1778240935) ([https://pub.mdpi-res.com/curroncol/curroncol-33-00276-g002-550.jpg?1778240937](https://pub.mdpi-res.com/curroncol/curroncol-33-00276/article_deploy/html/images/curroncol-33-00276-g002-550.jpg?1778240937))

Integration of Patient-Reported Outcome Measures in Clinical Practice for Head and Neck Cancer Patients: A Cross-Sectional Survey (/1718-7729/33/5/275)

by Tatiana Dragan, Niclas Hubel, Jens Lehmann, Katherine J. Taylor, Renée Bultijnck, Tihana Gašpert, Luigi Lorini, Vincent Bourbonne, Arnaud Béddek, Bartłomiej Tomasz, Daan Nevens, Stefano Cavalieri, Ruth Gabriela Herrera Gómez, Esmée Lauren Looman, Iyizoba-Ebozue Zsuzsanna, Fatjona Kraja, Emma Lidington, Csongor György Lengyel, Marc Oliva, Gerardo Petruzzi, + [Show full author list](#)

Curr. Oncol. **2026**, 33(5), 275; <https://doi.org/10.3390/curroncol33050275>

(<https://doi.org/10.3390/curroncol33050275>) - 8 May 2026

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Abstract Background: Head and neck cancer (HNC) and its multimodal treatment substantially impair speech, swallowing, breathing, appearance, and psychosocial well-being. Patient-reported outcome measures (PROMs) improve symptom monitoring and quality of life in oncology, yet their integration into routine HNC care remains inconsistent. This study [...] [Read more.](#)

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A Consensus Approach to the Incorporation of Total Neoadjuvant Therapy in a Treatment Algorithm for Stage I–III Resectable Rectal Cancer (/1718-7729/33/5/274)

by Sami A. Chadi, Karineh Kazazian, Paul Savage, Christine Brezden-Masley, Ron Burkes, Eric Chen, Anand Govindarajan, Ali Hosni, Raymond Jang, Erin Kennedy, John Kim, Jelena Lukovic, Aruz Mesci, Catherine O'Brien, Fayez Quereshy, Abdulazeez Salawu, Peter K. Stotland and Carol J. Swallow

Curr. Oncol. **2026**, 33(5), 274; <https://doi.org/10.3390/curroncol33050274>

(<https://doi.org/10.3390/curroncol33050274>) - 8 May 2026

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Abstract Advances in surgical techniques, radiographic imaging capabilities, radiotherapy, and chemotherapy have led to improved outcomes for patients with rectal adenocarcinoma. Treatment strategies have correspondingly evolved, as seen with total neoadjuvant therapy (TNT) and organ preservation approaches. TNT is a treatment strategy for primary, [...] [Read more.](#)

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Intraoperative Margin Control in Eyelid Tumor Surgery: Current Standards, Imaging Advances, and Emerging Techniques [\(/1718-7729/33/5/273\)](#)

by Michele Nardella, Anna Argentesi, Claudia Pirro, Claudia Quaranta Leoni and

Francesco M. Quaranta Leoni

Curr. Oncol. **2026**, *33*(5), 273; <https://doi.org/10.3390/curroncol33050273><https://doi.org/10.3390/curroncol33050273> - 8 May 2026

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Abstract Background: Eyelid malignancies require accurate intraoperative margin control to achieve complete tumor excision while preserving the functional and aesthetic integrity of the periorcular region. Mohs micrographic surgery (MMS) is widely regarded as the reference standard for margin-controlled excision, whereas frozen section–controlled excision (FSC) [...] [Read more.](#)

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Development and Evaluation of a Web-Based App for Adverse Effect Management in Breast Cancer Patients Treated with Oral Targeted Therapy or Chemotherapy: Findings from a Pilot Study [\(/1718-7729/33/5/272\)](#)

by Julie Lemieux, Isabelle Côté, Martine Lemay, Sophie Lauzier, Philippe Després, Christine Desbiens, Catherine Doyle, Brigitte Poirier, Amel Baghdadli, Leonardo Di Schiavi Trotta and Hermann Nabi

Curr. Oncol. **2026**, *33*(5), 272; <https://doi.org/10.3390/curroncol33050272><https://doi.org/10.3390/curroncol33050272> - 7 May 2026

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Abstract This pilot study (NCT05743686) evaluated the feasibility of a web-based application enabling patients with breast cancer (BC) receiving oral therapy to self-report and manage treatment-related adverse effects (AEs). Patients were enrolled between January and August 2023. Historical controls were used for comparison. Participants [...] [Read more.](#)

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Durable Response to Selpercatinib in Metastatic Colorectal Cancer Harboring a Novel**TIMM23B::RET Fusion: A Case Report (/1718-7729/33/5/271)**by **Ziyan Tong, Mengyuan Yang, Shanshan Weng and Ying Yuan***Curr. Oncol.* **2026**, 33(5), 271; <https://doi.org/10.3390/curroncol33050271><https://doi.org/10.3390/curroncol33050271> - 7 May 2026**Cited by 1 (/1718-7729/33/5/271#metrics)** | Viewed by 729

Abstract *RET* fusions are rare but actionable oncogenic drivers in metastatic colorectal cancer (mCRC), occurring in a small molecular subset with limited clinical evidence for selective *RET* inhibition. We report a 77-year-old woman with mCRC harboring a rare *TIMM23B::RET* fusion who achieved durable benefit [...]
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Sexuality in Adult Cancer Patients Living with Enterostomy or Urostomy: A Descriptive Phenomenological Study (/1718-7729/33/5/270)by **Nicolò Panattoni, Giulia Manzon, Alessia Campoli, Valentina Anselmi, Francesca Laurenza, Chiara Giammaria, Aurora De Leo, Alessandro Spano, Fabrizio Petrone, Emanuele Di Simone and Laura Iacorossi***Curr. Oncol.* **2026**, 33(5), 270; <https://doi.org/10.3390/curroncol33050270><https://doi.org/10.3390/curroncol33050270> - 7 May 2026

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Abstract Cancer patients with an enterostomy or urostomy face significant physical and psychological challenges that impact their sexuality and quality of life. Despite its importance, this topic is often overlooked in clinical settings. This study explores the lived experiences of these patients regarding their [...]
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(This article belongs to the Section **Oncology Nursing**[\(/journal/curroncol/sections/Oncology_Nursing/\)\)](#)**Propeller Flaps in Extremity Sarcoma Reconstruction: A Systematic Review of Reconstructive Outcomes and Oncologic Considerations (/1718-7729/33/5/269)**

by **Sara Matarazzo, Beatrice Corsini, Claudia Lauricella, Elisa Bascialla, Luigi Valdatta and Ferruccio Paganini**

Curr. Oncol. **2026**, 33(5), 269; <https://doi.org/10.3390/curroncol33050269>

(<https://doi.org/10.3390/curroncol33050269>) - 6 May 2026  (/toggle_desktop_layout_cookie)  

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Abstract Extremity soft tissue sarcoma resection often results in complex defects requiring reconstruction to preserve function and support multidisciplinary treatment. Propeller flaps have emerged as a local alternative to free flaps in selected cases, but their role in sarcoma reconstruction remains incompletely defined. This [...] **Read more.**

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Overlapping Toxicities of Pembrolizumab and Lenvatinib: A Case of Capillary Leak Syndrome with Severe Erythroblastosis (/1718-7729/33/5/268)

by **Aikaterini Gkoufa, Iraklis Patsialos, Christos Stafylidis, Amalia Anastasopoulou, Dimitra Adamou, Helen Gogas and Panagiotis T. Diamantopoulos**

Curr. Oncol. **2026**, 33(5), 268; <https://doi.org/10.3390/curroncol33050268>

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Abstract Combined immune checkpoint inhibition (ICI) and multitargeted tyrosine kinase inhibition (TKI) improve outcomes in advanced melanoma, especially in heavily pretreated patients, but introduce complex, overlapping toxicities. Although immune-related adverse events and TKI-specific toxicities are well characterized individually, their concurrent presentation is uncommon and [...] **Read more.**

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Clinical Outcomes and Immune-Related Adverse Events in Metastatic Non-Squamous NSCLC Treated with First-Line Pembrolizumab–Chemotherapy: A Real-World Study from Serbia (/1718-

7729/33/5/267)

by **MDPI** ^(I)
by **Zlatan Bojić, Filip Marković and Milica Kontić***Curr. Oncol.* **2026**, 33(5), 267; <https://doi.org/10.3390/curroncol33050267><https://doi.org/10.3390/curroncol33050267>) - 6 May 2026  [\(toggle desktop layout cookie\)](#)  

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Abstract Background: Pembrolizumab combined with pemetrexed–platinum chemotherapy is the standard first-line treatment for patients with metastatic non-squamous non-small-cell lung cancer (NSCLC) and a PD-L1 tumor proportion score (TPS) of 1–49%. Real-world data on treatment outcomes and the prognostic relevance of immune-related adverse events [...] [Read more.](#)

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Quality of Life and Healthcare Experiences of Patients with Anal Cancer: A Mixed-Methods Study
[\(/1718-7729/33/5/266\)](/1718-7729/33/5/266)

by **Andreia F. Moura, Catarina S. Padilla, Samuel M. Vorbach, Emily I. Holthuis, Baukelien van Triest, Cristiane D. Bergerot, Vassilios Vassiliou, Emir Celik, Kübra Akkaya, Irfan Cicin, Winette T. A. van der Graaf, Olga Husson and Samantha C. Sodergren***Curr. Oncol.* **2026**, 33(5), 266; <https://doi.org/10.3390/curroncol33050266><https://doi.org/10.3390/curroncol33050266>) - 5 May 2026

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Abstract Anal cancer is a rare and under-researched malignancy, leading to limited understanding of patients' experiences and potentially insufficiently tailored care. This study explored the health-related quality of life (HRQoL) and healthcare interactions of people with anal cancer. Patients with confirmed diagnosis took part [...] [Read more.](#)

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Association of Macrophage Migration Inhibitory Factor (MIF) with Therapy Response and Clinical Outcomes in HPV-Related Head and Neck Squamous Cell Carcinoma: A Preliminary Report
[\(/1718-7729/33/5/265\)](/1718-7729/33/5/265)

by **Janki Naidugari, Shruti Wadhwa, Benjamin Xie, Sarah Taheri, Indraneel Kulkarni, Luke Johnson, Heehwa G. Son, John Strickley, Shadmehr Demehri, Joongho J. Joh, Robert Mitchell and Rebecca Redman**

Curr. Oncol. **2026**, 33(5), 265; <https://doi.org/10.3390/curroncol33050265>

(<https://doi.org/10.3390/curroncol33050265>) - 1 May 2026

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Abstract Background: Macrophage migration inhibitory factor (MIF) is a critical modulator of the tumor immune microenvironment (TME). Its clinical significance in head and neck squamous cell carcinoma (HNSCC) remains controversial because of HPV-dependent tumor biology and the limitations of single-timepoint biomarker assessments. This preliminary [...] [Read more.](#)

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11 pages, 1230 KB

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Retinoblastoma and Its Tumor Microenvironment (/1718-7729/33/5/264)

by Ashwinaa M. Vaithianathan and George Zanazzi

Curr. Oncol. **2026**, 33(5), 264; <https://doi.org/10.3390/curroncol33050264>

(<https://doi.org/10.3390/curroncol33050264>) - 1 May 2026

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Abstract Retinoblastoma is the most common intraocular malignancy of childhood and is most often driven by loss of the *RB1* tumor suppressor gene. While current treatments achieve high survival rates, they are frequently associated with significant morbidity, highlighting the need for more precise, biology-driven [...] [Read more.](#)

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Educational Needs Regarding Mental Health of Professionals Working with Young Adults with Cancer: A European Survey (/1718-7729/33/5/263)

by Sid Morsink, Leonieke W. Kranenburg, Johanna Berg, Evangeli Bista, Saintuya Dashondog, Siret Kivistik, Mari Lahti, Carmen Monge-Montero, Joaquim Oliveira Lopes, Evanthisa Sakellari, Duygu Sezgin, Margarida Rodrigues Tomás, Merle Varik and Wendy H. Oldenmenger

Curr. Oncol. **2026**, 33(5), 263; <https://doi.org/10.3390/curroncol33050263>

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Abstract Worldwide, an increase in cancer diagnosis has been identified, especially in people under 50 years and in young adults (YAs, age group 18–39 years) [...] **Full article** ([/1718-7729/33/5/263](https://doi.org/10.3390/curroncol33050263))

(This article belongs to the Special Issue **Routine Screening for Distress, Depression and Anxiety in Oncology: Where Are We Now?** ([/journal/curroncol/special_issues/9N790S8U40](https://journal.curroncol/special_issues/9N790S8U40)))

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Greek Physicians' Skills and Factors Affecting Breaking Bad News to Cancer Patients ([/1718-7729/33/5/262](https://doi.org/10.3390/curroncol33050262))

by **Georgios Goumas**, **Theodoros I. Dardavesis**, **Konstantinos Syrigos**, **Nikolaos Syrigos**, **Dimitra S. Mouliou** and **Effie Simou**

Curr. Oncol. **2026**, 33(5), 262; <https://doi.org/10.3390/curroncol33050262>

(<https://doi.org/10.3390/curroncol33050262>) - 30 Apr 2026

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Abstract Background/Objectives: Breaking bad news is crucial for patient-centered care. This study aimed to assess physicians' skills and investigate the possible factors affecting their ability to communicate bad news. Methods: This web-based cross-sectional survey of 633 Greek physicians included demographic and other breaking bad [...] **Read more.**

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12 pages, 352 KB

([/1718-7729/33/5/261/pdf?version=1777536084](https://doi.org/10.3390/curroncol33050261))

Assessment of Risks and Outcomes of Sinusoidal Obstruction Syndrome/Veno-Occlusive Disease in Allogeneic Stem Cell Transplant Recipients Including Potentially Undiagnosed Cases—A Multicenter Canadian Study ([/1718-7729/33/5/261](https://doi.org/10.3390/curroncol33050261))

by **Emily Trus**, **Alexander Ruzic**, **Ram Vasudevan Nampoothiri**, **Gregory R. Pond**, **Vinita Dhir**, **Andrew Poskus**, **Louise Bordeleau** and **Michael Trus**

Curr. Oncol. **2026**, 33(5), 261; <https://doi.org/10.3390/curroncol33050261>

(<https://doi.org/10.3390/curroncol33050261>) - 30 Apr 2026

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Abstract Background and Methods: Sinusoidal obstruction syndrome/veno-occlusive disease (SOS/VOD) is a severe complication of allogeneic stem cell transplant (allo-SCT). Given the increased use of allo-SCT and variability of SOS/VOD incidence in published reports, cases of allo-SCT from two major transplant centers in Ontario, Canada [...] **Read more.**

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13 pages, 1435 KB

[\(/1718-7729/33/5/260/pdf?version=1777528659\)](/1718-7729/33/5/260/pdf?version=1777528659) **Maintenance Liposomal Doxorubicin Following Induction Doxorubicin in Soft Tissue Sarcoma: A Single-Center Observational Study** [\(/1718-7729/33/5/260\)](/1718-7729/33/5/260)

by Alexandre Da Silva Faco, Junior, Mohammad Amin Salehi, Mohammad Hassan Hodroj, Kaveh Mozafari-Lorestani, Feras A. Moria, Jonathan Noujaim and Ramy R. Saleh

Curr. Oncol. **2026**, *33*(5), 260; <https://doi.org/10.3390/curroncol33050260><https://doi.org/10.3390/curroncol33050260> - 30 Apr 2026

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Abstract Maintenance chemotherapy prolongs progression-free survival (PFS) in several malignancies, but its role in soft tissue sarcoma (STS) remains unclear. Conventional doxorubicin is limited by cumulative toxicities. Liposomal doxorubicin may allow prolonged therapy. We evaluated outcomes of patients treated with maintenance liposomal doxorubicin following [...] **Read more.**(This article belongs to the Section **Bone and Soft Tissue Oncology**[\(/journal/curroncol/sections/bone_soft_tissue_oncolog\)](/journal/curroncol/sections/bone_soft_tissue_oncolog).)[► Show Figures](#)https://pub.mdpi-res.com/curroncol/curroncol-33-00260/article_deploy/html/images/curroncol-33-00260-g001-550.jpg?1777528736 https://pub.mdpi-res.com/curroncol/curroncol-33-00260/article_deploy/html/images/curroncol-33-00260-g002-550.jpg?1777528737https://pub.mdpi-res.com/curroncol/curroncol-33-00260/article_deploy/html/images/curroncol-33-00260-g003-550.jpg?1777528739 https://pub.mdpi-res.com/curroncol/curroncol-33-00260/article_deploy/html/images/curroncol-33-00260-g004-550.jpg?1777528741https://pub.mdpi-res.com/curroncol/curroncol-33-00260/article_deploy/html/images/curroncol-33-00260-g005-550.jpg?1777528743

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14 pages, 371 KB

[\(/1718-7729/33/5/259/pdf?version=1777478091\)](/1718-7729/33/5/259/pdf?version=1777478091) **Global Disparities and Trends in Radiotherapy for Early-Stage Glottic Cancer** [\(/1718-7729/33/5/259\)](/1718-7729/33/5/259)by Issa Mohamad, Shatha Abu Taha, Ahmad Bushehri, Bassem Youssef, Enis Ozyar, Ibrahim Alotain, Ibrahim Abu-Gheida, Mohammed Aldehaim, Carlton Johnny, Layth Mula-Hussain, Majed Alghamdi, Mohamed Shelan, Mohammed Al Dohan, Nadeem Pervez, Olgun Elicin, Saad Alrashidi, Wael El-Sheshtawy, Shoukri Temraz, Zineb Dahbi, Ahmed Abbasi, + **Show full author list***Curr. Oncol.* **2026**, *33*(5), 259; <https://doi.org/10.3390/curroncol33050259><https://doi.org/10.3390/curroncol33050259> - 29 Apr 2026**Cited by 1** [\(/1718-7729/33/5/259#metrics\)](/1718-7729/33/5/259#metrics) | Viewed by 1852

Abstract We evaluated global radiotherapy practices in the management of early-stage (AJCC/UICC 8th edition stages I-II) glottic cancer (ESGC). A cross-sectional online survey was conducted in March 2025 across centers worldwide. Data was collected on clinical practices, including staging, CT simulation, target volumes delineation, [...] [Read more.](#)  [\(/toggle desktop layout cookie\)](#)  

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Overcoming Acquired MET-Driven Resistance to First-Line Lorlatinib: Successful Combination of Lorlatinib and Envafoleimab in an ALK-Positive NSCLC Patient with Ultra-High PD-L1 Expression (</1718-7729/33/5/258>)

by Lu Ding, Reyizha Nuersulitan, Jingjing Wang, Hanxiao Chen and Minglei Zhuo

Curr. Oncol. **2026**, 33(5), 258; <https://doi.org/10.3390/curroncol33050258>

(<https://doi.org/10.3390/curroncol33050258>) - 29 Apr 2026

Cited by 1 (</1718-7729/33/5/258#metrics>) | Viewed by 1037

Abstract Anaplastic lymphoma kinase (ALK) rearrangement is a well-established oncogenic driver alteration in non-small cell lung cancer (NSCLC), and ALK tyrosine kinase inhibitors (TKIs), particularly lorlatinib, have significantly improved the prognosis of ALK-positive NSCLC patients. Although high programmed death-ligand 1 (PD-L1) expression ($\geq 50\%$) is [...] [Read more.](#)

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Open Access Article 17 pages, 1061 KB [\(/1718-7729/33/5/257/pdf?version=1778752460\)](/1718-7729/33/5/257/pdf?version=1778752460)

Reasons for Indoor and Outdoor Tanning: Starting Points for Skin Cancer Prevention Based on a Nationwide Study (</1718-7729/33/5/257>)

by Katharina Diehl, Lisa Voß, Eckhard W. Breitbart, Inga-Marie Hübner and Tatiana Görig

Curr. Oncol. **2026**, 33(5), 257; <https://doi.org/10.3390/curroncol33050257>

(<https://doi.org/10.3390/curroncol33050257>) - 29 Apr 2026

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Abstract Background: Ultraviolet (UV) radiation is a major risk factor for skin cancer. Nevertheless, many people tan in the sun and in tanning beds. The aim of this study was to explore the reasons behind these behaviors and to investigate whether the reasons for [...] **Read more.**

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Open Access Article

16 pages, 1622 KB

([/1718-7729/33/5/256/pdf?version=1778129698](#))

Mutational Landscape and Treatment Response in Extensive-Stage Small-Cell Lung Cancer: A Single-Center Real-World Analysis ([/1718-7729/33/5/256](#))

by Meizeng Li, Lianying Guo, Ruiying Zhao, Shengnan Chen, Shengji Ma, Chan Xiang and Yuchen Han

Curr. Oncol. **2026**, *33*(5), 256; <https://doi.org/10.3390/curroncol33050256>

(<https://doi.org/10.3390/curroncol33050256>) - 29 Apr 2026

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Abstract Objectives: Small-cell lung cancer (SCLC) is an aggressive malignancy often diagnosed at the extensive stage (ES-SCLC). While chemoimmunotherapy (CIT) has emerged as a first-line option, SCLC's "cold" immune profile limits broad efficacy. This study evaluates the real-world clinical efficacy of CIT versus chemotherapy [...] **Read more.**

(This article belongs to the Special Issue **Clinical Advances and Therapeutic Challenges in Small-Cell Lung Cancer and Rare Thoracic Cancers** ([/journal/curroncol/special_issues/P5P665675E](#)))

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13 pages, 227 KB

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Phased Traumatic Stress Responses Among Caregivers of Children and Adults Recently Diagnosed With Acute Leukemia: A Grounded Theory Study (/1718-7729/33/5/255)

by **Carmine Malfitano, Stephanie M. Nanos, Luigi Grassi, Rosangela Caruso and Gary Rodin**

Curr. Oncol. **2026**, 33(5), 255; <https://doi.org/10.3390/curroncol33050255> (https://doi.org/10.3390/curroncol33050255) - 29 Apr 2026

(<https://doi.org/10.3390/curroncol33050255>) - 29 Apr 2026

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Abstract A diagnosis of acute leukemia (AL) represents a sudden, life-threatening event that places family caregivers (FCs) at high risk for traumatic stress. While traumatic stress symptoms have been documented among FCs later in the cancer trajectory, little is known about how these responses [...]

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(This article belongs to the Special Issue **Psychological Interventions for Cancer Survivors** (/journal/curroncol/special_issues/8AW288Z3GL))



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Imaging Features and Clinical Outcomes of Ischemic Cholangiopathy After Drug-Eluting Bead Transarterial Chemoembolization for Hepatocellular Carcinoma: A Retrospective Single-Center Cohort Study and Literature Review (/1718-7729/33/5/254)

by **Saša Štupar, Peter Popović, Rok Dežman, Jure Uršič, Martin Zaplotnik, Miha Štabuc, Sanjo Finderle and Alojz Šmid**

Curr. Oncol. **2026**, 33(5), 254; <https://doi.org/10.3390/curroncol33050254>

(<https://doi.org/10.3390/curroncol33050254>) - 28 Apr 2026

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Abstract Background: Ischemic cholangiopathy (IC) is an under-recognized complication after transarterial chemoembolization (TACE) for hepatocellular carcinoma (HCC). Our goal was to estimate the incidence, timing, clinical presentation, and management of IC after drug-eluting bead TACE. Methods: Single-center retrospective cohort of consecutive drug-eluting bead TACE [...]

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Open Access Article

14 pages, 234 KB

(</1718-7729/33/5/253/pdf?version=1777363904>)

Perceptions and Behaviors of Healthcare Providers Regarding Sexuality in Cervical Cancer Care: A Qualitative Study (/1718-7729/33/5/253)

by **Ida Ayu Md Vera Susiladewi, Yati Afiyanti, Allenidekania Allenidekania and Margaret Fitch**

Curr. Oncol. **2026**, 33(5), 253; <https://doi.org/10.3390/curroncol33050253>

(<https://doi.org/10.3390/curroncol33050253>) - 28 Apr 2026

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Abstract Sexuality is a fundamental aspect of human well-being, yet it is often disrupted in women diagnosed with cervical cancer. Although healthcare providers play a crucial role in supporting patients' sexual health, the topic remains largely unaddressed in oncology settings. This study aimed to [Read more](#).

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13 pages, 242 KB

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The Implementation of a Caregiver Distress Screening Initiative in a Pediatric Oncology Healthcare Setting: A Quality Improvement Project (</1718-7729/33/5/252>)

by Clayton Culp, Christen Long, Angelique Ribieras and Erica H. Sirrine

Curr. Oncol. **2026**, *33*(5), 252; <https://doi.org/10.3390/curroncol33050252>

(<https://doi.org/10.3390/curroncol33050252>) - 28 Apr 2026

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Abstract Background: Parents of children with cancer often experience significant stressors that can heighten distress and impact overall well-being. Despite recommendations supporting distress screening for adult and pediatric patients with cancer, systematic assessment of parent or caregiver distress in pediatric oncology settings remains [Read more](#).

(This article belongs to the Special Issue **Quality of Life and Management of Pediatric Cancer** (/journal/curroncol/special_issues/R9254581DM).)

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10 pages, 1251 KB

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Treatment Selection Based on Dominant Tumor Biology in Endometrial Carcinoma with Choriocarcinomatous Differentiation: A Case-Based Review (</1718-7729/33/5/251>)

by Norihito Kamo, Shigenori Furukawa, Asami Kato, Keisuke Yoshida, Chikako Okabe, Hideki Miura, Tetsu Sato, Hiroshi Suzuki, Shu Soeda and Keiya Fujimori

Curr. Oncol. **2026**, *33*(5), 251; <https://doi.org/10.3390/curroncol33050251>

(<https://doi.org/10.3390/curroncol33050251>) - 27 Apr 2026

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Abstract Endometrial carcinoma (EC) with choriocarcinomatous differentiation is an exceptionally rare malignancy for which standardized postoperative treatment strategies are lacking. Herein, we describe two postmenopausal patients with endometrioid carcinoma containing a choriocarcinomatous component. One patient had an EC-dominant tumor with low and rapidly normalized [Read more](#).

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Open Access Review

18 pages, 2232 KB

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Perineural Spread and Base of Skull Involvement in Cutaneous Squamous Cell Carcinoma—A Critical Review from an Endemic Region (/1718-7729/33/5/250)

by Charles Y. Lin, Rahul Ladwa and Ryan Sommerville

Curr. Oncol. **2026**, *33*(5), 250; <https://doi.org/10.3390/curroncol33050250>

(<https://doi.org/10.3390/curroncol33050250>) - 27 Apr 2026

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Abstract Perineural spread (PNS) from cutaneous squamous cell carcinoma (cSCC) to the skull base is increasingly recognised as a route of cancer spread. Management historically involved definitive radiotherapy to treat PNS at the skull base. In the endemic region with modern magnetic resonance neurogram [...][Read more.](#)

(This article belongs to the Special Issue **The Role of Targeted Therapy in Head and Neck Cancers (/journal/curroncol/special_issues/PNL0I5V110)**.)

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18 pages, 400 KB

(</1718-7729/33/5/249/pdf?version=1777278123>)

High-Risk Cytogenetic Multiple Myeloma Remains a Therapeutic Challenge: A 15-Year Real-World Analysis (/1718-7729/33/5/249)

by Carmel Awadallah, Anas Zayad, Shebli Atrash, Anita Mazloom, Omar Alkharabsheh, Prerna Mewawalla, Mansi R. Shah, Forat Lutfi, Zahra Mahmoudjafari, Muhammad Umair Mushtaq, Jeries Kort, Alma Habib and Al-Ola Abdallah

Curr. Oncol. **2026**, *33*(5), 249; <https://doi.org/10.3390/curroncol33050249>

(<https://doi.org/10.3390/curroncol33050249>) - 27 Apr 2026

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Abstract Background: High-risk cytogenetic multiple myeloma (HRMM) confers inferior outcomes despite significant therapeutic advances. Real-world data characterizing contemporary treatment

patterns across lines of therapy in this population are limited. **Methods:** We conducted a multicenter retrospective study of 205 patients with HRMM diagnosed [...] **Read more.**

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2 pages, 136 KB

(</1718-7729/33/5/248/pdf?version=1778473325>)

Reply to Venkataraman, J.; Mokbel, K. Reconsidering the Interpretation of “Recurrence-Free Survival” After Mastectomy for DCIS. Comment on “Sae-sim et al. Tamoxifen Reduces Breast Cancer Recurrence in Women with DCIS Who Underwent Mastectomy. *Curr. Oncol.* 2026, 33, 89” (</1718-7729/33/5/248>)

by Netchanok Sae-sim, Norasate Samarthai and Warapan Numprasit

Curr. Oncol. 2026, 33(5), 248; <https://doi.org/10.3390/curroncol33050248>

(<https://doi.org/10.3390/curroncol33050248>) - 27 Apr 2026

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Abstract We thank Venkataraman and Mokbel [...] **Full article** (</1718-7729/33/5/248>)

(This article belongs to the Section **Breast Cancer** (/journal/curroncol/sections/Breast_Cancer))

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12 pages, 442 KB

(</1718-7729/33/5/247/pdf?version=1777263529>)

Omission of Axillary Lymph Node Dissection in Breast Cancer Patients with 1–2 Positive Sentinel Lymph Nodes: A Multicenter Real-World Cohort Study in a Chinese Population (</1718-7729/33/5/247>)

by Chengye Hong, Jianhui Chen, Yongwu Chen, Liangqiang Li, Xianqiang Du, Debo Chen and Weibin Lian

Curr. Oncol. 2026, 33(5), 247; <https://doi.org/10.3390/curroncol33050247>

(<https://doi.org/10.3390/curroncol33050247>) - 27 Apr 2026

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Abstract The optimal management of patients with limited sentinel lymph node metastasis in breast cancer, particularly regarding whether to perform additional axillary surgery, continues to be an area of clinical uncertainty in routine practice. This multicenter retrospective cohort study aimed to evaluate adherence to [...] **Read more.**

(This article belongs to the Section **Breast Cancer** (/journal/curroncol/sections/Breast_Cancer))

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Open Access Article

17 pages, 717 KB

(</1718-7729/33/5/246/pdf?version=1777194703>)

Outcomes of Double-Hit and Single High-Risk Cytogenetic Newly Diagnosed Myeloma in Transplant-Eligible Patients (</1718-7729/33/5/246>)

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(<https://doi.org/10.3390/curroncol33050244>) - 24 Apr 2026

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Abstract Background: De novo (pretreatment) *EGFR* T790M mutation is a rare molecular finding in non-small cell lung cancer (NSCLC) and has historically been associated with primary resistance to first- and second-generation *EGFR* tyrosine kinase inhibitors (TKIs). Evidence guiding optimal first-line management in this subgroup, [...] **Read more.**

(This article belongs to the Special Issue **Advances in Thoracic Oncology: From Surgical Innovation to Outcome Optimization** (/journal/curroncol/special_issues/YS77GGIZ90))

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Guidance for Canadian Breast Cancer Practice: National Consensus Recommendations for the Systemic Treatment of Patients with Triple Negative Breast Cancer in Both the Early and Metastatic Setting 2025 (</1718-7729/33/5/243>)

by Christine Simmons, Omar F. Khan, Christine Brezden-Masley, David W. Cescon, Anil Abraham Joy, Nathalie LeVasseur, Katarzyna J. Jerzak, Karen A. Gelmon, Sandeep Sehdev, Stephen Chia, Marc Webster, Scott Edwards, Aalok Kumar, Jeffrey Q. Cao, Jean-François Boileau, Kara Laing, Nathaniel Bouganim, Mita Manna and on behalf of Patient Advocacy, Breast Cancer Canada

Curr. Oncol. **2026**, *33*(5), 243; <https://doi.org/10.3390/curroncol33050243>

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Robert A. Kratzke and Ravi Salgia*Curr. Oncol.* **2026**, 33(5), 241; <https://doi.org/10.3390/curroncol33050241><https://doi.org/10.3390/curroncol33050241> - 22 Apr 2026

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Abstract Immune checkpoint inhibitors (ICIs) have transformed non-small cell lung cancer (NSCLC) treatment; however, durable responses occur in only a subset of patients, underscoring the need for robust predictive biomarkers. Serine/threonine kinase 11 (*STK11*) is an emerging biomarker that portends poor prognosis [...] **Read more.**(This article belongs to the Section **Oncology Biomarkers** (/journal/curroncol/sections/oncology_biomarkers))► **Show Figures**https://pub.mdpi-res.com/curroncol/curroncol-33-00241/article_deploy/html/images/curroncol-33-00241-ag-550.jpg?1778568039 ([https://pub.mdpi-res.com/curroncol/curroncol-33-00241-g001-550.jpg?1778568038](https://pub.mdpi-res.com/curroncol/curroncol-33-00241/article_deploy/html/images/curroncol-33-00241-g001-550.jpg?1778568038))

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Abstract It is well-known that immune checkpoint inhibitors (ICIs) can lead to uncommon but potentially life-threatening immune-related adverse events (irAEs) such as checkpoint-inhibitor pneumonitis (CIP). Early recognition, identification, and treatment are crucial with regard to decreasing toxicity from ICIs. However, there is a discrepancy [...] **Read more.**

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Retrospective Monocentric Analysis of Carmustine Wafer Implantation in Recurrent Glioblastoma: Impact on Survival and Key Prognostic Factors (/1718-7729/33/5/238)

by **Naomi Houedjissin, Franziska Staub-Bartelt, Michael Sabel, Julia Steinmann, Hannah Fischer and Marion Rapp**

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Abstract Objective: The implantation of biodegradable carmustine (BCNU) wafers is a treatment option for recurrent high-grade glioma (HGG), but its efficacy is debated. We evaluated its impact on overall survival (OS) and survival after recurrence (SAR) considering recurrence timing after first-line treatment. Methods: In [...] [Read more.](#)

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Survival Outcomes and Prognostic Factors in Patients with Meningioma: A Single-Center Study at the Indonesian National Cancer Center Dharmas Hospital (2019–2025) (</1718-7729/33/5/237>)

by Rini Andriani, Sylvanie Ratna Permatasari, Ansi Rinjani, Mohammad Firdaus, Arwinder Singh, Oskar Ady Widarta, Rosalina, Achmad Fachri, Farilaila Rayhani, Nikrial Dewin and Aldithya Fakhri
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Abstract Background: Meningioma is the most common primary intracranial tumor in adults, and survival outcomes are influenced by histopathological grade, tumor characteristics, and treatment strategies. This study aimed to evaluate overall survival (OS) and identify prognostic factors in patients with meningioma treated at [...] [Read more.](#)

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Article

Survival Outcomes and Prognostic Factors in Patients with Meningioma: A Single-Center Study at the Indonesian National Cancer Center Dharmais Hospital (2019–2025)

Rini Andriani ^{1,*} , Sylvanie Ratna Permatasari ¹, Ansi Rinjani ¹, Mohammad Firdaus ¹ , Arwinder Singh ¹, Oskar Ady Widarta ¹, Rosalina ¹, Achmad Fachri ¹, Farilaila Rayhani ¹, Nikrial Dewin ¹ and Aldithya Fakhri ² 

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Simple Summary

Meningioma is the most common primary brain tumor in adults. While most cases are slow-growing with favorable outcomes, some show more aggressive behavior and reduced survival. Identifying prognostic factors is important to guide treatment and follow-up, particularly in resource-variable settings such as Indonesia. In this study, we analyzed survival outcomes of adult patients with meningioma treated at the Indonesian National Cancer Center Dharmais Hospital between 2019 and 2025. Most patients had low-grade tumors and favorable survival. However, higher tumor grade and incomplete resection were associated with poorer outcomes. Differences in survival among patients receiving radiotherapy likely reflect more advanced disease at presentation. These findings provide important real-world evidence from Indonesia to support better risk stratification, treatment planning, and follow-up strategies.

Abstract

Background: Meningioma is the most common primary intracranial tumor in adults, and survival outcomes are influenced by histopathological grade, tumor characteristics, and treatment strategies. This study aimed to evaluate overall survival (OS) and identify prognostic factors in patients with meningioma treated at a national referral cancer center in Indonesia. **Methods:** A retrospective cohort study was conducted at Dharmais National Cancer Center Hospital, including adult patients with histopathologically confirmed intracranial meningioma who underwent surgical resection between January 2019 and 17 August 2025. Overall survival was calculated from the date of histopathological diagnosis to death or last follow-up and analyzed using Kaplan–Meier methods and Cox proportional hazards regression. **Results:** A total of 114 patients were included (mean age 48.1 ± 10.5 years; 86.8% female), with most tumors classified as WHO Grade I (64.0%) and located at the skull base (57.0%). Subtotal resection was more common (67.5%), and 71.9% did not receive adjuvant radiotherapy. During follow-up, 14.0% of patients died, with cumulative overall survival rates of 95.6% at 6 months and 86.0% at 96 months. On multivariate analysis, only WHO tumor grade remained an independent prognostic factor (HR 2.199; 95% CI 1.161–4.167; $p = 0.016$), with higher grades associated with worse survival. Extent of resection and adjuvant radiotherapy were not significantly associated with overall survival after adjustment. **Conclusions:** In this Indonesian tertiary referral cohort, WHO



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tumor grade emerged as the only independent predictor of overall survival, underscoring its important prognostic role in meningioma; however, these findings should be interpreted with caution due to incomplete clinical data and relatively short follow-up duration. The high proportion of complex cases, including skull base tumors, reflects referral patterns and may also influence treatment outcomes.

Keywords: meningioma; overall survival; prognostic factors; extent of resection; adjuvant radiotherapy; WHO grade; Indonesia

1. Introduction

Meningioma is the most common primary intracranial tumor in adults, accounting for approximately 39.3% of all central nervous system tumors, with 55.4% classified as benign [1]. These tumors arise from meningotheelial (arachnoid cap) cells and are typically slow-growing, although a subset demonstrates more aggressive biological behavior with significant impact on morbidity and survival [2]. Despite generally favorable outcomes, survival varies widely depending on tumor grade, location, and treatment strategy, highlighting the importance of identifying prognostic factors.

In Indonesia, a lower-middle-income country with a population exceeding 273 million, CNS tumors represent a growing health burden. Primary brain and CNS tumors ranked 15th in incidence, with approximately 5964 new cases and 5298 deaths annually [3]. However, national-level epidemiological and survival data remain limited due to the absence of a comprehensive brain tumor registry. Most available evidence is derived from single-center studies. For example, a study at the National Brain Center Hospital in Jakarta reported 325 meningioma cases between 2020 and 2022, demonstrating an increasing trend in case detection [4].

However, the interpretation of these data must consider the structural limitations of the Indonesian healthcare system. Neurosurgical and neuro-oncological services remain unevenly distributed, with only approximately 371 neurosurgeons nationwide (around 1 per 725,000 population), most of whom are concentrated in major urban centers, particularly on Java [5]. Access to radiotherapy is similarly limited, with facilities available in only a portion of provinces and often associated with long waiting times [6]. In addition, Indonesia's geographic characteristics as an archipelagic country pose significant barriers to healthcare access, as referral centers are primarily located in large cities, making timely diagnosis and treatment difficult for patients from remote areas. Socioeconomic factors, including relatively low per capita income and disparities in health insurance coverage, may further delay healthcare-seeking behavior and adherence to treatment. These limitations may lead to delays in referral and treatment, particularly for patients from rural areas [7]. Therefore, survival data from Dharmas National Cancer Center Hospital are particularly important, as this national referral center receives complex cases referred from various centers across Indonesia, providing an appropriate setting to evaluate their clinical characteristics.

According to the World Health Organization (WHO) classification, meningiomas are divided into Grades I, II, and III [8]. Most tumors are Grade I (80.1%), while Grade II accounts for 18.3% and Grade III for 1.5%, with recurrence rates increasing markedly from 7 to 23% in Grade I to 50–55% in Grade II and 72–78% in Grade III tumors [1,9]. Consequently, WHO grade remains the most important determinant of prognosis and long-term survival [10,11]. However, additional prognostic factors such as a high Ki-67 index, subtotal resection, progesterone receptor negativity, larger tumor size (≥ 3 –5 cm), and non-skull-base tumor location may further worsen outcomes [12–14]. Although molecular

biomarkers and radiomic models are increasingly used, WHO grade, together with clinical and radiological characteristics remains the cornerstone of prognostic factor analysis in patients with meningioma [15–17]. Given the need to evaluate survival and prognostic factors in complex cases, a retrospective cohort study at Dharmais National Cancer Center, as a national referral institution, is warranted. By analyzing meningioma cases diagnosed between 2019 and 2025, this study aims to identify prognostic factors associated with survival outcomes, thereby supporting more precise risk stratification and evidence-based therapeutic decision-making.

2. Materials and Methods

2.1. Study Design

This study employed a quantitative observational analytic design using a retrospective cohort approach. Secondary data were obtained from electronic medical records at Dharmais National Cancer Center. Collected variables included demographic characteristics, baseline clinical features, histopathological and immunohistochemical findings, pre- and postoperative magnetic resonance imaging (MRI) results, and treatment modalities. The study was conducted at Dharmais National Cancer Center following approval from the institutional ethics committee. Patient survival status (alive or deceased) was ascertained, with follow-up extending until 17 August 2025. Eligible cases were identified from patients treated between January 2019 and 17 August 2025.

2.2. Study Population and Sampling

The target population comprised all adult patients diagnosed with intracranial meningioma who received treatment and follow-up at Dharmais National Cancer Center during the study period. Study samples included patients who met the inclusion criteria, were not excluded based on predefined criteria, and had complete medical records. A purposive, institution-based sampling method was applied, and all eligible patients meeting the criteria were included, resulting in total sampling. The inclusion criteria were: (1) adult patients age >18 years; (2) availability of pre- and postoperative MRI; (3) histopathological confirmation of meningioma with or without immunohistochemical examination, including specimens obtained from external institutions that underwent histopathological review (re-expertise) at Dharmais National Cancer Center; and (4) patients undergoing treatment and follow-up at Dharmais National Cancer Center in 2019–2025. The exclusion criteria were incomplete medical records or inability to contact the patient for survival verification.

2.3. Variables and Data Analysis

Primary variables included demographic factors (age, sex), clinical presentation (seizures, headache, consciousness level, cranial nerve deficits, motor weakness, cognitive impairment), tumor characteristics (WHO grade, Ki-67 index, lesion number, tumor location), treatment-related factors (extent of resection, radiotherapy), and survival outcomes. Tumor grading was performed according to the WHO Classification of Central Nervous System Tumors (2016), which categorizes meningiomas into Grades I–III based on histopathological features associated with biological behavior and prognosis. In addition to grading, we also analyzed specific histopathological subtypes, including meningoepithelial, fibrous, transitional, anaplastic variants, etc., to further characterize tumor heterogeneity [8].

Extent of resection was determined using postoperative MRI performed more than two weeks after surgery and categorized as gross total resection or subtotal resection. Gross total resection (GTR) in meningioma refers to complete tumor removal with no visible residual disease, assessed by intraoperative evaluation and confirmed by postoperative contrast-enhanced MRI as the gold standard. In contrast, subtotal resection (STR) indicates

incomplete removal, with residual tumor identified intraoperatively or on postoperative imaging [18]. All imaging findings were independently interpreted by several neuroradiologists as part of the standard diagnostic practice at our institution. However, in this study, the application of Simpson grading was limited due to incomplete postoperative data in many retrospective cases [19].

Adjuvant radiotherapy was categorized as absent (no radiotherapy received), incomplete (initiation without completion of the planned course), or complete (completion of the prescribed regimen). Radiotherapy was delivered according to national guidelines and individualized based on tumor characteristics and clinical condition. The primary technique used was three-dimensional conformal radiotherapy (3D-CRT). In general, treatment doses ranged from 45 to 60 Gy for lower-grade tumors and up to approximately 59.4–60 Gy for higher-grade tumors, delivered in standard fractionation [20].

Survival time was defined as the interval from the date of histopathological diagnosis to death or end of follow-up, measured in months. Data were tabulated and analyzed using SPSS (version 29.0), STATA (version 17), and EpiData (version 4.7) software. Descriptive statistics were presented as frequencies, percentages, or summary measures as appropriate. Survival outcomes were analyzed using survival analysis techniques, with multivariable analysis performed using Cox proportional hazards regression.

Given the relatively small number of events, this study may be underpowered for multivariable analysis, and the results should be interpreted with caution due to the potential risk of overfitting. Missing data were handled using a complete-case approach, with analyses restricted to patients with available data for each variable, and no imputation was performed.

2.4. Ethical Considerations

This study was conducted after obtaining approval from the Ethics Committee of Dharmais National Cancer Center. Patient confidentiality was strictly maintained, and all data were anonymized prior to analysis. The datasets generated and/or analyzed during the current study are available from the corresponding author upon reasonable request and with appropriate institutional approval.

3. Results

3.1. Population Characteristics

A total of 114 patients were included, with a mean age of 48.11 ± 10.48 years; most were female (86.8%) (Table 1). The majority were married (86.0%) and had completed senior high school (54.8%), while 68.4% were unemployed. The most common clinical manifestation was headache (62.3%), followed by cranial nerve palsy (35.1%), seizures (28.1%), and motor dysfunction (25.4%); decreased consciousness was rare (1.8%). Most tumors were WHO Grade I (64.0%), followed by Grade II (30.7%) and Grade III (5.3%). Ki-67 was not examined in 80.9% of cases. The majority of patients had solitary lesions (87.7%) and skull base location (57.0%). Subtotal resection was performed in 67.5% of cases, and 71.9% did not receive adjuvant radiotherapy.

Table 1. Population Characteristics (n = 114).

Age, mean + SD	47.84 ± 10.12 years
Gender	Male 15 (13.2%), Female 99 (86.8%)
Marital status	Married 98 (86.0%), Unmarried 10 (8.8%), Divorced 2 (1.8%), Widowed 4 (3.5%)
Education	No formal education 7 (6.1%), Elementary school 17 (14.8%), Junior high school 10 (9.6%), Senior high school 63 (54.8%), Diploma 4 (3.5%), Bachelor's degree 11 (9.6%), Postgraduate (>S1) 2 (1.7%)
Occupation	Civil servant/Military/Police 5 (4.4%), Private employee 26 (22.8%), Laborer 5 (4.4%), Farmer/Entrepreneur 5 (4.4%), Unemployed 78 (68.4%)
Clinical manifestation	
Headache	71 (62.3%)
Cranial nerve palsy	40 (35.1%)
Seizure	32 (28.1%)
Motor dysfunction	29 (25.4%)
Decreased consciousness	2 (1.8%)
WHO grading	
Grade I	73 (64.0%)
Grade II	35 (30.7%)
Grade III	6 (5.3%)
Histology types	
Meningothelial meningioma	55 (48.2%)
Atypical meningioma	30 (26.3%)
Transitional meningioma	10 (8.8%)
Anaplastic meningioma	6 (5.3%)
Fibrous meningioma	4 (3.5%)
Choroid meningioma	3 (2.6%)
Clear cell meningioma	2 (1.8%)
Angiomatous meningioma	2 (1.8%)
Psammomatous meningioma	2 (1.8%)
Ki-67	
Not examined	92 (80.7%),
≤4%	7 (6.1%)
>4%	15 (13.2%)
Number of lesions	
Multiple	14 (12.3%)
Solitary	100 (87.7%)
Lesion location	
Non-skull base	44 (38.6%)
Skull base	65 (57.0%)
Mixed	5 (4.4%)

Table 1. *Cont.*

Extent of Resection	
Gross total resection	37 (32.5%)
Subtotal resection	77 (67.5%)
Adjuvant radiotherapy	
Absent	82 (71.9%)
Incomplete	2 (1.8%)
Complete	30 (26.3%)

3.2. Overall Survival and Follow-Up

During a mean survival period of 106.65 ± 5.55 months, 16 of 114 patients (14.0%) died. Overall survival was defined as the interval from histopathologically confirmed diagnosis to death from any cause or last follow-up. The cumulative overall survival rates were 95.6% at 6 months, 94.7% at 12 months, 93.9% at 24 months, 89.5% at 48 months, and 86.0% at 96 months. Because more than half of the cohort remained alive at the end of follow-up, the median overall survival was not reached (Figure 1).

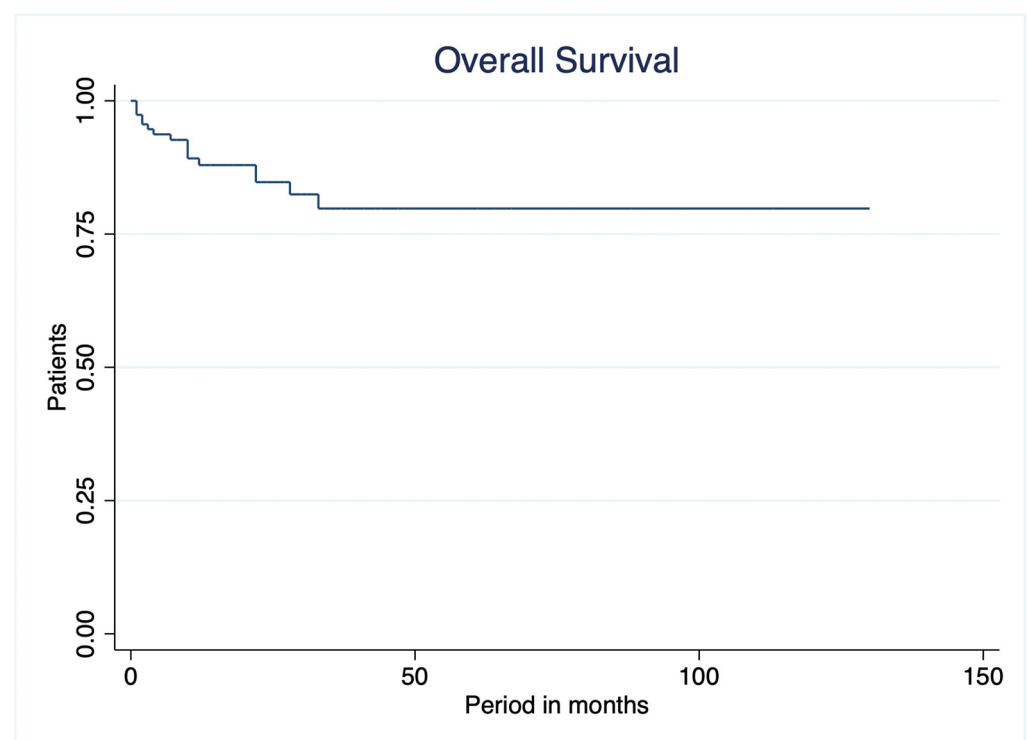


Figure 1. Kaplan–Meier overall survival curves for the entire cohort of meningioma patients. The curves show the percentage alive versus time after diagnosis of tumors based on histopathology in months.

3.3. Prognostic Factors Analysis

On univariate Cox proportional hazards analysis, age (HR = 0.961; 95% CI 0.927–0.995; $p = 0.026$) and WHO grading (HR = 2.233; 95% CI 1.158–4.306; $p = 0.016$) were significantly associated with overall survival. Adjuvant radiotherapy showed a trend toward significance (HR = 1.162; 95% CI 0.418–3.236; $p = 0.083$). Other variables, including gender, marital status, education, occupation, seizure, headache, decreased consciousness, cranial nerve palsy, motor dysfunction, histology type, Ki-67 index, number of lesions, lesion location,

and extent of resection, were not significantly associated with survival. Variables with $p < 0.05$ in univariate analysis and those considered clinically relevant were subsequently included in the multivariate Cox proportional hazards model. In the multivariate analysis, only WHO grading remained an independent prognostic factor (HR = 2.199; 95% CI 1.161–4.167; $p = 0.016$). Age (HR = 0.974; 95% CI 0.934–1.016; $p = 0.227$), extent of resection (HR = 3.145; 95% CI 0.714–13.853; $p = 0.791$), and adjuvant radiotherapy (HR = 1.149; 95% CI 0.412–3.207; $p = 0.130$) were not independently associated with overall survival after adjustment (Table 2).

Table 2. Hazard ratios for prognostic factors in survival.

Variables	Univariate Analysis		Multivariate Analysis	
	HR (95% CI)	<i>p</i> -Value *	HR (95% CI)	<i>p</i> -Value **
Age	0.961 (0.927–0.995)	0.026	2.199 (1.161–4.167)	0.016
Gender	2.231 (0.294–16.913)	0.437		
Marital status	0.481 (0.091–2.548)	0.390		
Education	0.962 (0.671–1.381)	0.835		
Occupation	0.894 (0.568–1.727)	0.656		
Seizure	1.514 (0.546–1.464)	0.432		
Headache	0.816 (0.292–2.276)	0.697		
Decreased consciousness	2.311 (0.296–18.017)	0.424		
Cranial nerve palsy	1.432 (0.503–4.074)	0.501		
Motor dysfunction	1.758 (0.624–4.949)	0.286		
WHO grading	2.233 (1.158–4.306)	0.016		
Histology types	0.853 (0.697–1.293)	0.853		
Ki-67	1.105 (0.569–2.145)	0.768		
Number of lesions	1.988 (0.261–5.147)	0.326		
Lesion location	0.883 (0.348–2.243)	0.794		
Extent of resection	3.050 (0.692–13.440)	0.141	1.149 (0.412–3.207)	0.130
Adjuvant radiotherapy	1.162 (0.418–3.236)	0.083		

HR hazard ratio, CI confidence interval, * analysis using univariate Cox regression, ** analysis using multivariate Cox regression.

Overall survival differed significantly across WHO tumor grades (log-rank $\chi^2 = 6.368$, $df = 2$, $p = 0.041$) (Figure 2). Patients with WHO grade I tumors demonstrated the most favorable outcomes, with a mean overall survival of 112.39 ± 7.19 months. In contrast, patients with WHO grade II and grade III tumors had progressively worse survival, with mean overall survival of 52.61 ± 4.50 months and 40.83 ± 10.78 months, respectively. These findings indicate a clear stepwise decline in survival with increasing WHO tumor grade, supporting its role as a significant prognostic factor.

When patients were stratified according to adjuvant radiotherapy status, no significant difference in overall survival was observed between the groups (log-rank $\chi^2 = 0.153$, $df = 1$, $p = 0.696$) (Figure 3). Two patients who did not complete adjuvant radiotherapy were excluded from the analysis due to potential confounding effects. Patients who did not receive adjuvant radiotherapy demonstrated a longer mean overall survival (108.28 ± 6.23 months) compared to those who completed radiotherapy (54.20 ± 5.13 months); however, this difference was not statistically significant.

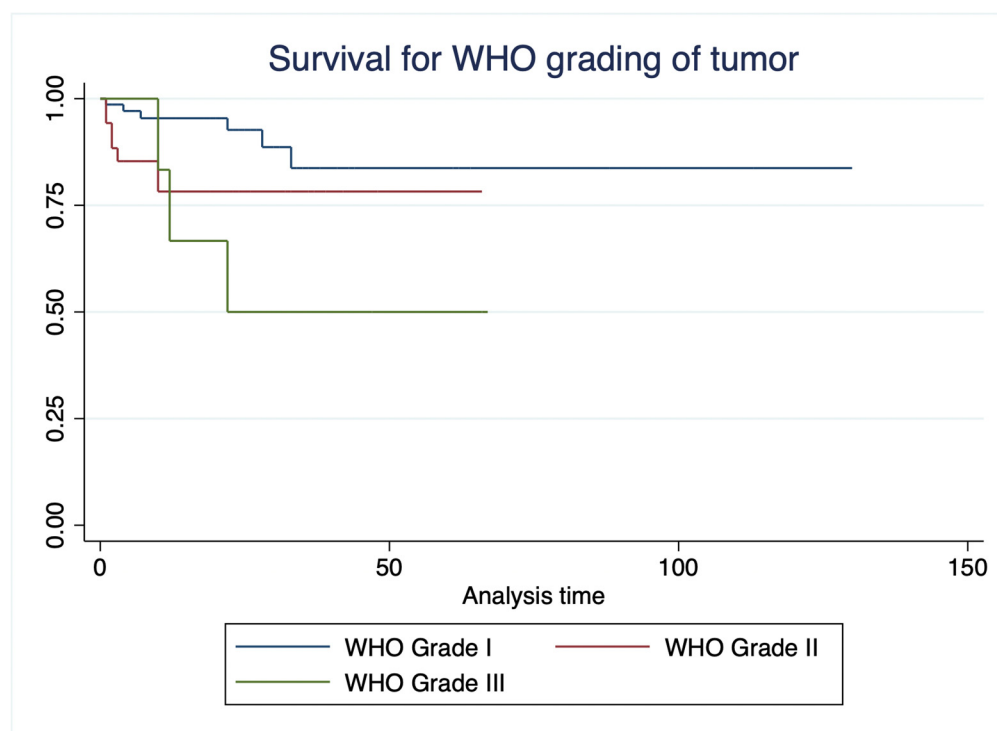


Figure 2. Kaplan–Meier survival curves for WHO grading of tumor.

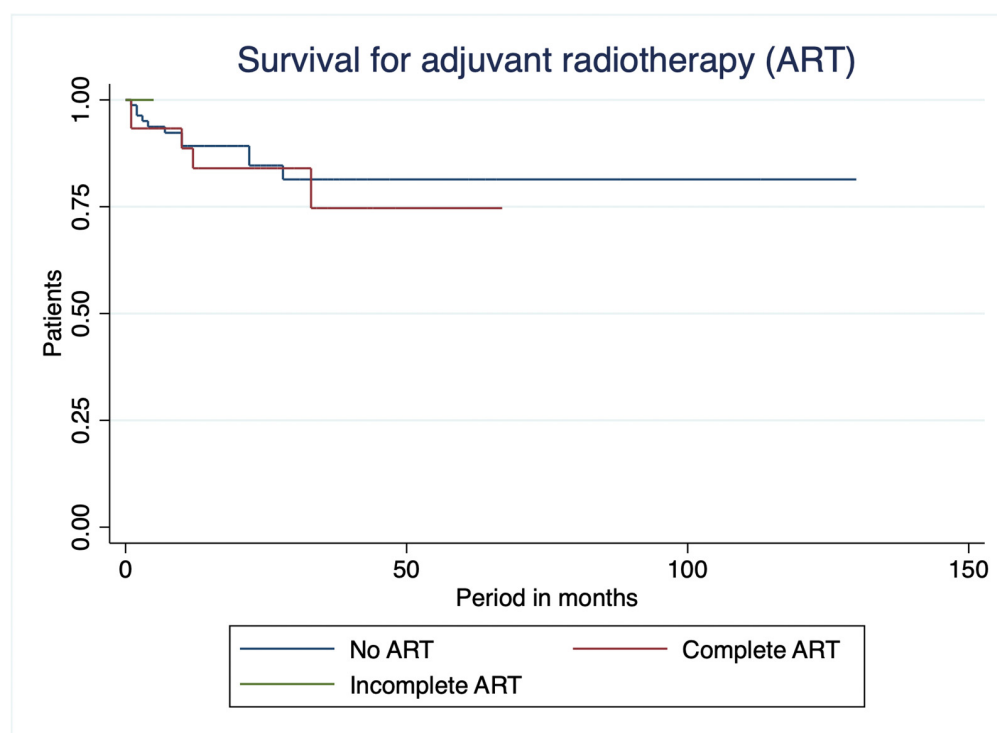


Figure 3. Kaplan–Meier survival curves for adjuvant radiotherapy (ART).

Similarly, overall survival did not differ significantly according to the extent of tumor resection (log-rank $\chi^2 = 2.433$, $df = 1$, $p = 0.119$) (Figure 4). Patients who underwent gross total resection (GTR) had a mean overall survival of 106.94 ± 4.16 months, whereas those who underwent subtotal resection (STR) had a mean overall survival of 100.75 ± 7.06 months. Although survival appeared longer in the GTR group, the difference did not reach statistical significance.



Figure 4. Kaplan–Meier survival curves for extent of resection. GTR: gross total resection, STR: subtotal resection.

3.4. Subgroup Analysis According to WHO Grading

Subgroup analyses were exploratory in nature and should be interpreted as hypothesis-generating rather than confirmatory. Subgroup analysis according to WHO tumor grading demonstrated variable effects of adjuvant radiotherapy on overall survival. In patients with WHO grade I tumors, those who did not receive adjuvant radiotherapy had significantly longer mean overall survival compared to those who completed radiotherapy (114.19 ± 7.90 vs. 39.92 ± 2.73 months; $p = 0.049$). A similar pattern was observed in WHO grade II tumors, where patients without radiotherapy exhibited better survival than those receiving radiotherapy (52.30 ± 5.42 vs. 37.97 ± 6.32 months; $p = 0.005$). In contrast, no significant difference was observed in WHO grade III tumors (41.00 ± 12.67 vs. 39.50 ± 19.44 months; $p = 0.377$). In the overall cohort, patients who did not receive adjuvant radiotherapy had significantly longer mean survival compared to those who completed radiotherapy (109.28 ± 6.23 vs. 54.20 ± 5.13 months; $p < 0.001$) (Table 3).

Subgroup analysis based on the extent of tumor resection across WHO grades did not demonstrate statistically significant differences in overall survival. In WHO grade I tumors, patients who underwent subtotal resection (STR) showed a longer mean overall survival compared to those who underwent gross total resection (GTR) (106.76 ± 8.76 vs. 73.15 ± 34.83 months; $p = 0.391$), although this difference was not statistically significant. Similarly, in WHO grade II tumors, mean survival was comparable between the GTR and STR groups (18.75 ± 11.65 vs. 20.00 ± 18.33 months; $p = 0.106$). In WHO grade III tumors, analysis was limited due to the small sample size, and no meaningful comparison could be performed. In the overall cohort, there was no significant difference in survival between patients undergoing GTR and STR (92.73 ± 11.18 vs. 101.63 ± 7.09 months; $p = 0.372$) (Table 4).

Table 3. Subgroup analysis of adjuvant radiotherapy according to WHO grading.

	Adjuvant Radiotherapy	Total Subject	Mean Survival (Months)	<i>p</i> -Value for Adjuvant Radiotherapy Impact (Log-Rank)
WHO grade I	Absent	55	114.19 ± 7.90	0.049
	Complete	17	39.92 ± 2.73	
	Overall	72	112.34 ± 7.19	
WHO grade II	Absent	22	52.30 ± 5.42	0.005
	Complete	11	37.97 ± 6.32	
	Overall	34	52.51 ± 4.52	
WHO grade III	Absent	4	41.00 ± 12.67	0.377
	Complete	2	39.50 ± 19.44	
	Overall	6	40.83 ± 10.78	
The entire cohort	Absent	82	109.28 ± 6.23	<0.001
	Complete	30	54.20 ± 5.13	
	Overall	112	106.56 ± 5.56	

Table 4. Subgroup analysis of the extent of resection according to WHO grading.

	Extent of Resection	Total Subject	Mean Survival (Months)	<i>p</i> -Value for Adjuvant Radiotherapy Impact (Log-Rank)
WHO grade I	GTR	22	73.15 ± 34.83	0.391
	STR	50	106.76 ± 8.76	
	Overall	73	102.11 ± 8.48	
WHO grade II	GTR	13	18.75 ± 11.65	0.106
	STR	22	20.00 ± 18.33	
	Overall	35	19.56 ± 16.21	
WHO grade III	GTR	1	N/A	N/A
	STR	5	35.4 ± 28.6	
	Overall	6	35.4 ± 28.6	
The entire cohort	Absent	37	92.73 ± 11.18	0.372
	Complete	77	101.63 ± 7.09	
	Overall	114	103.46 ± 6.13	

N/A not applicable; GTR gross total resection; STR subtotal resection.

4. Discussion

In this study, the overall survival (OS) of meningioma patients treated at the Indonesian National Cancer Center Dharmais Hospital demonstrated generally favorable outcomes. The median OS was not reached, reflecting that the majority of patients remained alive throughout the follow-up period. The relatively high survival rates observed in this cohort may be explained by the predominance of low-grade tumors and the relatively young mean age of patients, although long-term outcomes may differ due to variations in access to adjuvant therapy and follow-up systems. Early mortality was low, and survival declined progressively over time, particularly among higher-grade tumors. The proportion of skull base meningiomas in our cohort appears higher than commonly reported, where convexity locations are typically more frequent [21]. This likely reflects referral bias, as our institution is a national cancer referral center that receives a higher proportion of complex cases, including skull base tumors, from secondary and regional hospitals. Minor revisions in the reported percentages following methodological adjustments did not alter the overall interpretation of these findings.

These findings are different from other relevant data in Indonesia. In Makassar, South Sulawesi, a study involving 65 patients over six years found a predominance of

older (>47.5 years) female patients (78.5%), with the temporal region as the most common tumor location (30.8%) and headache as the leading symptom (31.1%). Notably, atypical meningioma was the most frequent subtype (29.2%), a higher proportion than typically reported [22]. In Bandung, West Java, 277 cases were reported between 2010 and 2013 (≈ 69 cases/year), with a subsequent 10-year study identifying 936 patients, reflecting a substantial and increasing burden. Most patients were female (88.0%) with a mean age of 44.16 ± 9.29 years, commonly presenting with visual disturbance (26.9%), headache (24.0%), and proptosis (23.5%). Sphenoorbital (23%) and convexity (21.7%) were the most frequent tumor locations [23]. In Jakarta, a study at the National Brain Center Hospital analyzing 325 patients (2020–2022) demonstrated a rising incidence trend, with a strong female predominance (4:1). Most tumors were WHO grade I, while higher-grade tumors occurred in slightly older patients. The most common locations were convexity (26.8%), falx (34%), and parasellar region (11.7%). Despite these inconsistencies, survival-specific data from Indonesian studies remain limited. The lack of comprehensive survival data, variability in histopathological reporting, and differences in treatment accessibility highlight important gaps in the current literature [4].

This study identified WHO tumor grading as the only independent prognostic factor for overall survival in multivariate analysis (HR 2.199; $p = 0.016$). A clear stepwise decline in survival was observed with increasing tumor grade, with mean OS decreasing from 112.39 months in grade I tumors to 40.83 months in grade III tumors. This finding is consistent with the current understanding that histopathological grade reflects tumor aggressiveness, proliferative activity, and recurrence potential. Durand et al. (2009) demonstrated that 5- and 10-year overall survival rates were 78.4% and 53.3% for Grade II tumors, compared with only 44.0% and 14.2% for Grade III tumors [24]. Progression-free survival was even more strikingly reduced in Grade III disease, with a 5-year PFS of 8.4% and no patients progression-free at 10 years. Multivariate analysis confirmed histological grade as one of the independent predictors of survival. Higher-grade meningiomas are characterized by increased mitotic activity, brain invasion, necrosis, and chromosomal instability, reflecting a more aggressive biological phenotype. In the updated WHO 2021 classification, additional molecular alterations such as TERT promoter mutations and CDKN2A/B homozygous deletions further define tumors with high-risk behavior and poor prognosis. These adverse histopathologic and molecular features likely underlie the markedly worse survival and steep early mortality observed in our WHO Grade II and especially Grade III subgroups [25].

Interestingly, extent of resection and adjuvant radiotherapy were not significantly associated with survival. Although gross total resection (GTR) is traditionally considered a key prognostic factor, the lack of significance in this study may be explained by several factors, including the predominance of skull base tumors (57%), which are technically challenging and often limit complete resection. The absence of a survival benefit from adjuvant radiotherapy is also notable. Patients who received radiotherapy tended to have worse survival, although this was not statistically significant. This likely reflects selection bias, where patients with more aggressive or higher-grade tumors were more likely to receive radiotherapy. Subgroup analysis further supports this interpretation, as radiotherapy appeared associated with poorer survival in grade I and II tumors, which contradicts biological plausibility and suggests confounding by indication [26].

According to the Indonesian National Guideline for Brain Tumors, maximal safe surgical resection remains the mainstay of treatment for meningioma, with the primary goal of achieving gross total resection (GTR) without compromising neurological function (Level I, Recommendation B). When complete resection is not feasible, a strategy combining subtotal resection (STR) with adjuvant therapy is recommended to optimize progression-

free survival while minimizing postoperative morbidity. Preoperative embolization may be considered in selected cases to reduce tumor vascularity, induce tumor necrosis, and facilitate safer resection (Level II, Recommendation B), although its use depends on institutional capability. Furthermore, for skull base meningiomas (such as sphenoorbital lesions), the guideline recommends bone reconstruction to prevent temporal muscle atrophy and poor cosmetic outcomes (Level III, Recommendation C), highlighting the importance of multidisciplinary surgical planning. In the present study, STR was more frequently performed (67.5%), likely due to the high proportion of skull base tumors (57%), which are often associated with complex anatomy and limited surgical accessibility [20]. The survival benefit of gross total resection (GTR) is biologically plausible, as complete cytoreduction reduces tumor burden, eliminates proliferative clones, and delays recurrence. In contrast, subtotal resection (STR) leaves residual disease that may progress more rapidly, particularly in higher-grade or biologically aggressive tumors. Similarly, Przybylowski et al. (2022) showed that residual tumor volume is an independent predictor of progression, with volumes $>3\text{ cm}^3$ significantly associated with poorer progression-free survival, even in WHO grade I skull base meningiomas [27].

Adjuvant radiotherapy constitutes an important component of meningioma management in the guideline, particularly for residual, recurrent, or high-grade tumors. According to the Indonesian National Guideline for Brain Tumors, WHO grade I–II meningiomas may be treated with conformal fractionated radiotherapy, stereotactic radiotherapy (SRT), or stereotactic radiosurgery (SRS), either directed at residual gross tumor or the tumor bed with a margin of 1–2 cm. In contrast, WHO grade III meningiomas are treated more aggressively, similar to malignant tumors, with radiation targeting the tumor bed and surrounding tissue using wider margins of 2–3 cm (Level I, Recommendation A). Radiotherapy may also be indicated in inoperable cases or as adjuvant therapy following surgery to reduce recurrence risk. However, in this cohort, the majority of patients did not receive adjuvant radiotherapy (71.9%), and no significant survival benefit was observed [20]. Regarding radiotherapy, management in Indonesia generally follows national guidelines, with dosing and fractionation adjusted based on tumor grade and patient condition. For lower-grade tumors, radiotherapy is typically delivered at 45–60 Gy in standard fractions, while higher-grade tumors receive approximately 59.4–60 Gy, with modifications for large tumor volume or clinical status. Hypofractionated regimens may be considered in elderly patients or those with poor performance status (Level IB, Recommendation A) [20]. Fischer et al. (2022) reported that adjuvant radiotherapy is consistently recommended for WHO Grade III and incompletely resected Grade II meningiomas, while its use in Grade I and selected Grade II cases remains variable and institution-dependent, reflecting ongoing uncertainty in standardizing its indications [28]. Such discrepancies likely reflect resource limitations, case complexity, and healthcare accessibility challenges in Indonesia. Importantly, the present study demonstrates that WHO tumor grading remains the most significant prognostic factor for survival, reinforcing the guideline's emphasis on histopathological classification while highlighting the need for improved implementation of multidisciplinary, guideline-based care [4].

Meningioma management in Indonesia faces several important limitations, as reflected in this study. The high rate of subtotal resection highlights challenges in achieving optimal surgical outcomes, particularly for skull base tumors, likely due to limited access to advanced neurosurgical techniques, intraoperative navigation, and neurophysiological monitoring. The low utilization of adjuvant radiotherapy (26.3%) further suggests barriers such as limited facility availability, long waiting times, financial constraints, and issues with patient adherence, all of which may affect treatment continuity. In addition, the absence of Ki-67 data in most cases (80.7%) indicates gaps in pathological assessment, potentially

limiting prognostic stratification [29]. As a single-center retrospective study, these findings may not fully represent national conditions, given regional disparities in healthcare access. To address these challenges, priorities should include establishing a multicenter national registry, improving access to advanced surgical and radiotherapy services, and strengthening referral systems to ensure timely and guideline-based care.

Several limitations of this study should be acknowledged. The mean follow-up duration was relatively short for a typically slow-growing tumor such as meningioma, potentially underestimating long-term mortality and recurrence patterns. Progression- or recurrence-free survival data could not be reliably assessed due to limited long-term follow-up at our center. Many patients, particularly those referred from outside Java, face geographic and logistical barriers to continued follow-up at our tertiary hospital. Additionally, within the Indonesian national referral system, patients are often referred back to secondary or regional hospitals after completing treatment, resulting in incomplete longitudinal data on disease progression or recurrence in our records [30]. Sociodemographic factors may also contribute to this limitation, as a substantial proportion of patients were unemployed (68.4%) and had lower educational attainment (Diploma 3.5%, Bachelor's degree 9.6%, postgraduate 1.7%), which may affect adherence to long-term follow-up.

The incompleteness of certain data, including Simpson resection grade, is largely attributable to the transition toward electronic medical records (EMR) in our center and many hospitals in Indonesia. Comprehensive electronic medical records were only reliably implemented at our center around 2018–2019, resulting in incomplete data for earlier periods; therefore, the study period was limited to 2019–2025. Consequently, some historical clinical and surgical details were not consistently documented. In addition, the classification of subtotal resection encompasses a wide spectrum (1–99%), potentially introducing heterogeneity in outcome interpretation; however, further stratification was not feasible due to limited operative detail in some cases.

The retrospective single-center design introduces inherent risks of selection bias and limits generalizability to broader populations. The relatively small number of death events ($n = 16$) may reduce the statistical power of multivariate analysis and contribute to wide confidence intervals. Potential treatment-selection bias may have influenced the observed association between adjuvant radiotherapy and survival, as patients receiving radiotherapy likely represented higher-risk disease at baseline. Future long-term, multicenter studies incorporating molecular profiling are warranted to validate and expand these findings, particularly within Indonesian or Southeast Asian populations. This study reflects a real-world, single-center Indonesian cohort and may not fully represent the national population; multicenter studies are needed for broader validation.

5. Conclusions

In conclusion, this study demonstrates that WHO tumor grade is the only independent prognostic factor for overall survival in meningioma patients treated at our tertiary referral center. The predominance of complex cases, particularly skull base tumors, reflects referral patterns within the Indonesian healthcare system and may influence treatment strategies and outcomes. Although extent of resection and adjuvant radiotherapy were not independently associated with survival, their roles should be interpreted within the context of case complexity and clinical selection. Although gross total resection (GTR) is a known prognostic factor, its lack of significance in this study may reflect the high proportion of technically challenging skull base tumors. Similarly, the absence of a survival benefit from adjuvant radiotherapy likely reflects selection bias, as it was more often given to patients with more aggressive disease. Subgroup findings further suggest confounding by indication. According to the Indonesian National Guideline, maximal safe resection

remains the mainstay of treatment, with adjuvant radiotherapy recommended for residual, recurrent, or high-grade tumors. Future studies with larger, multicenter cohorts, longer follow-up duration, and prospective design are needed to better evaluate long-term outcomes and minimize bias, as well as to support the development of more standardized national treatment and follow-up protocols.

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Institutional Review Board Statement: The study was conducted in accordance with the Declaration of Helsinki and approved by the Ethics Committee of Dharmais National Cancer Center Hospital, Jakarta, Indonesia (protocol code: DP.04.03/11.10/193/2025, approved on 2 October 2025).

Informed Consent Statement: Patient consent was waived due to the retrospective nature of the study using anonymized medical record data, with no direct patient contact and no identifiable personal information disclosed.

Data Availability Statement: The datasets generated and/or analyzed during the current study are not publicly available due to institutional data protection policies and patient confidentiality regulations but are available from the corresponding author upon reasonable request and with permission from Dharmais National Cancer Center.

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Conflicts of Interest: The authors declare no conflicts of interest related to this study.

Abbreviations

The following abbreviations are used in this manuscript:

GTR	Gross total resection
STR	Subtotal resection
ART	Adjuvant radiotherapy
WHO	World Health Organization

References

1. Ostrom, Q.T.; Cioffi, G.; Gittleman, H.; Patil, N.; Waite, K.; Kruchko, C.; Barnholtz-Sloan, J.S. CBTRUS Statistical Report: Primary Brain and Other Central Nervous System Tumors Diagnosed in the United States in 2012–2016. *Neuro-Oncology* **2019**, *21*, v1–v100. [\[CrossRef\]](#)
2. Maggio, I.; Franceschi, E.; Tosoni, A.; Nunno, V.D.; Gatto, L.; Lodi, R.; Brandes, A.A. Meningioma: Not always a benign tumor. A review of advances in the treatment of meningiomas. *CNS Oncol.* **2021**, *10*, CNS72. [\[CrossRef\]](#)

3. Ministry of Health Republic of Indonesia. *Basic Health Research (Riskesdas) 2020*; National Institute of Health Research and Development: Jakarta Pusat, Indonesia, 2020.
4. Felistia, Y.; Amanda, N.F.; Hendrawan, F.; Susanto, N.H.; Fauzi, A.A.; Miftahussurur, M. Incidence and clinicopathological features of meningioma at the National Brain Center Hospital in Indonesia. *Surg. Neurol. Int.* **2025**, *16*, 463. [CrossRef] [PubMed]
5. Faried, A.; Prasetyo, E.; Kamil, M.; Pratama, D.M.A.; Sumargo, S. Basic and clinical research publications of Indonesian neurosurgeons: Where are we? *Surg. Neurol. Int.* **2022**, *13*, 223. [CrossRef]
6. Octavianus, S.; Gondhowiardjo, S. Radiation Therapy in Indonesia: Estimating Demand as Part of a National Cancer Control Strategy. *Appl. Radiat. Oncol.* **2022**, *11*, 35–42. [CrossRef]
7. Hilmi, I.L.; Alfian, S.D.; Abdulah, R.; Puspitasari, I.M. Factors Associated with Health-Seeking Behavior in Indonesia: Evidence from the Indonesian Family Life Survey 2014. *Medicina* **2024**, *60*, 1607. [CrossRef] [PubMed]
8. Louis, D.N.; Perry, A.; Reifenberger, G.; Von Deimling, A.; Figarella-Branger, D.; Cavenee, W.K.; Ohgaki, H.; Wiestler, O.D.; Kleihues, P.; Ellison, D.W. The 2016 World Health Organization Classification of Tumors of the Central Nervous System: A summary. *Acta Neuropathol.* **2016**, *131*, 803–820. [CrossRef] [PubMed]
9. Zhao, L.; Zhao, W.; Hou, Y.; Wen, C.; Wang, J.; Wu, P.; Guo, Z. An Overview of Managements in Meningiomas. *Front. Oncol.* **2020**, *10*, 1523. [CrossRef]
10. Varshney, A.; Jaiswal, S.; Bajaj, A.; Yadav, A.; Srivastava, C.; Chandra, A.; Ojha, B.K.; Bhalla, S.; Jaiswal, P.; Singh, B.P.; et al. Management of intracranial meningioma: Outcome analysis and clinico radiological profile of 172 patients. *Surg. Neurol. Int.* **2024**, *15*, 464. [CrossRef]
11. Shiroishi, M.S.; Cen, S.Y.; Tamrazi, B.; D'Amore, F.; Lerner, A.; King, K.S.; Kim, P.E.; Law, M.; Hwang, D.H.; Boyko, O.B.; et al. Predicting Meningioma Consistency on Preoperative Neuroimaging Studies. *Neurosurg. Clin. N. Am.* **2016**, *27*, 145–154. [CrossRef]
12. Fathi, A.-R.; Roelcke, U. Meningioma. *Curr. Neurol. Neurosci. Rep.* **2013**, *13*, 337. [CrossRef] [PubMed]
13. Nakasu, S.; Nakasu, Y. Natural History of Meningiomas: Review with Meta-analyses. *Neurol. Med.-Chir.* **2020**, *60*, 109–120. [CrossRef] [PubMed]
14. Bender, L.; Somme, F.; Lhermitte, B.; Ahle, G.; Boone, M.; Blonski, M.; Pouget, C.; Truc, G.; Cebula, H.; Noël, G. High risk of recurrence for grade II meningioma: A 10-year multicenter analysis of prognosis factors. *Chin. Clin. Oncol.* **2021**, *10*, 26. [CrossRef]
15. Dwianingsih, E.; Krisnugraha, Y.; Bawono, R.; Malueka, R. Molecular biomarkers in meningioma (Review). *Biomed. Rep.* **2025**, *22*, 56. [CrossRef]
16. Zeng, Q.; Tian, Z.; Dong, F.; Shi, F.; Xu, P.; Zhang, J.; Ling, C.; Guo, Z. Multi-parameter MRI radiomic features may contribute to predict progression-free survival in patients with WHO grade II meningiomas. *Front. Oncol.* **2024**, *14*, 1246730. [CrossRef]
17. Radeesri, K.; Lekhavat, V. The Role of Pre-Operative MRI for Prediction of High-Grade Intracranial Meningioma: A Retrospective Study. *Asian Pac. J. Cancer Prev.* **2023**, *24*, 819–825. [CrossRef]
18. Musigmann, M.; Akkurt, B.H.; Krähling, H.; Brokinkel, B.; Spille, D.C.; Stummer, W.; Heindel, W.; Mannil, M. Analysis of the Predictability of Postoperative Meningioma Resection Status Based on Clinical Features. *Cancers* **2024**, *16*, 3751. [CrossRef] [PubMed]
19. Brokinkel, B.; Spille, D.C.; Brokinkel, C.; Hess, K.; Paulus, W.; Bormann, E.; Stummer, W. The Simpson grading: Defining the optimal threshold for gross total resection in meningioma surgery. *Neurosurg. Rev.* **2021**, *44*, 1713–1720. [CrossRef]
20. Kementerian Kesehatan Republik Indonesia. *Keputusan Menteri Kesehatan Republik Indonesia Nomor HK.01.07/MENKES/397/2020 Tentang Pedoman Nasional Pelayanan Kedokteran Tata Laksana Tumor Otak*; Kementerian Kesehatan Republik Indonesia: Jakarta, Indonesia, 2020. Available online: <https://kemkes.go.id/id/pnpk-2020--tata-laksana-tumor-otak> (accessed on 17 April 2026).
21. Wang, J.Z.; Landry, A.P.; Raleigh, D.R.; Sahm, F.; Walsh, K.M.; Goldbrunner, R.; Yefet, L.S.; Tonn, J.C.; Gui, C.; Ostrom, Q.T.; et al. Meningioma: International Consortium on Meningiomas consensus review on scientific advances and treatment paradigms for clinicians, researchers, and patients. *Neuro-Oncology* **2024**, *26*, 1742–1780. [CrossRef]
22. Talawo, V.Y.; Kaelan, C.; Juniarsih, J.; Zainuddin, A.A.; Ihwan, A.; Cangara, M.H.; Miskad, U. Clinical and Histopathological Characteristics of Meningioma in Makassar. *Healthy Tadulako J. (J. Kesehat. Tadulako)* **2023**, *9*, 81–86. [CrossRef]
23. Sidabutar, R.; Gondowardojo, Y. Characteristics of meningioma patients in Hasan Sadikin Hospital from 2012–2021: A 10 years descriptive study. *Indones. J. Neurosurg.* **2022**, *5*, 91–94.
24. Durand, A.; Labrousse, F.; Jouvet, A.; Bauchet, L.; Kalamaridès, M.; Menei, P.; Deruty, R.; Moreau, J.J.; Fèvre-Montange, M.; Guyotat, J. WHO grade II and III meningiomas: A study of prognostic factors. *J. Neuro-Oncol.* **2009**, *95*, 367–375. [CrossRef] [PubMed]
25. Go, K.-O.; Kim, Y.Z. Brain Invasion and Trends in Molecular Research on Meningioma. *Brain Tumor Res. Treat.* **2023**, *11*, 47. [CrossRef] [PubMed]
26. Bakhtiar, Y.; Eka Setiawan, F.; Ilmansyah, R.; Prihastomo, K.T.; Priambada, D.; Rizky Aryani Septarina, F.; Arifin, M.T.; Muttaqin, Z. The survival benefits of adjuvant radiotherapy for malignant meningioma: A retrospective cohort study. *Universa Med.* **2025**, *44*, 318–327. [CrossRef]

27. Przybylowski, C.J.; Hendricks, B.K.; Furey, C.G.; DiDomenico, J.D.; Porter, R.W.; Sanai, N.; Almefty, K.K.; Little, A.S. Residual Tumor Volume and Tumor Progression after Subtotal Resection and Observation of WHO Grade I Skull Base Meningiomas. *J. Neurol. Surg. Part B Skull Base* **2022**, *83*, e530–e536. [[CrossRef](#)]
28. Fischer, G.F.; Brügge, D.; Andratschke, N.; Baumert, B.G.; Bosetti, D.G.; Caparrotti, F.; Herrmann, E.; Papachristofilou, A.; Rogers, S.; Schwyzer, L.; et al. Postoperative radiotherapy for meningiomas—A decision-making analysis. *BMC Cancer* **2022**, *22*, 492. [[CrossRef](#)]
29. Umekawa, M.; Shinya, Y.; Hasegawa, H.; Morshed, R.A.; Katano, A.; Shinozaki-Ushiku, A.; Saito, N. Ki-67 labeling index predicts tumor progression patterns and survival in patients with atypical meningiomas following stereotactic radiosurgery. *J. Neuro-Oncol.* **2024**, *167*, 51–61. [[CrossRef](#)]
30. Handayani, P.W.; Dartanto, T.; Moeis, F.R.; Pinem, A.A.; Azzahro, F.; Hidayanto, A.N.; Denny; Ayuningtyas, D. The regional and referral compliance of online healthcare systems by Indonesia National Health Insurance agency and health-seeking behavior in Indonesia. *Heliyon* **2021**, *7*, e08068. [[CrossRef](#)]

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