EVERETT J. MODING, MD, PhD
CURRICULUM VITAE

Updated 11/21/25

PERSONAL INFORMATION

Current Position	Assistant Professor, Radiation Oncology Stanford University Medical Center, Stanford, CA
Work Address	875 Blake Wilbur Dr. MC 5847 Stanford, CA 94305
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EDUCATION

8/2004-5/2008	Bachelor of Arts, Biochemistry, Summa Cum Laude The Colorado College, Colorado Springs, CO
8/2008-5/2015	Doctor of Medicine, Medical Scientist Training Program Duke University School of Medicine, Durham, NC
10/2010-5/2014	Doctor of Philosophy, Molecular Cancer Biology Duke University School of Medicine, Durham, NC

POSTDOCTORAL AND CLINICAL TRAINING

7/2015-6/2016	Internship, Internal Medicine Moses H. Cone Memorial Hospital, Greensboro, NC
7/2016-6/2020	Residency, Radiation Oncology Stanford University Medical Center, Stanford, CA
7/2018-6/2020	Postdoctoral Scholar, Laboratories of Drs. Maximilian Diehn and Ash Alizadeh Stanford University, Stanford, CA
7/2019-6/2020	Chief Resident, Radiation Oncology Stanford University Medical Center, Stanford, CA

EMPLOYMENT HISTORY

7/2020-10/2020	Clinical Instructor, Radiation Oncology Stanford University Medical Center, Stanford, CA
11/2020-Present	Assistant Professor, Radiation Oncology Stanford University Medical Center, Stanford, CA

LICENSES AND CERTIFICATIONS

7/2016-Present	Physician's License Medical Board of California
9/2021-Present	Board Certified American Board of Radiology

1/2021-Present	Radiology X-ray Supervisor and Operator Certificate California Department of Public Health, Radiologic Health Branch

HONORS AND AWARDS

9/2003	City of Colorado Springs Mayor's 100 Teens
5/2004	Manitou Springs High School Valedictorian
8/2004	Mother Moon Service Scholarship
8/2004-5/2008	Barnes Chemistry Full Tuition Scholarship
5/2005-5/2008	Colorado College Dean's List
5/2005	Alpha Lambda Delta Honor Society
5/2005	First Year Chemistry Award
3/2006-5/2006	Biology in Chinese Culture Program Scholar
5/2006	William C. Champion Prize in Organic Chemistry
5/2007	American Chemistry Society Analytical Chemistry Award
6/2007-8/2007	University of California San Francisco Amgen Scholar
5/2008	Alpha Lambda Delta Book Award
5/2008	Frank Henry John Figge Award
5/2008	Merck Index Award in Biochemistry
5/2008	Phi Beta Kappa Honor Society
8/2008-5/2015	National Institutes of Health Medical Scientist Training Program Fellowship
6/2011	NASA Space Radiation Summer School Scholar
9/2011	Travel Support for NASA Space Radiation Investigators' Workshop
7/2012	Travel Support for NASA Space Radiation Investigators' Workshop
7/2012	NASA Space Radiation Graduate Student Poster Contest 2nd Place
9/2012	Pharmacology and Cancer Biology Retreat Poster Contest Winner
3/2013	Fitzgerald Academic Achievement Award
9/2013	Radiation Research Society Scholars-in-Training Travel Award
9/2014	ASTRO Basic Science Abstract Award
10/2014	Best of ASTRO Meeting Abstract Selection
7/2018-3/2020	B. Leonard Holman Research Pathway
7/2019-6/2020	Stanford Radiation Oncology Kaplan Fellowship
11/2019	Radiation Research Society Scholars-in-Training Travel Award
1/2020	Society for Translational Oncology Fellows' Forum Participant
10/2021	Radiation Research Society Early Career Investigator Travel Award
11/2021	Connective Tissue Oncology Society Young Investigator Award
04/2023	Invited Collaborative Researcher of the GCB at Hokkaido University
06/2023	Stanford Radiation Oncology Sarah S. Donaldson Mentorship Award
08/2023	ICRR Early Career Investigator Travel Award
01/2024	Stand Up To Cancer Maverick Award Finalist
10/2024-05/2025	Stanford OFDD Junior Leadership Bootcamp Participant

PUBLICATIONS

Peer-Reviewed Original Research Articles

1. **Moding EJ**, Hellyer J, Rank K, Lostroh P, Brasuel M. Characterization of PEBBLEs as a Tool for Real-Time Measurement of *Dictyostelium discoideum* Endosomal pH. **Journal of Sensors**, 2009, 235158 (2009).
2. Lee CL*, **Moding EJ***, Huang X, Li Y, Woodlief LZ, Rodrigues RC, Ma Y, Kirsch DG. Generation of primary tumors with Flp recombinase in FRT-flanked p53 mice. **Disease Models & Mechanisms**, 5, 397-402 (2012).
   **These authors contributed equally to this work.*

3. Lee CL, **Moding EJ**, Cuneo KC, Li Y, Sullivan JM, Mao L, Washington I, Jeffords LB, Rodrigues RC, Ma Y, Das S, Kontos CD, Kim Y, Rockman HA, Kirsch DG. p53 Functions in Endothelial Cells to Prevent Radiation-Induced Myocardial Injury in Mice. **Science Signaling**, 5, ra52 (2012).
4. **Moding EJ**, Clark DP, Qi Y, Li Y, Ma Y, Ghaghada K, Johnson GA, Kirsch DG, Badea CT. Dual energy micro-computed tomography imaging of radiation-induced vascular changes in primary mouse sarcomas. **International Journal of Radiation Oncology, Biology, and Physics**, 85, 1353-9 (2013).
5. Subashi E, **Moding EJ**, Cofer GP, MacFall JR, Kirsch DG, Qi Y, Johnson GA. A comparison of radial keyhole strategies for high spatial and temporal resolution 4D contrast-enhanced MRI in small animal tumor models. **Medical Physics**, 40, 22304 (2013).
6. Clark DP, Ghaghada K, **Moding EJ**, Kirsch DG, Badea CT. In vivo characterization of tumor vasculature using iodine and gold nanoparticles and dual energy micro-CT. **Physics in Medicine and Biology**, 58, 1683-1704 (2013).
7. Ashton JR, Clark DP, **Moding EJ**, Ghaghada K, Kirsch DG, West JL, Badea CT. Dual-Energy Micro-CT Functional Imaging of Primary Lung Cancer in Mice Using Gold and Iodine Nanoparticle Contrast Agents: A Validation Study. **PLoS One**, 9, e88129 (2014).
8. **Moding EJ**, Lee CL, Castle KD, Oh P, Mao L, Zha S, Min HD, Ma Y, Das S, Kirsch DG. *Atm* deletion with dual recombinase technology preferentially radiosensitizes tumor endothelium. **The Journal of Clinical Investigation**, 124, 3325-3338 (2014).
9. Schönhuber N, Seidler B, Schuck K, Veltkamp C, Schachtler C, Zukowska M, Eser S, Feyerabend TB, Paul MC, Eser P, Klein S, Lowy AM, Banerjee R, Yang F, Lee CL, **Moding EJ**, Kirsch DG, Scheideler A, Alessi DR, Varela I, Bradley A, Kind A, Schnieke AE, Rodewald HR, Rad R, Schmid RM, Schneider G, Saur D. A next-generation dual-recombinase system for time- and host-specific targeting of pancreatic cancer. **Nature Medicine**, 20, 1340-1347 (2014).
10. Liu Y, Ashton JR, **Moding EJ**, Yuan H, Register JK, Fales AM, Choi J, Whitley MJ, Zhao X, Qi Y, Ma Y, Vaidyanathan G, Zalutsky MR, Kirsch DG, Badea CT, Vo-Dinh T. A Plasmonic Gold Nanostar Theranostic Probe for In Vivo Tumor Imaging and Photothermal Therapy. **Theranostics**, 5, 946-60 (2015).
11. **Moding EJ**, Castle KD, Perez BA, Oh P, Min HD, Norris H, Ma Y, Cardona DM, Lee CL, Kirsch DG. Tumor cells, but not endothelial cells, mediate eradication of primary sarcomas by stereotactic body radiation therapy. **Science Translational Medicine**, 7, 278ra34 (2015).
12. Lee CL, Castle KD, **Moding EJ**, Blum JD, Williams N, Luo L, Ma Y, Borst LB, Kim Y, Kirsch DG. Acute DNA damage activates the tumour suppressor p53 to promote radiation-induced lymphoma. **Nature Communications**, 6, 8477 (2015).
13. **Moding EJ**, Min HD, Castle KD, Ali M, Woodlief L, Williams N, Ma Y, Kim Y, Lee CL, Kirsch DG. An extra copy of p53 suppresses development of spontaneous Kras-driven but not radiation-induced cancer. **JCI Insight**, 1, e86698 (2016).
14. **Moding EJ**, Million L, Avedian R, Ghanouni P, Kunder C, Ganjoo KN. Concurrent imatinib and radiation therapy for unresectable and symptomatic desmoid tumors. **Sarcoma**, 2017, 2316839 (2017).
15. Chin AL*, **Moding EJ***, Donaldson SS, Gibbs IC, Soltys SG, Hiniker SM, Pollom EL. Survival Impact of Postoperative Radiotherapy Timing in Pediatric and Adolescent Medulloblastoma. **Neuro-Oncology**, 20, 1133-1141 (2018).
    **These authors contributed equally to this work.*
16. Castle KD, Daniel AR, **Moding EJ**, Luo L, Lee CL, Kirsch DG. Mice Lacking RIP3 Kinase are not Protected from Acute Radiation Syndrome. **Radiation Research**, 189, 627-633 (2018).

17. Cheung PF, Neff F, Neander C, Bazarna A, Savvatakis K, Liffers ST, Althoff K, Lee CL, **Moding EJ**, Kirsch DG, Saur D, Bazhin AV, Trajkovic-Arsic M, Heikenwälder M, Siveke JT. Notch-induced myeloid reprogramming in spontaneous pancreatic ductal adenocarcinoma by dual genetic targeting. **Cancer Research**, 78, 4997-5010 (2018).

18. Wu Y, Million L, **Moding EJ**, Scott G, Berry M, Ganjoo KN. The Impact of Post-Operative Therapy on Primary Cardiac Sarcoma. **The Journal of Thoracic and Cardiovascular Surgery**, 156, 2194-2203 (2018).

19. **Moding EJ**, Advani R, Rosenberg SA, Hoppe RT. Prognostic Factors and Patterns of Failure in Advanced Stage Hodgkin Lymphoma Treated with Combined Modality Therapy. **Radiotherapy and Oncology**, 129, 507-512 (2018).

20. **Moding EJ**, Liang R, Lartey FM, Maxim PG, Sung A, Diehn M, Loo BW, Gensheimer MF. Predictors of Respiratory Decline Following Stereotactic Ablative Radiotherapy to Multiple Lung Tumors. **Clinical Lung Cancer**, 20, 461-468 (2019).

21. **Moding EJ**, Liu Y, Nabet BY, Chabon JJ, Chaudhuri AA, Hui AB, Bonilla RF, Ko RB, Yoo CH, Gojenola L, Jones CD, He J, Qiao Y, Xu T, Heymach JV, Tsao A, Liao Z, Gomez DR, Das M, Padda SK, Ramchandran KJ, Neal JW, Wakelee HA, Loo BW, Lin SH, Alizadeh AA, Diehn M. Circulating Tumor DNA Dynamics Predict Benefit from Consolidation Immunotherapy in Locally Advanced Non-Small Cell Lung Cancer. **Nature Cancer**, 1, 176-183 (2020).

22. Hellmann MD, Nabet BY, Rizvi H, Chaudhuri AA, Wells DK, Dunphy M, Chabon JJ, Liu CL, Hui AB, Arbour KC, Luo J, Preeshagul I, **Moding EJ**, Almanza D, Bonilla RF, Sauter JL, Choi H, Tenet M, Abu-Akeel M, Plodkowski AJ, Perez-Johnston R, Yoo C, Ko RB, Stehr H, Gojenola L, Wakelee HA, Padda SK, Neal JW, Chaft JE, Kris MG, Rudin CM, Merghoub T, Li BT, Alizadeh AA, Diehn M. Circulating tumor DNA analysis to assess risk of progression after long-term response to PD-(L)1 blockade in NSCLC. **Clinical Cancer Research**, 26, 2849-2858 (2020).

23. Chabon JJ, Hamilton EG, Kurtz DM, Esfahani MS, **Moding EJ**, Stehr H, Martin JS, Nabet BY, Chen B, Chaudhuri AA, Liu CL, Hui AB, Jin MC, Azad TD, Almanza D, Jeon Y, Nesselbush MC, Ting Keh LC, Bonilla RF, Yoo CH, Ko RB, Chen EL, Merriott DJ, Massion PP, Mansfield AS, Jen J, Ren HZ, Lin SH, Costantino C, Burr R, Tibshirani R, Gambhir SS, Berry GJ, Jensen KC, West RB, Neal JW, Wakelee HA, Loo BW, Kunder CA, Leung AN, Lui NS, Berry MF, Shrager JB, Nair VS, Haber DA, Sequist LV, Alizadeh AA, Diehn M. Integrating genomic features for non-invasive early lung cancer detection. **Nature**, 580, 245-251 (2020).

24. Nabet BY, Esfahani MS, **Moding EJ**, Hamilton EG, Chabon JJ, Rizvi H, Steen CB, Chaudhuri AA, Liu CL, Hui AB, Almanza D, Stehr H, Gojenola L, Bonilla RF, Jin MC, Jeon Y-J, Tseng D, Liu C, Merghoub T, Neal JW, Wakelee HA, Padda SK, Ramchandran KJ, Das M, Plodkowski AJ, Yoo C, Chen EL, Ko RB, Newman AM, Hellmann MD, Alizadeh AA, Diehn M. Noninvasive Early Identification of Therapeutic Benefit from Immune Checkpoint Inhibition. **Cell**, 183, 363-376 (2020).

25. Binkley MS, Jeon YJ, Nesselbush M, **Moding EJ**, Nabet BY, Almanza D, Kunder C, Stehr H, Yoo CH, Rhee S, Xiang M, Chabon JJ, Hamilton E, Kurtz DM, Gojenola L, Owen SG, Ko RB, Shin JH, Maxim PG, Lui NS, Backhus LM, Berry MF, Shrager JB, Ramchandran KJ, Padda SK, Das M, Neal JW, Wakelee HA, Alizadeh AA, Loo BW, Diehn M. KEAP1/NFE2L2 mutations predict lung cancer radiation resistance that can be targeted by glutaminase inhibition. **Cancer Discovery**, 10, 1826–1841 (2020).

26. Avanzini S, Kurtz DM, Chabon JJ, **Moding EJ**, Hori SS, Gambhir SS, Alizadeh AA, Diehn M, Reiter JG. A mathematical model of ctDNA shedding predicts tumor detection size. **Science Advances**, 6, eabc4308 (2020).

27. Tätte K, Metspalu E, Post H, Palencia-Madrid L, Luis JR, Reidla M, Rea A, Tamm E, **Moding EJ**, de Pancorbo MM, Garcia-Bertrand R, Metspalu M, Herrera RJ. The Ami and Yami aborigines of

Taiwan and their genetic relationship to East Asian and Pacific populations. **European Journal of Human Genetics**, 29, 1092-1102 (2021).

28. Kurtz DM, Soo J, Co Ting Keh L, Alig S, Chabon JJ, Sworder BJ, Schultz A, Jin MC, Scherer F, Garofalo A, Macaulay CW, Hamilton EG, Chen B, Olsen M, Schroers-Martin JG, Craig AFM, **Moding EJ**, Esfahani MS, Liu CL, Dührsen U, Hüttmann A, Casasnovas RO, Westin JR, Roschewski M, Wilson WH, Gaidano G, Rossi D, Diehn M, Alizadeh AA. Enhanced detection of minimal residual disease by targeted sequencing of phased variants in circulating tumor DNA. **Nature Biotechnology**, 39, 1537-1547 (2021).
29. Esfahani MS, Hamilton EG, Mehrmohamadi M, Nabet BY, Alig SK, King DA, Steen CB, Macaulay CW, Schultz A, Nesselbush MC, Soo J, Schroers-Martin JG, Chen B, Binkley MS, Stehr H, Chabon JJ, Sworder BJ, Hui AB, Frank MJ, **Moding EJ**, Liu CL, Newman AM, Isbell JM, Rudin CM, Li BT, Kurtz DM, Diehn M, Alizadeh AA. Inferring gene expression from cell-free DNA fragmentation profiles. **Nature Biotechnology**, 40, 585-597 (2022).
30. Gutkin PM, von Eyben R, Chin A, Donaldson SS, Oh J, Jiang A, Ganjoo KN, Steffner RJ*, **Moding EJ***, Hiniker SM*. Local Control Outcomes Using Stereotactic Body Radiation Therapy or Surgical Resection for Metastatic Sarcoma. **International Journal of Radiation Oncology, Biology, and Physics**, 114, 771-779 (2022).
**Co-senior authors.*
31. Obeid JP, Hiniker SM, Schroers-Martin J, Guo HH, No HJ, **Moding EJ**, Advani RH, Alizadeh AA, Hoppe RT, Binkley MS. Investigating and modeling positron emission tomography factors associated with large cell transformation from low-grade lymphomas. **eJHaem**, 4, 90-99 (2022).
32. Bui NQ, Nemat-Gorgani N, Subramanian A, Torres IA, Lohman M, Sears TJ, van de Rijn M, Charville GW, Becker H, Wang DS, Hwang GL, Ganjoo KN*, **Moding EJ***. Monitoring sarcoma response to immune checkpoint inhibition and local cryotherapy with circulating tumor DNA analysis. **Clinical Cancer Research**, 29, 2612-2620 (2023).
**Co-senior authors.*
33. Hasapis S, Caraballo I, Sears TJ, Brock KD, Cart JB, **Moding EJ***, Lee CL*. Characterizing the role of Phlda3 in the development of acute toxicity and malignant transformation of hematopoietic cells induced by total-body irradiation in mice. **Scientific Reports**, 13, 12916 (2023).
**Co-senior authors.*
34. Subramanian A, Su S, **Moding EJ**, Binkley MS. Investigating the tissue specificity and prognostic impact of cis-regulatory cancer risk variants. **Human Genetics**, 142, 1395-1405 (2023).
35. No HJ, Guo FB, Park NJ, Kastelowitz N, Rhee JW, Clark DE, Chin AL, Vitzthum LK, Horst KC, **Moding EJ**, Loo BW Jr, Diehn M, Binkley MS. Predicting Adverse Cardiac Events After Radiotherapy for Locally Advanced Non-Small Cell Lung Cancer. **JACC: CardioOncology**, 5, 775-787 (2023).
36. Ewongwo A, Oladipo ED, Hui C, Avedian RS, Steffner RJ, Mohler DG, Kalbasi A, Chin AL, Million L, Hiniker SM, **Moding EJ**. Patterns of local recurrence and risk of skin recurrence in soft tissue sarcomas after surgical resection. **Practical Radiation Oncology**, 14, e62-e67 (2024).
37. Subramanian A, Nemat-Gorgani N, Ellis-Caleo TJ, van IJzendoorn DGP, Sears TJ, Somani A, Luca BA, Zhou MY, Bradic M, Torres IA, Oladipo E, New C, Kenney DE, Avedian RS, Steffner RJ, Binkley MS, Mohler DG, Tap WD, D'Angelo SP, van de Rijn M, Ganjoo KN, Bui NQ, Charville GW, Newman AM, **Moding EJ**. Sarcoma microenvironment cell states and ecosystems are associated with prognosis and predict response to immunotherapy. **Nature Cancer**, 5, 642-658 (2024).
38. Matsui JK, Jackson S, Fang J, Million L, Chin AL, Hiniker SM, Kalbasi A, **Moding EJ**. Effect of palliative radiation dose on symptom response in metastatic sarcomas. **Clinical and Translational Radiation Oncology**, 48, 100803 (2024).

39. Su C, Kent CL, Pierpoint M, Floyd W, Luo L, Wiliams NT, Ma Y, Peng B, Lazarides AL, Subramanian A, Himes JE, Perez VM, Hernansaiz-Ballesteros RD, Roche KE, Modliszewski JL, Selitsky SR, Shinohara ML, Wisdom AJ, **Moding EJ**, Mowery YM, Kirsch DG. Enhancing radiotherapy response via intratumoral injection of a TLR9 agonist in autochthonous murine sarcomas. **JCI Insight**, 9, e178767 (2024).

40. Murciano-Goroff Y, Hui A, Araujo Filho J, Hamilton E, Chabon J, **Moding EJ**, Bonilla R, Lebow E, Gomez D, Rimner A, Ginsberg M, Offin M, Kundra R, Allaj V, Norton L, Reis-Filho J, Razavi P, Drilon A, Jones D, Isbell J, Lai W, Rudin C, Alizadeh A, Li B, Diehn M. Early ctDNA shedding kinetics for prediction of platinum sensitivity in patients with small cell lung cancer. **JCO Precision Oncology**, 8, e2400216 (2024).

41. Finkelstein SR, Patel R, Deland K, Mercer J, Starr B, Zhu D, Min H, Reinsvold M, Campos LDS, Williams N, Luo L, Ma Y, Neff J, Hoenerhoff M, **Moding EJ***, Kirsch DG*. ^{56}Fe-ion Exposure Increases the Incidence of Lung and Brain Tumors at a Similar Rate in Male and Female Mice. **Radiation Research**, 202, 734-744 (2024).
**Co-senior authors*.

42. Mowery YM, Ballman KV, Hong AM, Schuetze SM, Wagner AJ, Monga V, Heise RS, Attia S, Choy E, Burgess MA, Bae S, Pryor DI, Van Tine BA, Tinoco G, Chmielowski B, Freeman C, Gronchi A, Meyer CF, Dickson MA, Hartner L, Davis LE, Powers BC, **Moding EJ**, Weinhold KJ, van de Rijn M, Brigman BE, Riedel RF, Kirsch DG. Pembrolizumab, radiation therapy, and surgery versus radiation therapy and surgery for stage III soft tissue sarcoma of the extremity: a randomised, open-label clinical trial. **Lancet**, 404, 2053-2064 (2024).

43. Blomain ES, Soudi S, Wang Z, Somani A, Subramanian A, Nouth SCL, Oladipo E, New C, Kenney DE, Nemat-Gorgani N, Kindler T, Avedian RS, Steffner RJ, Mohler DG, Hiniker SM, Chin A, Kalbasi A, Binkley MS, Fried M, Gaida MM, van de Rijn M, **Moding EJ**. Evolutionary pressures shape undifferentiated pleomorphic sarcoma development and radiotherapy response. **Cancer Research**, 85, 1162-1174 (2025).

44. Matsui JK, Jackson S, Fang J, Mohler DG, Steffner RJ, Avedian RS, Charville GW, van de Rijn M, Million L, Chin AL, Hiniker SM, Kalbasi A, **Moding EJ**. Association of Histologic Subtype with Radiation Response and Survival Outcomes in Synovial Sarcoma. **Advances in Radiation Oncology**, 10, 101718 (2025).

45. Li LJ, Bui NQ, **Moding EJ***, Steffner RJ, Mohler DG, Ganjoo KN, Pan M. Musculoskeletal Tumor Care Disparities Prior to Initiation of Treatment Among Newly Diagnosed Adult Patients. **Cancers**, 17, 1519 (2025).

46. **Moding EJ***, Shahrokh Esfahani M, Jin C, Hui AB, Nabet BY, Liu Y, Chabon JJ, Binkley MS, Kurtz DM, Hamilton EG, Chaudhuri AA, Liu CL, Li Z, Bonilla RF, Jiang AL, Lau BC, Lopez P, He J, Qiao Y, Xu T, Yao L, Gandhi S, Liao Z, Das M, Ramchandran KJ, Padda SK, Neal JW, Wakelee HA, Gensheimer MF, Loo BW Jr, Li R*, Lin SH*, Alizadeh AA*, Diehn M*. Integrating ctDNA Analysis and Radiomics for Dynamic Risk Assessment in Localized Lung Cancer. **Cancer Discovery**, 15, 1609-1629 (2025).
**Co-corresponding authors.*

47. Testa S, Pal A, Subramanian A, Varma S, Tang JP, Graham D, Arfan S, Pan M, Bui NQ, Ganjoo KN, Dry S, Huang P, van de Rijn M, Jiang W, Kalbasi A*, **Moding EJ***. SCAN-ACT: adoptive T cell therapy target discovery through single-cell transcriptomics. **Genome Medicine**, 17, 89 (2025).
**Co-senior authors*.

48. Subramanian A, Su S, Flerlage J, Alig S, Younes S, Marks LJ, Pinnix C, Vega F, Steiner R, Kumar P, Mocikova H, Sykorova A, Prochazka V, Milito C, Allen P, Paulino D, Ramsay A, Flerlage T, Palese M, West R, Zhu C, Noordenbos T, Schroers-Martin J, Zhao S, Park NJ, Kalbasi A, **Moding EJ**, Newman AM, Advani RH, Hoppe RT, Diehn M, Natkunam Y, Alizadeh AA, Binkley MS. Distinct

cell state ecosystems for nodular lymphocyte-predominant Hodgkin lymphoma. **Nature Communications**, 16, 8473 (2025).

49. Leak L, Wang Z, Joseph AJ, Johnson B, Chan AA, Decosto CM, Magtanong L, Ko PJ, Lee WC, Ritho J, Manukian S, Millner A, Chitkara S, Salinas JJ, Skouta R, Rees MG, Ronan MM, Roth JA, Myers CL, Moffat J, Boone C, Bensinger SJ, Nathanson DA, Atilla-Gokcumen GE, **Moding EJ**, Dixon SJ. Tegavivint triggers TECR-dependent nonapoptotic cancer cell death. **Nature Chemical Biology**, Online ahead of print.
50. Xu Y, Thakkar K, Guan L, Miao Y, Mehibel M, Lee RB, Marciano D, Viswanathan V, Wang Z, Wang J, Ji L, Cao H, Petrakian CF, Valenzuela J, LaGory E, Jia X, Moon EJ, Martinez R, Wu F, Frock RL, **Moding EJ**, Le QT, Rankin EB, Zhang C, Huang P, Olcina MM, Giaccia AJ, Graves EE. High throughput mutational characterization of the GPCR ligand C5a using yeast display and deep sequencing. **Structure**, Online ahead of print.
51. Jiang H, Limsuwannarot S, Kulhanek KR, Pal A, Labiad O, Rysavy LW, Wong A, Su L, Cavender S, Soro J, Testa S, Ogana H, Waghray D, Tao P, Jude KM, Seet CS, Crooks GM, **Moding EJ***, Garcia KC, Kalbasi A. IL-9 as a naturally orthogonal cytokine with optimal JAK/STAT signaling for engineered T cell therapy. **Immunity**, Online ahead of print.

Preprints

1. Testa S, Himes JE, Subramanian A, Nouth SCL, Ballman KV, Heise RS, Pierpoint M, Nemat-Gorgani N, Sears TJ, Binkley MS, Kalbasi A, Corcoran DL, Hong AM, Brigman BE, Riedel RF, van de Rijn M, Mowery YM, Weinhold KJ, Kirsch DG*, **Moding EJ***, Distinct Sarcoma Microenvironments Predict Benefit from Addition of Pembrolizumab to Preoperative Radiotherapy and Surgery in SU2C-SARC032. **medRxiv**, https://doi.org/10.1101/2025.11.01.25339299. **Co-senior authors*.

Other Peer-Reviewed Articles

1. **Moding EJ**, Kirsch DG. Genetically Modified Mouse Models of Lung Cancer. **The Health Risks of Extraterrestrial Environments**, https://three.jsc.nasa.gov/articles/MouseModels.pdf (2012).
2. **Moding EJ**, Kastan MB, Kirsch DG. Strategies for optimizing the response of cancer and normal tissues to radiation. **Nature Reviews Drug Discovery**, 12, 526-542 (2013).
3. **Moding EJ**, Mowery YM, Kirsch DG. Opportunities for Radiosensitization in the Stereotactic Body Radiation Therapy (SBRT) Era. **The Cancer Journal**, 22, 267-273 (2016).
4. **Moding EJ**, Diehn M, Wakelee HA. Circulating Tumor DNA Testing in Advanced Non-Small Cell Lung Cancer. **Lung Cancer**, 119, 42-47 (2018).
5. Blomain ES, **Moding EJ**. Liquid Biopsies for Molecular Biology-Based Radiotherapy. **International Journal of Molecular Sciences**, 22, 11267 (2021).
6. **Moding EJ**, Nabet BY, Alizadeh AA, Diehn M. Detecting liquid remnants of solid tumors: circulating tumor DNA minimal residual disease. **Cancer Discovery**, 11, 2968-2986 (2021).
7. Oliva-Ramirez J, Milewski D, Banks L, Bailey KM, **Moding EJ**, Lake J, Chen A, Daley JD, Resch EE, Kaplan RN, Ladle BH, Zhang L, Chou MM, Nguyen R, Dagalakis U, Al Akoum N, Sorensen PH, Fletcher JA, DeMatteo R, Llosa NJ, Pollack SM. Future Directions and Priorities for Cellular Therapy in Sarcoma: A Report from the Strategic Advances in Sarcoma Science Cell Therapy Breakout. **Cancers (Basel)**, 17, 3068 (2025).

Non-Peer-Reviewed Articles

1. Lee CL, **Moding EJ**, Kirsch DG. Reining in Radiation Injury: HIF2α in the Gut. **Science Translational Medicine**, 6, 236fs20 (2014).

2. Ewongwo A, Hui C, **Moding EJ**. Opportunity in Complexity: Harnessing Molecular Biomarkers and Liquid Biopsies for Personalized Sarcoma Care. **Seminars in Radiation Oncology**, 34, 195-206 (2024).

Book Chapters

1. Qian Y, Weiner JP, **Moding EJ**, Kovalchuk N, Koong AC, Hong TS, Chang DT. Liver. **Stereotactic Radiosurgery and Stereotactic Body Radiation Therapy**. Heron, D.E., Huq, M.S., Herman, J.M., ed., Demos Medical Publishing (2018).

INVITED TALKS/ORAL PRESENTATIONS

International

1. "Monitoring Radiation Response Using Circulating Tumor DNA." **Princess Margaret Cancer Centre Radiation Medicine Program Seminar**, Toronto, Canada, November 2019.
2. **"**Sarcoma Cellular Ecosystems are Associated with Prognosis and Predict Immunotherapy Response." **Connective Tissue Oncology Society Annual Meeting**, Virtual Meeting, October 2021.
3. "Radiation Biology: Fundamental Knowledge and Recent Advances." **5th Global Center for Biomedical Science and Engineering Summer School for Molecular Biomedical Science and Engineering**, Sapporo, Japan, August 2022.
4. "Radiation treatment planning for soft tissue sarcomas." **Global Bridges Core Lecture Series**, Virtual Lecture, Africa, February 2023.
5. "Combining immunotherapy and radiotherapy in soft tissue sarcomas." **Immuno-Oncology Hong Kong Conference**, Hong Kong, April 2023.
6. "Decoding sarcoma cellular ecosystems associated with outcomes and immunotherapy response." **Mini-Symposium in Translational Oncology**, Mainz, Germany, September 2025.
7. "Radiation Therapy for Chondrosarcoma." **Connective Tissue Oncology Society Fall Webinar**, Virtual Meeting, October 2025.

National

1. **"**Genetic Analysis of Taiwanese Aboriginals Using Short Tandem Repeats." **Pew Midstates Science and Mathematics Consortium**, St. Louis, MO, October 2005.
2. **"**Using Mouse Genetics to Dissect the Radiobiology of SBRT: Tumor Cells, Not Endothelial Cells, Regulate Local Control." **56th Annual American Society for Radiation Oncology (ASTRO) Meeting**, San Francisco, CA, September 2014.
3. **"**Dual Recombinase Technology Defines a Therapeutic Window for ATM Inhibitors to Selectively Radiosensitize Tumors." **56th Annual American Society for Radiation Oncology (ASTRO) Meeting**, San Francisco, CA, September 2014.
4. "From slime mold to genetically engineered mice: how CC prepared me to be a physician scientist." **Colorado College Molecular Biology Day**, Keynote Speaker, Colorado Springs, CO, April 2016.
5. **"**Circulating Tumor DNA Changes During Chemoradiation for Lung Cancer Predict Patient Outcomes." **61st Annual American Society for Radiation Oncology (ASTRO) Meeting**, Chicago, IL, September 2019.
6. "Monitoring Radiation Response Using Circulating Tumor DNA." **University of Alabama at Birmingham Department of Radiation Oncology Seminar**, Birmingham, AL, October 2019.

7. “Circulating tumor DNA as a biomarker of lung cancer response to chemoradiation and consolidation immunotherapy.” **65th Annual Radiation Research Society Meeting**, San Diego, CA, November 2019.
8. “Combining immunotherapy and radiation therapy for soft tissue sarcoma: SU2C-SARC032 correlative studies update.” **NRG Sarcoma Working Group Meeting**, Virtual Meeting, July 2021.
9. “Opportunities and Challenges Toward the Clinical Application of ctDNA MRD Testing in Solid Cancers.” **Association for Molecular Pathology Webinar**, Virtual Meeting, September 2021.
10. “Combining immunotherapy and radiation therapy for soft tissue sarcoma: update of the SU2C-SARC032 clinical trial and correlative studies.” **NCI Immuno-Oncology Translational Network Immuno-Radiotherapy Working Group**, Virtual Meeting, November 2021.
11. “Combining immunotherapy and radiation therapy for soft tissue sarcoma: update of SU2C-SARC032 correlative studies.” **NRG Semi-Annual Meeting-Sarcoma Working Group**, Virtual Meeting, February 2022.
12. “Deciphering Cellular Ecosystems Associated with Clinical Outcomes in Soft Tissue Sarcoma.” **Duke University Cancer and Radiation Biology Symposium**, Durham, NC, April 2022.
13. “Predicting and tracking response to immunotherapy in sarcomas.” **Duke Cancer Institute Radiation Oncology and Imaging Program Annual Retreat**, Virtual Meeting, May 2022.
14. “Radiation Therapy for Soft Tissue Sarcomas: Current State of the Art and Future Directions.” **ECOG-ACRIN Fall Group Meeting**, Washington, DC, October 2022.
15. “Evolutionary Pressures Shape Soft Tissue Sarcoma Development and Response to Radiotherapy.” **NCCN Annual Conference**, Orlando, FL, March 2023.
16. “Resolving sarcoma heterogeneity to enhance cancer therapies.” **Yale Radiobiology and Genome Integrity Research Program**, Virtual Meeting, January 2024.
17. “Deconstructing sarcoma evolution during development and cancer therapy.” **Massachusetts General Hospital Radiation Biology and Research Program**, Virtual Meeting, February 2024.
18. “Sarcoma Tumor Board Cases.” **24th Multidisciplinary Management of Cancers Meeting**, Napa, CA, March 2024.
19. “Sarcoma cellular ecosystems predict response to immunotherapy.” **Strategic Advances in Sarcoma Science**, Bethesda, MD, September 2024.
20. “Survival of the Fittest: Evolutionary and Ecological Insights into Human Cancers.” **Colorado College Chemistry and Biochemistry Department**, Colorado Springs, CO, November 2024.
21. “Personalized ctDNA analysis is associated with outcomes after preoperative radiotherapy with or without pembrolizumab for stage 3 soft tissue sarcomas on SU2C-SARC032.” **Connective Tissue Oncology Society Annual Meeting**, San Diego, CA, November 2024.
22. “Unraveling Tumor Heterogeneity for Precision Therapy in Soft Tissue Sarcomas.” **Sidney Kimmel Comprehensive Cancer Center Sarcoma Research Meeting**, Virtual Meeting, March 2025.
23. “Radiation Therapy for Leiomyosarcomas.” **National Leiomyosarcoma Foundation Patient, Family, and Caregiver Information Forum**, Virtual Meeting, May 2025.
24. “Circulating tumor DNA analysis for monitoring radiation response and studying radiation biology.” **71st Annual Radiation Research Society Meeting**, San Juan, PR, September 2025.
25. “Unlocking Tumor Heterogeneity for Tailored Sarcoma Treatment.” **Winship Cancer Institute of Emory University Grand Rounds**, Atlanta, GA, October 2025.
26. “How far should we go before the knife? Balancing radiotherapy, chemotherapy, and immunotherapy in high-risk UPS of the extremities.” **Connective Tissue Oncology Society**

Annual Meeting, Boca Raton, FL, November 2025.

Local

1. "Knockdown of unfolded protein response sensor Ire1α via retrovirus and adenovirus delivered siRNA." **Undergraduate Summer Research Program Poster Session and Oral Presentations**, San Francisco, CA, August 2007.
2. "Dual recombinase technology defines a therapeutic window for ATM inhibitors during radiation therapy." **Duke MSTP Symposium**, Durham, NC, April 2014.
3. "Safety and Efficacy of SABR to Multiple Lung Tumors." **2017 Malcolm Bagshaw Visiting Professorship and Research Seminar**, Stanford, CA, March 2017.
4. "CNS Case Discussions." **Stanford Symposium on Contemporary Topics in Radiation Oncology**, Stanford, CA, September 2017.
5. "Prognostic Factors and Patterns of Failure in Advanced Stage Hodgkin Lymphoma Treated with Stanford V and Radiotherapy." **2018 Malcolm Bagshaw Visiting Professorship and Research Seminar**, Stanford, CA, March 2018.
6. "Circulating Tumor DNA Analysis for Personalization of Consolidation Immunotherapy in Localized Non-small Cell Lung Cancer." **2019 Malcolm Bagshaw Visiting Professorship and Research Seminar**, Stanford, CA, May 2019.
7. "Monitoring Radiation Response Using Circulating Tumor DNA." **Stanford University Department of Radiation Oncology Seminar**, Stanford, CA, November 2019.
8. "Resolving the radiation response of human cancers with circulating tumor DNA analysis." **Stanford Radiation Oncology Faculty Seminar Series**, Stanford, CA, November 2020.
9. "Radiation Cardiotoxicity." **Cardio-Oncology Group Meeting**, Stanford, CA, March 2021.
10. "Deconstructing the sarcoma microenvironment to predict immunotherapy response." **Stanford Radiation and Cancer Biology Faculty Meeting**, Stanford, CA, June 2021.
11. "Predicting sarcoma response to immunotherapy." **Stanford Sarcoma Program Research Meeting**, Stanford, CA, March 2022.
12. "Deconstructing evolutionary pressures during soft tissue sarcoma development and radiotherapy." **Radiation Oncology Department Retreat**, Stanford, CA, November 2022.
13. "Genomic biomarkers for precision therapy in soft tissue sarcomas." **Stanford Bass Center Grand Rounds**, Stanford, CA, March 2023.
14. "Deconstructing the role of the sarcoma microenvironment in prognosis and treatment response." **Stanford Radiation Oncology Faculty Seminar Series**, Stanford, CA, March 2023.
15. "Integrating spatial genomic profiling and circulating tumor DNA analysis to define evolutionary pressures during radiotherapy." **Stanford Radiation and Cancer Biology Faculty Meeting**, Stanford, CA, August 2023.
16. "Finding opportunity in complexity: leveraging heterogeneity for personalized sarcoma treatment." **Stanford Sarcoma Program Research Meeting**, Stanford, CA, November 2023.

POSTER PRESENTATIONS

1. **Moding EJ**, Nguyen M, Garcia-Bertrand R, Genetic STR Analysis of the Bunun and Tsou Aboriginals of Taiwan, **Pew Midstates Science and Mathematics Consortium**, Chicago, IL, October 2004.

2. **Moding EJ**, Brasuel M, Coumarin 343 PEBBLEs selectively monitor intracellular magnesium ion concentrations inside *Dictyostelium discoideum*, **American Chemical Society National Meeting**, Chicago, IL, March 2007.
3. **Moding EJ**, Lee CL, Blum JM, Sullivan JM, Jeffords LB, Rodrigues RC, Ma Y, Kim Y, Kirsch DG, Temporary knockdown of the tumor suppressor p53 during total-body irradiation prevents radiation-induced lymphomagenesis, **NASA Space Radiation Investigators' Annual Workshop**, League City, TX, September 2011.
4. **Moding EJ**, Lee CL, Huang X, Kirsch DG, A *p53^{FRT}* mouse to generate tumors by Flp recombinase to allow for manipulation of the tumor microenvironment by Cre recombinase, **AACR Tumor Microenvironment Complexity Special Conference**, Orlando, FL, September 2011.
5. **Moding EJ**, Woodlief LZ, Lee CL, Ma Y, Kirsch DG, Role of p53 in Lung Carcinogenesis after Exposure to Space Radiation. **NASA Space Radiation Investigators' Annual Workshop**, Durham, NC, July 2012.
6. **Moding EJ**, Lee CL, Kirsch DG, Using dual recombinase technology to study the response of primary cancers to radiation therapy. **Radiation Research Society Annual Meeting**, San Juan, PR, September 2012.
7. **Moding EJ**, Min HD, Lee CL, Williams N, Woodlief LZ, Ma Y, Kirsch DG, Dissecting the Function of p53 in Lung Carcinogenesis Following Fractionated Exposure to X-rays and ^{56}Fe. **Heavy Ion in Therapy and Space Radiation Symposium**, Chiba, Japan, May 2013.
8. **Moding EJ**, Loss of ATM preferentially sensitizes proliferating tumor endothelial cells to radiation. **National MD/PhD Student Annual Conference**, Keystone, CO, July 2013.
9. **Moding EJ**, Lee CL, Min HD, Ma Y, Kirsch DG, Endothelial cell-specific deletion of ATM preferentially sensitizes proliferating tumor endothelial cells to radiation. **Radiation Research Society Annual Meeting**, New Orleans, LA, September 2013.
10. **Moding EJ**, Lee CL, Castle KD, Kirsch DG, Tumor cells, but not endothelial cells, mediate the eradication of primary cancers by radiation therapy. **Radiation Research Society Annual Meeting**, Las Vegas, NV, September 2014.
11. **Moding EJ**, Maxim PG, Diehn M, Loo BW, Gensheimer M, Safety and Efficacy of Stereotactic Ablative Radiotherapy (SABR) to Multiple (Three or More) Lung Tumors. **American Society for Radiation Oncology (ASTRO) Annual Meeting**, San Diego, CA, September 2017.
12. **Moding EJ**, Ranjana RH, Rosenberg SA, Hoppe RT, Prognostic Factors and Patterns of Failure in Advanced Stage Hodgkin Lymphoma Treated with Stanford V and Radiotherapy. **American Society for Radiation Oncology (ASTRO) Annual Meeting**, San Antonio, TX, October 2018.
13. **Moding EJ**, Liu Y, Nabet BY, Chabon JJ, Chaudhuri AA, Hui AB, He J, Qiao Y, Heymach JV, Tsao A, Liao Z, Gomez DR, Ramchandran KJ, Neal JW, Wakelee HA, Loo BW, Lin SH, Alizadeh AA, Diehn M, ctDNA analysis for personalization of consolidation immunotherapy in localized non-small cell lung cancer. **American Society of Clinical Oncology (ASCO) Annual Meeting**, Chicago, IL, June 2019.
14. **Moding EJ**, Esfahani MS, Nabet BY, Liu Y, Chabon JJ, He J, Qiao Y, Xu T, Yao L, Gandhi S, Liao Z, Das M, Ramchandran KJ, Padda SK, Neal JW, Wakeless HA, Loo BW, Lin SH, Alizadeh AA, Diehn M, A mid-chemoradiation dynamic risk model integrating tumor features and ctDNA analysis for lung cancer outcome prediction. **American Society of Clinical Oncology (ASCO) Annual Meeting**, Virtual Meeting, May 2020.
15. **Moding EJ**, Liu Y, Hui AB, He J, Qiao Y, Xu T, Yao L, Gandhi S, Liao Z, Das M, Ramchandran KJ, Padda SK, Neal JW, Wakelee HA, Loo BW, Lin SH, Alizadeh AA, Diehn M, Circulating tumor DNA kinetics to identify genomic predictors of rapid response to chemoradiation in non-small cell lung

cancer. **American Association for Cancer Research (AACR) Radiation Science and Medicine Meeting**, Virtual Meeting, March 2021.

16. **Moding EJ**, Hui AB, Murciano-Goroff YR, Nabet BY, Schultz A, Qiao Y, Li BT, Lin SH, Alizadeh AA, Diehn M. Non-invasive identification of emergent mutations following cytotoxic therapy for lung cancer. **American Society of Clinical Oncology (ASCO) Annual Meeting**, Virtual Meeting, June 2021.
17. Sears TJ, Nemat-Gorgani N, Ballman KV, Mowery YM, Brigman BE, Riedel RF, Kirsch DG, **Moding EJ**. Digital cytometry reveals pro-inflammatory effects of radiation therapy on the sarcoma microenvironment. **Radiation Research Society Annual Meeting**, Virtual Meeting, October 2021.
18. Nemat-Gorgani N, Subramanian A, Torres IA, Sears TJ, van de Rijn M, Wang DS, Hwang GL, Bui NQ, Ganjoo KN, **Moding EJ**. Monitoring soft tissue sarcoma response to immune checkpoint inhibition and cryotherapy with circulating tumor DNA analysis. **Connective Tissue Oncology Society Annual Meeting**, Vancouver, Canada, November 2022.
19. Subramanian A, Nemat-Gorgani N, Ellis-Caleo TJ, van IJzendoorn DGP, Sears TJ, Somani A, Luca BA, Zhou MY, Bradic M, Torres IA, Oladipo E, New C, Kenney DE, Avedian RS, Steffner RJ, Binkley MS, Mohler DG, Tap WD, D'Angelo SP, van de Rijn M, Ganjoo KN, Bui NQ, Charville GW, Newman AN, **Moding EJ.** Identification and validation of sarcoma cellular ecosystems associated with prognosis and predictive of immunotherapy response. **American Association for Cancer Research Annual Meeting**, Orlando, FL, April 2023.
20. Blomain ES, Somani A, Subramanian A, Soudi S, Nemat-Gorgani N, **Moding EJ**. Tracking sarcoma evolution during radiotherapy using circulating tumor DNA analysis. **International Congress for Radiation Research**, Montreal, Canada, August 2023.
21. Subramanian A, Nemat-Gorgani N, Sears TJ, Ballman KV, Weinhold KJ, Brigman BE, Riedel RF, Mowery YM, Kirsch DG, **Moding EJ**. Tracking response to radiation therapy and immunotherapy in soft tissue sarcomas: SU2C-SARC032 correlative studies update. **Stand Up To Cancer Scientific Summit**, Coronado, CA, January 2024.

GRANTS

Current Funding

8/2022-6/2026	Mentored Clinical Scientist Research Career Development Award K08 CA255425 National Cancer Institute, National Institutes of Health "Non-invasive characterization of human soft tissue sarcoma response to radiation therapy" Role: PI
10/2022-9/2026	Research Project Grant NNH21ZDA015N National Aeronautics and Space Administration "Assessing Long-Term Effects of Radiation Exposure in Engineered Heart & Vascular Tissues" Role: Co-Investigator
6/2023-5/2028	Research Project Grant R01 CA27248501 National Cancer Institute, National Institutes of Health "Triggering a New Cancer Cell Death Mechanism in Sarcoma" Role: Co-Investigator
3/2024-7/2026	Catalyst Award Sarcoma Alliance for Research through Collaboration

	"Correlative analysis of CSF-1R blockade and immunotherapy in leiomyosarcoma" Role: PI
9/2024-9/2025	Merck Catalyst Award Stand Up to Cancer "Correlative Study of Pembrolizumab and Radiation Therapy to Improve Outcome in High Risk Sarcoma" Role: PI
08/2025-07/2030	Method to Extend Research in Time (MERIT) Award R37 CA296109 National Cancer Institute, National Institutes of Health "Subclonal determinants of radiation response in soft tissue sarcomas" Role: PI

Completed Funding

4/2013-5/2015	Predoctoral Fellowship F30 CA177220 National Cancer Institute, National Institutes of Health "Defining the cellular target of radiotherapy in primary mouse models of cancer" Role: PI
7/2018-6/2019	Research Resident Grant Radiological Society of North America "Circulating tumor DNA kinetics during radiation therapy as a prognostic biomarker for non-small cell lung cancer" Role: PI
7/2018-6/2019	Resident Seed Grant American Society for Radiation Oncology "Circulating tumor DNA kinetics during radiation therapy as a prognostic biomarker for non-small cell lung cancer" Role: PI
7/2020-6/2021	Conquer Cancer-GO_2 Foundation for Lung Cancer Young Investigator Award American Society of Clinical Oncology "Identification of chemoradiation response mediators in non-small cell lung cancer via circulating tumor DNA analysis" Role: PI
3/2021-2/2022	Cancer Innovation Award Stanford Cancer Institute "A Multi-tiered Genomic and Transcriptomic Predictor of Response to Immunotherapy in Sarcomas" Role: Co-PI
7/2021-6/2023	Young Investigator Award National Comprehensive Cancer Network Foundation "Resolving sarcoma evolution during tumor development and radiation therapy" Role: PI
8/2021-7/2022	SQIMM Award Stanford Cancer Center "Validation of sarcoma ecotypes as predictors of response to immune checkpoint inhibition" Role: PI

4/2022-4/2025	Career Development Award W81XWH-22-1-0161 Congressionally Directed Medical Research Program, Department of Defense “Tracking sarcoma response and resistance to radiation therapy” Role: PI
3/2024-2/2025	Behar Innovation Award in Sarcoma Research Stanford Cancer Institute “High-resolution longitudinal analysis of sarcoma response to hypofractionated radiotherapy” Role: PI

CLINICAL TRIALS

Current Trials

08/2023-Present	NCT06087861 **“**5-Day Preoperative Radiation for Soft Tissue Sarcoma” Role: Sub-investigator

EDITORIAL SERVICE

Ad Hoc Reviewer

2013-Present	International Journal of Radiation Oncology, Biology, and Physics
2020-Present	Molecular Cancer Therapeutics
2020-Present	Oncogene
2021-Present	Cancer Research
2021-Present	PLOS ONE
2021-Present	Journal of Molecular Diagnostics
2022-Present	British Journal of Cancer
2022-Present	Clinical Cancer Research
2022-Present	Nature Medicine
2023-Present	Genome Medicine
2023-Present	Nature Communications
2024-Present	Nature Cancer
2025-Present	Journal of Clinical Oncology
2025-Present	NPJ Precision Oncology

SERVICE AS GRANT REVIEWER

2021	Cancer Research Trust New Zealand, Ad Hoc Reviewer
2022	Stanford Mikitani Cancer Research Fund, Ad Hoc Reviewer
2024	European Research Council, Ad Hoc Reviewer
2024	Department of Defense CDMRP PRCRP Sarcoma Panel, Ad Hoc Reviewer
2025	Stanford Mikitani Cancer Research Fund, Ad Hoc Reviewer
2025	NIH Radiation Therapy and Biology Special Emphasis Panel, Ad Hoc Reviewer
2025	National Leiomyosarcoma Foundation Review Panel, Ad Hoc Reviewer
2025	Department of Defense CDMRP RCRP CON-S-1 Panel, Ad Hoc Reviewer

UNIVERSITY ADMINISTRATIVE SERVICE

Memberships

2020-Present	Stanford Cancer Institute
2023-Present	Stanford Maternal & Child Health Research Institute

Committee Service

2009	Duke MSTP Science Advisory Committee Member
2010-2011	Duke School of Medicine Admissions Interviewer
2017	Stanford Radiation Oncology MRI Simulation Workflow Committee
2020	Stanford Cancer Center South Bay Clinical Educator Interview Panel
2020	Stanford Radiation Oncology Residency Applicant Selection Committee
2020-Present	Stanford Radiation Oncology Residency Interviewer
2020-2021	Stanford Cancer Biology Program Admissions Committee
2020-Present	Stanford Cancer Biology Program Admissions Interviewer
2020-Present	Stanford Radiation Oncology Residency Clinical Competency Committee
2021-2022	Stanford Cancer Biology Preview Program Faculty Mentor
2021-2022	Stanford Radiation Oncology Physician Scientist Search Committee
2024	Stanford Maternal & Child Health Research Institute Mock Grant Review Panel
2024	Stanford REACH Postbaccalaureate Program Interviewer
2024-2025	Stanford Cancer Biology Program Admissions Committee
2025-Present	Stanford Tissue Bank Advisory Committee

Thesis/Qualifying Exam Committees

2022	Mike Tsai, PhD Qualifying Exam Committee, Cancer Biology Program
2023	Emily Shen, PhD Qualifying Exam Committee, Cancer Biology Program
2024	Logan Leak, PhD Thesis Committee, Cancer Biology Program
2025	Maria Korah, PhD Qualifying Exam Committee, Stem Cell Biology Program

Leadership Roles

2010-2013	Duke MSTP Davison Council Representative
2011-2012	Duke MSTP Symposium Planner
2022-2023	Stanford Radiation Oncology Computational Biologist Search Committee Chair
2023-Present	Stanford Radiation Oncology Radical Seminar Series Organizer
2024	Cancer Biology Journal Club Faculty Leader

SERVICE TO PROFESSIONAL ORGANIZATIONS

Memberships

2011-Present	American Association for Cancer Research
2012-Present	Radiation Research Society
2016-Present	American College of Radiology
2016-Present	Radiological Society of North America
2017-Present	American Society for Radiation Oncology
2019-Present	American Society of Clinical Oncology
2022-Present	Connective Tissue Oncology Society

Committee Service

2022	Radiation Research Society Annual Meeting Abstract Review
2023	American Association for Cancer Research Annual Meeting Abstract Review
2023	American Society for Radiation Oncology Annual Meeting Abstract Review
2023	Connective Tissue Oncology Society Annual Meeting Abstract Review
2024	American Society for Radiation Oncology Annual Meeting Abstract Review
2024	Connective Tissue Oncology Society Annual Meeting Abstract Review
2024-Present	Radiation Research Society Annual Meeting Program Planning Committee
2025-Present	National Leiomyosarcoma Foundation Executive Committee

Session Moderator

2023	"Immunology and Immunotherapy," CTOS Annual Meeting
2024	"Radiation Cancer Biology and Immune Response," ASTRO Annual Meeting
2024	"Genomics and Biomarkers," ASTRO Annual Meeting
2024	"Tumor Heterogeneity and Resistance," CTOS Annual Meeting
2025	"Normal Tissue Injury and Biomarkers," ASTRO Annual Meeting
2025	"Immunotherapy & Cell Therapy in Sarcoma," CTOS Annual Meeting

EDUCATIONAL ACTIVITIES

Clinical Lectures

1. "Unexpected Death in a Patient Undergoing Whole Brain Radiation Therapy." Morbidity and Mortality Conference, Stanford Department of Radiation Oncology, October 2016.
2. "Prostate Cancer Adjuvant and Salvage Radiation Therapy Case Discussion." Resident Lecture, Stanford Department of Radiation Oncology, November 2016.
3. "Genitourinary Cancer In-Service Question Review." Resident Lecture, Stanford Department of Radiation Oncology, November 2016.
4. "Soft Tissue Sarcoma Radiation Therapy Case Discussion." Resident Lecture, Stanford Department of Radiation Oncology, June 2017.
5. "Radiation Myelopathy After Post-Operative Spine Radiation Therapy." Morbidity and Mortality Conference, Stanford Department of Radiation Oncology, August 2017.
6. "Brain Metastases Radiation Therapy Case Discussion." Resident Lecture, Stanford Department of Radiation Oncology, August 2017.
7. "Genitourinary Cancer Anatomy and Overview." Resident Lecture, Stanford Department of Radiation Oncology, November 2017.
8. "Bladder Cancer Radiation Therapy Case Discussion." Resident Lecture, Stanford Department of Radiation Oncology, December 2017.
9. "Indolent Lymphoma Radiation Therapy Case Discussion." Resident Lecture, Stanford Department of Radiation Oncology, January 2018.
10. "Radiation Therapy for Hemoptysis." Morbidity and Mortality Conference, Stanford Department of Radiation Oncology, February 2018.
11. "Early Stage Invasive Breast Cancer." Resident Lecture, Stanford Department of Radiation Oncology, March 2018.
12. "Radiation Therapy for Non-Metastatic Rectal Cancer." Resident Lecture, Stanford Department of Radiation Oncology, August 2018.
13. "Craniospinal Irradiation Practical." Resident Lecture, Stanford Department of Radiation Oncology, August 2018.
14. "Vulvar Cancer Radiation Therapy Case Discussion." Resident Lecture, Stanford Department of Radiation Oncology, November 2018.
15. "Lung Cancer." Clinical Lecture Series for Physicists, Dosimetrists, and Therapists, Stanford Department of Radiation Oncology, November 2018.
16. "Lymphoma Anatomy and Overview." Resident Lecture, Stanford Department of Radiation Oncology, January 2019.
17. "Anorectal Cancer." Clinical Lecture Series for Physicists, Dosimetrists, and Therapists, Stanford Department of Radiation Oncology, January 2019.

18. “Meningioma and Schwannoma Radiation Therapy Case Discussion.” Resident Lecture, Stanford Department of Radiation Oncology, August 2019.
19. “Mesothelioma and Thymoma Radiation Therapy Case Discussion.” Resident Lecture, Stanford Department of Radiation Oncology, October 2019.
20. “Cervical Cancer Radiation Therapy Case Discussion.” Resident Lecture, Stanford Department of Radiation Oncology, October 2019.
21. “Bladder Cancer Radiation Therapy Case Discussion.” Resident Lecture, Stanford Department of Radiation Oncology, December 2019.
22. “Intact Prostate Cancer Radiation Therapy Case Discussion.” Resident Lecture, Stanford Department of Radiation Oncology, December 2019.
23. “Contemporary Sarcoma Management.” Resident Lecture, Stanford Department of Radiation Oncology, June 2021.
24. “Sarcoma Journal Club and Case Discussion.” Resident Lecture, Stanford Department of Radiation Oncology, June 2022.
25. “Current sarcoma management and role of radiotherapy.” Resident Lecture, Stanford Department of Radiation Oncology, April 2023.
26. “Introduction to Cancer and Radiation Biology.” REACH-HBMC Medical Student Lecture, Stanford Department of Radiation Oncology, July 2023.
27. “Enteritis after radiation and immunotherapy.” Morbidity and Mortality Conference, Stanford Department of Radiation Oncology, September 2023.
28. “Sarcoma Case Discussion.” Resident Lecture, Stanford Department of Radiation Oncology, May 2024.
29. “Sarcoma Case Discussion.” Resident Lecture, Stanford Department of Radiation Oncology, November 2024.

Science Lectures

1. “New insights into solid cancers with circulating tumor DNA analysis.” **T32 Chats**, Stanford, CA, May 2021.
2. “Non-invasive insights into human sarcoma biology.” **Stanford Cancer Biology Journal Club**, Stanford, CA, November 2021.
3. “Unraveling sarcoma evolution to enhance cancer therapies.” **Stanford Cancer Biology Journal Club**, Stanford, CA, October 2023.
4. “Genomic approaches to unravel sarcoma complexity for personalized treatment.” **Biomedical Physics Research Seminar**, Stanford, CA, November 2023.
5. “Circulating tumor DNA: a transformative biomarker providing novel insights into cancer biology.” **CBIO 242: Cellular and Clinical Aspects of Cancer**, Stanford, CA, May 2024.
6. “Leveraging tumor heterogeneity for personalized sarcoma treatment.” **Biomedical Physics Research Seminar**, Stanford, CA, October 2024.
7. “Foundations and future directions for circulating tumor DNA in research and the clinic.” **CBIO 242: Cellular and Clinical Aspects of Cancer**, Stanford, CA, May 2025.
8. “Genomic insights from patient samples to drive precision cancer therapy.” **Stanford Cancer Biology Journal Club**, Stanford, CA, October 2025.
9. “Understanding tumor heterogeneity to guide precision cancer therapy.” **Biomedical Physics**

Research Seminar, Stanford, CA, October 2025.

Mentees/Advisees

2012-2015	Patrick Oh (Undergraduate Student): Supervised his undergraduate research using mouse work, cell culture, and immunohistochemistry. Mentored him during his applications to medical school and radiation oncology residency.
2016-2017	Duy Tran (Medical student): Mentored him during his second-year coursework and transition to clinical rotations through the Stanford Mentorship Academy for Resident Training.
2019-2020	Sophia Fay (Undergraduate Student): Taught her wet laboratory techniques and helped with her successful application for the Bio-X Undergraduate Fellowship.
2020-2021	Max Devine (Assistant Clinical Research Coordinator): Mentored his research on genomic predictors of patterns of recurrence in sarcomas which he presented at the 2021 ASTRO Annual Meeting and helped with his successful application to medical school.
2020-2021	TJ Sears (Bioinformatician): Supervised multiple genomic and transcriptomic projects. Advised his successful application to Bioinformatics PhD Programs.
2020-2023	Erik Blomain (Radiation Oncology Resident and Postdoctoral Scholar): Research mentor for his Holman Pathway project on sarcoma evolution during radiation therapy, which was selected for an oral presentation at the 2023 CTOS Annual Meeting. Advised his successful search for a physician scientist faculty position.
2020-2024	Fred Wu (Radiation Oncology Resident): Served as his faculty mentor and provided guidance on clinical training, research, and professional development.
2021-2023	Timothy Ellis-Caleo (Medicine Resident): Research mentor for his project on transcriptomic predictors of sarcoma response to immunotherapy.
2021-2024	Anish Somani (Undergraduate Student Intern): Research mentor for his project on computational approaches to evaluate tumor clonal evolution.
2021-2024	Eniola Oladipo (Assistant Clinical Research Coordinator): Research mentor for her project on sarcoma patterns of local recurrence.
2021-Present	Ziwei Wang (Postdoctoral Scholar): Research mentor for her postdoctoral research on rapid functional validation of cancer therapeutic targets in mice.
2021-Present	Ajay Subramanian (Bioinformatician): Supervisor for multiple genomic projects to understand sarcoma heterogeneity.
2021-Present	James Jahng (Postdoctoral Scholar): Research mentor for his postdoctoral fellowship Translational Research Institute for Space Health (TRISH) award.
2022	Mike Tsai (Graduate Student): Research mentor for rotation project studying the role of macrophage populations in sarcoma immunotherapy response and qualifying exam committee member.
2022	Allie Cheung (Undergraduate Student Intern): Research mentor for her summer project on genomic mediators of radiation response.
2022-2025	Agnes Ewongwo (Radiation Oncology Resident): Research mentor for her clinical project on sarcoma patterns of local recurrence and her lab-based project analyzing ctDNA in patients treated with hypofractionated radiotherapy for soft tissue sarcomas. Advised her successful application for an academic faculty position.
2022-Present	Shaghayegh Soudi (Research Scientist): Research mentor for her project investigating sarcoma evolution for which she was awarded the Mikitani Cancer Research Fund Award.
2022-Present	Stefano Testa (Medicine Resident): Research mentor for his project identifying novel CAR-T cell targets in sarcomas, which was selected for oral presentations at the 2023 and 2024 CTOS Annual Meetings.

2022-2025	Claire Johns (Pediatric Oncology Fellow): Research mentor for her project developing circulating tumor DNA assays for pediatric sarcomas for which she was awarded an MCHRI Clinical Trainee Grant and an ASCO Conquer Cancer Young Investigator Award. Advised her successful application for an academic faculty position.
2023	Echezonachi Asimama-Duruaku (Medical Student): Research mentor for her summer project on profiling tumor DNA in sarcoma surgical washings as part of the HBMC-REACH program.
2023-2025	Serey Nouth (Postbaccalaureate Scholar): Research mentor for her project on circulating tumor DNA analysis in sarcomas as part of the REACH postbac program.
2023-Present	Wilson Mai (Radiation Oncology Resident): Faculty mentor for his clinical training, research, and professional development.
2023-2025	Cierra Hong (Orthopedic Surgery Resident): Research mentor for her project on cell free tumor DNA analysis to predict local recurrences after surgery in sarcomas for which she was awarded an OREF Resident Research Grant.
2023-Present	Jennifer Matsui (Medical Student): Research mentor for her projects on response of metastatic sarcomas and synovial sarcomas to radiotherapy. Advised her successful application to radiation oncology residency.
2024	Matthew Ricks (Graduate Student): Research mentor for rotation project developing a pathomic classifier for soft tissue sarcomas.
2024-2025	Nadia Silvia (Research Technician): Research mentor for her project studying sarcoma evolution during radiotherapy.
2024-Present	Marina Francis (Postdoctoral Scholar): Research mentor for her postdoctoral research on developing new therapies to radiosensitize tumors.
2024-Present	Justin Jagodinsky (Radiation Oncology Resident): Faculty mentor for his clinical training, research, and professional development.
2024-2025	Stewart Kim (Graduate Student): First-year mentor for his coursework and career development.
2025	Samihaa Mehta (Medical Student): Research mentor for her project on wound healing after sarcoma surgery as part of the Stanford-HBMC Summer Research Program.
2025-Present	Luke Sylvester (Research Technician): Research mentor for his projects developing new methods for circulating tumor DNA analysis in sarcomas.
2025-Present	Mattias de los Rios Rogers (Graduate Student): Research co-mentor for rotation project studying sarcoma evolution during radiotherapy.

Training and Certifications

2009-Present	Collaborative Institutional Training Initiative (CITI) Biomedical Research Program
2020	Advancing Communication Excellence at Stanford (ACES) Workshop
2021	ACES 2.0 Workshop: Mastering Clinician-Clinician Communication through Relationship-Centered Skills
2021-2022	Stanford Starting Up Your Research Group (SURGE) I Program
2023	ACES 2.0: Mastering Presence in Virtual Visits through Relationship-Centered Communication