

Innovative Preclinical Models for Pediatric Cancer Research

Nationwide Children's Hospital, Columbus, Ohio, USA
13 – 15 October 2026

Programme

Day 1: Tuesday 13 October 2026

12:00pm	Registration opens
12:30pm	Lunch
	Session 1
	Chair: Elaine Mardis Nationwide Children's Hospital, USA
2:00pm	Welcome
2:15pm	Martine Roussel St. Jude Children's Research Hospital, USA Developing pre-clinical models of high-risk pediatric embryonal brain tumors to facilitate clinical trials
3:00pm	Marc Zuckermann Hopp Children's Cancer Center Heidelberg (KiTZ), Germany Using autochthonous mouse models of pHGG to understand tumorigenesis and explore multimodal therapies
3:30pm	Beatriz Esteves Silva i3S - Institute for Research and Innovation in Health, Portugal Optimization and validation of a patient-derived tumoroid drug screening platform for paediatric brain tumours
3:45pm	Afternoon break
4:15pm	Lena Kutscher Hopp Children's Cancer Center Heidelberg (KiTZ) and German Cancer Research Center (DKFZ), Germany 2D and 3D models of embryonal brain tumor initiation
4:45pm	Bethan Williams University of Nottingham, UK Modelling the architectural tumour microenvironment of paediatric diffuse midline glioma
5:00pm	Alice Alhaj Kadour University of Wisconsin-Madison, USA A novel zebrafish model of DIPG to investigate tumor initiation and identify new treatment strategies

5:15pm **Poster flash talks**

5:30pm – 7:00pm **Poster session**

Day 2: Wednesday 14 October 2026

Session 2

Chair: Pratiti (Mimi) Bandopadhyay Harvard Medical School, USA

9:00am

Jason Berman CHEO Research Institute, Canada
Zebrafish: from risk to remedy in pediatric oncology

9:45am

Kevin Jones The University of Utah, USA
Modeling translocation fusion oncoprotein-driven sarcomagenesis in the mouse

10:15am

Raelene Endersby The Kids Research Institute Australia, Australia
A panel of childhood cancer mouse models reveals that developmental stage is a driver of tumor immunosuppression and immunotherapy resistance

10:30am

Manon Watzky Children's Hospital Los Angeles, USA
A 3D Ewing sarcoma spheroid model uncovers endogenous EWSR1::FLI1 downregulation and a functional role for STAT3 signaling during metastatic invasion

10:45am

Morning break

11:15am

Alice Soragni University of Colorado Anschutz, USA
Charting therapeutic vulnerabilities in pediatric sarcomas with short term patient-derived tumor organoids

11:45am

Eleni Tomazou St. Anna Children's Cancer Research Institute, Austria
A build-to-understand approach to fusion oncogene-driven sarcomas

12:15pm

Diana Acevedo Children's Mercy Hospital, USA
The kidney capsule graft: a versatile *in vivo* model to recapitulate the tumor microenvironment in neuroblastoma

12:30pm

Nicole Anderson University of Mississippi Medical School, USA
The MYCN_{TT} zebrafish models early metastatic dissemination and genomic evolution in high-risk neuroblastoma

12:45pm

Lunch

Session 3

Chair: Ana Banito German Cancer Research Center (DKFZ), Germany

2:00pm

Michael Underhill University of British Columbia, Canada
Modelling synovial sarcoma in the mouse – insights into a potential cell of origin and tumorigenic trajectories

2:30pm	Delilah Hendriks Princess Máxima Center, The Netherlands Advanced human organoid models to unravel early events of tumorigenesis
3:00pm	Casey Langdon Medical University of South Carolina, USA Engineered extracellular matrix hydrogel spheroid and 3D tumor models for pediatric bone sarcomas
3:15pm	Karen Liu King's College London, UK Human embryonic stem cell modelling reveals unexpectedly early developmental consequences of neuroblastoma-associated ALK p.F1174L mutation
3:30pm	Afternoon break
4:00pm	Verena Korber University of Oxford, UK Progenitor cell-driven development of T-cell acute lymphoblastic leukemia upon thymus autonomy in mice
4:30pm	James Amatruda Children's Hospital Los Angeles, USA From origin to metastasis: zebrafish preclinical models of Ewing sarcoma
5:00pm	Chinmay Sankhe Nationwide Children's Hospital, USA Cellular context dictates rhabdomyosarcoma fusion-oncogene activity
5:15pm	Kyle Woodward University of Mississippi Medical Center, USA LMO1 promotes multifocal disease and divergent tumor fates in MYC-driven zebrafish models of neuroblastoma
5:30pm	Poster flash talks
5:45pm – 7:15pm	Poster session
7:30pm	Dinner – The Elevator

Day 3: Thursday 15 October 2026

Session 4

Chair: James Amatruda Children's Hospital Los Angeles, USA

9:00am	Ana Banito German Cancer Research Center (DKFZ), Germany Somatic gene delivery for flexible <i>in vivo</i> modeling of pediatric sarcoma
9:30am	Caroline Hutter St. Anna Children's Cancer Research Institute, Austria An iPSC-derived model of Langerhans cell histiocytosis as a preclinical platform to test new treatment regimens
10:00am	Kris Vleminckx Ghent University, Belgium Investigating the molecular network underlying Wilms' tumor formation using CRISPR multiplexing in <i>Xenopus tropicalis</i>
10:15am	Morning break

10:45am	Mimi Bandopadhyay Harvard Medical School, USA Anti-transformation screens identify mediators of oncogenic transformation as novel therapeutic targets for pediatric brain tumors
11:15am	Timothy Phoenix University of Cincinnati, USA Modeling CNS tumors to advanced basic and translational discoveries
11:45am	James Reinecke Nationwide Children's Hospital, USA Engineering the leptomeningeal niche: modular models of metastatic colonization in medulloblastoma
12:00pm	Wu-Min Deng Tulane University School of Medicine, USA A cross-species <i>Drosophila</i> -mammalian platform for modeling SMARCB1-deficient pediatric rhabdoid tumors
12:15pm	Lunch Session 5 Chair: Karen Liu King's College London, UK
1:45pm	Claudia Kleinman McGill University, Canada From robust cell fates to plastic states: lineage constraints in pediatric brain tumors
2:15pm	Joelle Straehla Seattle Children's, USA Microvascular models of glioma recapitulate human disease
2:45pm	Martin Distel Huntsman Cancer Institute, USA Fishing for the cell of origin for Ewing sarcoma
3:00pm	Afternoon break
3:30pm	Michelle Wedemeyer Nationwide Children's Hospital, USA Of mice and men: illuminating the blind spots in preclinical models of pediatric gliomas
4:00pm	Genevieve Kendall Nationwide Children's Hospital, USA Comprehensive <i>in vivo</i> phenotyping of fusion-driven pediatric sarcomas
4:30pm	Closing remarks
4:45pm	End