January 22-24, 2019, San Francisco, CA

www.tumor-models-sf.com

3rd PREDICT: TUMOR MODELS SAN FRANCISCO

Arming IO Decision Making Through Model Confidence

Expert speakers include:

James Hodge
Deputy Chief Tumor Immunology and Biology, Senior Investigator, Head, Recombinant Vaccine Group
National Cancer Institute

Barbara Joyce-Shaikh
Associate Principal Scientist
Merck & Co

Peter King
Principal Scientist
PDS-PDM - Imaging
Janssen Research & Development

John Westwick
CEO
Resonant Therapeutics, Inc

Joshua Breunig
Associate Professor & Board of Governors Regenerative Medicine
Cedars-Sinai Medical Center

Lead Partner: The Jackson Laboratory — *Leading the search for tomorrow's cures*

Hosting Partner: CrownBio — CONNECTING SCIENCE TO PATIENTS

Program Partner: CHAMPIONS ONCOLOGY

Tel: + 1 415 735 3289 **Email:** info@hansonwade.com

Tumor Models @PREDiCT_Models

hansonwade

3rd PREDICT: TUMOR MODELS SAN FRANCISCO

Tumor Models San Francisco
January 22-24, 2019

WHAT TO EXPECT

100+ Attendees

23 Case Studies

3 Deep Dives

7 Q&A's

Identify Which Model, When & Why

Understanding the differences between experimental immuno-oncology models, and where each fits best into drug development programs, is an essential part of IO research.

Returning for its 3rd year, PREDiCT: Tumor Models San Francisco remains dedicated to revealing model-based strategies adding immediate value to emerging IO programs.

With new speakers, fresh case studies, and a more interactive format to the agenda, this is your opportunity to plug into a ready-made network of pioneering biotech and developers redefining this area.

Leave with actionable takeaways on model utility and applicability. Dive into the use of both emerging and classical model systems and understand how they can correctly be used to support your translational decision making.

> The conference gave me an opportunity to delve deeper into our current in vivo models and start to identify areas to improve and develop better assays. It was also a good space to meet new people in the industry as it gets bigger and more complex
>
> **Connie Ardila, Xencor**

> It was a great chance to learn about new research from colleagues and new vendor offerings to support the research--well worthwhile
>
> **Rachel Dusek, Senior Director of Preclinical Development, Oxford BioTherapeutics**

What to Expect

1. Perspectives into the selection and characterization of emerging systems from **Jackson Laboratories, Berg** & **Merck**

2. Case studies from **Cedars-Sinai** & **Resonant Therapeutics** exploring the value of emerging in-vitro systems

3. Experts from the **NCI** and **Amgen** revealing key considerations for experimental design, assessment & validation of IO-combos.

4. Insights from **UCSF, Pfizer,** & **Baylor** into models elucidating the role TME, reflecting patient-level responses and study of resistance

5. Insights into models informing the **Mayo Clinic** & **Chimera Engineering's** next-generation immune-therapies

Tel: + 1 415 735 3289 Email: info@hansonwade.com
tumor-models-sf.com Tumor Models @PREDiCT_Models
hansonwade

YOUR EXPERT SPEAKERS

Barbara Joyce-Shaikh
Associate Principal Scientist
Merck & Co

Brian Belmontes
Oncology Scientist
Amgen Inc.

Bryan Welm
Associate Professor &Investigator
Huntsman Cancer Institute University of Utah

Davy Ouyang
Executive Director
Crown Bioscience

Isabel Kurth
VP, Research & Development
Rgenix

James Hodge
Deputy Chief Tumor Immunology and Biology, Senior Investigator, Head, Recombinant Vaccine Group
National Cancer Institute

James Keck
Senior Director for the Clinical Lab & In Vivo Pharmacology Services
The Jackson Laboratory

Jason DeVoss
Senior Scientist
Amgen Inc.

Tiina Kähkönen
Research Director
Pharmatest Services

Joshua Breunig
Associate Professor & Board of Governors Regenerative Medicine
Cedars-Sinai Medical Center

John Westwick
CEO
Resonant Therapeutics, Inc

Ksenya Shchors
Principal Scientist
Pfizer

Krista Mcnally
Scientist
Chimera Bioengineering

Maryland Franklin
Vice President – Scientific Development
MI Bioresearch

Stephanie Casey Parks
Scientist
Amgen Inc.

Tseten Jamling
VP of Research and Development
Hera BioLabs, Inc.

Peter King
Principal Scientist
PDS-PDM - Imaging
Janssen Research & Development

Rosemary Akhurst
Professor of Anatomy
Helen Diller Family Cancer Research Institute
UCSF

Robin Parihar
Assistant Professor, Center for Cell and Gene Therapy
Baylor College of Medicine

Speaker to Be Confirmed

Saad Kenderian
Assistant Professor of Medicine and Oncology
Mayo Clinic

Shiva Kazerounian
Principal Scientist, In Vivo Pharmacology Lead
Berg Pharma

Sumiti Jain
Associate Director
Sangamo Therapeutics

CONFERENCE DAY ONE
JANUARY 23RD 2019

Barbara Joyce-Shaikh
Associate Principal Scientist
Merck & Co

8.00 **Chairperson's Opening Remarks**

Addressing The Demand for Clinically Relevant Mouse Models for Immunotherapy

Session Purpose:

Recent breakthroughs involving humanized mice have elevated the translational quality of these models within preclinical IO research. This session will explore preclinical investigations to better model human tumor and human immune system interaction through the use of humanized models. Particular emphasis will be given to the challenges, insights, and future directions for mouse and humanized models in cancer immunology and immunotherapy

Davy Ouyang
Executive Director
Crown Bioscience

8.30 **Developing Checkpoint Target Humanized Models for Preclinical Efficacy Assessment**

- Lack of animal models for efficacy evaluation of human therapeutic antibodies for cancer Immunotherapies
- HuGEMM models, expressing chimeric checkpoint targets with human extracellular domains, allow the evaluation of specific human biological therapies in vivo

Barbara Joyce-Shaikh
Associate Principal Scientist
Merck & Co

8.55 **Emerging Models for Preclinical Assessment of Cancer Immunotherapy's**

- Exploring the latest advances in human Immune system development for humanized mouse models
- Demonstrating how these systems have rationally supported the development of clinically phased immuno-oncology therapeutics
- Exploring the emerging role and translatability of 3d-organoid cultures in supporting IO discovery & development

Stephanie Casey Parks
Scientist
Amgen Inc.

9.20 **'Humanized' Modeling Strategies for Developing Next Generation Checkpoint Therapeutics**

James Keck
Senior Director for the Clinical Lab & In Vivo Pharmacology Services
The Jackson Laboratory

9.45 **Patient-Derived Tumor Xenografts in Humanized NSG-SGM3 Mice: A New Immuno-Oncology Platform**

- The addition of 3 human cytokines (GM-CSF, IL-3 & Kit Ligand) into the NSG mouse provide for a more robust myeloid compartment after humanization
- Showcase data on the myeloid engraftment kinetics and also show checkpoint inhibitor efficacy against several PDX tumors

Davy Ouyang
Executive Director
Crown Bioscience

Barbara Joyce-Shaikh
Associate Principal Scientist
Merck & Co

James Keck
Senior Director for the Clinical Lab & In Vivo Pharmacology Services
The Jackson

Stephanie Casey Parks
Scientist
Amgen Inc.

10.10 **Session Q&A Panel**

- How can we better design and develop models which can replicate a more natural and translationally relevant tumour microenvironment
- In which situations can strategies of immune system humanization in mice add most value to preclinical development over syngeneic and other models
- What is the predictive validity, efficacy and safety of humanized mouse models?
- With which systems have we seen the most success in understanding the mechanisms underlying the complex interactions between the immune system and cancer?

10.30 **Speed Networking and Morning Refreshments**

PDX Models for the Study of Cancer Immunotherapies

Session Purpose:

PDX models have enabled the invaluable assessment of human tumor biology, ID of therapeutic targets, and preclinical screening of cancer therapeutics. However, immunodeficiency amongst other related challenges have limited their use for most IO applications. This session aims to explore the continued advances of PDX models, their context of use alongside new technologies to support model and therapetic development.

Tseten Jamling
VP of Research and Development
Hera BioLabs, Inc.

11.30 OncoRat® Enables Faster Establishment of PDX Models in Fewer Passages

- Model engraftment rates are increased 67% in comparison to mouse for non-small cell lung cancer (NSCLC) patient samples
- OncoRat delivers tumor masses 10x that of mouse models in half the time – making PDX studies possible after a single passage, decreasing the risk of genetic drift and host-specific tumor evolution from multiple passages as observed in mice.

Bryan Welm
Associate Professor &Investigator
Huntsman Cancer Institute University of Utah

11.45 Advanced PDX Tumor Biology Platforms for Drug Advancement

- Patient-Derived Xenograft Organoids As Models Of Therapy Response In Breast Cancer
- Long-term organoid models derived from PDX tumor tissue (termed PDxO) maintain genomic and molecular features, and exhibit stable drug response profiles, following >1 year in culture.
- PDxO drug response assays can predict in vivo (PDX) drug response.
- PDX and PDxO models can be established and evaluated for therapy response concomitantly with patient care.

Speaker to be Confirmed:
Champions Oncology

12.10 Advanced PDX Tumor Biology Platforms for Drug Advancement

- Harnessing large collections of PDX models for more resolute efficacy predictions and the discovery of new therapeutic targets, resistance mechanisms, and biomarker signatures of response
- How robust systems of myeloid engraftment, including hematopoietic stem cells for immune-oncology modeling and AML engraftment for high throughput multipatient in vivo screens, have now provided expanded PDX screening with a wider scope of therapeutic agents
- Advancement of coupled-PDX trials, where clinical trials are combined with companion PDX studies to help guide follow-on trial design

Peter King
Principal Scientist
PDS-PDM - Imaging
Janssen Research & Development

12.35 Imaging The Immune System In Translational Models

- Tracking of immune cells in vivo
- Understand immune cell function in translational models and how this changes during treatment
- Drive the decision-making processes for drug-candidate selection
- Aid patient selection in clinic

Bryan Welm
Associate Professor &Investigator
Huntsman Cancer Institute University of Utah

Peter King
Principal Scientist
PDS-PDM - Imaging
Janssen Research & Development

Speaker to be Confirmed:
Champions Oncology

1.00 Session Q&A Panel

- How can -omic, imaging and other technologies be merged to characterize and enhance the translational assessment of immunotherapies?
- In which situations should PDX be used as a suitable surrogate for screening novel immunotherapies?
- How should we advance PDX tumor biology platforms for drug advancement?
- Does pre-clinical success with PDX models equal clinical translatability?

1.20 Lunch & Networking

Modelling Cancer Drug Response In-Vitro

Session Purpose:

The advent of the range of 3D models now available has presented a new dimension to cancer research. Promising to better mimic tumor biology and the in-vivo environment than classical 2D systems, they present an opportunity to facilitate more efficient and translatable drug discovery research. This said, major questions surround their utility and applicability. This session will seek to address these outstanding issues and showcase the opportunities and ultimately the impact organoids and other 3D tumor models have had on IO development.

John Westwick
CEO
Resonant Therapeutics, Inc

2.15 The Value of Novel In-Vitro Models for Exploring Compound Activity, Mechanism Of Action And Discover & Validate Biomarkers

- Highlighting the development of novel tumor microenvironment models, and Resonant's approach linking target and therapeutic candidate identification and functional validation
- Combining high-throughput fidelity phenotypic screens and machine learning strategies to accelerate the process, and result in unprecedented speed in the identification of novel, efficacious anti-tumor monoclonal antibodies

Joshua Breunig
Associate Professor & Board of Governors Regenerative Medicine
Cedars-Sinai Medical Center

2.40 "Personalized" Modeling Of Diverse Tumor Subtypes Via Single-Copy Somatic Transgenesis

- Strategies for combining single-copy somatic transgenesis with CRISPR genome editing to generate patient-derived mutation signatures in in vivo mouse and 3D human organoid models to accurately model clinical tumor subtypes in a "personalized" manner
- Methodologies for interrogating human tumor heterogeneity over space and time as well as for credentialing of models with single-cell RNA sequencing
- Examples of preclinical studies investigating strategies to impede tumor growth and development by immunotherapy, metabolic targeting, and therapeutic mimicry

John Westwick
CEO
Resonant Therapeutics, Inc

Joshua Breunig
Associate Professor & Board of Governors Regenerative Medicine
Cedars-Sinai Medical Center

3.05 Session Q&A Panel

- What key components should be considered when developing in vitro tumor models to ensure that they are more physiologically relevant?
- Does context of use for microphysiological systems remain a critical factor in achieving success within industry?
- What methods should be utilized to evaluate and validate new technologies for advanced 3d in vitro immuno-oncology models?
- What are the greatest opportunities and challenges in adoption of more predictive 3D models?
- What key components should be considered when developing a predictive 3D model

3.15 Afternoon Refreshments & Networking

Engineering Cancer Microenvironments; What Are We Modelling, And What Should We Be Modelling For?

Session Purpose:

It has become increasingly evident that the tumor microenvironment is equally important for tumor growth, progression and drug response. While some models enable high-throughput screening of drugs, they cannot accurately re-capitulate the immune contexture alongside the dynamic nature, heterogeneity and complexity of the microenvironment. This session will aim to review the admixture of models which can re-create the microenvironment, retain tumor-immune contexture and keep clinical correlation.

Tiina Kähkönen
Research Director
Pharmatest Services

3.45 Importance of the Microenvironment in Evaluating IO Therapy Response – Case Studies From Bone Metastasis Models in Humanized Mice

- Bone metastases as a clinical problem, and how to model them using preclinical models
- Basis of osteoimmunology and targeting immune cells in bone
- Differential efficacy of immunotherapy in primary and bone metastasis models

Ksenya Shchors
Principal Scientist
Pfizer

4.00 From Improved Models of Immunosuppressive Tumor Microenvironment to Effective Therapeutic Strategies

- Highlighting the complexity of tumor microenvironment
- Exploring the rational selection of preclinical models
- Demonstrating the Evaluation of therapeutic efficacy of tumor microenvironment targets

Robin Parihar
Assistant Professor, Center for Cell and Gene Therapy
Baylor College of Medicine

4.25 Investigating the Effects of MDSCs, M2 Macrophages, and Tregs on Human CAR-based Cellular Therapies via a Novel TME Xenograft

- Understand the role of myeloid-derived suppressor cells (MDSCs) in patients who fail CAR-T cell therapy
- Present a novel xenograft model of the TME for understanding mechanisms that limit immune therapies in solid tumors
- Discuss the different roles of MDSCs, inhibitory macrophages, and Tregs of the TME in affecting cell therapies

Ksenya Shchors
Principal Scientist
Pfizer

Robin Parihar
Assistant Professor, Center for Cell and Gene Therapy
Baylor College of Medicine

4.50 Session Q&A Panel

- How can models better replicate a more natural and translationally relevant tumor microenvironment?
- What are the fundamental differences in immune composition, tumor microenvironments and disease progression between mice and humans? How can we overcome these and further minimize or account for this gap?
- What role should preclinical metastasis models play in confirming the role of the TME & efficacy of therapeutics?
- What is the biology and clinical significance of the immune component such as myeloid-derived suppressor cells, macrophages etc. in the TME

5.00 Close of Conference Day One

The Jackson Laboratory
Leading the search for tomorrow's cures

Evening Reception & Poster Session Hosted by The Jackson Laboratory

CONFERENCE DAY TWO
JANUARY 24TH 2019

James Hodge
Deputy Chief Tumor Immunology and Biology, Senior In vestigator, Head, Recombinant Vaccine Group
National Cancer Institute

8.25 **Chairperson's Opening Remarks**

Methods for Modelling & Overcoming Resistant Tumors

Session Purpose:

A hallmark of immunotherapy is the durability of responses, but this unfortunately only translates into long-term survival for a subset of patients. Whilst the molecular mechanisms of resistance to immunotherapy are being actively studied, actionable strategies to combat therapeutic resistance to immunotherapy are limited. This session will review model-driven efforts that attempt to address the challenge posed by the evolving nature of the immune/cancer cell interactions amongst efforts to transform immunologically "cold" tumors into "hot" tumors.

Maryland Franklin
Vice President – Scientific Development
MI Bioresearch

8.30 **Syngeneic Models of Breast and Ovarian Cancers: Effects of Immune Modulatory Agents in Classically "Cold" Tumors**

- Utilization of murine breast cancer models in preclinical immuno- oncology pharmacology
- Pros and cons of the 4t1 mammary cancer model
- Characteristics of alternative syngeneic breast models
- Responses of a new model to checkpoint inhibition and t cell costimulation

Rosemary Akhurst
Professor of Anatomy Helen Diller Family Cancer Research Institute
UCSF

8.45 **Syngeneic Mouse Models For Studies Of Mechanism Of Resistance To Immune Checkpoint Blockade**

- Highlighting syngeneic mouse models in common use
- Chemically-induced squamous cell carcinoma model
- Exploring Mutational load and tumor response, intrinsic and acquired resistance amongst the role of TGFβ blockade in circumventing resistance

Saad Kenderian
Assistant Professor of Medicine and Oncology
Mayo Clinic

9.10 **Chimeric Antigen Receptor T-Cell Therapy for Solid Tumors**

- Discussing some of the key hurdles encountered by CAR T cells in the solid tumor microenvironment.
- Showcasing models highlighting T cell proliferation and persistence across the physical and biochemical barriers of solid tumors

Saad Kenderian
Assistant Professor of Medicine and Oncology
Mayo Clinic

Rosemary Akhurst
Professor of Anatomy Helen Diller Family Cancer Research Institute
UCSF

9.35 **Session Q&A Panel**

- How should environmental, genetic factors or treatment interventions be considered in the context of resistance?
- Primary, acquired or adaptive resistance – where should we pool our primary efforts?
- Why do some patients respond and not others?
- What model systems can we utilize to better identify biomarkers that predict response?
- Are there other pathways that can be targeted to improve clinical outcomes?
- What are the key advantages of using 'classic' syngeneic models over GEMM, 3D and other systems?

9.55 **Morning Refreshments & Networking**

Modelling Strategies to Enhance the Translational Confidence of Immunotherapy Combinations

Session Purpose:

The renaissance in cancer immunotherapy is bringing with it added complexity for combinatorial drug development. Given the lack of predictivness often attributed to current models, huge question marks still centre around key study design elements such as, scheduling, escalation strategies and patient selection. This section will look to elucidate models enabling the understanding the mechanism of action of tested compounds, and help with identifying rationale combination partners for best anti-tumor efficacy.

Isabel Kurth
VP, Research & Development
Rgenix

10.55 **The Changing Expectations of IO Model-Strategies; Key Considerations for Experimental Design in Predicting Combination Value**

- Exploring the value of pharmacodynamic vs predictive biomarkers to support IO development
- Highlighting the underlying model-strategy and translational validation of biomarkers supporting Rgenix's clinical candidates
- Discussing the seemingly changing 'expectations' of IO model strategies

James Hodge
Deputy Chief Tumour Immunology and Biology, Senior In vestigator, Head, Recombinant Vaccine Group
National Cancer Institute

11.20 **Non-Clinical Approaches To Predict Combination Value, Scheduling And Cycling Of IO Agents**

- Exploring model systems able replicate a more natural and translationally relevant tumor microenvironment
- Reviewing the 'necessity' of PDX, humanized and syngeneic models in aiding the understanding of underlying MoA and providing a rationale for the use of immunotherapy in multiple combination regimens
- Highlighting the development and impact of a rationally-driven preclinical strategy for rapidly assessing and translating combination therapies to the clinic

Jason DeVoss
Senior Scientist
Amgen Inc.

11.45 **Combining Oncolytic Viruses And Checkpoint – Bench To Bedside**

- Oncolytic viruses are emerging as a potent class of immunotherapies and preclinical and clinical data suggest that combination with checkpoint will be beneficial.
- Viruses presently in clinical development have varying infectivity & replication in rodents, presenting a potential challenge to researchers looking to utilize preclinical models.
- In preclinical models, oncolytic viruses engage both innate and adaptive immune responses resulting in robust anti-tumor efficacy in injected and uninjected tumors.

Jason DeVoss
Senior Scientist
Amgen Inc.

James Hodge
Deputy Chief Tumour Immunology and Biology, Senior In vestigator, Head, Recombinant Vaccine Group
National Cancer Institute

Isabel Kurth
VP, Research & Development
Rgenix

12.10 **Session Q&A Panel**

- How do we better handle the unexpected?
- What strategies should we employ to avoid immune-related adverse events and guide the future combination cancer immunotherapy
- What emerging models should we invest into to enhance the predictive confidence of combination testing and general de-risking of cytotoxic, targeted and IO clinical programs?
- How can preclinical models guide the selection of the best combo partner?

12.30 Lunch & Networking

Enhancing the Translational Confidence of T Cell–Redirection Strategies

Session Purpose:

Multiple methodologies exist for directing T cells to tumor cells. Checkpoint, CAR and BiTE's have generated much excitement given the range and level of function they can elicit from T-cells as well as the expansion of treatment possibilities they present for immunotherapies. This session will look to review emerging preclinical strategies for predicting, mediating and mitigating toxicities.

Sumiti Jain
Associate Director
Sangamo Therapeutics

1.30 Highly Efficient Gene Modification Using Zinc Finger Nucleases for Generation of Allogeneic T Cell Products

- Overview of zinc finger nucleases and innovations of the platform
- Allogeneic T cell editing and efficiencies
- Safety and specificity of ZFN-modified T cell products

Krista Mcnally
Scientist
Chimera Bioengineering

1.55 Activation-Induced Luciferase Expression for in vivo Identification, Monitoring and Evaluation of CAR-T Activation

- Exploring how next generation of engineered cell therapies will need to discriminate between diseased and healthy tissue,and demonstrate spatial and/or temporal activation in vivo
- Highlighting the development of an activation-inducible switch that will link the expression of luciferase (or other visualization agent) with T-cell activation
- Revealing how the mechanism driving the switch is tightly controlled and can be customized for dynamic range, timing, and overall signal output.

Brian Belmontes
Oncology Scientist
Amgen Inc.

2.20 Multispecific BiTE'S For Immuno-Oncology – Considerations In Efficacy And Safety

Stephanie Casey Parks
Scientist
Amgen Inc.

Krista Mcnally
Scientist
Chimera Bioengineering

Brian Belmontes
Oncology Scientist
Amgen Inc.

2.45 Session Q&A Panel

- How do we better handle the unexpected?
- What strategies should we employ to avoid immune-related adverse events and guide the future combination cancer immunotherapy
- What emerging models should we invest into to enhance the predictive confidence of combination testing and general de-risking of cytotoxic, targeted and IO clinical programs?
- How can preclinical models guide the selection of the best combo partner?

James Hodge
Deputy Chief Tumour Immunology and Biology, Senior In vestigator, Head, Recombinant Vaccine Group
National Cancer Institute

3.05 Chair's Closing Remarks & Close of Conference

PRECONFERENCE DEEP DIVES

Pre-Conference Day | Tuesday, January 22

Workshop A — 8.00 - 11.00am

Challenges, Insights, and Future Directions for Experimental Models in Cancer Immunotherapy

Understanding tumor placement, immune composition, response to treatment, and molecular characterization for the model of interest can be invaluable when designing the most appropriate study for your research goals. However, major issues remain not just in selecting and optimizing models and tools for cancer immunotherapy research but in selecting who to work with and when.

Discussions in this session will centre on:

- The range of current IO models available amongst their strengths and weaknesses
- Mouse syngeneic models, their genetic backgrounds and use in IO for mono or combination therapy
- How to identify, select and work with model developers and CRO's available

Workshop Leader:

Shiva Kazerounian
Principal Scientist,
In Vivo Pharmacology Lead
Berg Pharma

Workshop B — 11.30 - 2.30pm

Utilize Humanized Mice for Your Immuno-Oncology Preclinical Research For Increased Translational Success

Understanding the interactions between human immune cells and tumors is paramount when devising treatment strategies that prevent tumor evasion of immune cells and improve cytotoxic responses.

Discussions in this session will centre on:

- Patient derived xenograft (PDX) mouse models that recapitulate disease progression and respond to standard of care (SoC) and experimental therapies
- Specialized, immunodeficient mouse models that efficiently reconstituted with functional human immune cells
- How Tumor-bearing, humanized NSG and NSG-SGM3 (Onco-Hu) mice can act as a valuable tool for immuno-oncology research

Workshop Leader:

James Keck
Senior Director for the Clinical Lab & In Vivo Pharmacology Services
The Jackson Laboratory

PRECONFERENCE DEEP DIVES

Pre-Conference Day | Tuesday, January 22

Workshop C — 3.00 - 6.00pm

Organoids and the Transgenic Manipulation of Human Tumor Models

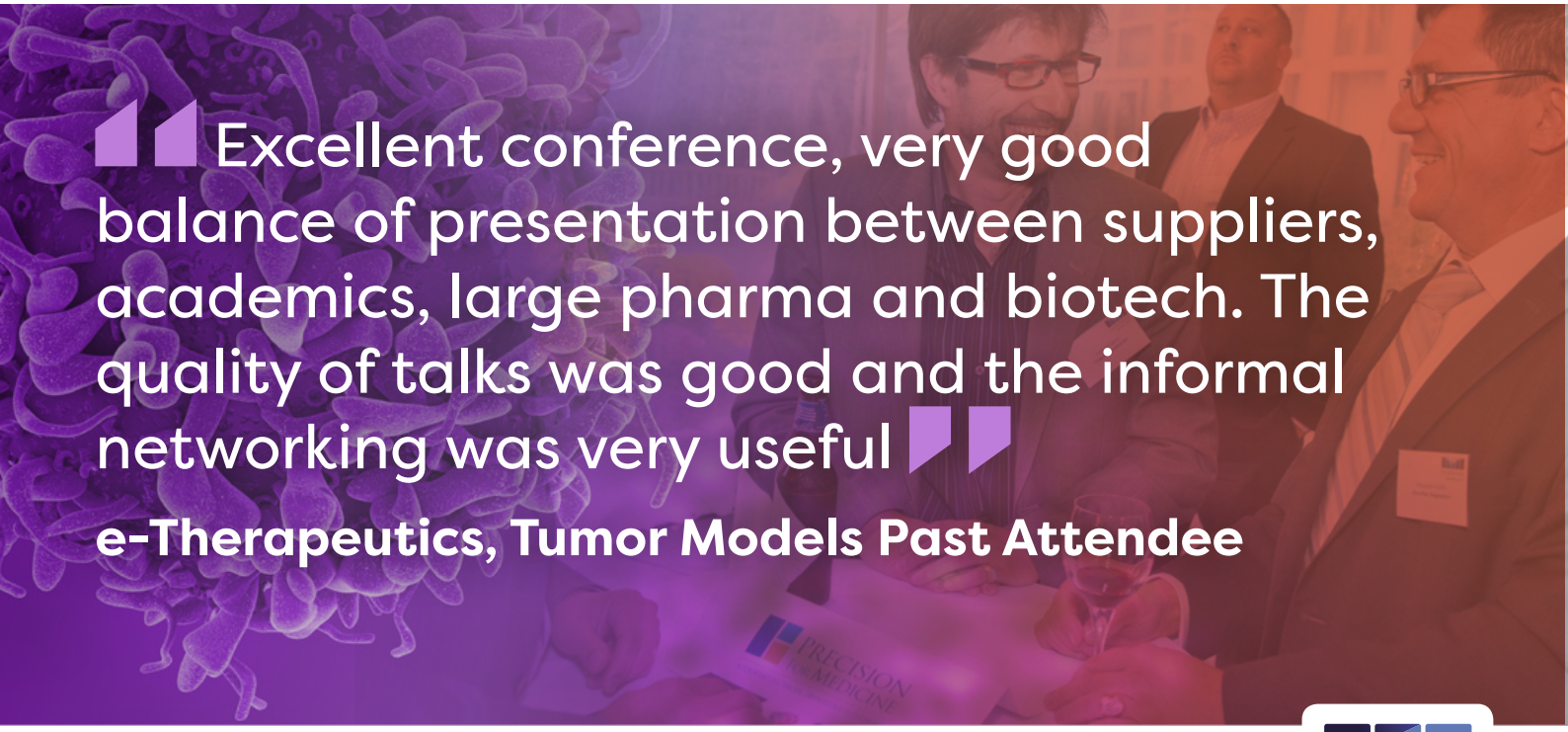
Rapid advances in therapeutic areas like cancer immunotherapy, has created a need for translational strategies to more effectively guide indication selection, understand mechanisms of resistance and identify biomarkers of response. 3D organoids have presented huge opportunities to bridge the in vitro and in vivo gap. This workshop this session will look to explore the technical advances in designing these models. It will cover how organoid systems are being further adapted towards applications within the basic and pharmaceutical setting through the use of transgenic and other editing technologies as well.

Discussions in this session will center on:

- How to develop flexible strategies with iPSC-derrived organoids cultures to maximize predictability and translatability of early discoveries
- Assessing the translational capability and remaining limitations of organoid cultures
- Applications of organoids in understanding of disease biology, mechanisms to disease and opening up new avenues for the path to target
- Cross comparative analyses of data generated in CRISPR/transgenically edited organoid systems to in vivo systems

Workshop Leader:

Joshua Breunig
Associate Professor
& Board of Governors
Regenerative Medicine
Cedars-Sinai Medical Center



SPONSORS

Lead Partner

The Jackson Laboratory
Leading the search for tomorrow's cures

The Jackson Laboratory is a leading provider of cancer mouse models and in vivo oncology services and a National Cancer Institute designated Cancer Center. Drawing on decades of research experience we provide capabilities around model selection, husbandry and customizable oncology studies to help clients and researchers evaluate novel anti-cancer therapies. Our diverse oncology study protocols range from traditional xenograft services to PDX cancer models and advanced humanized mouse models for immuno-oncology drug development.

www.jax.org

Hosting Partner

CrownBio
CONNECTING SCIENCE TO PATIENTS

Our mission is to provide the "gold-standard" collection of well characterized models and services for drug discovery to help our clients reduce the attrition rate of candidate compounds in the clinic, before they enter the clinic. Crown Bioscience, Inc. is a Preclinical CRO with expertise in the disease areas of Oncology and Metabolic Disease. We are known for the breadth and quality of our in vitro and in vivo models, as well as our ability to help clients quantify the real efficacy and pharmacological profile of their candidate before they move into the clinic.

www.crownbio.com

Program Partner

CHAMPIONS ONCOLOGY

Champions Oncology was founded by renowned specialists in the field of cancer diagnosis, treatment, and research. The Champions Oncology team is comprised of seasoned oncology professionals passionately dedicated to working to accelerate oncology drug development, improve treatment outcomes and extend lives. Our core platform, the Champions TumorGraft™ offers an enhanced xenograft mouse avatar model for growing and testing human tumors. Champions Personalized TumorGrafts™ empower patients and physicians using an in vivo xenograft mouse avatar based diagnostic model that has shown to be predictive of a patients' clinical response to cancer treatments and anticancer therapies

www.championsoncology.com

Spotlight Partner

MI Bioresearch
Advancing Your Preclinical Oncology

MI Bioresearch (MI), a preclinical oncology service provider, offers in vitro services, oncology pharmacology, in vivo imaging, and focal radiation to support research programs. Our team explores the effects of your drugs and biologics using both

human and syngeneic models and multi-modality imaging systems. MI provides you with decision-driving data to help advance your drug candidate toward the next cancer research breakthrough. One Focus. One Purpose. Oncology Research.

www.mibioresearch.com

Spotlight Partner

hera BioLabs

Hera Biolabs, Inc., is an innovative pre-clinical CRO utilizing cutting-edge gene-editing technologies to create novel in vivo models for oncology. Given our mission to accelerate cancer research and rug development, we focus upon rat models to deliver translationally-relevant, high-quality results. Using proprietary technologies, Hera built the SRGTM Platform, a double knockout Sprague-Dawley rat engineered for T-cell, B-cell, and NK cell deficiency. Our first SRG model is the OncoRat®, uniquely suited for xenograft studies given its excellent tumor take-rates and ability to deliver masses 10x that of mouse models in half the time – all without the increased risk of genetic drift from multiple passages as observed in mice. Find out more at:

www.herabiolabs.com

Spotlight Partner

pharmatest

Pharmatest Services Ltd is a CRO offering preclinical efficacy services for the pharmaceutical industry. We offer both in vitro and in vivo models in the fields of oncology and skeletal diseases. In oncology we have special expertise in clinically predictive orthotropic and metastasis models, and especially models of bone metastasis.

www.pharmatest.com

Exhibition Partner

studylog®
Animal Study Workflow Software

Studylog's Animal Study Workflow Software® is designed for biomedical animal research and provides features for the design, planning, execution, analysis, and reporting of animal studies in a standardized, highly efficient manner, while protecting data integrity. Reducing many labs' study-related labor by half, Studylog automates and streamlines the entire animal study process, making it easier, faster and cheaper, so researchers have more time and resources to get their job done.

www.studylog.com

BECOME A PARTNER

Diane McKenna
Commercial Director, PREDiCT
Tel: +44 (0)20 3141 8700
Email: sponsor@hansonwade.com

READY TO REGISTER?

3 EASY WAYS TO BOOK

www.tumor-models-sf.com/register/

Tel: +44 (0)203 141 8700

Email: register@hansonwade.com

1. Optimize model selection & characterization
2. Benchmark against leading pharmaceutical organizations
3. Explore model advances & drive translational decision making

Team Discounts*

2 Delegates 10%
3 Delegates 15%
4+ Delegates 20%

Please note that discounts are only valid when two or more delegates from one company book and pay at the same time.

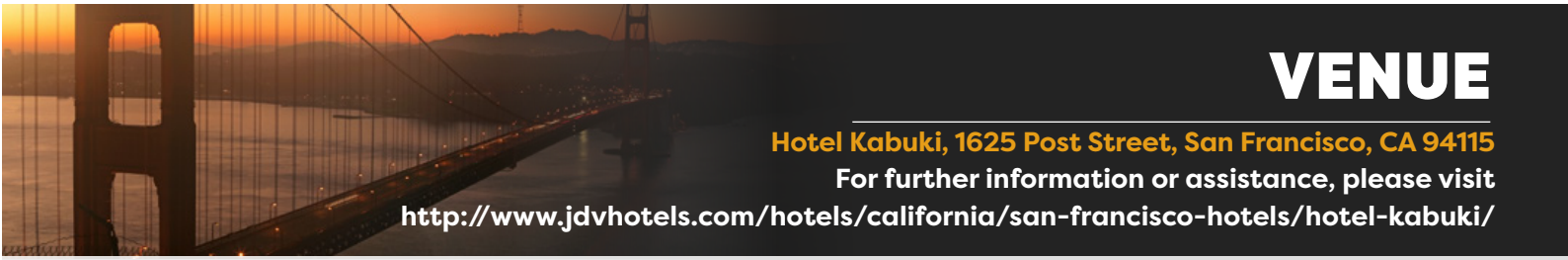
EARLY-STAGE BIOTECH OR ACADEMIC'S	Register & Pay Before Friday, October 26 (Save $300)	Standard Price
Conference + 3 Workshops	$2,596	$2,896
Conference + 2 Workshops	$2,197	$2,497
Conference + 1 Workshops	$1,798	$2,098
Conference Only	$1,399	$1,699
Workshop Only	$499	

ESTABLISHED DRUG DEVELOPERS	Register & Pay Before Friday, October 26 (Save $600)	Standard Price
Conference + 3 Workshops	$3,696	$4,296
Conference + 2 Workshops	$3,097	$3,697
Conference + 1 Workshops	$2,498	$3,098
Conference Only	$1,899	$2,499
Workshop Only	$699	

MODEL OR SOLUTION PROVIDERS	Register & Pay Before Friday, October 26 (Save $600)	Standard Price
Conference + 3 Workshops	$4,196	$4,796
Conference + 2 Workshops	$3,597	$4,197
Conference + 1 Workshops	$2,998	$3,598
Conference Only	$2,399	$2,999
Workshop Only	$699	

**The small-biotech discounted rate is available to allow newer, less established companies to attend this meeting. Email info@hansonwade.com to enquire about the rate or apply. Eligibility criteria states that the company needs to be less than 8 years old and with less than 50 full time employees. Model and service providers are excluded. All bookings at this rate are subject to organizer approval. T&Cs apply.

Email info@hansonwade.com to enquire about the rate or apply.



VENUE

Hotel Kabuki, 1625 Post Street, San Francisco, CA 94115

For further information or assistance, please visit

http://www.jdvhotels.com/hotels/california/san-francisco-hotels/hotel-kabuki/

TERMS & CONDITIONS

Full payment is due on registration. Cancellation and Substitution Policy: Cancellations must be received in writing. If the cancellation is received more than 14 days before the conference attendees will receive a full credit to a future conference. Cancellations received 14 days or less (including the fourteenth day) prior to the conference will be liable for the full fee. A substitution from the same organization can be made at any time. Changes to Conference & Agenda: Hanson Wade reserves the right to postpone or cancel an event, to change the location or alter the advertised speakers.

Hanson Wade is not responsible for any loss or damage or costs incurred as a result of substitution, alteration, postponement or cancellation of an event for any reason and including causes beyond its control including without limitation, acts of God, natural disasters, sabotage, accident, trade or industrial disputes, terrorism or hostilities. Data Protection: The personal information shown and/or provided by you will be held in a database. It may be used to keep you up to date with developments in your industry.

Please note that discounts are only valid when three or more delegates from one company book and pay at the same time. Team discounts cannot be applied to academic pricing

Sometimes your details may be obtained or made available to third parties for marketing purposes. If you do not wish your details to be used for this purpose, please write to: Database Manager, Hanson Wade, Suite A, 6 Honduras Street, London EC1Y 0TH