



Program 26th

9:20 – 9:30 h CET. Welcome to the SMOT by Beatriz Llamusi, CSO and co-founder at Arthex Biotech.

9:30 – 11:00 h CET. Successful entrepreneurship projects.

Chairwoman of the session: Beatriz Llamusi, CSO and co-founder at Arthex Biotech

- “Impact Investment in Pediatric Innovation (from start-ups to funds)”, Marc Ramis, Managing Partner at Montana Impact Fund and Co-Founder and Partner of Chasing Science, (Spain). *Online*.
- “Technology transfer of innovative gene writing tools in the Spanish Biotech Ecosystem”, Avencia Sánchez-Mejías, CEO & Co-Founder at Integra Therapeutics (Spain). *Online*.
- “How to turn a therapeutic project into a clinical stage company”, Beatriz Llamusi, Co-Founder and CSO at Arthex Biotech (Spain).
- “From academia to the clinic: positioning BO-112 (a dsRNA agonist) as treatment option for skin cancers”, Marisol Quintero, CEO at Highlight Therapeutics (Spain).
- “Creating Value in Biotechnology through Entrepreneurship and Investment”, Julen Oyarzabal, CSO at Syngoi Technologies (Spain).

11:00 – 11:30 h CET. Coffee break and networking.

11:30 – 12:30 h CET. Round table: From bench to bed.

Moderator:

Andrés Fernández, CSO at Landsteiner Genmed, Co-Founder & Drug Dev. Advisor at Nanobots Therapeutics & Founder at AF Biopharma Consulting.

Participants:

Juan Solís, partner at Arvor Consulting (Spain).
Marisol Quintero, CEO at Highlight Therapeutics (Spain).
Julen Oyarzabal, CSO at Syngoi Technologies (Spain).
Pawel Soluch, CEO at Spinally Medical (Spain).

12:30 – 13:30 h CET. Lunch and networking.



Program 26th

13:30 – 15:30 h CET. Session 1. How to start? What to consider. Technology Transfer, Regulatory and IP issues.

Chairwoman of the session: Anabel Sanz. Head of Technology and Business Development at Centre for Genomic Regulation (CRG) in Barcelona.

- “From the laboratory to the patient. CaixaImpulse Program supporting innovation in biomedicine and health”, Alexandre Esteban, Program Manager at Fundación Bancaria “La Caixa” (Spain).
- “A general overview of the main regulatory milestones to be achieved during development”, Marta Rayo Lunar, Director of the Development & Writing Department at Asphalion (Spain).
- “The importance of FTO in the biomedical field”, Gustavo Fuster, MBA, Pharmacist, Spanish Attorney-at-Law, Spanish and European Patent Attorney at Hoffman Eitle (Spain).
- “CDTI funding and investment instruments for new technology-based companies”, Juan Luis Romera Santiago, Technology and scientific advisor in Department of Institutional Promotion and Regional Cooperation at Centre for the Development of Technology and Innovation (CDTI) (Spain).
- “From Research to Innovation: Small steps to make a big difference”, Anabel Sanz. Head of Technology and Business Development at Centre for Genomic Regulation (CRG) in Barcelona (Spain).

15:30 – 16:00 h CET. Coffee break and networking.

16:00 – 17:30 h CET. Session 1 (continuation). How to start in the oligos space.

Chairman of the session: Mano Manoharan, Senior Vice President, Innovation Chemistry & Alnylam Distinguished Scientist at Alnylam Therapeutics

- “Living in the World of RNA Therapeutics: Challenges and Opportunities”, Muthiah Mano Manoharan, Senior Vice President, Innovation Chemistry & Alnylam Distinguished Scientist at Alnylam Therapeutics (US).
- “Precise gene writing in mammalian genomes”, Marc Güell, Co-founder and Scientific Head at Integra Therapeutics | Professor at Pompeu Fabra University (Spain). *Online*.
- “Oligonucleotides: key non-coding features in linear closed DNA”, Julen Oyarzabal, CSO at Syngoi Technologies (Spain).
- “Networking is key in the development of nucleic acid therapeutics”, Virginia Arechavala Gomeza, Ikerbasque Research Professor, Head of Nucleic Acid Therapeutics for Rare Disorders Group at Biobizkaia Health Research Institute (Spain).

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9:00 – 10:30 h CET. Session II: Chemical diversity, manufacturing and design.

Chairman of the session: Ramón Eritja, Professor at IQAC-CSIC

- “Development of biosensors for detection of SARS-CoV-2 virus by Triplex Enhanced Nucleic Acid Detection Assay (TENADA)”, Ramon Eritja, Professor at IQAC-CSIC and Group leader of Nucleic Acids Group (Spain).
- “Overcoming Oligonucleotide Manufacturing Challenges”, Trishul Shah, Director of Business Development at Polypeptide Laboratories Inc. (US).
- “Oligos-based therapies: improving their efficiency through the use of encapsulation systems”, Sandra Freitas, Scientific Specialist in Pharma Drug Delivery Systems at Nanovex Biotechnologies (Spain).
- “Drug and target discovery with explainable AI”, Lykke Pedersen, Chief Pharma Officer, Head of RNA Therapeutics at Abzu (Denmark).
- “Advancing RNA Analysis: Nostrum Biodiscovery's Multiscale In Silico Pipeline and Cutting-Edge Computational Tools”, Dr. Vito Genna, Director of Nucleic Acid Department at Nostrum Biodiscovery (Spain).

10:30 – 11:00 h CET. Coffee break and networking.

11:00 – 13:00 h CET. Session III. Discovery and preclinical.

Chairman of the session: Ekkehard Leberer, Senior Life Sciences Consultant at ELBIOCON

- “RNA therapies for cardiovascular diseases. A present hope”, Carmen Sánchez, Research Coordinator at Biocardio (Spain).
- “Emerging Therapeutic Paradigms in Liver Disease Treatment: Exploiting the Potentials of RNA Technology”. Dr. Martínez Chantar, Group Leader at the Liver Disease Lab in CIC BioGUNE (Spain).
- “New RNA therapies for the treatment of childhood cancer”, Gisela Lorente, CEO at Aptadel Therapeutics (Spain).
- “Modulation of NUMB alternative splicing as a therapeutic tool for the treatment of oncological indications”, Jordi Hernández, Principal at Alira Health and researcher at Centre for Genomic Regulation (CRG) in Barcelona (Spain).
- “Antisense oligonucleotides in obesity-related metabolic pathologies”, Santiago Vernia, Imperial College of London (UK).
- “Therapeutic RNA delivery into the brain using protein-based nanocapsules”, Ekkehard Leberer, Senior Life Sciences Consultant at ELBIOCON (Germany).

13:00 h – 14:00 h CET. Lunch and networking.

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14:00 – 16:00 h CET. Session IV. Preclinical tools and development.

Chairman of the session: Juanma Fernández, Senior Researcher at Institute for Bioengineering of Catalonia

- “Muscle-on-chip models for preclinical evaluation of potential therapies”, Juanma Fernández, Senior Researcher at Institute for Bioengineering of Catalonia (Spain).
- “Creating a comprehensive toolbox for oligonucleotide drug discovery and development”, Dave Madge, Vice President of Discovery Services, WuXi AppTec (China).
- “Custom-Tailored Solutions in Preclinical Research and Development of Oligonucleotide- and Nucleic Acid-Therapeutics”, Dr. Soham Mandal, Head of Synthesis - Discovery Chemistry and Delivery at LGC Group (UK)
- “Preclinical development of antimiR ATX-01”, Nuria Barquero, Head of Toxicology at Arthex Biotech (Spain).
- “CMC Strategies for Assuring Quality While Accelerating Development of Oligonucleotides”, Judy Carmody founder of Carmody Quality Solutions, LLC. (US). *Online*.
- “Therapeutic Targeting of a Pathological MicroRNA in Metabolic, Muscular and Cardiac Diseases”, Anders M. Näär, Professor of Metabolic Biology, Vice Chair, Dept. of Nutritional Sciences & Toxicology, Innovative Genomics Institute, University of California, Berkeley (US). *Online*.

16:00 – 16:30 h CET. Coffee break and networking.

16:30 – 18:00 h CET. Session IV (continuation). Clinical Studies.

Chairwoman of the session: Anne Marie Bleau, Clinical Head at Sylentis

- “New Advances in siRNA-based Topical Therapy for Ocular Diseases”, Anne Marie Bleau, Clinical Head at Sylentis, (Spain).
- “mRNA Vaccines for Cancer and Infectious Diseases”, Eric Marcussen, Co-founder, Board Member & Chair of the Scientific Advisory Board at Providence Therapeutics (Canada). *Online*.
- “Clinical Development of ApTOLL, an Aptamer to Reduce Inflammation”. Macarena Hernández-Jimenez, Chief Scientific Officer at AptaTargets (Spain).
- “Phase 1 Research: Advancing Medical Innovation and Elevating Patient Well-being”, Dra Ana Londoño, MD, PhD Clinical Pharmacologist, Clinical Trials Unit at Hospital Universitario Dr Balmis (Spain).

18:00 h – 18:15 h CET. Congress closing and wrap up.

Mano Manoharan (Alnylam Therapeutics) / Ramón Eritja (CSIC) & Beatriz Llamusí (Arthex Biotech).