

# Program

[Interactive ProgramPROGRAM AT A GLANCE](#)

**14:00 – 14:10**

## **WELCOME ADDRESS**

*Plenary Hall (Ballsaal)*

**Dirk Busch**, Technical University of Munich, Germany

**Adi Barzel**, Tel-Aviv University, Israel

**14:10 – 14:45**

## **KEYNOTE LECTURE: BALANCING PERSISTENCE AND EFFECTOR FUNCTIONS IN CAR T-CELLS**

*Plenary Hall (Ballsaal)*

**Chair: Adi Barzel**, Tel-Aviv University, Israel

14:10 – 14:35 Presentation

**Michel Sadelain**, Memorial Sloan Kettering Cancer Center, USA

14:35-14:45 – Q&A

**14:10 – 15:45**

## **SESSION 1: REAL-WORLD EXPERIENCE, NOVEL CLINICAL APPROACHES AND COMBINATION THERAPIES**

*Plenary Hall (Ballsaal)*

**Chairs: Chiara Bonini**, Vita-Salute San Raffaele University, Italy

**Michael Hudecek**, LETSimmun Consortium, Germany

14:10 – 14:35

## **KEYNOTE LECTURE: CONQUERING RESISTANCE MECHANISMS IN ENGINEERED CELL THERAPIES**

**Stanley Riddell**, Fred Hutchinson Cancer Research Center, USA

14:35 -14:50

## **RWE: BEYOND CRS AND ICANS: HEMATOTOXICITY AND INFECTIONS AS DRIVERS OF CAR-T NRM**

**Marion Subklewe**, LETSimmun Consortium, Germany

14:50 – 15:05

## **CLINICAL LEARNINGS AND NEW FRONTIERS FOR B CELL-DRIVEN DISEASES**

**Jennifer Brogdon**, Novartis, USA

15:05 – 15:45

Panel discussion

**15:45 – 16:30**

## **COFFEE BREAK, YOUNG SCIENTIST FORUM, EXHIBITION & POSTER VIEWING**

*Exhibition & Networking Area (Grosser Saal)*

15:55 – 16:25

## **THE RESEARCHER'S JOURNEY: OVERCOMING EARLY CAREER CHALLENGES**

**Moderator: Stanley Riddell**, Fred Hutchinson Cancer Research Center, USA

Young scientists:

**Alon Richter**, Tel Aviv University, Israel

**Sophia Stock**, Ludwig Maximilian University of Munich, Germany

**Bettina Bernard**, Technical University of Munich, Germany

Faculty members:

**Marion Subklewe**, LETSimmun Consortium, Germany

**Hans Stauss**, University College London, UK

**Chiara Bonini**, Vita-Salute San Raffaele University, Italy

**16:30 – 18:15**

**SESSION 2: SUPERPOWERED LYMPHOCYTES**

*Plenary Hall (Ballsaal)*

**Chairs:** Mirjam Heemskerk, Leiden University Medical Center, Netherlands

**Wolfgang Kastenmüller**, University of Wurzburg, Germany

16:30 – 16:45

**A PRIVATE CROSSTALK ESTABLISHED BY TUMOR-TARGETED CYTOKINE RELEASE RESCUES CAR-T ACTIVITY AND ENGAGES HOST T-CELLS AGAINST GLIOBLASTOMA**

**Luigi Naldini**, San Raffaele Telethon Institute for Gene Therapy, Italy

16:45 – 17:00

**ENGINEERING T-CELLS FOR SUPERIOR PERFORMANCE**

**George Coukos**, Ludwig Cancer Research Lausanne Branch, Switzerland

17:00 – 17:15

**OVERCOMING T-CELL SENESENCE BY GENOME EDITING**

**Chiara Bonini**, Vita-Salute San Raffaele University, Italy

17:15 – 17:25

**STAB-T-CELLS SECRETING ANTI-BCMA T-CELL ENGAGERS DEMONSTRATE SUPERIOR ANTITUMOR ACTIVITY COMPARED TO ANTI-BCMA CAR T-CELLS**

**Javier Arroyo-Rodenas**, University Hospital October 12, Spain

17:25 – 17:35

**T-CELL-MEDIATED ADCC AS A THERAPEUTIC STRATEGY FOR SOLID CANCERS**

**Yaron Carmi**, Tel Aviv University, Israel

17:35 – 17:45

**ADDRESSING TUMOUR MICROENVIRONMENT RESISTANCE MECHANISMS TO IMPROVE CAR T-CELL EFFICACY**

**Paul Neeson**, Peter MacCallum Cancer Centre, Australia

17:45 – 18:15

Panel discussion

**18:15 – 20:00**

## **MEET THE POSTER PRESENTERS & WELCOME RECEPTION**

*Exhibition & Networking Area (Grosser Saal & Forums 4-7)*

**09:00 – 10:10**

## **SESSION 3: NON-VIRAL CAR/TCR GENE TARGETING**

*Plenary Hall (Ballsaal)*

**Chairs: Antonio Bertolotti**, A\*STAR, Singapore

**Elvira D'Ippolito**, Technical University of Munich, Germany

09:00 – 09:15

### **COMBINING CRISPR AND TRANSPOSON-BASED TECHNOLOGIES FOR IMPROVED CAR-T THERAPIES**

**Juan Roberto Rodriguez-Madoz**, Cima Universidad de Navarra, Spain

09:15 – 09:30

### **CAR-Ts GOING NON-VIRAL FROM BENCH TO BEDSIDE (AND BACK)**

**Michael Hudecek**, LETSimmun Consortium, Germany

09:30 – 09:40

### **CELL AVIDITY NEXT GENERATION BINDING: UNDERSTAND THE MECHANISM OF ACTION THROUGH CELL-CELL BINDING**

**Andrea Candelli**, Lumicks, Netherlands

09:40 – 10:10

Panel Discussion

**10:10 – 10:50**

## **COFFEE BREAK, EXHIBITION, INDUSTRY PRESENTATIONS &**

## POSTER VIEWING

*Exhibition & Networking Area (Grosser Saal)*

10:30 – 10:40

**GENOME EDITING FOR THE TREATMENT OF HUMAN DISEASE NETWORK (GenE-HumDi). COST ACTION CA21113**

**Daniela Benati**, University of Modena and Reggio Emilia, Italy

**10:50 – 12:20**

## SESSION 4: CUTTING-EDGE INDUSTRY ADVANCEMENTS

*Plenary Hall (Ballsaal)*

**Chairs: Johanna Olweus**, Oslo University, Norway

**Sebastian Kobold**, LMU Hospital, Germany

10:50 – 11:20

**ENHANCING CELL THERAPY MANUFACTURING: SCALABLE AND FLEXIBLE SOLUTIONS FOR T CELL ISOLATION**

**Hany Meås**, Thermo Fisher Scientific, Norway

11:20 – 11:35

**AUTOMATED, SCALABLE IMMUNE CELL CIRCULATION PLATFORM FOR CANCER MODELS**

**Mark Lyons**, Hooke Bio, Ireland

11:35 – 11:50

**MOLECULAR PIXELATION QUANTIFIES CAR T ACTIVITY AND REVEALS CANCER – SPECIFIC PROTEIN PATTERNS OF INDIVIDUAL CELLS**

**Hanna van Ooijen**, Pixelgen Technologies, Sweden

11:50 – 12:20

Panel Discussion

**12:20 – 13:50**

**LUNCH BREAK, TOP 10 POSTER PRESENTATIONS,**

## **EXHIBITION & POSTER VIEWING**

*Exhibition & Networking Area (Grosser Saal)*

### **12:40 – 13:30 TOP 10 POSTER PRESENTATIONS**

**Chair: Maayan Zaba, Tel Aviv University, Israel**

**12:40 – 12:45**

**T CELL ENGINEERING USING V(D)J RECOMBINATION ALLOWS TUMOR GROWTH INHIBITION IN MICE**

**Tal Veig, Tel Aviv University, Israel**

**12:45 – 12:50**

**FCγRI-DRIVEN T CELL-MEDIATED ADCC AS A STRATEGY FOR TREATING SOLID TUMORS**

**Alon Richter, Tel Aviv University, Israel**

**12:50 – 12:55**

**PROSTANOID-INSENSITIVE CHIMERIC ANTIGEN RECEPTOR MODIFIED T CELLS MEDiate THERAPEUTIC EFFICACY IN SOLID CANCER MODELS**

**Lisa Gregor, LMU Clinic, Germany**

**12:55 – 13:00**

**TUMOR-INFILTRATING LYMPHOCYTES SECRETING T CELL-ENGAGING ANTIBODIES INDUCE REGRESSION OF PATIENT-DERIVED LUNG CANCER XENOGRAFTS**

**Anaïs Jiménez-Reinoso, 12 de Octubre University Hospital, Spain**

**13:00 – 13:05**

**FINE-TUNING SIGNAL-STRENGTH IN T CELL-BASED ADOPTIVE CELLULAR ANTI-CANCER THERAPIES: TRANSIENT LOW-DOSE MEK-INHIBITION FOR POTENTIATING ENGINEERED T CELLS**

**Franziska Füchsl, Technical University Munich, Germany**

**13:05 – 13:10**

**OPTIMIZING ADOPTIVE IMMUNOTHERAPY OF LEUKEMIA WITH CD1C-REDIRECTED T AND INKT CELLS**

**Michela Consonni, IRCCS San Raffaele Scientific Institute,**

Italy

**13:10 – 13:15**

**POTENCY TUNED NOVEL CD70 CAR-T CELLS WITH A COMPUTATIONALLY DESIGNED CD27:CD70 BINDING INTERFACE FOR ACUTE MYELOID LEUKEMIA**

**Tiffany Que**, UNIL-CHUV, Switzerland

**13:15 – 13:20**

**T CELL STIMULATION AND PIFITHRIN-ALPHA CONTROL DNA DELETION SIZES AND ANEUPLOIDY IN CRISPR-EDITED HUMAN T CELLS**

**Jule Müschen**, Technical University Munich, Germany

**13:20 – 13:25**

**UNRAVELING T-CELL-RECEPTOR (TCR) SPECIFICITY: TCR LANGUAGE MODELS TO PREDICT AND DESIGN TCR:EPITOPE INTERACTIONS**

**Adrian Straub**, Technical University Munich, Germany

**13:25- 13:30**

**ENGINEERING B CELLS THROUGH THE INTEGRATION OF HIV-RECEPTOR EXONS**

**Ata Ul Wakeel Ahmad**, MDC Berlin, Germany

**13:50 – 15:15**

## **SESSION 5: CAR/TCR MRNA THERAPIES**

*Plenary Hall (Ballsaal)*

**Chairs: Adi Barzel**, Tel Aviv University, Israel

**Jürgen Rüland**, TUM University Hospital, Germany

**13:50 – 14:15**

**KEYNOTE LECTURE: NUCLEOSIDE-MODIFIED mRNA-LNP THERAPEUTICS**

**Drew Weissman**, University of Pennsylvania School of Medicine, USA

**14:15 – 14:30**

**MRNA-BASED T-CELL ENGINEERING FOR VIRUS-RELATED CANCERS (HBV-HCC) AND VIRAL INFECTIONS**

**Antonio Bertoletti**, A\*STAR, Singapore

14:30 – 14:40

**ANTIGEN-SPECIFIC AND BYSTANDER ANTITUMOR ACTIVITY OF RNA CAR T-CELLS AGAINST GBM-ASSOCIATED ANTIGEN PTPRZ1**

**Darel Martínez Bedoya**, University of Geneva, Switzerland

14:40 – 15:15

Panel Discussion

**15:15 – 15:25**

**SHORT BREAK**

**15:25 – 16:35**

**SESSION 6: UNIVERSAL DONOR CELLS & ADVANCED TCR ENGINEERING**

*Plenary Hall (Ballsaal)*

**Chairs:** **Darel Martinez Bedoya**, University of Geneva, Switzerland

**Eva Bräunlein**, TUM University Hospital, Germany

15:25 – 15:40

**TARGETING CANCER WITH T-CELL RECEPTOR-ENGINEERED T-CELLS**

**Johanna Olweus**, Oslo University, Norway

15:40 – 15:55

**TARGETED ENGINEERING OF RECOMBINANT TCR-T CELLS FOR THERAPY AND LIGAND PREDICTION**

**Dirk Busch**, Technical University of Munich, Germany

15:55 – 16:05

**DISRUPTED KINASE (DISK) CAR T-CELLS FOR ALLOGENEIC THERAPY**

**Previtha Dawn Sakthi Vale**, National University of Singapore, Singapore

16:05 – 16:35



## Panel Discussion

**16:35 – 17:30**

### **COFFEE BREAK, EXPERT-LED INSIGHTS, EXHIBITION & POSTER VIEWING**

*Exhibition & Networking Area (Grosser Saal)*

16:50 – 17:20

#### **EXPERT-LED INSPIRATION: YOUR QUESTIONS, OUR INSIGHTS**

Moderator: **Stanley Riddell**, Fred Hutchinson Cancer Research Center, USA

Discussants:

**Drew Weissman**, University of Pennsylvania School of Medicine, USA

**Carl June**, University of Pennsylvania, USA

**17:30 – 19:00**

### **SESSION 7: UPDATED CLINICAL DATA & NOVEL DEVELOPMENTS**

*Plenary Hall (Ballsaal)*

**Chairs:** **Yaron Carmi**, Tel Aviv University, Israel

**Annette Künkele-Langer**, Charite – Berlin University Medicine, Germany

17:30 – 17:55

#### **KEYNOTE LECTURE: CAR T-CELLS – CURRENT STATUS AND OUTLOOK**

**Carl June**, University of Pennsylvania, USA

17:55 – 18:10

#### **ENGINEERING DE NOVO BINDER CAR-T CELL THERAPIES WITH GENERATIVE AI**

**Andrea Schmidts**, Technical University of Munich, Germany

18:10 – 18:20

#### **ALLOREACTIVE VERSUS IL-15 EX-VIVO-STIMULATED NK CELLS AS**

## **ADOPTIVE CELL THERAPY IN HAPLOIDENTICAL TRANSPLANTATION FOR PEDIATRIC ACUTE LEUKEMIA: A PHASE I/II TRIAL (PHINK)**

**Carmen Mestre-Durán**, Research Institute of the University Hospital La Paz (IdiPAZ), Spain

18:20 – 19:00

Panel discussion

**08:30 – 09:30**

## **SESSION 8: BEYOND ALPHA-BETA T-CELLS**

*Plenary Hall (Ballsaal)*

**Chairs: Hans Stauss**, University College London, UK

**Maik Luu**, University Hospital of Wurzburg, Germany

08:30 – 08:45

### **FROM AUTOLOGOUS TO ALLOGENEIC CAR EFFECTOR CELLS: PUSHING THE BOUNDARIES FROM CANCER TO OTHER SEVERE DISEASES**

**Ulrike Koehl**, Fraunhofer Institute for Cell Therapy and Immunology Leipzig, Germany

08:45 – 08:55

### **HSPC GENE EDITING FOR SPECIFIC ANTIBODY EXPRESSION THROUGH HUMORAL IMMUNE RESPONSES**

**Harald Hartweger**, The Rockefeller University, United States

08:55 – 09:05

### **REPROGRAMING IMMUNOSUPPRESSIVE MICROENVIRONMENT IN THE SOLID TUMOR BY TARGETED DELIVERY OF TGF-B-BLOCKING SCFV FROM ANTIBODY-CAR-MACROPHAGES (AB-CAR-M)**

**Rio Sugimura**, Hong Kong University, Hong Kong

09:05 – 09:30

Panel discussion

**09:30 – 11:00**

## **SESSION 9: TARGETING NON-MALIGNANT DISEASES**

*Plenary Hall (Ballsaal)*

**Chairs: Ulrike Koehl**, Fraunhofer Institute for Cell Therapy and Immunology Leipzig, Germany

**Ulrike Protzer**, Technical University of Munich, Germany

09:30 – 09:45

### **CAR T-CELL TREATMENT IN AUTOIMMUNE DISEASE**

**Georg Schett**, Friedrich-Alexander University of Erlangen-Nuremberg, Germany

09:45 – 10:00

### **CAR T-CELLS AGAINST IgE B CELLS**

**Adi Barzel**, Tel Aviv University, Israel

10:00 – 10:15

### **MODIFICATION OF TCR/CD3 TO ENHANCE T-CELL FUNCTION**

**Hans Stauss**, University College London, UK

10:15 – 10:30

### **CLINICAL AND TRANSLATIONAL STUDIES OF RESE-CEL (AN ANTI-CD19 CAR T THERAPY) IN MYOSITIS, SLE, AND SYSTEMIC SCLEROSIS: RESET PHASE I/II TRIALS**

**Samik Basu**, Cabaletta, USA

10:30 – 10:40

### **BASE EDITING OF APDS1 AND APDS2 T-CELLS RESTORES PI3K DELTA SIGNALLING**

**Kate Orf**, UCL, United Kingdom

10:40 – 11:00

Panel discussion

**11:00 – 11:40**

## **COFFEE BREAK, EXHIBITION & POSTER PRESENTATIONS**

*Exhibition & Networking Area (Grosser Saal)*

**11:40 – 12:40**

## **SESSION 10: SELECTED ABSTRACTS FOR ORAL PRESENTATION**

*Plenary Hall (Ballsaal)*

**Chairs:** Dirk Busch, Technical University of Munich, Germany  
Adi Barzel, Tel-Aviv University, Israel

11:40 – 11:50

### **RAPID MACHINE LEARNING DRIVEN TARGET IDENTIFICATION IN TIL AND PERSONALISED TRANSGENIC TCR CELL THERAPIES**

Edward Green, DKFZ, Germany

11:50 – 12:00

### **OVERCOMING BARRIERS FOR T-CELL THERAPY OF CHRONIC HEPATITIS B VIRUS INFECTION**

Lisa Schiller, Technical University of Munich, Germany

12:00 – 12:10

### **SYSTEMIC DELIVERY OF CDH17 CAR T-CELLS ALLOWS EFFECTIVE AND SAFE TARGETING OF COLORECTAL CANCER LIVER METASTASES**

Rita El Khoury, IRCCS San Raffaele Scientific Institute, Italy

12:10 – 12:20

### **DUAL TARGETING OF PD-L1 AND ERBB2 BY CAR-NK CELLS ENABLES SPECIFIC ELIMINATION OF SOLID TUMOR CELLS AND OVERCOMES IMMUNE ESCAPE VIA ANTIGEN LOSS**

Jiri Eitler, Technical University of Dresden, Germany

12:20 – 12:40

Panel Discussion

**12:40 – 13:45**

## **SESSION 11: IN VIVO AND BEDSIDE T-CELL ENGINEERING**

*Plenary Hall (Ballsaal)*

**Chairs:** Harald Hartweg, The Rockefeller University, United

States

**Louisa v. Baumgarten**, Ludwig Maximilian University of Munich, Germany

12:40 – 12:55

**T-CELL TARGETED VECTORS FOR IN VIVO CAR DELIVERY**

**Christian Buchholz**, PEI, Germany

12:55 – 13:10

**EXTRACORPOREAL CAR GENE DELIVERY**

**David Peritt**, Lupagen, USA

13:10 – 13:25

**NOVEL NON-VIRAL DNA-BASED GENE THERAPY VECTOR FOR CAR T ENGINEERING IN VIVO**

**Jacek Lubelski**, NanoCell, Netherlands

13:25 – 13:45

Panel Discussion

**13:45 – 14:00**

**BEST POSTER ANNOUNCEMENT & CONFERENCE CLOSURE**

*Plenary Hall (Ballsaal)*

Moderators: **Adi Barzel**, Tel-Aviv University, Israel

**Dirk Busch**, Technical University of Munich, Germany

13:45 – 13:50

**ANNOUNCEMENT OF THE TOP 3 POSTERS**

13:50 – 13:55

**5 MIN PRESENTATION ON STAGE OF THE BEST POSTER RANKED 1st**

13:55 – 14:00

**CLOSING WORDS BY THE CONFERENCE CO-CHAIRS**

**\*The program could be subject to changes.**