

CENTRE FOR STEM CELL RESEARCH
(A unit of BRIC-inStem, Bengaluru)
Christian Medical College Campus, Bagayam, Vellore



10TH ANNUAL CELL AND GENE THERAPY SYMPOSIUM

Progress towards Clinical Reality

10th to 11th October, 2025



PROGRAMME SCHEDULE
DAY-1: Friday, 10th October, 2025

8:00 to 9:00 AM	REGISTRA ON/ WELCOME TEA		
	Scudder Auditorium		
9:00 to 09:05 AM 9:05 to 09:20 AM	<ul style="list-style-type: none"> Prayer by Chaplain Welcome remarks: Director, CMC / Director, BRIC-inStem / Principal, CMC Remarks by Secretary, Department of Biotechnology, Ministry of Science and Technology, Govt. of India Closing remarks: Head, CSCR 		
9:20 to 9:30 AM	Talk by Secretary, Department of Biotechnology, Ministry of Science and Technology, Govt. of India		
Hall A		Hall B	
SESSION: CELL AND GENE THERAPY Chairs Dr. Aby Abraham Christian Medical College Vellore, India Dr. Eunice Sindhuvi Christian Medical College Vellore, India		Session: ORGANOIDS AND DISEASE MODELLING Chairs Dr. Minhaj Sirajuddin BRIC-Institute for Stem Cell Science and Regenerative Medicine, Bengaluru, India Dr. Srinivasarao Repudi BRIC-Institute for Stem Cell Science and Regenerative Medicine, Bengaluru, India	
India Time	Speaker	India Time	Speaker
09:30 to 9:55 AM	<i>Pancreatic Islet Cell Transplantation for the treatment of Diabetes</i> Balamurugan N Appakalai University of Louisville/Norton Healthcare, Louisville,USA	09:30 to 9:55 AM	<i>Asrij role in hematopoiesis</i> Maneesha S. Inamdar BRIC-Institute for Stem Cell Science and Regenerative Medicine, Bangalore, India
9:55 to 10:20 AM	Shaji R Velayudhan Centre for Stem Cell Research (a unit of BRIC- inStem, Bengaluru), Christian Medical College Vellore, India	9:55 to 10:20 AM	<i>Harnessing the potential of human liver organoid developed from cells isolated from healthy individuals and patients to develop therapeutics and precision medicines against non-alcoholic fatty liver disease.</i> Ruchi Tandon Translational Health Science and Technology Institute, Faridabad, India

10:20 to 10:45 AM	<i>Current status, challenges and opportunities with CAR-T cell therapy in India</i> Vikram Mathews Christian Medical College Vellore, India	10:20 to 10:45 AM	<i>Stem cell derived organoid models to study eye diseases and to validate newer drugs</i> Indumathi Mariappan L V Prasad Eye Institute (LVPEI), Hyderabad, India
10:45 to 11:10 AM	Punam Malik Cincinnati Children's Hospital Medical Center, USA	10:45 to 11:10 AM	<i>Human 3D organoids as a preclinical platform for intervention testing</i> Arvind Ramanathan Institute for Stem Cell Science and Regenerative Medicine Bangalore, India
11:10 to 11:40 AM	Tea Break		
	Hall A		Hall B
India Time	Session: MESENCHYMAL STEM CELLS (MSCs) AND THEIR SECRETOME Chairs Dr. Indumathi Mariappan L V Prasad Eye Institute (LVPEI), Hyderabad, India Dr. Jayakanthan K Post Graduate Institute of Medical Education & Research Chandigarh, India	India Time	Session: MOLECULAR GENETICS OF INHERITED DISEASES Chairs Dr. Vinod Scaria Karkinos Healthcare Private Limited, Bengaluru, India Dr. Alan Mathew Punnoose SRIHER- Sri Ramachandra Institute of Higher Education and Research, Chennai, India
11:40 AM to 12:05 PM	<i>Modeling Vascular Pathophysiology in ACDC Disease Using Gene-Edited Human Aortic Endothelial Cells and Patient-Derived iPSC-based systems</i> Jyothi Prasanna S Manipal Institute of Regenerative Medicine, Bengaluru, India	11:40 AM to 12:05 PM	<i>Deciphering the "omics" for Alkaptonuria</i> Sumita Danda Christian Medical College Vellore, India
12:05 to 12:30 PM (IST) 7:40 to 8:05 AM (BST)	<i>Articular cartilage repair and regeneration – are we there yet?</i> Ilyas Khan Swansea University Medical School, Wales, United Kingdom	12:05 to 12:30 PM	<i>Population Genomes to Precision Medicine – Impact on Public Health in India</i> Sridhar Sivasubbu Karkinos Healthcare Pvt Ltd, Mumbai, India
12:30 to 12:55 PM	<i>Potential of Wharton's Jelly Mesenchymal Stem Cell-Derived Small Extracellular Vesicles in Managing Metabolic Syndrome in an Animal Model</i> Yogeswaran Lokanathan	12:30 to 12:55 PM	<i>Genetics of Insulin Secretion: Insights from massive parallel sequencing</i> Aaron Chapla Christian Medical College

	Universiti Kebangsaan Malaysia, Kuala Lumpur, Malaysia		Vellore, India
12:55 to 1:25 PM	<i>MSCs in the clinic – current status & future prospects</i> Pawan K Gupta Stempeutics Research, Bangalore, India	12:55 to 1:25 PM	<i>Mission program in pediatric rare genetic disorders</i> Ashwin Dalal Centre for DNA Fingerprinting and Diagnostics (CDFD), Hyderabad, India
1:25 to 2:00 PM	Lunch Break		
2:00 to 2:30 PM	Industry Exhibition		
2:30 to 3:10 PM	Remarks by Secretary, Department of Biotechnology, Ministry of Science and Technology, Govt. of India		
Hall A		Hall B	
India Time	Session: MANUFACTURING AND REGULATORY ASPECTS IN CELL AND GENE THERAPY Chairs Dr. Punam Malik Cincinnati Children's Hospital Medical Center, USA Dr. Jyothi Prasanna S Manipal Institute of Regenerative Medicine, Bengaluru, India	India Time	Session: POPULATION SCREENING & MANAGEMENT OF GENETIC DISORDERS Chairs Dr. Sumita Danda Christian Medical College Vellore, India Dr. VGM Naidu National Institutes of Pharmaceutical Education and Research, Guwahati, India
3:10 to 3:35 PM	<i>SAGES: Development and Translation of a Novel CRISPR Genome Editing Therapy to Induce Fetal Hemoglobin for Sickle Cell Disease</i> Jonathan Yen St. Jude Children's Research Hospital, Memphis, TN	3:10 to 3:35 PM	<i>Sickle Cell Anaemia: Kal, Aaj, aur Kal (Past, Present and Future)</i> Giriraj Chandak Centre for Cellular and Molecular Biology Hyderabad, India
3:35 to 4:00 PM	<i>Configuring Chimeric Antigen Receptors for safety and efficacy</i> Sunil Martin BRIC-Rajiv Gandhi Centre for Biotechnology, Kerala, India	3:35 to 4:00 PM	Sukesh C Nair Christian Medical College Vellore, India
4:00 to 4:25 PM	<i>Robust Manufacturing of NK cells towards development of Allogeneic Therapies</i> Priyadarshini Chatterjee Aurigene Oncology Ltd., Bangalore	4:00 to 4:25 PM	<i>Genetic screening of pheochromocytoma 'susceptibility genes': CMC experience</i> Rekha Pai Christian Medical College Vellore, India
4:25 to 4:50 PM (IST) 6:55 to 7:20 AM(EDT)	<i>What No T Cell Has Treated Before: Advances in CAR Design and Delivery to Patients</i>	4:25 to 4:50 PM	Vinod Scaria Karkinos Healthcare Private Limited, Bengaluru, India

	<div>Bruce L. Levine</div> <div>University of Pennsylvania, Philadelphia, PA</div>		
4:50 to 6:00 PM	Poster and Industry Exhibition		
Hall A			
KEYNOTE ADDRESS			
Chair			
Dr. Vikram Mathews			
Christian Medical College Vellore, India			
India Time	Speaker Name	Title	
6:00 to 6:40 PM (IST) 7:30 to 8:10 AM (CDT)	<div>Mitchell Weiss</div> <div>St. Jude Children’s Research Hospital, Memphis, USA</div>	Gene Therapy for Hemoglobinopathies: Recent Developments and Ongoing Challenges	
6:40 to 7:30 PM	Opening remarks		
7:30 PM onwards	Cultural event		
	Dinner		
End of Day-1			

DAY-2: Saturday, 11th October, 2025

Hall A		Hall B	
SESSION- INDUSTRY UPDATES Chairs Dr. Priyadarshini Chatterjee, Aurigene Oncology Ltd., Bangalore, India Dr. Rajkumar Banerjee CSIR-Indian Institute of Chemical Technology, Hyderabad, India		Session: CELL THERAPY FOR HEMATOLOGICAL DISORDERS Chairs Dr. Everette J R Nelson Vellore Institute of Technology, Vellore, India Dr Poonkuzhali B. Christian Medical College, Vellore, India	
India Time	Speaker	India Time	Speaker
9.00 to 9: 25 AM	Allogenic Off-the-shelf Natural Killer (NK) cell therapy for cancers Renjitha Gopurappilly NKure Therapeutics Pvt Ltd Centre for Cellular and Molecular Platforms (CCAMP), Bengaluru, India	9.00 to 9: 25 AM	Moving beyond matched sibling donor transplantation Biju George Christian Medical College Vellore, India
9:25 to 9:50 AM	Driving CAR T Cell Innovation with Agilent's Integrated Analytical Platforms Vadiraja Bhat Agilent Technologies India Pvt Ltd.	9:25 to 9: 50 AM	Lentiviral gene therapy for haemophilia A- an update of the clinical trial Aby Abraham Christian Medical College Vellore, India
9: 50 to 10:15 AM	Cytokine Profiling in Cell & Gene Therapy: Bridging Mechanistic Insight and Translational Impact Anisha Polley Sikder Krishgen Biosystems PVT. Ltd., Mumbai, India	9: 50 to 10:15 AM	Mohankumar K M. Centre For Stem Cell Research (a unit of BRIC-Instem, Bengaluru), Christian Medical College Vellore, India
10:15 to 10:30 AM	Talk by Thermo	10:15 to 10:40 AM	Gene-Edited Allogeneic CAR-T Cells for B-Cell Malignancies Thiyagaraj Mayuranathan Centre For Stem Cell Research (a unit of BRIC-Instem, Bengaluru), Christian Medical College Vellore, India
10:30 to 10:40 AM	Talk by Hi Media		
10:40 to 11:25 AM	Tea Break and Poster Exhibition		
	Hall A		Hall B
India Time	Session: IMMUNE MODULATION IN THERAPY Chairs Dr. B. Ashokkumar Madurai Kamaraj University, Madurai, India	India Time	Session: MICROBIAL INFECTIONS CHALLANGES WAY FORWARD Chairs

	Dr. Vijayalekshmi B Christian Medical College Vellore, India		Dr. Siddhardha Busi Pondicherry University, India Dr. Joe Varghese Christian Medical College Vellore, India
11:25 to 11:50 AM	TBC	11:25 to 11:50 AM	Balaji Veeraraghavan Christian Medical College Vellore, India
11:50 AM to 12:15 PM	<i>Gut–Lung Crosstalk: Harnessing Immunomodulation for Asthma Therapy</i> Kiran Kumar MN JSS Academy of Higher Education & Research, Mysuru, India	11:50 AM to 12:15 PM	<i>Neglected Tropical Diseases: Improving Diagnostics for Helminth Elimination and Control Programs</i> Sitara Swarna Rao Ajjampur Christian Medical College Vellore, India
12:15 to 12:40 PM	<i>From HIV Biology to lentiviral vectors: Insights into the mechanisms of antiviral actions</i> Ajit Chande Indian Institute of Science Education and Research, Bhopal, India	12:15 to 12:40 PM	<i>Uncovering the burden of Riboflavin transporter deficiency among Indians: metabolic insights and emerging strategies for gene therapy</i> B. Ashokkumar Madurai Kamaraj University, Madurai, India
12:40 to 01:10 PM	Lunch Break		

Hall A		Hall B	
India Time	SESSION: GENE EDITING Chairs Dr. Jonathan Yen St. Jude Children’s Research Hospital, USA Dr. Mohankumar K M. Centre For Stem Cell Research (a unit of BRIC-Instem, Bengaluru), CMC Vellore	India Time	Session: TECHNOLOGY ADVANCES Chairs Dr. Arabinda Chaudhuri Indian Institute of Science Education and Research (IISER) Kolkata India Dr. Ullas Kothur-Seetharam Centre for DNA Fingerprinting and Diagnostics, Hyderabad, India
1:10 to 1:35 PM	<i>Development of Precision Genome and Transcriptome Engineering Technologies</i> Tan Meng How Nanyang Technological University, Singapore	1:10 to 1:35 PM	Minhaj Sirajuddin BRIC-Institute for Stem Cell Science and Regenerative Medicine, Bangalore, India

1:35 to 2:00 PM	<i>Use of precision editing, PROTACs to investigate mechanism of neurodevelopmental disorders</i> Pradeepa Madapura Queen Mary University of London, London, UK	1:35 to 2:00 PM	<i>Cadherin-dependent junction formation in driving metabolic reprogramming of cell clusters</i> Sunil Laxman BRIC-Institute for Stem Cell Science and Regenerative Medicine, Bangalore, India
2.00 to 2:25 PM	<i>DYRK1A, a Down Syndrome-linked gene, regulates mTOR signaling</i> Manish Jaiswal Tata Institute of Fundamental Research, Hyderabad, India	2.00 to 2:25 PM	Dasaradhi Palakodeti BRIC-Institute for Stem Cell Science and Regenerative Medicine, Bangalore, India
	Hall A		Hall B
India Time	Session- YOUNG PROMISES IN RESEARCH Chairs Dr. Kumar Pranav Narayan Birla Institute of Technology & Science, Pilani Hyderabad Campus, Telangana, India Dr. Sunil Laxman BRIC-Institute for Stem Cell Science and Regenerative Medicine, Bangalore, India	India Time	Session: METABOLIC DISORDERS AND NOVEL THERAPEUTIC STRATEGIES Chairs Dr. Muthuraman N Christian Medical College Vellore, India
2:25 to 2:40 PM		2:25 to 2:50 PM	<i>Type 5 Diabetes- what is it about? directions for thought and research</i> Nihal Thomas Christian Medical College Vellore, India
2:40 to 2:55 PM		2:50 to 3:15 PM	<i>Metabolic Orchestration of Cellular Reprogramming: Towards Harnessing Epigenetic and Mitochondrial Networks for Next-Generation Cell and Gene Therapies</i> Ullas Kothur-Seetharam Centre for DNA Fingerprinting and Diagnostics, Hyderabad, India
2:55 to 3:10 PM		3:15 to 3:40 PM	<i>Boosting anti-cancer vaccine by "FORTY" fying immunity to achieve tumor free survival</i> Jayanta Bhattacharyya Indian Institute of Technology Delhi, New Delhi, India
3:10 to 3: 25 PM			
3:25 to 3: 40 PM			

3:40 to 4:00 PM	Tea Break and Exhibition		
Hall A		Hall B	
Session: NEW FRONTIER OF CELL THERAPY Chairs Dr. Shaji R Velayudhan Centre for Stem Cell Research (a unit of inStem, Bengaluru), Christian Medical College Vellore, India Dr Vasanth Thamodaran Tata Institute for Genetics and Society, Bengaluru, India		Session: ADVANCES IN PRECISION THERAPEUTICS Chairs Dr. Tan Meng How Nanyang Technological University, Singapore Dr. Pradeepa Madapura Queen Mary University of London, London, UK	
India Time	Speaker	India Time	Speaker
4:00 to 4:25 PM (IST) 11:30 to 11:55 AM (BST)	CAR T-cell immunotherapy of NKG2D-expressing solid tumours John Maher King's College, London, UK	4:00 to 4:25 PM	Glucocorticoid receptor: a potent target for drug sensitization, immuno-modulation in nano-therapeutic strategy for cancer Rajkumar Banerjee CSIR-Indian Institute of Chemical Technology, Hyderabad, India
4:25 to 4:50 PM (IST) 5:55 to 6:20 AM (CDT)	Gene therapy for sickle cell disease – current state and future directions Akshay Sharma St. Jude Children’s Research Hospital, Memphis, USA	4:25 to 4:50 PM	Gene edited hematopoietic stem cells for the gene therapy for beta-hemoglobinopathies Saravanabhavan Thangavel Centre For Stem Cell Research (a Unit of BRIC-Instem, Bengaluru), Christian Medical College Vellore, India
4:50 to 5:15 PM (IST) 4:20 to 4:45 AM (PDT)	Timothy Henrich University of California San Francisco, San Francisco, CA	4:50 to 5:15 PM	Srinivasarao Repudi BRIC-Institute for Stem Cell Science and Regenerative Medicine, Bangalore, India
5:15 to 6:00 PM	Result announcement and closing remarks		
End of Day-2			
