Singapore Society of Haematology

ANNUAL SCIENTIFIC MEETING 2026

9 MAY 2026

Level 1 Auditorium, NUHS Tower Block
1E Kent Ridge Road, Singapore 119228

CONFERENCE BOOKLET

www.ssh.org.sg
secretariat@ssh.org.sg

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ANNUAL SCIENTIFIC MEETING 2026

9 MAY 2026

Precision. Prediction. Personalisation: The Evolving Dimensions of Haematology

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WELCOME MESSAGE

Dear Colleagues,

We cordially invite you to the Singapore Society of Haematology Annual Scientific Meeting (SSH ASM 2026), which will be held on 9 May 2026 at the National University Health System Tower Block. This event is part of our ongoing efforts to promote advances in the knowledge and practice of haematology.

The Annual Scientific Meeting is a premier event that brings together leading experts, researchers, and practitioners in the field of haematology. It provides a unique platform for the exchange of ideas, presentation of the latest research findings, and discussion of innovative practices that can shape the future of haematology.

Furthermore, we are proud to offer scientific opportunities for healthcare professionals working on the field of haematology to present their research and innovations. This includes the chance to submit abstracts for oral and poster presentations, participate in panel discussions, and collaborate with leading researchers in the field. These opportunities will allow both faculty and participants to highlight their scientific contributions and engage with the haematology community on a deeper level.

This year, we are excited to be focusing on themes which have generated buzz in the world of haematology in recent times. Firstly, precision medicine has revolutionised the field of haematology by allowing us to tailor diagnostic and therapeutic strategies for each individual. The deeper understanding of molecular underpinnings of various haematological disorders have allowed for more targeted interventions, and consequently improved outcomes. Another area which has taken the world by storm is artificial intelligence, and haematology is no exception. From boosting diagnostic efficiency to fine-tuning treatment regimens, machine learning algorithms and deep learning models have proven to be useful allies in the battle against haematological diseases. Together, precision medicine and artificial intelligence are but two of the several hot topics that are reshaping our approach to haematology and we are confident that these will be enriching topics for attendees of the ASM.

Join us at the SSH ASM 2026 to collaborate, learn, and shape the future of haematology in Singapore and beyond.

We can't wait to welcome you there!

Dr Lee Shir Ying
President
SSH

Dr Edwin Thong
Co-Chair
SSH ASM 2026

Dr Denise Tan
Co-Chair
SSH ASM 2026

Mr Jordan Hwang
Nursing Session Chair
SSH ASM 2026

Ms Lim Chi Ching
Nursing Session Chair
SSH ASM 2026

ABOUT US

ABOUT SINGAPORE SOCIETY OF HAEMATOLOGY (SSH)

The Singapore Society of Haematology (SSH) is a non-profit organisation dedicated to advancing knowledge in the diagnosis, treatment, and prevention of haematological diseases. The Society also aims to enhance the understanding and practice of transfusion medicine, while actively promoting research, training, and interest in both disciplines across Singapore.

The SSH regularly organises or supports educational events focusing on the recognition, management, and prevention of blood disorders. Contributing significantly to medical education at all levels, the Society actively collaborates with other local and international medical and haematological societies and professional groups. These partnerships facilitate basic and clinical research concerning haematological diseases and transfusion medicine.

ABOUT SINGAPORE SOCIETY OF HAEMATOLOGY ANNUAL SCIETIFIC MEETING (SSH ASM)

The Singapore Society of Haematology Annual Scientific Meeting is an annual premier event organised by SSH, bringing together leading experts, researchers, and practitioners in the field of haematology. The meeting provides a unique platform for the exchange of ideas, presentation of the latest research findings, and discussion of innovative practices that can shape the future of haematology.

At the SSH ASM, we are proud to offer scientific opportunities for healthcare professionals working on the field of haematology to present their research and innovations. This includes the chance to submit abstracts for poster presentations, participate in panel discussions, and collaborate with leading researchers in the field. These opportunities will allow both faculty and participants to highlight their scientific contributions and engage with the haematology community on a deeper level.

PROGRAMME

Precision. Prediction. Personalisation: The Evolving Dimensions of Haematology

Note: Programme is tentative and may be subject to changes.

Time (SGT)	Programme
08:30 – 09:00	Registration
09:00 – 09:05	*Auditorium* **Welcome Address** Dr Lee Shir Ying, National University Cancer Institute, Singapore
09:05 – 09:10	*Auditorium* **Opening Address** Dr Edwin Thong, National University Cancer Institute, Singapore
09:15 – 09:45	*Auditorium* **Session 1** **Starting a New Era: Fixed-Duration Bispecific Antibodies in the Precision Management of R/R DLBCL** Prof Chris Fox, University of Nottingham, United Kingdom
09:45 – 10:15	*Auditorium* **Session 2** **Next-Frontier Therapy: Epcoritamab for 3L+ Follicular Lymphoma** A/Prof Yeh Su-Peng, China Medical University Hospital, Taiwan
10:15 – 10:20	*Auditorium* **Questions and Answer**
10:20 – 11:00	Morning Tea Break
11:00 – 11:30	*Auditorium* **Session 3** **Managing Chronic Immune Thrombocytopenia Purpura: Treatment Strategies for Long-Term Disease Control** Dr Liao Chunkai, E-Da Dachung Hospital, Taiwan
11:30 – 12:00	*Auditorium* **Session 4** **Re-defining Relapse and Refractory Disease in AML through MRD-directed Approach** Dr Sun Loo, The Alfred Hospital & Northern Hospital, Australia
12:00 – 12:05	*Auditorium* **Questions and Answer**

PROGRAMME

Precision. Prediction. Personalisation: The Evolving Dimensions of Haematology

Time (SGT)	Programme		
12:05 – 13:45	Lunch Break	*Auditorium* ***12:05 – 13:00*** **Singapore Society of Haematology Annual General Meeting**	*Staff Lounge* **Nursing Session** ***12:05 – 12:20*** **Anemia, Transfusion and Alternatives** Ms Nur Diyanah Binte Mohamed Said, National University Cancer Institute, Singapore (NCIS) ***12:20 – 12:35*** **Mystic Programme for Patients with Myeloma** Ms Lee Zhao Yuan, Singapore General Hospital, Singapore ***12:35 – 12:50*** **VTE and Hyper-coagulation** Ms Shao Zhen Zhi, Singapore General Hospital, Singapore ***12:50 – 13:00*** **Questions & Answer**
		Staff Lounge ***13:00 – 13:30*** **Poster Presentation**	
13:45 – 14:15	*Auditorium* **Keynote Lecture** **Working Toward Cancer Care in 2030: AI+X for Precision Medicine 2.0, Population Health, Aging and Global Health Impact** Dr Joe Yeong, Singapore General Hospital, SingHealth Duke-NUS Pathology Academic Clinical Program, Singapore		
14:15 – 14:45	*Auditorium* **Session 5** **Evolving Treatment Strategies in Chronic Lymphocytic Lymphoma and Mantle Cell Lymphoma from ASH 2025** Dr Joanne Lee, Centre For Clinical Haematology, Singapore		

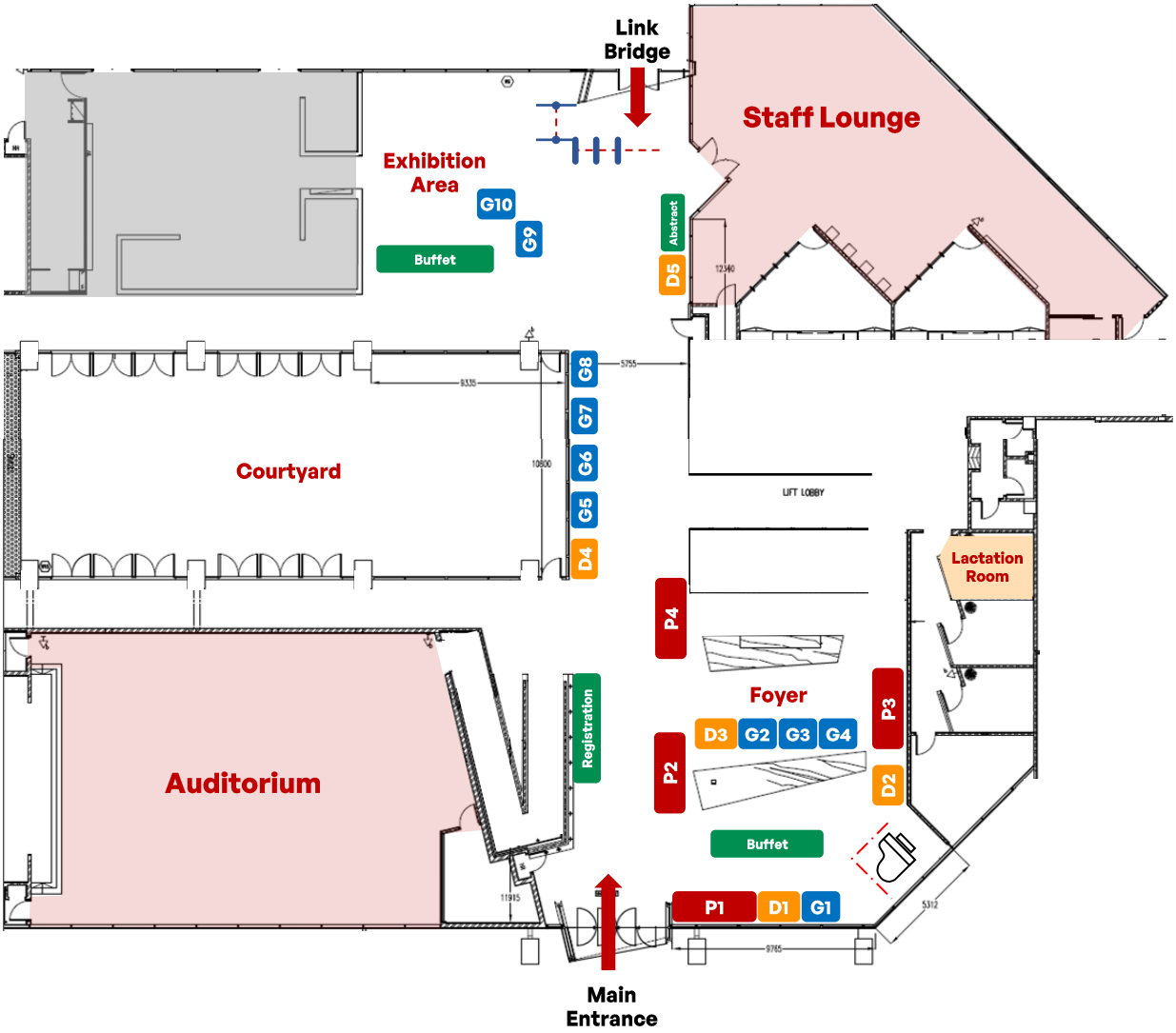
PROGRAMME

Precision. Prediction. Personalisation: The Evolving Dimensions of Haematology

Time (SGT)	Programme
14:45 – 15:15	*Auditorium* **Session 6** **Advances in First-Line Management of MDS-Associated Transfusion-Dependent Anaemia** A/Prof Valeria Santini, University of Florence Medical School, Italy
15:15 – 15:20	*Auditorium* **Questions and Answer**
15:20 – 15:45	Afternoon Tea Break
15:45 – 16:15	*Auditorium* **Session 7** **Targeting Novel Antigens in RRMM: The Emerging Role of Bispecific Antibodies** Prof Amrita Krishnan, City of Hope, United States
16:15 – 16:45	*Auditorium* **Session 8** **Navigating the Unmet Needs and Challenges in Early Relapsed Multiple Myeloma** Prof Chng Wee Joo, National University Hospital, Singapore
16:45 – 16:50	*Auditorium* **Questions and Answer**
16:50 – 16:55	*Auditorium* **Award Ceremony**
16:55 – 17:00	*Auditorium* **Closing Address** Dr Denise Tan, Sengkang General Hospital, Singapore
End of Meeting	

VENUE FLOOR PLAN

NUHS TOWER BLOCK LEVEL 1



Exhibitor Booth List

P1	Roche
P2	DKSH
P3	GSK
P4	AbbVie

D1	MSD
D2	Johnson & Johnson
D3	Astellas
D4	AstraZeneca
D5	Sysmex Asia Pacific

G1	Sanofi
G2	CSL Behring
G3	IASO Biotechnology & Pills and Pokes
G4	Sandoz
G5	Takeda

G6	Amgen
G7	Novartis
G8	BeOne Medicines
G9	Biomed Diagnostic
G10	Steward Cross

FACULTY

KEYNOTE SPEAKER

Keynote Lecture: Working Toward Cancer Care in 2030: AI+X for Precision Medicine 2.0, Population Health, Aging and Global Health Impact

Dr Joe Yeong

Director of ImmunoPathology
Singapore General Hospital, SingHealth Duke-NUS Pathology Academic Clinical Programme, Singapore

Group Leader
Institute of Molecular and Cell Biology (IMCB), A*STAR, Singapore;
Department of Anatomical Pathology, Singapore General Hospital (SGH)

Associate Professor
Duke-NUS Medical School, Singapore

Dr. Joe Yeong is a clinician-innovator and immunopathologist focused on overcoming resistance to cancer immunotherapy using advanced technologies and artificial intelligence, with a core vision to bridge immunology and pathology. He is a pioneer in spatial technologies, has translated assays into clinical practice (from bench to bedside), and has published over 150 peer-reviewed papers (Top 2% Scientist), delivering more than 100 invited international talks. His cancer immunology research has been supported by national, international, and industry-sponsored funding exceeding 25 million dollars since 2017.

He has served as a committee member of the American Society of Clinical Oncology (ASCO), co-organizer of the World Immunotherapy Council (WIC) and the Society for Immunotherapy of Cancer (SITC), and contributor to multiplex immunofluorescence expert consensus meetings. He is a founding Program Chair of CLINICCAI-MICCAI, a founding board member of MICCAI SIG-ComPath, and a board member of the Asian Society of Digital Pathology. He holds editorial roles with Nature Springer, Journal for ImmunoTherapy of Cancer (JITC), Journal of Clinical Oncology (JCO, ASCO), and World Scientific (Chief Editor).

Dr. Yeong serves as Executive Secretary of the Singapore Society of Oncology–Cancer Immunotherapy Consortium, Co-Lead for Education and Diagnostics at the SingHealth Duke-NUS Cell Therapy Centre, and Advisor for Spatial Technologies at the Cancer Discovery Hub, National Cancer Centre. In 2023, he co-founded the World Immunotherapy Council APAC Chapter to advance tumour immunology and cancer immunotherapy education, research, and collaboration across Asia-Pacific.

He is also a regular grant reviewer for funding agencies in over 15 countries across five continents and for leading journals including Cell, The Lancet, Nature Medicine, and Nature.

FACULTY

SESSION SPEAKERS

Session 1: Starting a New Era: Fixed-Duration Bispecific Antibodies in the Precision Management of R/R DLBCL

Prof Chris Fox

Professor of Haematology
School of Medicine, University of Nottingham, United Kingdom

Chris Fox, MBChB(Hons) PhD FRCP FRCPath, is Professor of Haematology at the University of Nottingham and a Consultant Haematologist at Nottingham University Hospitals NHS Trust, where he is the lead clinician for lymphoma and Haematology research.

His clinical research interests focus on the aggressive lymphomas, including DLBCL, central nervous system and T cell lymphoma. Prof Fox Chaired the UK high-grade lymphoma study group from 2019-2025. Since 2022 he has served as the Medical Director for the UK TAP (therapy-accelerated programme) network for delivery of blood cancer trials. He has extensive experience as a clinical researcher including Principal Investigator for >90 clinical studies and Chief Investigator for several current academic and commercial studies. He has co-authored research papers in high-impact journals including NEJM, Lancet, Blood and JCO.

FACULTY

SESSION SPEAKERS

Session 2: Next-Frontier Therapy: Epcoritamab for 3L+ Follicular Lymphoma

Prof Yeh Su-Peng

Associate Professor of Medicine
China Medical University, Taiwan

Director, Division of Hematology and Oncology
China Medical University Hospital, Taiwan

Director of Tissue Bank
Organ Preservation Bank, and Stem Cell Lab., China Medical University Hospital, Taiwan

Su-Peng Yeh graduated from the School of Medicine, Taipei Medical University, and completed his fellowship training in medical oncology and hematology at Veterans General Hospital-Kaohsiung and National Cheng Kung University Hospital. In addition, he also received BMT training at MD Anderson Cancer Center. He is an Associate Professor of Medicine at China Medical University, Taiwan, and the Deputy Chief of the Department of Internal Medicine at China Medical University Hospital (CMUH).

Professor Yeh has served as Principal Investigator for numerous clinical trials evaluating novel agents and hematopoietic stem cell transplantation in hematologic malignancies. He is one of the pioneers of haploidentical transplantation and CAR-T cell therapy in Taiwan. He is currently the President of the Taiwan Society of Blood and Bone Marrow Transplantation.

As well as publishing numerous articles in peer-reviewed journals, including Bone Marrow Transplantation, Leukemia, Blood, Journal of Clinical Oncology, Lancet, and New England Journal of Medicine, Professor Yeh has also presented numerous studies at leading hematologic conferences, including EBMT, APBMT, EHA, and ASH.

FACULTY

SESSION SPEAKERS

Session 3: Managing Chronic Immune Thrombocytopenia Purpura: Treatment Strategies for Long-Term Disease Control

Dr Liao Chunkai

Director, Department of Hematology and Oncology
E-Da Dachung Hospital, Taiwan

Dr Liao Chunkai is the Director of the Department of Hematology and Oncology at E-Da Dachung Hospital. He specializes in the diagnosis and management of hematologic disorders and malignancies, with particular expertise in anemia, purpura, bone marrow transplantation, lymphoma, and multiple myeloma. His clinical practice also encompasses the comprehensive treatment of solid tumors, including breast and colorectal cancers, as well as palliative care.

Dr Liao graduated from the Department of Medicine at National Cheng Kung University and completed his residency training in Internal Medicine at National Cheng Kung University Hospital. He subsequently served as a research physician in the Department of Hematology and Oncology at Kaohsiung Chang Gung Hospital, before continuing on as an attending physician in the same department. With extensive clinical and academic experience, Dr Liao is dedicated to advancing patient-centered cancer care and improving outcomes across both hematologic and solid malignancies.

FACULTY

SESSION SPEAKERS

Session 4: Re-defining Relapse and Refractory Disease in AML through MRD-directed Approach

Dr Sun Loo

Consultant Haematologist, Department of Haematology
The Alfred Hospital & Northern Hospital, Australia

Dr Sun Loo is a Consultant Haematologist at The Alfred Hospital and Northern Hospital in Melbourne, Australia with subspecialty expertise in acute leukaemia and myeloid malignancies. She completed a two-year leukaemia fellowship at Alfred Hospital, which was instrumental in fostering her interest in AML research and clinical trials. Her PhD research at Peter MacCallum Cancer Centre and Walter and Eliza Hall Institute of Research focused on measurable residual disease (MRD) and MRD-directed therapies in acute myeloid leukaemia. She is actively involved in clinical trials and currently serves as a Chief Investigator for a national AML trial and Principal Investigator for several AML/MDS trials. She is one of the main clinicians involved in AMLM26 INTERCEPT platform trial, spearheaded by the Australasian Leukaemia & Lymphoma Group, investigating if novel MRD-directed therapies can achieve a sustained response in patients and increase the duration of remission in early AML relapse.

FACULTY

SESSION SPEAKERS

Session 5: Evolving Treatment Strategies in Chronic Lymphocytic Lymphoma and Mantle Cell Lymphoma from ASH 2025

Dr Joanne Lee

Senior Consultant Haematologist
Centre For Clinical Haematology, Singapore

Dr. Joanne Lee is a Senior Consultant Haematologist. She has a special interest in Lymphoma, Haematopoietic Stem Cell Transplantation and Cellular Therapy (such as CAR-T Cell Therapy), and has wide experience in the management of both benign (such as clotting, bleeding or anaemia) and malignant haematological conditions (such as myeloma and leukaemia).

Dr. Lee received her medical degree from the National University of Singapore, and subsequently underwent Internal Medicine training and Haematology speciality training at National University Hospital (NUH) where she served as Chief Resident in various programs including the Singapore Chief Residency Program and the Haematology Senior Residency. She has also received training on Haematopoietic Stem Cell Transplantation and Cellular Therapy at the prestigious Memorial Sloan Kettering Cancer Centre (MSKCC) in New York.

While working in NUH, she held several notable key positions. She served as the Lymphoma Group Lead, and a member of the Haematopoietic Stem Cell Transplantation Group. She has also been very involved with education, serving as the Program Director for the National Haematology Senior Residency Integrated Program as well as an Assistant Professor at the Yong Loo Lin School of Medicine, National University of Singapore.

Dr. Lee has co-authored multiple papers on a wide range of topics, including haematological malignancies, treatment outcomes, and the impact of genetic mutations on cancer. Her research has contributed significantly to the understanding and treatment of various haematological conditions. She continues to be active in medical research and clinical trials and is passionate about novel treatment strategies to improve outcomes and reduce toxicity.

Dr. Lee has also been recognised for her excellence and dedication through various awards, including the NCIS Junior Investigator Award, NUHS-NCIS Shine Award, and multiple Merit Awards for her quality improvement projects. Her efforts in setting up new services, such as outpatient mobilization for Myeloma and Haematopoietic Stem Cell Transplants at home (Home Transplants), demonstrate her commitment to improving patient care. She believes strongly in a good patient experience and strives to support patients through every aspect of their journey.

FACULTY

SESSION SPEAKERS

Session 6: Advances in First-Line Management of MDS-Associated Transfusion-Dependent Anaemia

A/Prof Valeria Santini

Associate Professor, Department of Haematology
University of Florence, Italy

Valeria Santini runs the MDS Unit- Hematology- AOUC, Florence. Her interests are focused on clinical and translational research in MDS and elderly AML. Author of > 250 peer-reviewed papers, member of the Editorial board of Leukemia, Blood Neoplasia, and past member of Editorial board of Blood journal. Documented reviewer for high impact factor scientific journals. Invited speaker at international meetings including: American Society of Clinical Oncology (ASCO 2007, 2024 and 2025 educational sessions), American Society of Hematology (ASH 2012, 2016, 2023: educational sessions), European Haematology Association (EHA 2016, 2020, 2022, 2025: educational sessions) and national haematology societies of several countries. She is Vice president of the Italian Society of Hematology (SIE) and President Elect of the Society of Oncologic Hematology (SOHO).

FACULTY

SESSION SPEAKERS

Session 7: Targeting Novel Antigens in RRMM: The Emerging Role of Bispecific Antibodies

Prof Amrita Krishnan

Nason-Hollingsworth Chair in Multiple Myeloma
Executive Medical Director, Hematology
City of Hope, United States

Director
Judy and Bernard Briskin Multiple Myeloma Center, United States

Professor, Department of Hematology & Hematopoietic Cell Transplantation

Dr. Krishnan is the Nason-Hollingsworth Endowed Chair for Multiple Myeloma at City of Hope, and is executive medical director of hematology for City of Hope Orange County. She has also served, for the past decade, as Director of City of Hope's Briskin Center for Multiple Myeloma Research. Dr. Krishnan's current research is focused in multiple myeloma, specifically in developing new drugs for relapsed disease and in teasing out the disease's mechanisms of treatment resistance. Among her other research, she led early trials of T-cell engager therapies and has more recently overseen pioneering work in understanding resistance to CD38 antibodies used to treat myeloma. She held scientific leadership roles with the Multiple Myeloma Research Foundation, the International Myeloma Society, and the Blood and Marrow Transplant Clinical Trials Network (BMT-CTN). As Director of the Briskin Center, in addition to overseeing numerous clinical and translational research projects, Dr. Krishnan has also established a strong track record in developing early-career researchers.

FACULTY

SESSION SPEAKERS

Session 8: Navigating the Unmet Needs and Challenges in Early Relapsed Multiple Myeloma

Prof Chng Wee Joo

Senior Consultant, Division of Haematology, Department of Haematology-Oncology
National University Cancer Institute, Singapore

Professor, Department of Medicine
Yong Loo Lin Professor in Medical Oncology
Yong Loo Lin School of Medicine, National University of Singapore, Singapore

Vice President (Biomedical Sciences Research), Office of the Deputy President (Research and Technology)
National University of Singapore, Singapore

Group Chief Scientist
National University Health System, Singapore

Prof Chng obtained his medical degree from the University of Leeds, UK, and did his internal medicine residency in the United Kingdom. His fellowship training in haematology was completed in Singapore before he obtained an A*STAR international fellowship in 2004 for a research fellowship in multiple myeloma genetics at the Mayo Clinic. His current research is very translational and involves the use of high-resolution global genomic techniques to understand biology, identify drug targets, understand drug resistance and improve disease prognosis in haematological malignancies, with the ultimate aim of improving patient outcomes and personalising treatment.

FACULTY

NURSING SESSION SPEAKERS

Anemia, Transfusion and Alternatives

Ms Nur Diyanah Binte Mohamed Said

Assistant Nurse Clinician
National University Cancer Institute, Singapore

Diyanah has been a dedicated nurse at the National Cancer Institute Singapore (NCIS) for more than a decade, caring for oncology and hematology patients. Throughout her career, she has gained valuable experience in cancer patient care and stem cell transplant.

Currently leading the Patient Blood Management Clinic, Diyanah focuses on helping patients with pre-operative anemia by optimizing pre-operative care through evidence-based anemia management strategies. Her clinical acumen ensures patients receive appropriate interventions to improve surgical outcomes and reduce transfusion requirements, directly impacting patient safety and recovery trajectories.

As the nursing representative on the hospital's Blood Usage Committee, Diyanah acts as an important link between clinical staff and laboratory teams. In this role, she helps review blood related policies and works to improve protocols that make patient care safer and more efficient.
Her position allows her to understand both the practical needs of nurses caring for patients and the technical requirements of laboratory operations. This perspective helps ensure that hospital policies work well in real-world situations. Diyanah's commitment to continuous improvement has resulted in enhanced communication pathways, standardized protocols, and ultimately, safer patient outcomes across the institution.

FACULTY

NURSING SESSION SPEAKERS

Mystic Programme for Patients with Myeloma

Ms Lee Zhao Yuan

Advanced Practice Nurse
Singapore General Hospital, Singapore

Zhao Yuan Lee, MN, RN, is an Advanced Practice Nurse at Singapore General Hospital, specialising in haematology with a subspecialty focus on Multiple Myeloma,Haematopoietic Cell Therapy and Transplant. She has over a decade of clinical experience managing complex haematological conditions and is deeply committed to advancing supportive care strategies, particularly in the areas of myeloma bone disease and survivorship. Zhao Yuan plays a key leadership role in patient engagement initiatives, including support group facilitation and patient education. Her research interests include symptom burden, skeletal-related events, and quality-of-life improvement in myeloma patients. She has presented her work at local and regional forums and is a strong advocate for multidisciplinary care.

FACULTY

NURSING SESSION SPEAKERS

VTE and Hyper-coagulation

Ms Shao Zhen Zhi

Advanced Practice Nurse
Singapore General Hospital, Singapore

Ms Shao Zhenzhi is an Advanced Practice Nurse (APN) at Singapore General Hospital (SGH), providing care across both inpatient settings and specialised outpatient services. Her clinical interests lie in benign haematological conditions, where she is actively involved in comprehensive patient assessment and the coordination of care within the multidisciplinary team.

Her practice places a strong emphasis on patient safety, continuity of care, and patient education to support optimal clinical outcomes. In addition to her clinical responsibilities, Ms Shao contributes to nursing education and mentoring, supporting the development of junior nurses and advancing standards of haematology nursing practice.

ABSTRACTS

Poster Abstract Display and Q&A will take place under the following schedule:

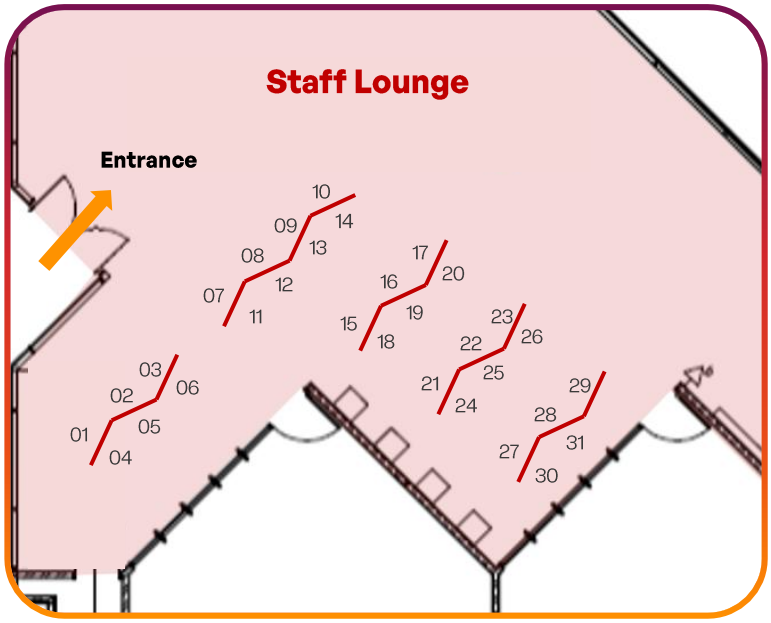
Venue: **Level 1 Staff Lounge, NUHS Tower Block**

Q&A Schedule:

Allied Health Category	
13:00 – 13:30	A-106, A-115, A-116, A-117

Clinical Haematology Category	Laboratory and Diagnostic Category
10:30 – 10:40	A-101, A-107, A-113	A-102, A-104
10:40 – 10:50	A-119, A-120, A-122	A-108, A-111, A-124
13:00 – 13:30	A-109, A-121, A-126, A-127	A-112, A-114, A-118, A-128
15:30 – 15:40	A-103, A-105, A-110, A-123, A-129, A-131	A-125, A-130

Poster Panel:



Abstract	Panel	Abstract	Panel	Abstract	Panel
A-101	07	A-111	26	A-121	17
A-102	21	A-112	29	A-122	09
A-103	20	A-113	10	A-123	06
A-104	25	A-114	28	A-124	31
A-105	05	A-115	02	A-125	23
A-106	03	A-116	01	A-126	16
A-107	12	A-117	04	A-127	15
A-108	22	A-118	27	A-128	30
A-109	18	A-119	11	A-129	08
A-110	19	A-120	13	A-130	24
				A-131	14

ABSTRACTS

A-101: Relapsed ALK-Positive Anaplastic Large Cell Lymphoma with Durable Disease Control Using Brentuximab, Vedotin and Alectinib

Poster Panel 07 **Q&A Standby Period** 10:30 – 10:40

Category Clinical Haematology

Authors
Luke Han Wei-En, Department of Haematology, Singapore General Hospital, Singapore
Lawrence Ng Cheng Kiat, Department of Haematology, Singapore General Hospital, Singapore

Background & Aim
Anaplastic large cell lymphoma (ALCL) is a rare peripheral T-cell lymphoma characterised by uniform CD30 expression and, in ALK-positive cases, oncogenic ALK rearrangements such as NPM-ALK. Although frontline anthracycline-based chemotherapy yields favourable outcomes, 20–30% of patients relapse. Management of multiply relapsed disease, particularly following autologous haematopoietic stem cell transplantation (auto-HSCT), remains challenging. We describe a young patient with multiply relapsed stage IV ALK-positive ALCL who achieved durable remission using combined CD30-directed therapy and ALK inhibition.

Result
A 22-year-old Chinese woman presented with stage IV ALK-positive ALCL with bone marrow involvement and International Prognostic Index score of 2. Initial therapy comprised six cycles of CHOP-E, resulting in end-of-treatment PET partial response (Deauville 4); biopsy confirmation was infeasible due to the location. Refractory disease was treated with brentuximab vedotin (BV) inducing a complete metabolic response (CMR). The patient declined auto-HSCT for fertility concerns and received BV maintenance, which was stopped after 13 cycles (September 2019) due to grade 3 peripheral neuropathy. Disease relapsed 9 months off-treatment (June 2020) with symptomatic abdominal lymphadenopathy; she received BV-gemcitabine followed by BV combined with alectinib, achieving CMR and proceeding to auto-HSCT (November 2020). 13 months post-transplant the patient experienced a second relapse (December 2021). Re-introduction of BV-alectinib again produced CMR by March 2022 after three cycles. As she declined allogeneic HSCT, further 11 cycles of maintenance BV was given (March-November 2022), then transitioned to single-agent alectinib from January 2023. Alectinib was well tolerated with minimal toxicity and continued for two years; the patient stopped therapy in April 2025 after repeated PET scans showed sustained CMR. At last follow-up in November 2025, over three years from her most recent relapse and without active therapy, she remained in ongoing remission with no clinical or radiological evidence of disease.

Conclusion
Integration of BV with ALK inhibition produced multiple deep remissions, including durable control after post-auto-HSCT relapse, in this heavily pretreated ALK-positive ALCL patient. Combined CD30-directed therapy and extended ALK inhibitor maintenance may offer an effective long-term disease-control strategy for patients ineligible for allogeneic transplantation.

ABSTRACTS

A-102: Comprehensive Analysis of Acute Myeloid Leukaemia with Hyperdiploid Karyotype: An Institutional Case Series and Correlation with Published Cases

Poster Panel 21 **Q&A Standby Period** 10:30 – 10:40

Category Laboratory and Diagnostic

Authors
Tan Xiu Lin Celine, Department of Laboratory Medicine, National University Hospital, Singapore
Karen Tan Mei Ling, Department of Laboratory Medicine, National University Hospital, Singapore
Lee Shir Ying, Department of Laboratory Medicine / Haematology, National University Hospital, Singapore

Background:
Hyperdiploid Acute Myeloid Leukaemia (AML) is a rare cytogenetic subgroup characterized by ≥49 chromosomes.

Objectives:
To analyse cytogenetic patterns and complexities of hyperdiploid AML through a retrospective study of 20 adult cases, comparing findings with published literature. The aim is to identify any recurring patterns of chromosomal gains, structural abnormalities in hyperdiploid AML.

Methods:
We retrospectively studied 20 hyperdiploid AML cases (1.57%) out of 1272 AML cases from 2012-2024. Hyperdiploidy is defined by more than 49 chromosomes. Cytogenetic analyses used standard Giemsa-banding on 24- and 48-hour cultures of bone marrow aspirate.

Results:
The cohort (n=20) had 55% males, 45% females, median age 62.5 years. All 20 cases analysed had a complex karyotype (3 or more abnormalities). 70% had 49-50 chromosomes, 30% had 51-68. 25% showed numerical aberrations only, while 75% also had structural abnormalities. Most frequent chromosome gains involved 8, 13, 19, and 21. Less common gains involved chromosomes 6, 11, 18 and 22. Common structural aberrations included t(9;22), abnormalities involving 11q23, and 17p. One case of inv(16) was observed.

Conclusion:
Hyperdiploid AML shows a broad cytogenetic spectrum. Numerical-only abnormalities generally fall into intermediate European Leukaemia Net (ELN) risk, while complex karyotypes, and abnormalities involving 11q23, 17p, or t(9;22), fall into high ELN risk category. Our findings support the high prevalence of gains in chromosomes 8, 13, 19 and 21 as core features of hyperdiploid AML.

Hyperdiploid AML represents a heterogeneous cytogenetic group and should be assessed for the presence of specific abnormalities. Our institutional findings affirm previously reported cytogenetic trends and highlight the complexity of this AML subgroup. Future studies should investigate whether hyperdiploidy carries independent prognostic implications that warrant risk-adapted therapy. Expanded molecular testing for AML gene mutations may reveal relationships between gene mutations and hyperdiploidy.

ABSTRACTS

A-103: Clinical Characteristics and Treatment Outcomes of Acquired Hemophilia A in Singapore: A 10-Year Retrospective Cohort Study

Poster Panel 20 **Q&A Standby Period** 15:30 – 15:40

Category Clinical Haematology

Authors
Lee Sz-Ying, Department of Haematology, Singapore General Hospital , Singapore
Jing Yuan Tan, Department of Haematology, Singapore General Hospital, Singapore
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INTRODUCTION:
Acquired Hemophilia A (AHA) is a life-threatening bleeding disorder caused by autoantibodies against Factor VIII (FVIII). Data on Asian cohorts remains limited.

AIM: To evaluate clinical characteristics, treatment patterns, and outcomes of AHA in a multi-ethnic Asian population.

METHODS: Retrospective study of AHA patients at Singapore General Hospital (2014–2024).

RESULTS:
Ninety patients (59 males, 31 females) were analyzed (incidence: 3.2/million/year). Median age was 76 years; 32.2% were ≥80. Key comorbidities included institutionalization (16%), ECOG >2 (32.2%), and dementia (24.4%). While 52.2% fulfilled ISTH major bleeding criteria, 37.2% of patients with severe anemia (Hb <7g/dL) lacked overt bleeding, suggesting significant occult hemorrhage. Median time to diagnosis was 4 days (range 0–271). Bypassing agents were required in 64.4% (median 5 days). First-line immunosuppression was predominantly prednisolone and cyclophosphamide (70%). Median time to complete response (CR) was 72 days (IQR 49–101). With a median follow-up of 21.5 months, the relapse rate was 14.4% (median 7.7 months). Overall mortality was 51.1% (n=46); 3.3% (n=3) died from hemorrhage, while 11.1% (n=10) died from sepsis during immunosuppression.

CONCLUSION:
AHA in this population predominantly affects elderly patients with high frailty. The frequent presentation of occult bleeding and severe anemia warrants high clinical suspicion. While immunosuppression effectively achieves CR, sepsis-related mortality and protracted recovery remain significant challenges.

ABSTRACTS

A-104: Performance Comparison of the iSED® and iSED® ELITE ESR Analysers

Poster Panel 25 **Q&A Standby Period** 10:30 – 10:40

Category Laboratory and Diagnostic

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BACKGROUND:
The iSED® and iSED® ELITE (ALCOR Scientific) are fully automated erythrocyte sedimentation rate (ESR) analysers that employ direct photometric measurement of RBC rouleaux formation, the earliest phase of erythrocyte sedimentation. Both systems require 500µL of EDTA whole blood, aspirating only 100µL for analysis, and generate results within 20 seconds with a throughput of up to 180 tests/hour. While the measurement principle is unchanged, the newer iSED® ELITE incorporates a more intuitive touchscreen interface, a workflow-optimised design, and a micro-flow cell that allows for a controlled environment to improve consistency and reduce susceptibility to preanalytical variables.

METHODS:
Performance evaluation included inter- and intra-assay precision using 2 levels of commercial controls (normal and abnormal), carryover assessment, and correlation of male and female samples between the iSED® and the iSED® ELITE analyser.

RESULTS:
Inter assay precision was 3.4% for the normal control and 1.1% for the abnormal control. Intra assay precision was 9.2% for the normal control and 1.5% for the abnormal control. Carryover averaged 2.7% across three runs. Correlation analysis (n = 45) demonstrated strong agreement between analyzers, with correlation coefficients of >0.96 for female samples and >0.97 for male samples.

CONCLUSIONS:
The iSED® ELITE maintains the core measurement principal of the iSED® while demonstrating equivalent performance and providing enhanced usability and workflow efficiency. These improvements support its suitability as an updated platform for routine ESR testing.

ABSTRACTS

A-105: NPM1 Mutated Adult Acute Myeloid Leukaemia – Clinicopathological Features, Co-mutational Patterns and Outcomes in Patients Treated at Singapore General Hospital

Poster Panel 05 **Q&A Standby Period** 15:30 – 15:40

Category Clinical Haematology

Authors
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BACKGROUND & AIM
NPM1 mutations occur in approximately 30% of adult cases of acute myeloid leukaemia (AML). We assessed the clinico-pathological features, co-mutations and outcomes in NPM1-mutated AML patients diagnosed at Singapore General Hospital.

METHODS
AML patients with NPM1 mutations identified via Sanger or next-generation sequencing (NGS) from 2017 to 2025 were studied. The Oncomine Myeloid Research assay (Thermo Fisher Scientific, USA) was used to interrogate 40 DNA genes. NGS libraries were sequenced with Ion GeneStudio S5 System (Thermo Fisher Scientific) and analysed using in-house bioinformatics pipelines and the IonReporterTM software. Clinical data was collected from medical records. The study was approved by the institutional review board.

RESULTS
71 patients were identified with a median age at diagnosis of 62 years (range 54-71); 52.1% were female. Using ELN 2022 AML risk classification, 43.7% patients were favourable, 50.7% intermediate and 5.6% adverse risk. Karyotype was normal in 86%; no patients had adverse risk or complex cytogenetics. NPM1 subtypes were A (81.7%), B (5.6%), D (7%) and I (4.2%). Patients had 0 (2.8%), 1 (12.7%), 2 (52.1%). 3 (29.6%) and 4 (2.8%) co-mutations. Co-mutations were found in FLT3 (ITD 53.5% and TKD 2.8% of patients), IDH1/2(22.6%), KRAS (4.2%), NRAS (15.5%), DNMT3A (46.5%), TET2 (26.8%), SRSF2 (5.6%). PTPN11 (11.3%), ZRSR2 (2.8%), CEBPA (8.5%), SF3B1 (1.4%), CSF3R (1.4%), EZH2 (1.4%), KIT (4.2%) and GATA2 (2.8%).59 patients received treatment, of which 39 (66.1%) received intensive chemotherapy with a median follow up of 23.2 months. 89.7% achieved a complete response, with 41% becoming NPM1-MRD-negative after 2 cycles of chemotherapy. Median OS was not reached and 5-year OS was 66%. 23 patients (39%) underwent allogeneic haematopoietic stem cell transplantation. Post-transplant, 2 patients had molecular relapse but 1 progressed to full haematological relapse. In contrast, 33.9% of patients received non-intensive treatment with a median follow up of 25.8 months and median OS of 19.8 months.

CONCLUSION
NPM1-mutated AML typically has a normal karyotype. The most common co-mutations were FLT3-ITD, DNMT3A and TET2. MDS-related gene mutations were less common (11.3%). OS in those receiving intensive treatment was similar to previously published data, notably with good outcomes post stem cell transplantation.

ABSTRACTS

A-106: Transplant @ Home: A Single Centre Experience In Home-Based Care For Autologous Stem Cell Transplantation

Poster Panel 03 **Poster Presentation** 13:00 – 13:07

Category Allied Health

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BACKGROUND:
Autologous stem cell transplantation (ASCT) for multiple myeloma has traditionally required inpatient care. Post-COVID-19, many centres globally have adopted home-based transplantation with comparable outcomes. However, data on healthcare economics, acceptability and safety in Asian settings are limited. Since 2024, we initiated a pilot program using Singapore's Hospital-at-Home (HaH) model (NUHS@Home) to offer home-based ASCT for myeloma patients.OBJECTIVE: To evaluate the safety, feasibility and quality of life impact of home-based ASCT in Singapore.

METHODS:
Stringent patient selection criteria for the HaH programme included age, functional status, comorbidities, caregiver availability and social situation. Selected patients underwent pre-transplant conditioning and stem cell infusion as outpatient before returning home under the supervision of the HaH care team. Daily video consultations involved patients/caregivers, the transplant team, and the HaH team. The HaH team conducted alternate-day home visits and assisted with blood sampling, intravenous hydration and medications. Patients and caregivers were trained in vital sign monitoring, intake/output recording, and subcutaneous injection administration. A 24-hour emergency hotline provided access to expedient hospital return when necessary. Febrile patients were admitted directly to pre-booked transplant ward beds. For transfusions, patients were transfused in the outpatient unit/hospital before returning home. Quality of life (QoL) was assessed using Functional Assessment of Cancer Therapy-Bone Marrow Transplant (FACT-BMT version 4) scale pre-transplant and at Day 30 post-transplant.

RESULTS:
12 patients participated from September 2024 to November 2025 (median age 62, range 45-67; 5 females, 7 males). No unexpected toxicities occurred. 8 patients returned to hospital per protocol on median Day +8 (range Day +7 to +15), all within the 45-minute target. No ICU admissions or deaths occurred. A median of 12 bed-days was saved per patient (range 9-21), totalling 172 bed-days. Patient and caregiver feedback was positive. FACT-BMT scores improved from median 99 at baseline (range 81-136) to 116 post-transplant (range 87-126), and all but 2 patients showed improved scores post-transplant.

CONCLUSION:
With careful patient selection and protocolized workflows in collaboration with HaH, home-based ASCT is safe, feasible and well-accepted. This model achieves significant bed savings while maintaining QoL.

ABSTRACTS

A-107: Timely Removal of Inferior Vena Cava Filters – Effectiveness and Outcomes of an Active Tracking Process

Poster Panel 12 **Q&A Standby Period** 10:30 – 10:40

Category Clinical Haematology

Authors
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BACKGROUND & AIM
Inferior vena cava (IVC) filters function as a mechanical barrier and may reduce the risk of pulmonary embolism in high-risk patients with venous thromboembolism who have temporary contraindications to anticoagulation. 2026 AHA/ACC guidelines provide recommendations for when temporary IVC filters may be considered, encouraging early retrieval to reduce risk of long-term complications

1. The FDA issued a Safety Communication recommending the removal of filters between 29 to 54 days after placement
2. Herein, we report our centre's experience in implementing a workflow to track IVC filter insertion and removals.

METHODS
From 2019, a workflow was implemented at our institution to track IVC filter insertions until removal or death, with prompts to physicians when indications for retrieval were met. Compliance rates for retrieval and complications were recorded. Descriptive analysis was performed on this retrospective cohort to evaluate the effectiveness of a tracking system on timely removal. IRB approval was obtained.

RESULTS
Ninety-five patients underwent IVC filter insertions from January 2019 to December [SL1.1]2025 at our institution. Fifty-one (53.7%) filters were successfully removed. Eighteen patients (18.9%) demised before a decision regarding filter retrieval could be determined. Of the 26 patients remaining, the most frequent reason for non-retrieval was limited life expectancy (10/26, 38.4%). IVC filter thrombosis precluding retrieval (5/26, 19.2%) [SL2.1]was another common reason. Four (15.4%) patients had recurrent bleeding that prohibited anticoagulation, and decision was made not for retrieval. Three patients underwent retrieval attempts that were unsuccessful due to mechanical reasons. Average duration of IVC filter in patients who underwent retrieval was 2.3 months. Twenty patients had durations exceeding 2 months, of which 4 had recurrent bleeding episodes and 4 had planned procedures/surgeries. These patients underwent retrieval once anticoagulation could be safely commenced.

CONCLUSION
In this cohort study, IVC filters were retrieved in only 53.7%, with 39.2% of these patients experiencing filter durations in excess of 2 months. This reflects IVC filter insertions in a cohort of patients with low life expectancy or complex bleeding situations. Complications including filter thrombosis and challenging filter retrievals emphasize the limits even of active surveillance, underscoring the need for circumspect use of IVC filters.

ABSTRACTS

A-108: Detection of Heparin Contamination in Prolonged PT/APTT Using a Thrombin Clotting Time Reflex Algorithm: A Retrospective Laboratory Study in Khoo Teck Puat Hospital

Poster Panel 22 **Q&A Standby Period** 10:40 – 10:50

Category Laboratory and Diagnostic

Authors
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BACKGROUND & AIM
Prolonged coagulation test results, particularly Prothrombin Time (PT) and Activated Partial Thromboplastin Time (APTT), are frequently encountered in clinical laboratories and often require further investigation to determine whether abnormalities are due to true coagulation disorders or pre-analytic artefacts. One common source of artefactual prolongation is heparin contamination during specimen collection. Distinguishing true pathological cases from pre-analytical interference is essential to prevent unnecessary downstream investigation. This study evaluates the effectiveness of implementing a Thrombin Clotting Time (TCT) reflex algorithm to identify heparin contamination in prolonged coagulation results.

METHODS
A retrospective analysis of coagulation test data was conducted using laboratory records collected between November 2024 and October 2025. Samples showing prolonged PT and APTT were identified. Cases with documented anticoagulant therapy were excluded from further analysis. Remaining samples underwent reflex testing using TCT to detect anti-thrombin activity suggestive of heparin contamination. Data were tabulated and analysed to determine the frequency of artefactual prolongation and the diagnostic impact of the reflex algorithm.

RESULTS
Approximately 30 prolonged PT/APTT (PT < 20 seconds and APTT > 50 seconds) out of 2311 coagulation panel samples were identified monthly. Of these, an estimated 15 cases were excluded due to known anticoagulant therapy. The remaining 15 samples underwent TCT reflex testing. Results demonstrated that an average of 11 cases per month showed evidence of heparin contamination, indicating a pre-analytical source of artefactual prolongation.

CONCLUSION
Implementation of a TCT reflex algorithm provides a robust and efficient strategy for identifying heparin contamination in samples presenting with prolonged PT and APTT. In this high-volume laboratory setting, the algorithm demonstrated that majority of the unexplained prolongations were attributable to pre-analytical artefacts rather than true coagulation abnormalities. Early detection of heparin contamination reduces unnecessary confirmatory testing, minimising diagnostic delays, and enables laboratories to focus clinical investigations on cases with genuine haemostatic disorders. This reflex approach represents a practical quality improvement strategy that enhances laboratory workflow efficiency and supports more accurate clinical decision-making.

ABSTRACTS

A-109: Geriatric Assessment Demonstrating Cost-Effectiveness and Improved Survival – A RCT in Haematological Cancers

Poster Panel 18 **Poster Presentation** 13:21 – 13:28

Category Clinical Haematology

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Background
Haematological malignancies predominantly affect older adults who present with both oncologic and age-related issues, and are expected to receive prolonged chemotherapy regimens. Comprehensive geriatric assessment (CGA) has been shown to optimise treatment decisions and tailor interventions to manage physiological decline. We aim to evaluate the cost-effectiveness of CGAs for older patients with haematological cancer.

Methods
Patients aged ≥65 years with haematological cancer and planned chemotherapy underwent frailty screening (G-8 screening tool) and CGAs at a tertiary cancer centre. Eligible patients were then randomised to receive CGA-guided multidisciplinary interventions or standard-care and followed-up for 6-months. Survival analysis (Cox proportional hazards models) was adjusted for cancer diagnoses and risk stratification scores. We compared intervention utilisation (logistic regressions), quality-adjusted life-years (QALYs) gain (linear regressions), and healthcare costs (gamma regressions with log link), adjusting for cancer diagnoses. Multiple imputation (MI) was performed for missing QALYs data.

Results
88 intervention patients and 96 control patients, with balanced baseline characteristics were analysed. The intervention group had better survival outcomes (Hazards ratio: 0.47, p=0.020). 86% of patients were identified with unmet needs and to require medical social work, dietetics, physiotherapy or occupational therapy. More intervention patients utilised such services as compared to controls (Odds ratios=2.45, p=0.034). Follow-up QALYs data was available for 27.3% – 44.8% of patients, depending on grouping and follow-up time-point. Unadjusted QALYs gained were: Intervention-mean – 3-month= -0.013 (SD=0.111) & 6-month= -0.133 (SD=0.244); and control-mean – 3-month= -0.066 (SD=0.112) & 6-month= -0.177 (SD=0.221). In the analysis with MI, there were significant 3-month QALYs gained for intervention patients (coefficient=0.042, p=0.042), compared to control patients. No between-group differences were observed for healthcare costs, inclusive of CGA costs for intervention patients.

Conclusion
Despite longer survival, higher utilisation of intervention services, and greater short-term QALY benefits, the intervention group did not incur additional healthcare costs. These findings underscore the potential economic value of integrating geriatric screening into oncology care model where targeted interventions have enhanced quality-of-life.

ABSTRACTS

A-110: Evaluating the Value of Outpatient versus Inpatient High-dose Cytarabine Consolidation in Acute Myeloid Leukemia

Poster Panel 19 **Q&A Standby Period** 15:30 – 15:40

Category Clinical Haematology

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Background:
High-dose cytarabine (HIDAC) consolidation is standard therapy for patients with AML in remission. Due to risks of neutropenia, toxicities, infection, and the lack of ambulatory infrastructure in the past, HIDAC treatment, by default, was administered in the inpatient setting, resulting in substantial healthcare resource utilization and concomitant costs. This study evaluates the value of outpatient versus inpatient and hybrid models by comparing clinical quality indicators and healthcare costs.

Objective:
to compare clinical quality indicators and healthcare costs between HIDAC regimes

Methods:
a retrospective cohort study was conducted among 76 adult Acute Myeloid Leukemia (AML) subjects who received HIDAC consolidation treatment between March 2022 and June 2025. Patients were stratified into outpatient (n=18), inpatient (n=44) and hybrid (n=14) groups based on HIDAC administration mode. Quality indicators include 28-day mortality, 28-day hospital-acquired infections, 28-day ICU admissions, 28-day inpatient transfusion and repeated laboratory full blood count tests within treatment days. A comparison of quality indicators was made between the 3 HIDAC administration cohorts.

Results:
There was no difference in 28-day mortality or hospital acquired infections among the three cohorts. ICU admission was rare, with only one case each from the outpatient and hybrid cohort. There were significantly lesser repeated labs conducted for the outpatient cohort compared to the hybrid and inpatient cohorts. Inpatient transfusion (in the outpatient cohort) admission rates were lower in the outpatient group and comparable between the hybrid and inpatient groups. Outpatient HIDAC was associated with a substantial reduction in overall cost averaging to below 5000 SGD, while the average cost was 40,000 SGD and 22,000 SGD for the inpatient and hybrid cohorts respectively.

Conclusion:
Outpatient administration of HIDAC showed improved value by significantly reducing costs and resource utilization without compromising patient safety nor survival outcomes. With careful patient selection and structured monitoring, outpatient HIDAC delivery represents a safe and cost-effective model for AML consolidation therapy, whilst supporting sustainable oncology care delivery amid rising healthcare costs.

ABSTRACTS

A-111: A Comparative Evaluation of the Sysmex CN-3000 and CS-2500 Hemostasis Analyzers

Poster Panel 26 **Q&A Standby Period** 10:40 – 10:50

Category Laboratory and Diagnostic

Authors
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BACKGROUND:
The Sysmex CN-3000, introduced globally in August 2021, was developed to meet increasing demands for faster and more accurate coagulation testing. Its predecessor, the Sysmex CS-2500 (launched globally in August 2016), has been a reliable analyzer in hemostasis testing. This study compares both systems to evaluate the CN-3000's technological and operational improvements for our laboratory's implementation.

METHODS:
Validation studies for the CN-3000 included accuracy, precision, linearity, carryover, verification of reference ranges, and correlation with the CS-2500. A comparison between the 2 analyzers assessed average turnaround times (TAT) for PT/INR and PT/INR + APTT assays over a period of 2 months.

RESULTS:
Precision, carryover, and linearity met all manufacturer criteria. Strong correlation was shown between the 2 systems ($r > 0.95$). The CN-3000 achieved shorter overall turnaround times (TATs). For PT testing, the CN-3000 ($n = 7,263$) recorded a median TAT and inter-quartile range (IQR) of 16 minutes (13–18 min), compared with the CS-2500 ($n = 7,669$), which had a median TAT of 17 minutes (15–21 min). For combined PT + aPTT testing, the CN-3000 ($n = 5,835$) demonstrated a median TAT of 16 minutes (14–19 min), while the CS-2500 ($n = 5,789$) showed a median TAT of 18 minutes (15–21 min).

CONCLUSION:
The CN-3000 delivers equivalent analytical performance with improved workflow efficiency, reducing TAT and supporting faster, more effective laboratory operations. The CN-3000 has been in service with us since July 2025.

ABSTRACTS

A-112: Evaluation of CellaVision as a Learning Pedagogy for Blood Cell Morphology Training

Poster Panel 29 **Poster Presentation** 13:00 – 13:07

Category Laboratory and Diagnostic

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BACKGROUND & AIM
Digital morphology platforms such as CellaVision are increasingly used in clinical haematology laboratories to support blood film review, workflow efficiency, and education. While digital systems offer advantages including automated pre-classification and image libraries, their role as a primary learning tool for morphology training remains unclear. This study aimed to evaluate medical laboratory technologists' (MLTs) perceptions of adopting CellaVision as a learning pedagogy and to compare learning experiences with traditional manual microscopy.

METHODS
Two questionnaire-based surveys were conducted among MLTs in the haematology laboratory at Ng Teng Fong General Hospital, Singapore. The first survey evaluated familiarity, perceived benefits, challenges, and willingness to adopt CellaVision (n = 18). The second survey compared learning experiences between CellaVision and manual microscopy, including effectiveness, confidence in identifying abnormal cells, and engagement (n = 16). Responses were collected using Likert scales and analysed descriptively using medians and proportions. Paired comparisons were performed using the Wilcoxon signed-rank test.

RESULTS
Most respondents reported moderate familiarity with CellaVision (66.7%), and 78% were likely or very likely to adopt it as a learning tool. Manual microscopy was perceived as more effective for learning morphology (median score 5 vs 3 for CellaVision) and for identifying rare or abnormal cells (median 4 vs 3). Manual microscopy was also rated as more engaging (median 4 vs 3). Wilcoxon signed-rank testing demonstrated a statistically significant difference in engagement between the two modalities ($p = 0.029$), favouring manual microscopy. In contrast, CellaVision was perceived to improve efficiency and facilitate faster cell identification. The most common preference was a combined approach integrating both methods (62.5%).

CONCLUSION
While CellaVision enhances efficiency and digital workflow, manual microscopy remains essential for developing core morphology skills and diagnostic confidence. A blended learning approach integrating both modalities may provide the most effective training model in laboratory haematology.

ABSTRACTS

A-113: Nilotinib-Associated Arterial Thrombosis in Chronic Myeloid Leukemia: A Case Series

Poster Panel 10 **Q&A Standby Period** 10:30 – 10:40

Category Clinical Haematology

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BACKGROUND AND AIM
Nilotinib is widely used in managing chronic myeloid leukemia (CML) due to its efficacy in achieving deep molecular responses. However, concerns have emerged regarding its association with arterial thrombotic events (ATEs), particularly ischemic strokes and coronary artery disease. This study aimed to assess the occurrence of arterial thrombotic events and their association with vascular risk factors in patients with CML treated with Nilotinib.

METHOD
A retrospective review was conducted at the Haematology unit, RIPAS Hospital, involving 31 patients under follow up for chronic myeloid leukemia (CML). Of these, a cohort of 19 patients receiving Nilotinib was identified and included in the analysis. Demographic characteristics, treatment duration and vascular risk factors were systematically evaluated.

RESULT
In a cohort of 19 patients (mean age 47.7 years; 63% male) receiving Nilotinib, 4 individuals (21%) developed ATEs during treatment.Case 1: A 72 years old male with diabetes, hyperlipidaemia, and on Nilotinib since 2012 had a right middle cerebral artery (MCA) infarct in October 2024, followed by non-ST elevation myocardial infarction with severe three-vessel disease in June 2025.Case 2: A 41 years old male with hypertension on Nilotinib since July 2023 presented in June 2024 with a left MCA infarct.Case 3: A 64 years old female with hypertension and hyperlipidaemia on Nilotinib since November 2023, presented in April 2025 with right facial weakness and dysarthria; MRI showed a left periventricular MCA perforator infarct.Case 4: A 49 years old male with prior nasopharyngeal carcinoma treated with chemoradiotherapy in 2000, developed bilateral MCA infarcts in 2015 after four years on Nilotinib.

CONCLUSION
In this case series of four patients with CML receiving Nilotinib, three experienced cerebrovascular events and one developed severe multivessel coronary artery disease. Events occurred both early (within 1 year of therapy) and late (after >10 years), suggesting that vascular complications are not strictly time dependent. Imaging consistently revealed in situ arterial pathology without embolic sources. These findings support growing evidence of Nilotinib's vascular toxicity. Routine cardiovascular risk stratification, close monitoring, and timely intervention are essential to mitigate serious thrombotic events in patients on long-term Nilotinib therapy.

ABSTRACTS

A-114: Derivation and External Validation of a dRVVT ratio Cutoff for Identifying Triple Positive Antiphospholipid Profiles

Poster Panel 28 **Poster Presentation** 13:07 – 13:14

Category Laboratory and Diagnostic

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INTRODUCTION:
Triple-positive antiphospholipid antibodies (TP-aPL) confer substantial thrombotic risk; however, the clinical utility of reflex anticardiolipin (aCL) and anti-β2-glycoprotein I (aβ2GPI) testing in asymptomatic patients with isolated lupus anticoagulant (LA) remains unclear. Identifying asymptomatic TP-aPL individuals is important, as risk mitigation strategies—including thromboprophylaxis during high-risk periods and counselling regarding estrogen exposure or pregnancy—may be considered. We evaluated whether a normalized dilute Russell viper venomtime (dRVVT) ratio could stratify LA-positive patients for targeted testing.

METHODS:
Receiver operating characteristic analysis in a developmental cohort derived an optimal dRVVT cutoff using Youden's index. Internal and external validation were performed to evaluate the robustness and interlaboratory applicability of the normalized dRVVT cutoff. aCL and aβ2GPI positivity were defined by the 99th percentile. Cohorts 1–2 used FEIA/CLIA, while cohort 3 used ELISA.

RESULTS:
Among 618 patients, TP-aPL prevalence was 16.0%, 20.7%, and 24.7% across developmental(n=231), internal (n=213), and external cohorts (n=174). The optimal cutoff (dRVVT 1.45)demonstrated excellent discrimination in the developmental cohort (AUC 0.96). Using this prespecified threshold, accuracy was preserved internally (88.3%) and externally (74.7%), with consistently high sensitivity (~91%) and NPV up to 99.4%.

CONCLUSION:
A normalized dRVVT ratio of 1.45 provides a pragmatic strategy to identify asymptomatic LA-positive individuals who warrant comprehensive aPL testing. External validation supports interlaboratory applicability, enabling early recognition of high-risk patients while promoting more targeted investigation.

ABSTRACTS

A-115: A 5-year Retrospective Analysis of The Use of Extracorporeal Photopheresis (ECP) via UVA-PIT in Treating Graft Versus Host Disease (GVHD) in Singapore General Hospital (SGH)Apheresis Unit

Poster Panel 02 **Poster Presentation** 13:07 – 13:14

Category Allied Health

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BACKGROUND
Graft-versus-host disease (GVHD) is a systemic disorder in which donated stem cells recognize patients 'own cells as foreign and attack them (Justiz Vaillant et al., 2022). It poses as one of the main significant courses of morbidity and mortality post-allogenic hematopoietic stem-cell transplantation (Drexler et al.,2020). Extracorporeal photopheresis (ECP) is a treatment option when GVHD becomes refractory or dependent on first line steroids (Penack at al.,2020).

AIM
To provide a retrospective analysis with the use of Extracorporeal Photopheresis (ECP) via UVA-PIT in treating patients with acute and chronic Graft Versus Host Disease (GVHD) in the Singapore General Hospital (SGH) Apheresis Unit over 5 years.

METHOD
This is a retrospective single-centre analysis. A total of seventeen patients who were treated with ECP via UVA-PIT from June 2019 to June 2024 at SGH Apheresis Unit were selected for analysis. The details extracted include types of GVHD, the total sessions each patient received and the total treatment time for each ECP procedure. The descriptive statistics used in the analysis are in a form of numeric and categorial variables pertaining to types of GVHD, mean number of ECP sessions per patient, number of successful completions and time of each session.

Results
A total of 347 sessions of ECP via UVA Pit were performed by trained apheresis nurses for the seventeen patients. The mean number of sessions for each patient is 15.5. The mean time taken for each ECP procedure is 207.6 minutes from initiation of MNC collection till reinfusion. Among the seventeen patients, eight of them had chronic GVHD and nine had acute GVHD. Five patients had GVHD that involved multiple organs such as liver, gut, lung, and skin; one case had neuromuscular system involvement. Five out of the seventeen patients successfully completed ECP treatment. They had a mean total of 27.2 sessions with good response. Twelve patients were not able to complete their ECP sessions due to multifactorial factors such as infection, disease progression and respiratory failure.

Conclusion
From the analysis, ECP via UVA-PIT is one of the treatment options for patients with acute or chronic GVHD in SGH Apheresis unit by trained nurses.

ABSTRACTS

A-116: To Reduce the Number of Steps Taken to Check Documents during Blood Transfusion by 50% within 6 Months in Hematology Centre

Poster Panel 01 **Poster Presentation** 13:14 – 13:21

Category Allied Health

Authors
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Background
Blood transfusion is a common procedure in Haematology Centre. Haematology Centre nurses are challenged with an absence of a communication tool during blood transfusion as the steps to check monitoring documents are lengthy and repetitive. The implementation of duration chart had proved to enhance nonverbal communication among nurses and helped to reduce steps and time taken for blood transfusion monitoring document checking without compromising patient safety.

Aim
To reduce the number of steps taken to check documents during blood transfusion by 50% within 6 months in Hematology Centre.

Methodology
A cause-and-effect diagram was used to examine and identify the potential root cause. The absence of communication was identified as one of the main causes of repetitive documents checking resulting in the potential delay in patient monitoring. A hardcopy duration chart was designed as a non-verbal communication tool to improve and reduce repetitive steps during the documents checking process. Quantitative data was taken before and after the implementation of the duration chart. A satisfaction survey was conducted to gauge the nurses' perspective on the new implementation.

Results
The use of the duration chart effectively reduced the number of steps taken from 8 to 4 steps. The time taken to perform document checking for 1 patient decreased from 8.75 minutes to 3.775 minutes. The time saved translated to an estimated cost saving of $21,581.56 for nursing staff and a high level of 94% staff satisfaction was reported. Data collected was based on steps and time taken for 1 transfusion. Satisfaction survey sample size: 16.

Conclusion
Haematology Centre nurses are challenged with an absence of a communication tool during blood transfusion as the steps to check monitoring documents are lengthy and repetitive. Amidst the high turnover rate and heavy workload in an outpatient setting, nurses are challenged to provide care, monitor patients and complete documentation on time. The use of the duration chart proved to enhance nonverbal communication among nurses and helped reduce steps and time taken for blood transfusion monitoring document checking without compromising patient safety, with additional cost savings and high staff satisfaction.

ABSTRACTS

A-117: Multidisciplinary Coordination for Managing the Transition to a New APTT Heparin Therapeutic Range in the Hospital

Poster Panel 04 **Poster Presentation** 13:21 – 13:28

Category Allied Health

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BACKGROUND & AIM:
Validation of activated partial thromboplastin time (APTT) responsiveness to heparin is required for each reagent-coagulation analyzer system. Transition to a new analyzer with a new heparin therapeutic range (HTR) must be managed carefully to ensure correct heparin titration. We describe the strategy taken at the National University Hospital (NUH) to manage the transition.

METHODS:
In early 2025, we established the HTR for the incoming Sysmex-CN analyzer using paired APTT (Dade® Actin FSL) and anti-Xa levels (BIOPHEN™ Heparin LRT) on 48 samples from patients receiving heparin. Samples analyzed on the new analyzer would require the new HTR titration protocol. We formed a multidisciplinary group of pharmacists, nurses, laboratory technologists and hematologists to coordinate the transition.

RESULTS:
The new HTR was 55-75 seconds, versus the previous 55-80 seconds on Sysmex CS-5100 (Figure). Two main aspects required attention (1) patients already on heparin infusion during changeover, (2) patients newly initiated after changeover. Two months before the changeover, relevant forms and heparin titration protocols were updated with the new HTR, and corresponding links in the EPIC electronic medical records system were identified for IT update. One month before, the changeover was announced at the Pharmacy and Nursing Quality Improvement Committee meeting, followed by announcements to clinicians and nurses one week before. On changeover day, pharmacists identified 10-15 patients with ongoing heparin infusion. At cutover, the laboratory and IT personnel validated the new analyzer-EPIC interfaces. Post-implementation actions included: (1) ward visits by nursing leads to introduce new monitoring forms with the new protocol, (2) alerts to clinicians to use the new HTR, (3) EPIC interventions by pharmacist lead to amend heparin orders, (4) Replacement of old protocols on the intranet and EPIC (5) laboratory comments on all APTT results within the first 12 hours indicating use of new analyzer and new HTR. Over the next 24 hours, pharmacists reviewed new heparin infusion orders and reinforced new HTR use. Announcements were sent through medical affairs and Anticoagulation Steering Committee to ensure use the new HTR protocol.

CONCLUSION:
Pre-emptive and coordinated actions enabled a smooth and error-free period of transition in heparin titration protocol.

ABSTRACTS

A-118: Beyond Routine Serology: Discovery of ParaBombay B Phenotype Using Next-Generation Sequencing

Poster Panel 27 **Poster Presentation** 13:14 – 13:21

Category Laboratory and Diagnostic

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BACKGROUND:
A 39-year-old Chinese female with no history of transfusion or stem cell transplant was admitted for anaemia. Routine serology showed an O forward type, presence of only anti-A in plasma, and a negative antibody screen. These atypical results triggered further evaluation for a possible H-deficient phenotype. Testing with anti-H lectin showed no reactivity, suggesting absence of H antigen on red cells.

AIM:
To identify the genetic cause of the patient's unusual serological findings and determine whether she exhibits a paraBombay B phenotype.

METHOD:
Genomic DNA extracted from EDTA blood was analysed by the Red Cell Reference Laboratory, Australian Red Cross, using targeted next-generation sequencing (NGS) with a customised 44-gene blood group panel on the Illumina MiSeq platform. Reads were aligned to GRCh37, and variants in ABO, FUT1, FUT2, and FUT3 were interpreted using ISBT allele databases and HGVS guidelines to define the genotype–phenotype relationship.

RESULTS:
NGS showed that the patient carries one B allele and one O allele (ABOB.01 / ABOO.01.01), confirming a genetic Group B. Two pathogenic FUT1 variants (c.551_552delAG and c.881_882delTT) were identified on separate alleles. These rendered both FUT1 proteins nonfunctional and prevented H antigen formation, which is essential for A or B antigen expression on red cells. This explains the apparent absence of B and H antigens in initial routine testing.In contrast, FUT2 analysis revealed one functional allele (FUT2*01.09), confirming the patient is a secretor, capable of producing soluble H substance in secretions. A functionally active FUT3 enzyme identified, which together with FUT2-derived H Type-1 substrate enables formation of Leb, correlates with her Le(a−b+) Lewis phenotype. Molecular findings confirm a paraBombay B (H-deficient secretor) and Le(a−b+) phenotype.

CONCLUSION:
This case demonstrates how H antigen deficiency can mask the true ABO genotype, leading to potential misclassification of blood group. This highlights the importance of NGS in resolving complex serological discrepancies and ensuring safe transfusion practice. Accurate identification is critical for appropriate blood selection, as individuals with para-Bombay phenotype may require ABO-compatible units with consideration of H antigen status, and in some cases, H antigen–negative blood to avoid haemolytic transfusion reactions.

ABSTRACTS

A-119: Characterization of Extramedullary Relapse of Acute Myeloid Leukemia post Allogenic Stem Cell Transplant and Comparison with Marrow Relapse

Poster Panel 11 **Q&A Standby Period** 10:40 – 10:50

Category Clinical Haematology

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BACKGROUND
Extramedullary relapse (EMR) of acute myeloid leukemia (AML) following allogenic haematopoietic stem cell transplantation (alloSCT) can occur in isolation, precede, coincide or follow bone marrow relapse (BMR). It is an under-recognized entity reported in up to 5-12% of alloSCT patients associated with poor outcomes. Here we compare the disease characteristics and outcomes of patients with EMR to patients with only BMR.

METHODS AND RESULTS
An electronic record and database review was conducted on 375 patients with AML who underwent first alloSCT between 2000 to 2024 in our institution. A total of 134 patients relapsed post-transplantation, amongst whom 33 patients (24.6% of relapsed patients and 8.8% of all transplanted) had EMR. The baseline characteristics were comparable between the EMR and BMR cohort. Cumulative incidence of EMR was 7.8%,9.8%, 12% and 14.1% at 1 year, 2 years, 5 years and 10 years respectively, compared to 24.3%, 27.5%,30.2% and 31.5% for the BMR cohort. Amongst the 33 patients with EMR, marrow involvement occurred before EMR in 26 (81%), after in 3 patients (9%), and 4 had isolated EMR (iEMR). EMR involved a single site in 17 patients (51%) and was disseminated ≥3 sites in 10 patients (30%). Most common sites of disease included skin, central nervous system (CNS) and bone. Treatment of EMR remains challenging. Therapy included hypomethylating agents, conventional chemotherapy, targeted therapy, donor lymphocyte infusions and second alloSCT. Additional local treatments to extramedullary sites included surgical resection (n=2), intrathecal chemotherapy (n=5), and radiotherapy (RT) (n=8). When compared to the BMR cohort without extramedullary involvement, response rates were equally poor, with cumulative incidence of achieving remission at 1 year of 36.0% and 42.6%; median survival of 6.9 months and 4.9 months for EMR vs BMR respectively (p=ns), and long-term survival of 11.1% and 12.1% respectively. Five of the 33 patients with EMR survived beyond 5 years, including 3 of the 4 patients with iEMR.

CONCLUSION
EMR post alloSCT in AML presents significant diagnostic and therapeutic challenges. Further studies to elucidate disease-related risk factors and to evaluate the efficacy of therapeutic strategies are required to improve outcomes for patients.

ABSTRACTS

A-120: Outcome of Acute Myeloid Leukemia Relapsing After Allogenic Hematopoietic Stem Cell Transplant— Analysis of Risk Factors and Long-Term Clinical Course

Poster Panel 13 **Q&A Standby Period** 10:40 – 10:50

Category Clinical Haematology

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We review our series of 375 AML patients who underwent an allogeneic transplant to analyse factors impacting relapse and further clinical course. A total of 134 patients relapsed, with a cumulative incidence of28.0%, 32.4%, 36.7% and 39% at 1, 2, 5 and 10 years respectively, giving a post-relapse survival of 30.2%,22.3%, 16.6% and 11.5% respectively. Refined Disease Risk Index and remission status at transplant are independent risks for relapse. The cumulative incidence of another remission after relapse was 23.4%, 32.6%and 41.1% at 3, 6 and 12 months respectively. Interval from transplant to relapse and treatment after relapse strongly impacted post-relapse survival. A second transplant in a highly selected 26 patients gave the best long-term survival of 59.5%, 55.0%, 36.1% and 28.9% at 1,2, 5 and 10-years from second transplant. Twenty-four of the 134 relapsed patients survived beyond 2 years, 14 were recipients of second transplant, while the other 10 received various combinations including donor lymphocyte infusion, salvage chemotherapy, hypomethylating agent with venetoclax and targeted therapy. The longer duration of further remissions after relapse compared to the interval from transplant to relapse in these long-term survivors suggests a potent graft-vs-leukemia effect acting in synergism with pharmacological treatment.

ABSTRACTS

A-121: Real-world Asian Multi-centre Cohort Study on Outcomes of Pola-R-CHP in Untreated Diffuse Large B-cell Lymphoma

Poster Panel 17 **Poster Presentation** 13:00 – 13:07

Category Clinical Haematology

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BACKGROUND
Pola-R-CHP (polatuzumab vedotin with rituximab, cyclophosphamide, doxorubicin, and prednisone) is approved for first-line treatment of diffuse large B-cell lymphoma (DLBCL). However, comparative real-world outcomes with R-CHOP (rituximab, cyclophosphamide, doxorubicin, and prednisone) remain limited, especially in Asian cohorts where POLARIX subgroup analyses suggested an overall survival (OS) benefit.

AIM
To evaluate the efficacy of Pola-R-CHP for first-line treatment of DLBCL in a real-world Asian setting.

METHODS
We conducted a retrospective multi-centre observational study (APOLLO: Asian POLA-R-CHP reaL-world Outcomes) including patients with newly diagnosed DLBCL treated in Singapore and Hong Kong between January 2015 and 2026. Physician-assessed best responses were documented. Outcomes were analysed with Kaplan-Meier and Cox proportional-hazards models, with analyses restricted to 24 months to account for follow-up differences. Restricted mean survival time (RMST) at 24 months was calculated to compare survival within the fixed time horizon.

RESULTS
A total of 145 patients treated with Pola-R-CHP and 592 treated with R-CHOP were identified. After 1:1 propensity matching, 137 patients remained in each arm, with median follow-up of 13.9 and 77.4 months, respectively. Median age was 68 years (range, 21-87), with the majority being IPI 3-5 (83.9%). Based on Hans criteria, 84 (30.7%) were germinal centre B-cell-like (GCB) and 183 (66.8%) were non-GCB. Complete response (CR) rates were higher with Pola-R-CHP (92.0%) than with R-CHOP (84.3%). CR rates for Pola-R-CHP were comparable in non-transformed and transformed DLBCL (92.3% vs 92.0%). Two-year OS was 92.5% versus 77.2% (HR 0.30, 95% CI 0.13–0.70, p=0.003), and two-year PFS was 79.0% versus 66.2% (HR 0.57, 95% CI 0.34–0.98, p=0.038), favouring Pola-R-CHP. RMST at 24 months also favoured Pola-R-CHP for both PFS (21.0 vs 19.0 months, difference 1.99 months, 95% CI 0.23-3.75, p=0.027) and OS (23.0 vs 20.7 months, difference 2.29 months, 95% CI 0.92-3.67, p=0.001). The survival benefits of Pola-RCHP over R-CHOP were observed for patients with IPI 3-5 (2-year OS 91.4% vs 73.4%, p=0.0023; 2-year PFS 76.7% vs 62.9%, p=0.037) and in non-GCB subtypes.

CONCLUSION
Early real-world data suggest that Pola-R-CHP may provide significant OS and PFS benefit over R-CHOP, particularly in higher-risk and non-GCB subgroups.

ABSTRACTS

A-122: Real-World Clinical Characteristics, Treatment Patterns and Outcomes of Classical Hodgkin Lymphoma in a Multi-Ethnic Asian Population: A 15-Year Single-Centre Experience

Poster Panel 09 **Q&A Standby Period** 10:40 – 10:50

Category Clinical Haematology

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BACKGROUND
The therapeutic landscape of classical Hodgkin lymphoma (cHL) has shifted remarkably over the past two decades, with breakthrough advances including brentuximab vedotin (BV), checkpoint inhibitors, and PET-adapted treatment strategies. We examined clinical characteristics, treatment patterns, and outcomes of cHL in a multi-ethnic Asian population to determine the real-world need for novel therapeutics.

METHODS
We conducted a retrospective cohort analysis of cHL patients (N=177) treated at NCIS Singapore from 2009–2025. Advanced stage and elderly patients were analysed as pre-specified subgroups, and temporal trends were assessed across three diagnostic eras: before 2015 (n=44), 2015–2020 (n=72), and after 2020 (n=61).

RESULTS
The cohort comprised 100 male and 77 female patients with a median age of 29 years. At a median follow-up of 49 months, 5-year PFS was 74% and OS 94%, with PFS differing significantly by GHSG stage but no difference in OS (p=0.167). Elderly patients were more likely to have ECOG PS >1, higher LDH, B symptoms and advanced disease. They had comparable PFS to younger patients (61.5% vs 74.9%, p=0.479) but markedly worse 5-year OS (68.1% vs 96.0%, p<0.001). Within the advanced cohort, majority (41%) were treated with 6-ABVD (41%) or RATHL approach (32%) as first line therapy, and 16% received BV-based induction. On multivariate analysis, iPET2 positivity was the strongest predictor of inferior PFS (HR 4.88, p=0.002), while BV use was independently associated with improved PFS(HR 0.11, p=0.033). Treatment patterns evolved significantly across eras, with radiotherapy use declining significantly from 36% to 12% (p=0.004) and BV use rising from 0% to 34% (p<0.001). Despite a trend towards higher-risk and more comorbid patients in the modern era, 5-year PFS and OS remained comparable (p=0.304 and p=0.477 respectively).

CONCLUSION
Our local cHL population demonstrates prognostic characteristics and outcomes consistent with global data. Elderly patients and Adv patients with iPET positivity continue to experience inferior outcomes, highlighting an unmet need for improved treatment strategies. As one of the largest real-world cHL analyses from our region, this study serves as an important benchmark for healthcare policy and future research in the field.

ABSTRACTS

A-123: Real-World Application of Clinical and Molecular-Enhanced Prognostic Scoring Systems in Myelofibrosis Patients in Singapore

Poster Panel 06 **Q&A Standby Period** 15:30 – 15:40

Category Clinical Haematology

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BACKGROUND & AIMS
Prognostic models for myelofibrosis (MF), such as DIPSS, DIPSS-Plus, MIPSS70, MIPSS70-Plus v2.0, and MYSEC-PM, were largely developed in Western populations. Their applicability in Southeast Asian cohorts remains under-explored, and molecular-enhanced systems incorporating cytogenetics and next-generation sequencing (NGS) data have not been routinely assessed in Asian patients until recently. This study evaluates the performance of established clinical and molecular-enhanced prognostic models in primary (PMF) and secondary MF (SMF) within a multi-ethnic Singaporean cohort, and assesses the incremental value of molecular data in a real-world setting.

METHODS
A retrospective review identified 146 adult Singaporean MF patients (PMF n=73; SMF n=73). Clinical, laboratory, cytogenetic, and molecular data were collected and prognostic scores were calculated. Overall survival (OS) was analysed using Kaplan–Meier estimates and Firth-penalised Cox regression. Discrimination was assessed using concordance indices and time-dependent AUC. The study was approved by the local institutional review board.

RESULTS
Median follow-up was 75.9 and 24.4 months for PMF and SMF respectively. The cohort was predominantly Chinese (PMF 73%, SMF 71%), with Malays, Indians and other minority ethnicities represented. Driver mutations were predominantly JAK2 (PMF 66%; SMF 74%) while high-molecular-risk mutations were detected in 18% of PMF and 25% of SMF patients. Kaplan–Meier risk stratification was significant for DIPSS and DIPSS-Plus across both cohorts ($p < 0.001$). MIPSS70-Plus v2.0 demonstrated significant separation in PMF ($p=0.011$), although this was limited by a smaller molecularly-characterised sample size. In PMF, MIPSS70-Plus v2.0 showed the highest Harrell's C-index (0.831), with time-dependent AUC ranging from 0.835-0.892. In SMF, DIPSS-Plus achieved the highest discrimination (Harrell's C-index 0.813) particularly at earlier timepoints, whereas molecular-enhanced models demonstrated improved discrimination at later timepoints. Across both cohorts, age ≥65 years, anaemia, thrombocytopenia, and transfusion dependence were consistently associated with inferior OS. In SMF, circulating blasts ≥2%, unfavourable/complex karyotype, and TP53 mutation were additional adverse prognostic factors.

CONCLUSION
Established MF prognostic models demonstrate good discrimination in a multi-ethnic Singaporean cohort. Molecular-enhanced scores show promising discriminatory capacity, though significance is constrained by sample size. Conventional clinical models remain clinically applicable where molecular profiling is limited, and our findings support incorporating molecular profiling into routine clinical practice.

ABSTRACTS

A-124: Analytical Performance Evaluation of Mindray Automated ESR Compared with CUBE30 Touch and Sediplast Systems

Poster Panel 31 **Q&A Standby Period** 10:40 – 10:50

Category Laboratory and Diagnostic

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BACKGROUND
Erythrocyte Sedimentation Rate (ESR) is a widely used nonspecific marker of inflammation. Automated ESR systems have been introduced to improve laboratory workflow and biosafety while maintaining agreement with the Westergren reference method. This study evaluated the analytical agreement between the Mindray BC-series automated optical ESR method and existing ESR systems — the Sediplast manual modified Westergren system and the automated Diesse CUBE30 Touch analyser.

METHODS
992 EDTA routine whole blood samples analysed for ESR using the CUBE30 Touch system in our laboratory were also analysed with the Mindray BC-series analyser. A subset of 97 samples underwent three-way comparison using Mindray, CUBE30 Touch, and Sediplast systems. Mindray ESR results were evaluated using both raw and corrected values, and compared with Sediplast and the CUBE30 Touch, respectively. Correlation and agreement between methods were assessed using linear regression and Bland-Altman analyses.

RESULTS
Regression and Bland-Altman analyses showed varying levels of agreement across the comparisons. Mindray ESR-corrected values displayed weak correlation when compared with CUBE30 Touch (n = 992), although mean bias was minimal. Limits of agreement were wide, with increasing variability at higher ESR values. In contrast, uncorrected Mindray ESR values showed strong agreement with the Sediplast method (n = 97), with good correlation and relatively small bias. Uncorrected Mindray ESR values also demonstrated better correlation with CUBE30 Touch compared to ESR-corrected values, suggesting that the correction algorithm may introduce additional variability.

CONCLUSION
The Mindray ESR method showed good agreement with Sediplast, but poor agreement with the CUBE30 Touch, despite the correction being intended to improve comparability with the Westergren method. The limited sample size for the Sediplast comparison (n = 97) may affect the reliability of these findings, and further evaluation against the reference Westergren method is required to confirm these observations. Despite these limitations, the Mindray system offers practical advantages, including faster turnaround time and improved workflow efficiency.

ABSTRACTS

A-125: Analytical Performance Evaluation of Mindray BC-6800 Plus Haematology Analyzer compared with Sysmex XN-9000

Poster Panel 23 **Q&A Standby Period** 15:30 – 15:40

Category Laboratory and Diagnostic

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BACKGROUND AND AIM
Automated haematology analyzers are essential in clinical laboratories, providing accurate full blood count (FBC) results routinely for patient management. The Mindray BC-6800 Plus is a high-throughput automated haematology analyzer designed for comprehensive haematological analysis. The study aims to evaluate the analytical performance of the Mindray BC-6800 Plus by assessing precision, method comparison, and linearity, using the Sysmex XN-9000 as the reference analyzer.

METHODS
The analyzer was assessed for repeatability using 20 consecutive runs of commercial-quality control (QC) materials, and reproducibility was evaluated over 20 consecutive days in closed-sampling mode. 1,277 patient samples were compared by analysis on both the Mindray BC-6800 Plus analyzer and the Sysmex XN-9000 analyzer as reference. Major complete blood count (CBC) parameters evaluated included White Blood Cells (WBC), Red Blood Cells (RBC), Haemoglobin (Hb), Haematocrit (HCT), Mean Corpuscular Volume (MCV), Platelet count (PLT), Reticulocyte Count (RET), and WBC differentials (Neutrophils, Lymphocytes, Monocytes, Eosinophils, and Basophils). Agreement was assessed with the Passing-Bablok regression and Bland-Altman analysis. Linearity was established and validated using third-party materials from Verified Medical Research (VMR). Results for CBC parameters were compared with expected concentrations and evaluated using linear regression analysis.

RESULTS
All evaluated parameters met the claimed acceptable precision limits, indicating good repeatability and reproducibility. The Passing-Bablok regression demonstrated a strong correlation for all CBC parameters. Furthermore, Bland-Altman analysis demonstrated minimal mean bias and small standard deviation (SD). Results fell within the established 95% limits of agreement, indicating good agreement between the analyzers. The results were within acceptable linearity limits across the analytical measurement range. Additionally, the regression analysis exhibited strong correlation coefficients, indicating a good linear relationship between expected and measured values.

CONCLUSION
Mindray BC-6800 Plus haematology analyzer demonstrated acceptable precision, good agreement with Sysmex XN-9000, and strong linearity, supporting its suitability for routine haematology testing.

ABSTRACTS

A-126: The Blinatumomab Era in Philadelphia Chromosome Positive B-Acute Lymphoblastic Leukemia (Ph+ B-ALL): A Single-Center Analysis of Treatment Evolution and Survival

Poster Panel 16 **Poster Presentation** 13:07 – 13:14

Category Clinical Haematology

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BACKGROUND
The advent of BCR-ABL tyrosine kinase inhibitors (TKIs), such as imatinib, dasatinib, ponatinib, and introduction of blinatumomab have greatly improved survival in Ph+ B-ALL. We analyzed our center's 15-year experience to assess the impact of these advances on patient outcomes.

METHODS
Our center treated 107 adult Ph+ B-ALL patients from 2010 to 2025. For this analysis, we included patients who attained CR with induction chemotherapy and remained alive 3 months after diagnosis. Overall survival (OS) and progression-free survival (PFS) were analyzed by Kaplan–Meier methods and log-rank tests. Outcomes were evaluated at a 3-year landmark to account for differences in follow-up duration between historical (Imatinib) and modern (Dasatinib/Blinatumomab) treatment eras (median follow-up: 68 months). Complete molecular response (CMR) was defined as BCR-ABL ≤ 0.01%.

RESULTS
89 patients were included for analysis. Median age was 48.2 (Range 18.1–78.6). 42 (47.2%) were male. 55 patients (62%) underwent allogeneic transplant (alloHSCT) at CR1. 25 (36.20%) patients received hyperCVAD + imatinib, 45 (63.80%) patients received hyperCVAD + dasatinib, 23 (25.8%) patients had blinatumomab incorporated into frontline treatment (median 2 cycles). Patients who received frontline-blinatumomab treatment had significantly higher 3-year OS (91.3% vs 59.4%, p=0.0468) and 3-year PFS (85.6% vs 40.0%, p=0.0042). In the transplanted subgroup (n=55), patients who received blinatumomab pre-transplant had significantly higher 3-year PFS (90.0% vs 39.9%, p=0.0485) and a trend toward improved OS (90.0% vs 65.7%, p=0.177), though this was non-significant. Among blinatumomab-treated patients, 3-year OS did not differ between those who underwent alloHSCT (n=10) and those who did not (n=13) (90.0% vs 92.3%, p=0.605). Among patients receiving hyperCVAD + TKI, 90-day CMR was higher with dasatinib than imatinib (77.3% vs 56.0%, p=0.082). Overall, 61 patients (69%) achieved 90-day CMR; within this group, 3-year OS did not differ between transplanted and non-transplanted patients (66.0% vs 62.9%, p=0.593).

CONCLUSION
Overall, survival outcomes for Ph+ B-ALL significantly improved with frontline incorporation of blinatumomab. Our study is one of the few real-world Asian studies evaluating survival outcomes and supports continued evolution toward frontline TKI–immunotherapy strategies in Ph+ ALL.

ABSTRACTS

A-127: The Monospecific and Bispecific Chimeric Antigen Receptor (CAR) T-cell Therapy in Multiple Myeloma: A Systematic Review, Meta-analysis and Meta-regression

Poster Panel 15 **Poster Presentation** 13:14 – 13:21

Category Clinical Haematology

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BACKGROUND & AIM:
Chimeric antigen receptor (CAR) T-cell therapy has revolutionized treatment for relapsed/refractory multiple myeloma (RRMM). However, the comparative effectiveness across CAR-T constructs, target antigens and patient subgroups remains incompletely characterized.

METHODS:
This PRISMA-adherent systematic review was prospectively registered (CRD420251156267) and searched Medline, Embase, CENTRAL, ClinicalTrials.gov and CNKI from January 2010 to 5 December 2025. Eligible studies reported clinical outcomes of CAR T-cell therapy in MM. Primary efficacy endpoints included overall response rate (ORR) and complete response (CR) rate. Safety outcomes of interest included grade ≥3 hematologic toxicities, cytokine release syndrome (CRS) and neurotoxicity (ICANS). Random-effects meta-analyses and meta-regression were performed stratifying by key characteristics including CAR target, product type, extramedullary disease, high-risk cytogenetics and prior lines of therapy. Heterogeneity was quantified via I2 statistics.

RESULTS:
Forty-four cohorts (1,833 patients) were included. Across all platforms, pooled ORR was 88% (95%CI 83–91; I2=70.8%) and pooled CR was 55% (95%CI 47–62; I2=83.8%). Among monospecifics, ORR was 89% for autologous BCMA CAR-T (95%CI 82–93; I2=79.3%) and 89% for GPRC5D CAR-T (84–92; I2=25.2%). Allogeneic BCMA CAR-T showed lower ORR (95%CI 58%). Dual-target approaches achieved similarly high activity, including BCMA/CD19 (overall ORR 92% [95%CI 89–95; I2=0%]; CR 64%), encompassing both bispecific CAR-T products and combined/sequential BCMA+CD19 CAR-T infusions. Minimal residual disease negativity occurred in 78% (95%CI 68–86) of evaluable patients. In BCMA-exposed patients, subsequent GPRC5D CAR-T retained efficacy (ORR 82%; CR 35%). Cohorts with higher proportions of extramedullary disease (EMD) and higher median lines of previous therapy had significantly lower ORR/CR, whereas high-risk cytogenetics, ISS stage, age, sex, region had minimal impact. Grade≥3 neutropenia, leukopenia, anemia and thrombocytopenia occurred in 0.83, 0.73, 0.46 and 0.48, respectively. Grade≥3 CRS and ICANS were uncommon (0.08 and 0.03) across construct types.

CONCLUSION:
CAR-T therapy yields high response rates and deep remissions in RRMM. Both monospecific and dual-target (bispecific or dual-infusion) strategies are highly active. GPRC5D CAR-T showed promise in patients who relapsed after BCMA CAR-T. EMD was a key adverse prognostic factor. Severe CRS and ICANS are infrequent, while hematologic toxicity remains common.

ABSTRACTS

A-128: Evaluation of the VWF Collagen Binding Assay using the HEMOSIL ACUSTAR Analyser

Poster Panel 30 **Poster Presentation** 13:21 – 13:28

Category Laboratory and Diagnostic

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BACKGROUND AND AIM
Current diagnosis of von Willebrand disease is dependent on assays to detect factor VIII activity, von Willebrand factor (VWF) levels and activity. Recent evidence called for inclusion of the VWF collagen binding (VWF:CB) assay to distinguish Type 2A and 2B from Type 2M samples for better disease stratification and management. The aim of this study is to evaluate the VWF:CB assay reagent on the Hemosil Acustar platform using a chemiluminescent 2 step immunoassay. With this introduction, local VWD diagnostic would be enhanced and in line with international recommendations.

METHODS
Evaluation is carried out through comparison of external quality assurance (EQA) samples to peer means as a first strategy in view of a lack of local accredited assays. Precision was done using control samples for 5 days for 5 times. Linearity was done using serially diluted patient samples to see the response-concentration curve, Limit of blank uses buffer and the limit of detection uses diluted samples to extremely low values. The claimed reference intervals were validated obtained from 32 healthy donor samples.

RESULTS
The EQA samples analysed in our laboratory differed no more than 5% from the peer means and interpretations were as expected. The within-run precision estimates were verified at 3.3% and 4.1% respectively for two levels of controls while within-laboratory estimates were verified at 5.3% and 7.8% respectively. The validated linearity range was between 0 - The VWF:CB assay compared well with the peer means with bias of less than 5%. The within-run precision estimate were verified at 3.3% and 4.1% respectively for two levels of controls while within-laboratory estimates were verified at 5.3% and 7.8% respectively, while the within-laboratory precision was 8%. Linearity was verified from 0 – 50% and the detection limit was 0.2%. The reference interval was validated at 50.5% - 181.2% for all blood types and lower levels were also observed with O blood type.

CONCLUSION
The VWF:CB assay is validated to be consistent in performance and would be a good addition to our VWF diagnostic test panel. The automated platform will also allow for less operator dependency and shorter turnaround time.

ABSTRACTS

A-129: Transitioning from On-Demand to Prophylaxis After Government Subsidies: A Qualitative Study of Beliefs and Behavioural Adaptation in Adult Haemophilia

Poster Panel 08 **Q&A Standby Period** 15:30 – 15:40

Category Clinical Haematology

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BACKGROUND
Prophylactic factor replacement reduces bleeding complications and improves long-term outcomes in haemophilia. In Singapore, the introduction of government subsidies has expanded access to regular prophylaxis among adults previously on-demand treatment. However, transitioning from episodic to preventive therapy represents a behavioural and identity shift that extends beyond clinical decision-making. Understanding patient perspectives is essential to optimise sustained adherence.

AIM
To explore beliefs, behavioural adaptations, and contextual factors influencing adult haemophilia patients' transition from on-demand therapy to subsidised prophylaxis.

METHODS
We conducted a qualitative study using semi-structured interviews with adult patients with haemophilia A or B who transitioned to prophylaxis under the national subsidy framework. Interviews were audio-recorded, transcribed verbatim, and analysed using inductive thematic analysis. A hybrid analytical approach was used, leveraging a Large Language Model for the automated discovery of preliminary theme. This was then refined and validated by human researchers to maintain interpretive nuance. Recruitment continued until thematic saturation was achieved. Domains explored included perceptions of disease control, financial considerations, treatment burden, healthcare relationships, and quality of life.

RESULTS
Twelve participants (median age 34 years, range 19–61) were interviewed. Four major themes emerged: Reframing disease identity — Most participants described feeling "more normal," reporting increased confidence in physical, occupational, and social participation after initiating prophylaxis. Financial security as a behavioural catalyst — Subsidy access was consistently identified as the decisive factor enabling transition and sustained adherence. Treatment fatigue and injection aversion — Despite recognising clinical benefit, several participants reported difficulty maintaining motivation for regular infusions, reflecting the ongoing burden of therapy. Healthcare trust and relational influence — Strong clinician and nurse support facilitated acceptance of long-term preventive treatment. Notably, a subset of participants retained elements of a crisis-oriented mindset, indicating incomplete psychological transition from on-demand habits.

CONCLUSION
Transition to prophylaxis following subsidy expansion is shaped by financial assurance, evolving self-identity, and healthcare relationships. Addressing residual crisis-based attitudes and treatment fatigue through structured behavioural support may be critical to sustaining long-term prophylaxis adherence. These findings provide policy-relevant insights for patient-centred haemophilia care models in publicly funded systems.

ABSTRACTS

A-130: Evaluation of Reference Range for Extended Inflammatory Parameters (EIP)

Poster Panel 24 **Q&A Standby Period** 15:30 – 15:40

Category Laboratory and Diagnostic

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Introduction:
Differentiating viral and bacterial infections is critical to optimize treatment strategies. The Extended Inflammation Parameters (EIP) such as RE-LYMPH (Reactive Lymphocytes), AS-LYMPH (Antigen-Stimulating Lymphocytes), NEUT-RI (Neutrophils Reactivity Intensity) and NEUT-GI (Neutrophils Granularity Intensity) offers this valuable information.

Objective:
Establish a reference range of EIPs for healthy adults.

Methods:
204 adult patients free from any inflammatory disease with normal FBC results were collected from NUH Wellness Center retrospectively. Using Tukey method, the interquartile range (IQR) using the difference of 75th (Q3) and 25th (Q1) percentile were calculated to remove the outlier. Upper and lower limit are computer by: Q1-1.5 X IQR and Q3-1.5XIQR. The reference range is defined by 2.5th percentile as the lower limit, and 97.5th percentile as the upper limit of the reference range.

Results:
Reference range obtained: AS-LYMPH 0.00 x109/L – 0.02 x109/L (n=193), AS-LYMP 0.00% - 0.20% (n=179), RE-LYMPH 0.01 x109/L – 0.05 x109/L (n=200), RE-LYMPH 0.1% - 1.0% (n=202), NEUT-RI 39.9fL – 49.8fL (n=184), NEUT-GI 145.3SI – 158.6SI (n=188).

Conclusion:
Setting a reference range gives a valuable predictive assessment of patient inflammatory condition. The early predictions help guide antibiotics prescription, decide on further diagnostics test and monitor effectiveness of the treatment.

ABSTRACTS

A-131: Parvovirus B19 Induced Pure Red Cell Aplasia in Patient with Systemic Lupus Erythematosus

Poster Panel 14 **Q&A Standby Period** 15:30 – 15:40

Category Clinical Haematology

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We report an interesting case of a 41-year-old Chinese female patient presenting with persistent normocytic normochromic anemia refractory to blood transfusions on a background of known systemic lupus erythematosus (SLE). Patient has had SLE since 2009 with multisystemic involvement and had been on multiple lines of immunosuppressants. On admission she was on stable doses of prednisolone 5mg OM, hydroxychloroquine 300mg OM, cellcept 1.5g BD, tacrolimus 0.5mg BD. She has also been on 6 monthly rituximab for the past 4 years as her SLE flares were previously refractory to cellcept and tacrolimus. Of note, patient also presented with a 2 week history of occipital headache. On admission, hemoglobin levels were 6.9 and maintained at 7.9 after 2 units of red blood cell transfusions which then dropped back to 6.2 subsequently. Patient did not have any clinical bleeding manifestations. Bloods were unremarkable for hemolysis and direct antiglobulin test was negative. In view of persistent anaemia and reticulocytopenia, a bone marrow aspirate and trephine biopsy was performed. Bone marrow aspirate showed marked erythroid hypoplasia with the presence of proerythroblasts with nuclear inclusion bodies, consistent with pure red cell aplasia (PRCA). Parvovirus B19 was detected via polymerase chain reaction in the blood. IgM and IgG antibodies to parvovirus tested negative. MRI brain done for patient's headache revealed that she had an acute right occipital stroke. Patient tested positive for anti-beta2 glycoprotein IgG titers (739 U/ml). In view of the high titers and thrombotic manifestations, she was presumptively treated for antiphospholipid syndrome with thrombotic complications and started on anticoagulation with bridging clexane and subsequently warfarin. After careful consideration, decision was made to start intravenous immunoglobulin for parvovirus induced PRCA whilst patient was kept on therapeutic anticoagulation to attenuate any thrombotic risks. This case highlights possible hematologic complications in patients with rheumatological conditions such as SLE. It is important to recognize Parvovirus-induced PRCA as a possible cause of severe anemia in SLE and by extension other immunocompromised individuals. It is also interesting to note that standard serologic testing of parvovirus is often ineffective as immunocompromised individuals may not be able to produce detectable levels of antibodies.

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