



APHRS NEWSLETTER

MAY 2025 | NO.78

Chief of Editor: Aparna Jaswal

Managing Editor: Pipin Kojodjojo

Editorial Board:

Hsuan-Ming Tsao

Seiji Takatsuki

Jacky Chan

Arisara Suwanagool

Sandeep Prabhu

Poppy Bala

Niti Chadha

Contents

- 02 UP-PGH Launches First Ever Lead Extraction Program for CIED Patients in Philippines
- 05 Use of Leadless Pacing via the Internal Jugular Vein in a 15KG child with Postoperative Complete Atrioventricular Block (AVB)
- 09 Asia Pacific Heart Rhythm Society (APHRS) Summit 2025: Summary Report
- 11 Getting to Know: Assoc. Prof Nobuhiro Nishii
- 13 The Electrophysiology Team of the Indraprastha Apollo Hospital, New Delhi, India

UP-PGH LAUNCHES FIRST EVER LEAD EXTRACTION PROGRAM FOR CIED PATIENTS IN PHILIPPINES

Written by: Giselle Gervacio, MD

MANILA, PHILIPPINES – In a pioneering move for Philippine healthcare, the University of the Philippines – Philippine General Hospital (UP-PGH) has officially launched the country's first **Cardiac Implantable Electronic Device (CIED) Lead Extraction Program**. Led by cardiologists and electrophysiologists from the UP-PGH Division of Cardiovascular Medicine, this initiative aims to provide life-saving treatment for patients experiencing infections or malfunctions of pacemakers and other implantable heart devices.



Why Lead Extraction Matters

CIEDs such as pacemakers and implantable cardioverter-defibrillators (ICDs) help regulate abnormal heart rhythm. With an increasing number of these devices being implanted in the Philippines, a rise in complications like **device-related infections** or **lead failures** is expected. International guidelines recommend **complete removal** of infected CIED systems to treat the infection, but until now, most Philippine hospitals lack the resources and expertise to do so safely.

“As CIED use grows, so does the risks of infection and lead malfunction. This program is our response to a very real need in the Philippines,” Dr. Gervacio G said., one of the lead electrophysiologists behind the new initiative.

Early Success Stories

During its first year (September 2023 – August 2024), the UP-PGH team performed four successful lead extractions on patients aged 40 to 80 who presented with infected pacemakers or ICD leads. All leads were completely removed without complications – a notable achievement given that in the past, patients with older, more entrenched leads often required open-heart surgery.

“Before we started this program, removing leads that had been in place for more than two years usually meant **major surgery**,” Dr. De Leon J. explained, “Now, we can perform a **transvenous extraction** in a specialized setting, which is significantly less invasive.”

The Making of a Milestone

According to the study team which also includes Dr. Agbayani MJ, Dr. Cheng-Bromeo PV, Dr. Aya-ay TA, Dr. Rangiris N, Dr. Nicolas R, Dr. Punzalan FE, and Dr. Anonuevo J, the program’s success stems from several critical factors:

1. Multidisciplinary Training

UP-PGH physicians collaborated with international experts, led by Dr. Pipin Kojodjojo and Prof. Morio Shoda, in lead extraction, attending workshops and proctorships to develop the specialized skills necessary for these complex procedures.

3. A Structured Workflow

The team established a clear **three-phase** process – preoperative assessment, intraoperative management with surgical backup on standby, and meticulous postoperative care – to reduce risks and ensure patient safety

2. Equipment Procurement & Hospital Support

Specialized tools such as **locking stylets** and **cutting sheaths** were acquired via “compassionate use” approvals, with UP-PGH leadership and charitable foundations helping to fund these life-saving instruments.

4. Ongoing Registry & Future Expansion

All procedures and outcomes are documented in a newly created **lead extraction registry**, which the team hopes will serve as a model for other Philippine hospitals.



Looking Ahead

With 100% successful removals in its first few cases, the UP-PGH Lead Extraction Program marks a critical step toward expanding specialized cardiac care in the Philippines, especially for patients who cannot easily afford or access complex heart surgeries.

"This is only the beginning. We want to see more hospitals developing lead extraction expertise so that **no Filipino** with a failing or infected CIED has to go without timely, efficient treatment," Dr. Gervacio emphasized.

To sustain the program, UP-PGH intends to continue training new practitioners, acquiring additional tools, and forging partnerships with government bodies and medical societies. Ultimately, they hope that a **nationwide referral network** will emerge, making safe lead extraction accessible to patients throughout the archipelago.



For more information about the CIED Lead Extraction Program at UP-PGH or to inquire about potential training opportunities and referrals, please visit the UP-PGH Division of Cardiovascular Medicine website at <https://www.dcvm.org.ph>

USE OF LEADLESS PACING VIA THE INTERNAL JUGULAR VEIN IN A 15 KG CHILD WITH POSTOPERATIVE COMPLETE ATRIOVENTRICULAR BLOCK (AVB)

Written by: Tian Jie, MD and Lv Tiewei, MD

Case History

A **6.5-year-old girl** (15kg, 110 cm) experienced syncope 7 hours prior to admission, characterized by loss of consciousness, cyanosis, and urinary incontinence. Cardiopulmonary resuscitation (CPR) was administered for 2 minutes, after which she regained consciousness and was immediately transferred to our hospital. The patient had undergone surgical repair of ventricular septal defect (VSD), atrial septal defect (ASD), patent ductus arteriosus (PDA) ligation, tricuspid valve repair, and mitral valve repair at 6 months of age. Postoperatively, she developed third-degree atrioventricular block (AVB). She had been following up regularly for 5 years, but remained free from syncope, despite persisting complete AVB, which had decreased. Her exercise tolerance, growth and development are impaired compared to her peers.

ECG shows complete AVB with a narrow escape. Her average heart rate was 42 beats/min and her lowest heart rate was 37 beats/min during Holter monitoring. LVEF was normal on echocardiography.

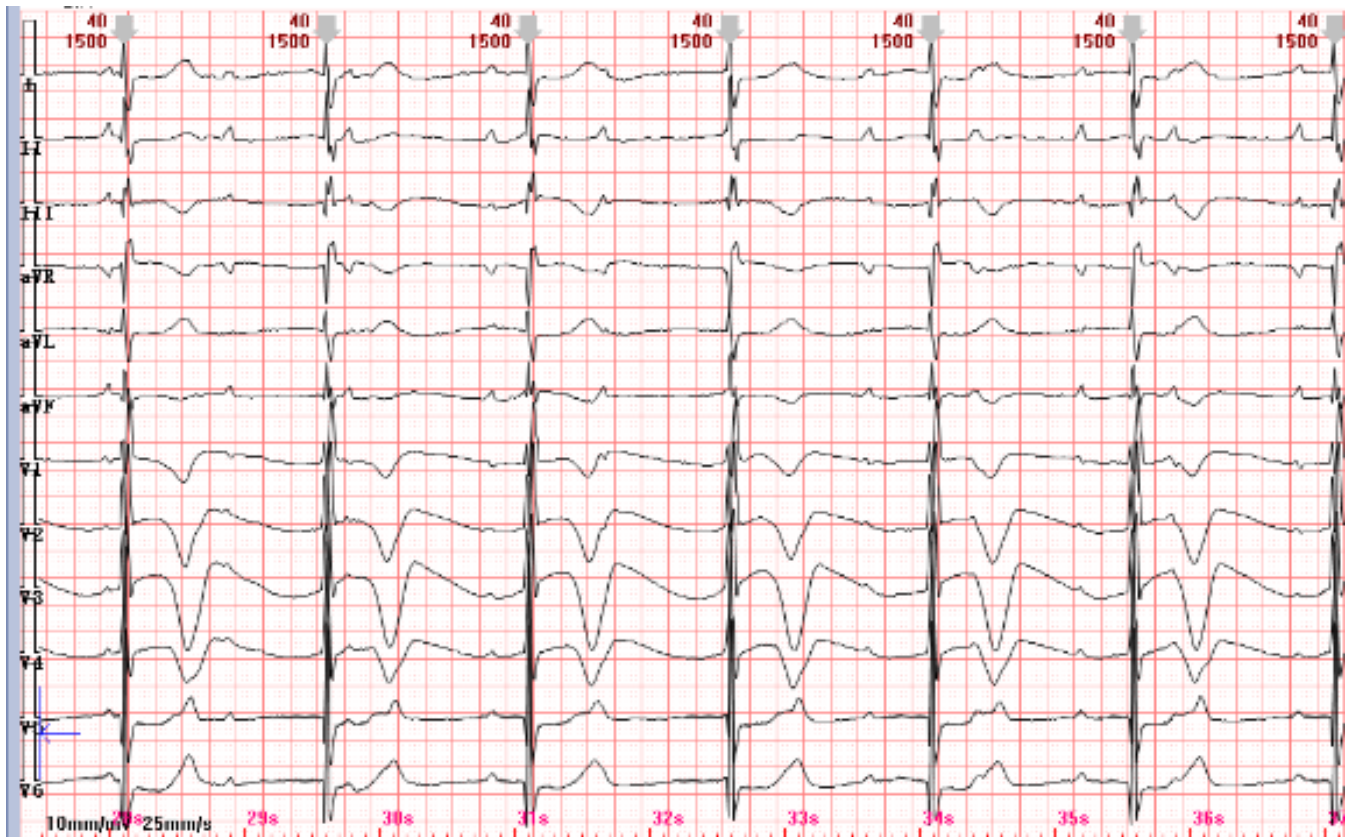


Figure 1. Surface ECG showing third-degree atrioventricular block upon admission

Treatment Considerations

She met the Class I indications for permanent pacemaker implantation but given her young age, low weight, and thin subcutaneous tissue in the chest, traditional transvenous pacemaker implantation would pose significant risks of lead and pocket-related complications. Additionally, considering her future growth, active lifestyle, and long life expectancy, a leadless pacemaker was considered a more suitable option. However, there were no existing guidelines or clinical experiences for leadless pacemaker implantation in children of this age group. The team conducted a thorough preoperative evaluation using cardiac ultrasounds and angiography to assess the vascular access and cardiac chamber size. Right ventricular angiography revealed a tricuspid valve annulus to right ventricular apex distance of 55 mm in diastole and 44 mm in systole, while the internal jugular vein diameter was 9.05 mm (Figure 2). After multidisciplinary discussion and detailed preoperative preparation, it was decided to implant the AVEIR retrievable leadless pacemaker via the internal jugular vein.

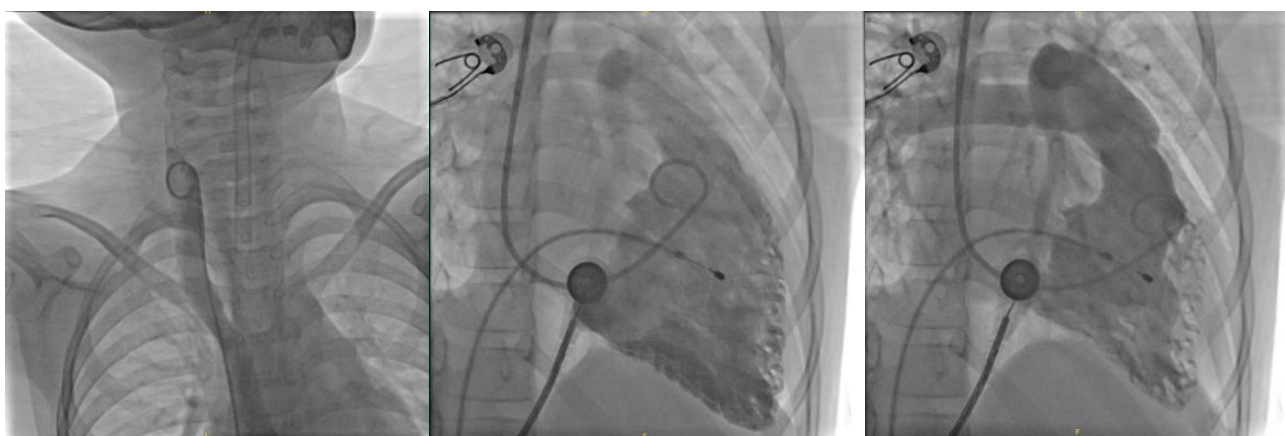


Figure 2. Right internal jugular vein angiography showing a diameter of 9.05 mm, with tricuspid valve annulus to right ventricular apex distance of 55 mm in diastole and 44 mm in systole.

Surgical Procedure

Under general anaesthesia, the right internal jugular vein was punctured with ultrasonic guidance, and a 6 F venous sheath was inserted. Heparin (1500 U) was administered for anticoagulation. A pigtail catheter was advanced to perform right ventricular angiography in the right anterior oblique 30° and left anterior oblique 45° views to confirm the size of the right ventricular cavity and the optimal pacemaker implantation site. The 6 F sheath was then removed, and a Perclose ProGlide™ vascular closure device was pre-positioned. Using a 0.035/180 cm Amplatz super-stiff guidewire, the vessel was sequentially dilated with 8 to 24 F dilators, followed by the final placement of a 27F AVEIR pacemaker delivery sheath. The AVEIR leadless pacemaker was loaded into the delivery system and advanced across the tricuspid valve into the right ventricular septal region. After confirming satisfactory positioning with angiography, the protective sheath was retracted to expose the pacemaker for pre-implantation parameter testing. The pacemaker was then screwed into the myocardium and was released after satisfactory testing. The delivery catheter and sheath were removed, and the puncture site was closed using the vascular closure device without bleeding.

On postoperative day 1, the ECG showed satisfactory pacing, and the chest X-ray confirmed the proper position of the pacemaker (Figure 3). Echocardiography revealed no tricuspid valve regurgitation or pericardial effusion. At the 2-week follow-up, the pacemaker parameters were as follows: threshold 0.75 V/0.2 ms, sensing 9.4 mV, impedance 710 Ω , pacing proportion 53%. The pacemaker was programmed to an output voltage of 2.0 V, pulse width of 0.2 ms, basic rate of 60 beats/min in VVI mode.

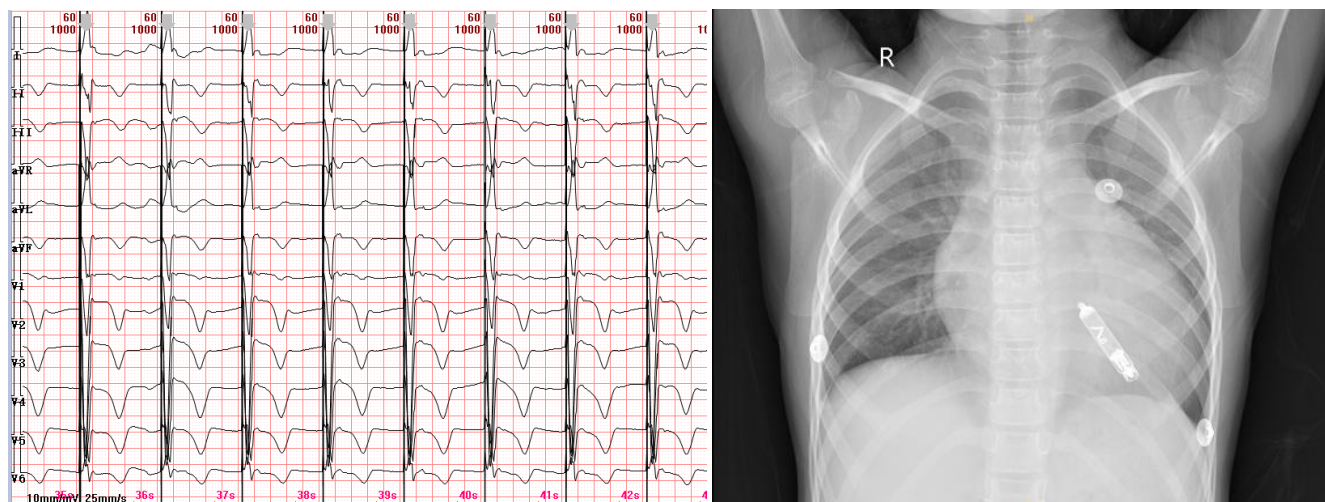


Figure 3. Postoperative Electrocardiogram and Anterior-Posterior Chest X-ray

Case Discussion

The AVEIR wireless pacemaker is gradually being adopted in clinical practice due to its small size, absence of a pocket, minimal implantation trauma, lack of lead-related complications, programmability before implantation, retrievability, and long battery life. These advantages align well with the preferences of paediatric patients and their families. Currently, there are no guidelines or consensus statements specifically addressing the indications for wireless pacemaker implantation in children. The Chinese Expert Consensus on the Clinical Application of Wireless Pacemakers in Adults suggests that both traditional and wireless pacemakers have their own advantages and disadvantages for patients who meet the criteria for permanent cardiac pacing. The choice can be made based on a comprehensive consideration of the patient's condition and preferences, potentially favouring wireless pacemakers.

For the paediatric population, the implantation of wireless pacemakers requires a thorough evaluation of their benefits and drawbacks, as well as the implantation conditions, including the vascular access route, cardiac chamber size, pacing proportion, pacemaker lifespan, and replacement considerations. Age and weight are not the sole determinants of feasibility. The femoral vein is the conventionally preferred route for wireless pacemaker implantation. However, in young children with low body weight, the femoral vein may be too narrow for this approach. The internal jugular vein, with its superficial location, relatively wider lumen, and proximity to the cardiac chambers, emerges as an excellent alternative vascular access site for wireless pacemaker implantation in paediatric patients. The clinical advantages of the internal jugular vein approach include a shorter, more direct pathway, lower bleeding risk and minimal post-operative restrictions.

However, implantation via the internal jugular vein is more technically challenging compared to the femoral vein approach:

1. **Operative Space:** The operative field is located in the patient's head area, requiring sufficient space and appropriate positioning of equipment and the operating table (as shown in Figure 4). The surgical team must support the delivery system throughout the procedure
2. **Operative Positioning:** The surgeon must stand on the left side of the patient's head to operate. The process of crossing the valve and rotating to adhere to the septum is opposite to that of the femoral vein approach, requiring a period of familiarization and adaptation.
3. **Device Stability:** After the pacemaker reaches the target position, it tends to displace downward when the bending and brake are released. The pacemaker must be screwed in while the brake is partially engaged, followed by releasing the bend and brake, making the procedure more difficult compared to the femoral vein approach.

This case represents the youngest age and lowest weight reported in the literature for a child undergoing AVEIR pacemaker implantation via the internal jugular vein. The patient had an excellent postoperative recovery without complications, providing valuable clinical reference for similar cases involving young children with low body weight.



Figure 4. Surgical team and set-up during internal jugular vein approach implantation

Hospital Introduction

The Department of Cardiology at Children's Hospital Affiliated to Chongqing Medical University has been conducting paediatric catheter ablation and device implants since 2004. The number of cases treated annually has been increasing year by year and since 2021, more than 100 children have been treated annually. The service area covers the entire western region of China, parts of the Middle East and is the only children's specialty hospital in Western China that independently conducts radiofrequency ablation.

ASIA PACIFIC HEART RHYTHM SOCIETY (APHRS) SUMMIT 2025: SUMMARY REPORT

Written by: Dr Abdul Raqib BIN ABD GHANI

The **APHRS Summit 2025** recently concluded on the 15th of February 2025 in the heart of Kuala Lumpur. A first for Malaysia and a very proud moment for the Malaysian Heart Rhythm Society, the co-organisers for this annual meetup of like-minded colleagues and future prospects with an inkling of interest in everything ECG and electrophysiology related. This was a one-day event focused on heart rhythm disorders catered for a diverse audience comprising of electrophysiologists, junior physicians, fellows in training and allied health personnel. The summit included a variety of sessions covering topics around atrial arrhythmias, ventricular arrhythmias, bradyarrhythmias, CIED (Cardiac Implantable Electronic Devices), and SVT (Supraventricular Tachycardia). The program consisted of presentations, case discussions, and expert panel discussions.



Session Highlights

Session 1: Atrial Arrhythmias: Topics included workflow optimization for PFA in AF ablation, patient selection for AF ablation in HFrEF, persistent AF ablation strategies, AF recurrences, management of asymptomatic AF patients, and combining AF ablation and LAAO.



Session 2: Ventricular Arrhythmias: Discussions focused on advanced mapping and ablation strategies, approaches to ventricular fibrillation, catheter ablation for ventricular arrhythmias in patients with channelopathies and ARVC, papillary muscle VT/PVC ablation, epicardial VT ablation, first-line catheter ablation for monomorphic VT, and ablation of intramural ventricular arrhythmias.

Session 3: Bradyarrhythmias and CIED: The session covered cardioneural ablation vs. pacemaker implantation for vasovagal syncope, practical approaches to cardioneural ablation, CRT vs. CSP in patients with HFrEF and LBBB, confirming LBB capture in conduction system pacing, improving procedural success in conduction system pacing, management of CIED infections, and approach to device-detected sub-clinical atrial fibrillation.



Session 4: SVT: Talks included EP manoeuvres, diagnosis and ablation of challenging accessory pathways, ablation of AVNRT in congenital heart disease, and difficult AVNRT ablation.



Session 5: Best Practices and Recent Advances in EP: The final session addressed incorporating ICE in EP procedural workflow, managing complications post EP procedures, remote monitoring for CIED in the Asia-Pacific region, artificial intelligence and digital health in EP, and wearable devices for arrhythmia detection.



The APHRS Summit Kuala Lumpur 2025 provided a comprehensive overview of current topics and advances in the field of electrophysiology and most importantly, networking opportunities and newly fostered friendships between the rapidly growing EP community in Malaysia, the APHRS board members and experts who graciously accepted the invite. See you in Auckland, New Zealand next year!

GETTING TO KNOW: ASSOC. PROF NOBUHIRO NISHII

APHRS Lead Extraction Committee Chair 2025

Okayama University Graduate School of Medicine, Dentistry, and Pharmaceutical Sciences, Okayama, Japan

Why did you choose to enter medicine and above all, prefer to specialize in Electrophysiology?

I was attracted to the medical profession because my former professor (Prof. Ohe), was an authority on electrophysiology. Electrophysiology was interesting because it can theoretically prove a variety of events, and ablation and devices are dramatic treatments for patients.

What do you regard as the most significant development in Electrophysiology in the recent past?

Recently, the most significant developments in the field of electrophysiology have been related to PFA, EV-ICD, and AI. Various tools are now available for lead extraction, and the indications are expanding, and the success rate and safety are also satisfactory.

Can you talk about an accomplishment that you are particularly proud of?

The results of transvenous lead extraction for large vegetation, lead extraction in patients with infective endocarditis, and innovations in lead extraction for cases of severe LV dysfunction are special issues. Artificial intelligence to analyse intracardiac electrocardiograms is a recent topic for me, I could show that AI could distinguish noise events or arrhythmic events.



If you could have an alternative career, what would it be and why?

If I were to take on another career, it would be working on rockets, computer-related work, carpenter, soccer player. Depending on my age, I wanted to be in different professions, but generally aspired to something like this.

Who has inspired you the most in your life and why?

The person who has had the greatest impact on my life is my former professor (Prof. Ohe) because he set an example of what it means to be a doctor. He taught me the importance of treating everyone equally.

What are your hobbies and interests outside of medicine?

My hobbies are soccer, cycling, swimming, running, and reading. I mainly enjoy physical exercise, but reading at a slow pace is also one of my hobbies. I wear sunscreen to avoid getting sunburned, but around May, my skin gets quite tanned.

THE ELECTROPHYSIOLOGY TEAM OF THE INDRAPRASTHA APOLLO HOSPITAL, NEW DELHI, INDIA

Written by: Vanita Arora, MD, FHRS, FACC, FESC, FRCP (Edin)

Overview of EP Therapy Expansion in India

Over the past decade, the Indian market has experienced significant growth in electrophysiology (EP) therapy, driven by several key factors:

- Increased Awareness - Rising awareness among patients and healthcare providers about the benefits of EP therapy for managing arrhythmias.
- Enhanced Reimbursement Policies – Improved reimbursement policies have made EP procedures more accessible to a broader patient population.
- Adoption of Advanced Technologies – Rapid adoption of advanced technologies such as 3D mapping systems, intracardiac echocardiography, and zero-fluoroscopy procedures.
- Extensive Training Programs – Comprehensive training programs for EP physicians and technicians have been established to ensure high standards of care.
- Growth in Case Numbers – A steady increase in the number of EP cases being treated, reflecting the growing demand for these specialized services.

Hospital Overview



Figure 1. Indraprastha Apollo Hospital, New Delhi

A Glimpse of Apollo's Advanced EP Cath Lab

The electrophysiology department at Indraprastha Apollo Hospital, established in 2008 with the LABpro system (now Boston Scientific), provides specialized care for heart rhythm disorders. Under Dr. Vanita Arora's leadership, the department has significantly advanced, offering state-of-the-art treatments for all types of cardiac arrhythmias using cutting-edge technologies.

Since 2022, the EP lab has been equipped with advanced electrophysiology laboratories and the EnSite system, enabling ultra-high-density mapping of complex arrhythmias. The adoption of the 3D mapping system has resulted in shorter recovery times for patients with complex arrhythmias and reduced radiation exposure for both patients and Cath Lab staff.

Indraprastha Apollo Hospital has integrated several innovative technologies and techniques in their EP lab, including:

WorkMate Claris System - This system provides an intuitive display of real-time and historical data, enhancing the efficiency and accuracy of EP procedures. Key features include **Exceptional Signal Display**, **Integrated Stimulator & Fiber-Optic Technology** which reduces electrical noise and improves system performance.

Ensite Precision Mapping System: This system offers advanced mapping capabilities to diagnose and treat complex arrhythmias. Key features include **Automated Morphology Matching** enhancing VT mapping with advanced algorithms & **High-Density Maps** to improve procedural efficiency.

Meet the Expert: The Team behind the EP Lab's Success

Dr. Vanita Arora has assembled a team of highly skilled professionals with expertise in advanced technologies. The team includes 5 Junior Consultant Cardiologists, 6 dedicated nurses, and 6 highly trained lab technicians, all committed to providing exceptional care to patients.



Figure 2. Dr Arora's EP Team at Indraprastha Apollo Delhi

Indraprastha Apollo Hospital is one of the EP centres in India to allow same-day discharge after ablation of atrial fibrillation and benign arrhythmias. With over 4 years of experience having successfully conducted many procedures utilizing this approach offering special clinic for inherited cardiac arrhythmias and for syncope management. Due to the high competency of the team, complex cases are often referred from other centres.

Case Example: Effective Bi-atrial Mapping in Atrial Tachycardia

A 22-year-old male presented with incessant tachycardia exhibiting both narrow and wide QRS morphologies. Echocardiography and cardiac MRI demonstrated normal left ventricular function and no structural abnormalities. The patient was in sinus rhythm upon arrival at the EP lab, where tachycardia was successfully induced and confirmed to be atrial tachycardia through a series of pacing maneuvers.

Electrophysiological mapping was initially performed in the right atrium, where the earliest activation was recorded at the RA septum (-40 ms pre-P wave). RF ablation at this site resulted in transient termination of the tachycardia; however, the arrhythmia was re-inducible. Subsequent mapping of the left atrium (LA) revealed an earlier activation signal at the LA septum (-60 ms pre-P wave). RF ablation at this site led to immediate tachycardia termination, and no recurrence was observed despite aggressive induction attempts, including burst pacing and isoproterenol infusion.

This case underscores the importance of comprehensive biatrial mapping in atrial tachycardia, especially with suspected septal involvement. The differing earliest activation sites in the RA and LA suggest a primary focus in the left atrium with passive RA activation. 3D electroanatomic mapping and fluoroscopy facilitated precise ablation, successfully eliminating the arrhythmia without recurrence.

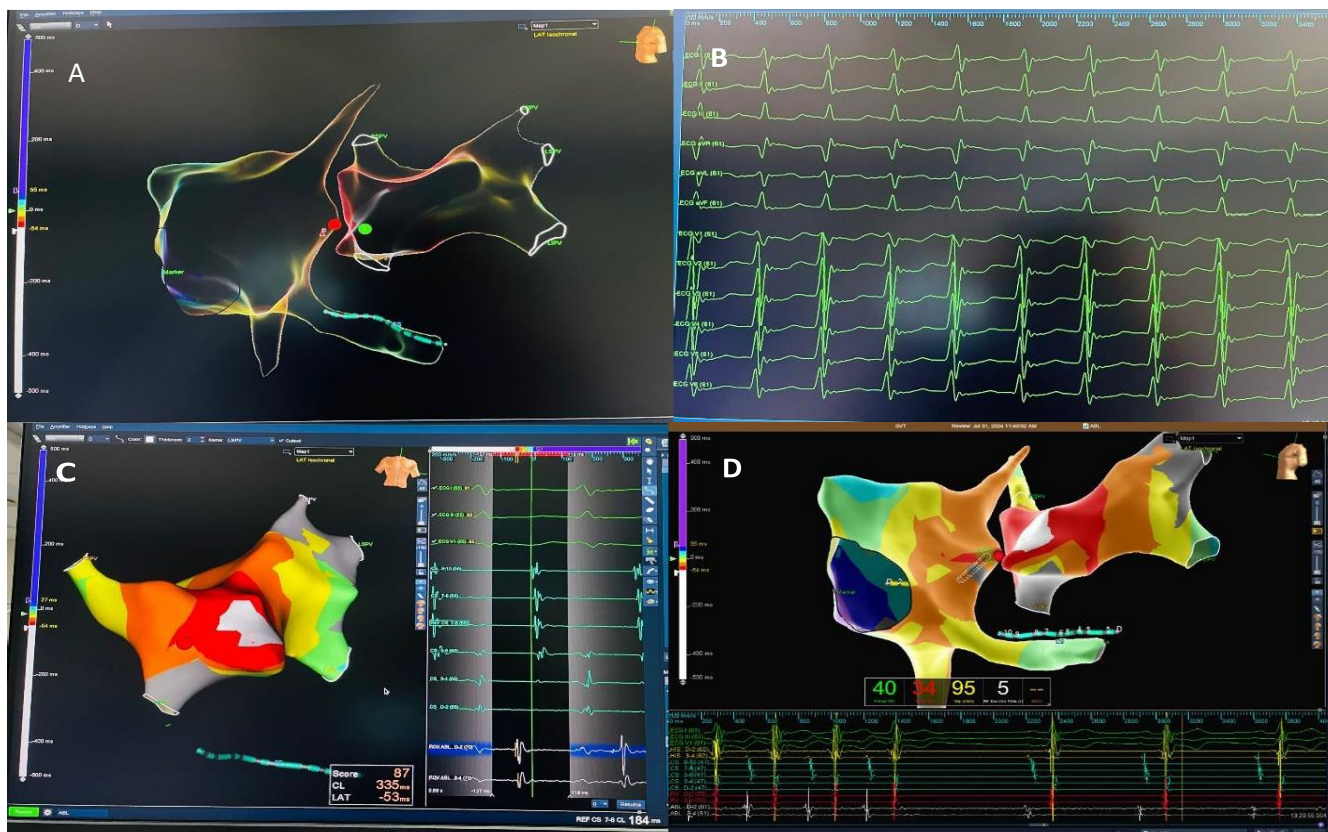


Figure 3. Bi-atrial Mapping for Atrial Tachycardia with EGM signals & 3D anatomical maps: A. Earliest Activation Site on LA with correlation with RA; B. Long RP narrow QRS Tachycardia; C. Window settings; D. Termination of Tachycardia during Ablation

Expertise in Leadless Pacemaker Implantations and LBBP Cases

Dr. Arora is also a pioneer in device implantations, including cardiac resynchronization therapy (CRT) devices, conduction system pacing, subcutaneous implantable defibrillators (ICD), leadless pacemakers at Apollo Hospital, significantly improving patient outcomes. Dr. Arora's proficiency in these advanced technologies has greatly enhanced the quality of care for patients in the country.

Case Example: AVEIR VR implant through prosthetic tricuspid valve and complex anatomy

This case study focuses on the implantation of the AVEIR helix-fixation LCP in a patient with a prosthetic tricuspid valve, highlighting the challenges posed by altered cardiac anatomy. The patient, a 62-year-old female with a history of ASD closure, severe TR, and atrial fibrillation, underwent tricuspid valve replacement and Maze procedure. Post-procedure, she experienced recurrent syncope and bradyarrhythmia's. Conventional pacemaker implantation failed due to anatomical complications, leading to the choice of a leadless pacemaker.

The implantation technique involved accessing the femoral veins and introducing a pigtail catheter with a Teflon wire. Entry into the right ventricle (RV) was challenging due to a tissue valve at the tricuspid position. The long catheter length, the angulation for crossing tricuspid valve, protective sheath over the device made it difficult to deliver it through the tricuspid valve. Attempts to maneuver the catheter were hindered by the tissue valve and advancing the sheath into the right atrium (RA) and superior vena cava (SVC) restricted deflection. An alternative jugular approach was considered but revealed challenges with the unroofed coronary sinus and persistent left superior vena cava (LSVC). Multiple attempts to implant the AVEIR leadless pacemaker (LP) with the protective sleeve failed despite using a roadmap. With precision at the right spot the sheath was pulled back and the device made its way across TV and was placed at the right spot in RV without the support of the sheath. It was an excellent procedural success and stable electrical parameters during follow-up. This case underscores the importance of thorough preprocedural planning, precise implantation techniques, and the implanter's skill in using the delivery mechanism safely.

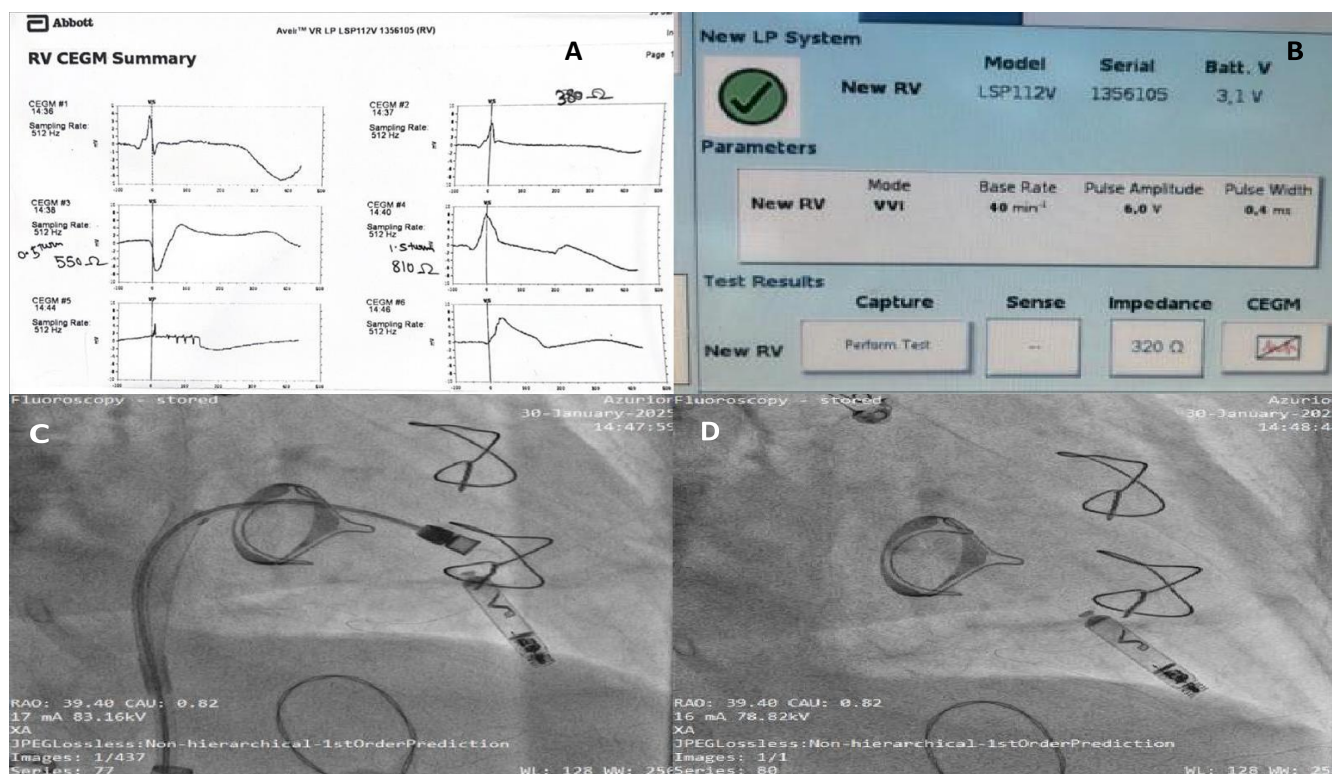
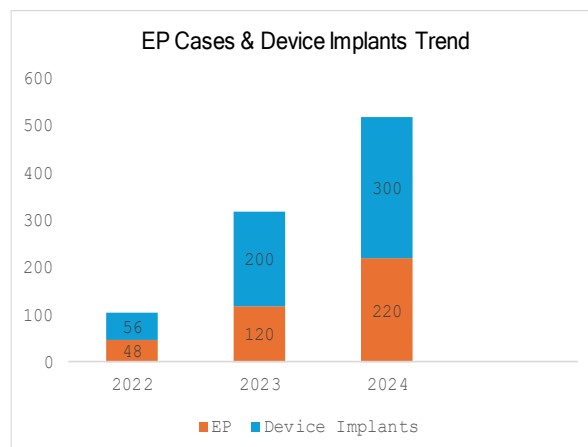


Figure 4. Fluoroscopy images & Programmer settings of AVEIR VR implant through prosthetic Tricuspid valve and complex anatomy: A. RV EGM Signals; B. Programmer Setting Window; C. Releasing AVIER into the chamber; D. AVEIR successfully implanted

Achievements and Future Directions

The number of performed ablations per year at Apollo Hospital has been increasing over the past years. From 2021 onwards, more than 220 RF ablations (SVT, AT, AF, VT, PVC's) and more than 300 device implantations, including cardiac resynchronization therapy (CRT) devices, conduction system pacing, subcutaneous implantable defibrillators (ICD), leadless pacemaker (Medtronic and Abbott) as well as transvenous lead extractions are being done with promising results. We expect this upward trend of device and ablation procedures to continue in the coming years.



Efficacy Advantage:

**FARAPULSE™ significantly reduced
atrial arrhythmia recurrence
vs Arctic Front Advance™
12-month timepoint**

**NEWLY
Released
Data**

► **SINGLE SHOT CHAMPION Clinical Trial**
NCT05534581

FARAPULSE™
Pulsed Field Ablation System



SINGLE SHOT CHAMPION was supported by an unrestricted research grant from BSC

APHRS2025

JHRS2025

Is this what Yokohama is like?

Yokohama is located approximately 35km west of Tokyo.

Yokohama is known as one of the leading port cities in Japan and has many tourist attractions.

Some of the tourist attractions include the night view of Minato Mirai 21, Yamashita Park, Yokohama Chinatown, Hakkeijima Sea Paradise (aquarium), and the Shin-Yokohama Ramen Museum.

Enjoy Yokohama during JHRS2025/APHRS2025.

AUGUST 2025 Registration opens

Plenary Session

Speakers

Josep Brugada, Roderick Tung, Young-Hoon Kim
November 14.2025



Simultaneous Publication

Possible candidates from:

Selected abstracts for Late breaking session

Selected abstracts for APHRS's YIA session

High-scoring general abstracts

Joint Symposiums with APHRS

HRS (Heart Rhythm Society)

EHRA (European Heart Rhythm Association)

LAHRS (Latin American Heart Rhythm Society)

WSA (World Society of Arrhythmias)





APHRS EMERGING LEADERS' SUMMIT 2025

Connect with emerging leaders in cardiac electrophysiology from across the Asia-Pacific. Network, learn, and gain valuable insights from renowned pioneers and mentors in the field.



DATE:
12 NOVEMBER, 2025



LOCATION:
PACIFICO YOKOHAMA NORTH

For application process and selection criteria, visit [here](#)

APPLY BEFORE 30 JUNE!

Please submit your application to apply@aphrs.org

