Welcome to the new SCMR NewsBeat delivered via Multiview twice a month, which replaces our previous monthly newsletter. We hope that you like the new format and it helps our members to remain up-to-date with the latest SCMR activities.

Manish Motwani, MB ChB PhD FSCMR
SCMR Newsletter Editor

SCMR NEWS

Join us at SCMR Annual Scientific Sessions!

By João Cavalcante

Anticipation is building for our first in-person conference in three years! Registration is now open for the 26th SCMR Annual Scientific Sessions, being held 25-28 January 2023 in San Diego, CA. We have received a record number of abstract and case submissions, and are expecting a record-breaking attendance at #SCMR23! Alongside the 4 parallel main sessions, the program includes numerous face-to-face networking events including receptions, meet-the-expert sessions, speed mentoring, hands-on sessions and various social events. All presentations will be given live in-person, but for anyone unable to travel, we are offering a virtual experience with a combination of live-streamed and recorded sessions, and the opportunity to interact with delegates, speakers and industry via the SCMR23 app.

Whether you intend to join in person or online, be sure to take advantage of our Early Registration Discount by registering on or before 5 December 2022. Also, make sure to book your hotel room prior to 23 December to secure the discounted SCMR rate here.

Heear from SCMR Early Career Chair, Punvi Parwani, MD about why you should attend #SCMR23:

Detailed conference event information is available here.

Program highlights include:
- Plenary sessions on all aspects of contemporary CMR, from basic science to clinical application, delivered by the leading experts in the field.
- Practical tips on how to implement advanced CMR methods into clinical practice.
- Dedicated sessions to explore career paths & training opportunities.
- Mentorship programs.
- Over 400 abstract and poster presentations.
- Over 100 case presentations.
- Hands-on with the expert sessions.
- A series of social and networking events.

I look forward to seeing many of you in San Diego this January! #SCMR23

João Cavalcante, MD, FSCMR
Annual Scientific Program Committee Chair

New Management Team

Beginning December 1, operational and day-to-day management activities of SCMR will transition to Veritas Association Management. Veritas is a leader in non-profit medical association management with a belief in SCMR’s mission, a proven record of success, and an experienced staff to effectively move our Society forward. We are confident that as a strategic partner, Veritas will help SCMR best serve our membership advancing the field of cardiovascular magnetic resonance through education, advocacy, networking, research, and clinical excellence.

The new SCMR headquarters is based in suburban Chicago, with oversight and support of staff members, including Sue O’Sullivan, Managing Director.
Updates from CMR in Australia & New Zealand

The Australia and New Zealand Working Group for Cardiovascular MRI (ANZCMR) recently ran a 1-day CMR course in Melbourne, Australia. The 2022 CMR Australia Masterclass was a huge success with >100 delegates and national and international faculty, including Prof Sven Plein, SCMR President, who delivered his talk virtually. There were lectures, hands-on workstations, case presentations, and the all-important Big Quiz!

ANZCMR is also the chief advocacy group for CMR in the region. This past year we submitted a new application to the Australian government to provide reimbursement for CMR in the setting of myocarditis - either patients with ACS who would otherwise have an invasive coronary angiogram, or patients with heart failure who would otherwise have an endomyocardial biopsy. We hope to hear the outcome early next year!

We also have a new website with information about education and fellowship opportunities, and a member's only section with a case archive. Check it out ANZCMR.

Dr Rebecca Kozor
ANZCMR Vice President

Professor Andrew Taylor
ANZCMR President

New SCMR Podcast

We are delighted to announce the first edition of the SCMR Podcast. Edited by Hildo Lamb, MD, PhD, the SCMR podcast will be streamed several times per year and cover topics of particular interest to SCMR members, and will be accessible from all your favorite platforms, such as Spotify and Anchor. The first edition is available now featuring SCMR President, Sven Plein, MD, PhD, and Julio Cavalcante, MD, FSCMR, Program Chair for the upcoming 2023 SCMR Scientific Sessions. Email mailto:scmrpodcast@gmail.com if you are interested in being a podcast guest, or to share your suggestions or comments.

Renew or Start Your SCMR Membership for 2023

Not a SCMR member yet? — check out all the benefits available & start your journey here. Existing members, don’t forget to renew here. Do you live in any of these World Bank Category countries? If so, you can save on your renewal and should renew now before the end of the year. We are excited to continue to provide you with workshops, Scientific Sessions discounts, and FSCMR recognition!

Follow us on Facebook or Twitter icons to stay updated between newsletters. Thank you all for your continued enthusiasm and advocacy for CMR.
The Relationship Between Myocardial Microstructure and Strain in Chronic Infarction Using Cardiovascular Magnetic Resonance Diffusion Tensor Imaging and Feature Tracking

Cardiac diffusion tensor imaging (cDTI) using cardiovascular magnetic resonance (CMR) is a novel technique for the non-invasive assessment of myocardial microstructure. Previous studies have shown myocardial infarction to result in loss of sheetlet angularity, derived by reduced secondary eigenvector (EZA) and reduction in subendocardial cardiomyocytes, evidenced by loss of myocytes with right-handed orientation (RHLM) on helix angle (HA) maps.

Machine-Learning Score Using Stress CMR for Death Prediction in Patients With Suspected or Known CAD

In patients with suspected or known coronary artery disease, traditional prognostic risk assessment is based on a limited selection of clinical and imaging findings. Machine learning (ML) methods can take into account a greater number and complexity of variables.

Cardiovascular Magnetic Resonance Images With Susceptibility Artifacts: Artificial Intelligence With Spatial-Attention for Ventricular Volumes and Mass Assessment

Segmentation of cardiovascular magnetic resonance (CMR) images is an essential step for evaluating dimensional and functional ventricular parameters as ejection fraction (EF) but may be limited by artifacts, which represent the major challenge to automatically derive clinical information.

Fractional myocardial blood volume by ferumoxytol-enhanced MRI: Estimation of ischemic burden

Magnetic Resonance in Medicine

Moderate to severe focal coronary stenosis in the left anterior descending artery of 19 swine were artificially induced by percutaneous delivery of a 3D-printed coronary implant. Using the MOLLI pulse sequence, we acquired T1 maps at 3 T after multiple incremental ferumoxytol doses (0.0–4.0 mg/kg). We computed pixel-wise fMBV using a multi-compartmental modeling approach in 19 ischemic swine and 4 healthy swine.

Left Ventricular Anatomy in Obstructive Hypertrophic Cardiomyopathy: Beyond Basal Septal Hypertrophy

European Heart Journal Cardiovascular Imaging

Cardiovascular magnetic resonance images from 2,396 HCM individuals were obtained as part of the NHLBI HCM Registry. Three-dimensional left ventricular (LV) models were constructed and used, together with a principal component analysis, to build a statistical shape model capturing shape variations.