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## **GUEST EDITOR'S PAGE**



## Raising Awareness of Tricuspid Valve Disease and Standardizing Patient Management





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ricuspid regurgitation (TR) has a dismal prognosis, affects fragile older adult patients with multiple related or unrelated comorbidities, and is often the ultimate marker of advanced heart failure with repercussions on the right side of the heart.<sup>1</sup> Clinical consequences include generalized peripheral edema unresponsive to diuretic agents, ascites, and renal and hepatic dysfunction. All these parameters increase the surgical risk, as demonstrated by the recently published dedicated TRI-SCORE.<sup>2</sup>

Because patients are often referred late, conventional surgery carries increased risk and is rarely performed; this issue has largely contributed to the profound underdiagnosis and undertreatment of TR over the years. Transcatheter options offer newer opportunities for this complex group of patients and for the first time have a clinical recommendation in guidelines for the management of valvular heart disease.<sup>3</sup>

In recent years, there has been an unprecedented enthusiasm for the tricuspid valve, with exponentially increasing numbers of publications providing invaluable insights on valve anatomy and TR natural history, as well as imaging and interventions. In 2023, the presentation of the first randomized data comparing transcatheter treatment with medical treatment is expected (TRILUMINATE pivotal trial [TRIal to EvaLUate Cardiovascular OutcoMes IN PAtients Treated with the Tricuspid ValvE Repair System; NCT03227757]).

Nonetheless, such a deployment of resources needs to be channeled to avoid confusion and uncertainty. Unlike the aortic valve, the tricuspid valve has anatomical complexity, heterogeneity of pathophysiology and clinical context, and a requirement for interdisciplinary approaches that bear the risk of disseminating confusing concepts and language. The early experience with tricuspid transcatheter techniques has taught us that correct classification of pathomechanisms, effective communication among specialties, standardized preprocedural and postprocedural management, and well-defined outcomes are instrumental to ensure reproducible results and support the development of evidence.

With this in mind, the independent organization PCR that provides worldwide education in cardiovascular interventional medicine, established the PCR Tricuspid Focus Group in 2020 as a complementary initiative to the Tricuspid Valve Academic Research Consortium (TVARC), with the following far-reaching mission:

"To facilitate innovation and the development of up-to-date standards of care for patients with tricuspid valve disease, by aligning knowledge, unifying practice and eliminating cultural barriers among physicians and associations worldwide."<sup>4</sup>

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The main activities of the group consist of achieving alignment of the messages conveyed to the broader community, raising awareness, and educating physicians about tricuspid valve disease.<sup>5</sup> As a multidisciplinary structure with the contribution of interventional cardiologists, imaging and heart failure specialists, electrophysiologists, and cardiac surgeons, the PCR Tricuspid Focus Group also serves as a performant platform to initiate and encourage exchanges among communities and catalyze multicenter research projects. The group is articulated around 5 Working Groups and has a long-term vision, as shown in Figure 1.

The PCR Tricuspid Focus Group has been proud to collaborate with *JACC: Case Reports.* This issue features an exceptional collection of case reports highlighting the importance of imaging for the diagnosis and grading of TR, the guidance of interventions, and postprocedural follow-up. This series is the result of a call among the members of the PCR Tricuspid Focus Group, and the quality and number of the submissions underline the outstanding expertise of this group in this domain. Considering the high variability and complexity of tricuspid valve disease, individual case reports certainly play an essential role to help understanding all the diverse clinical TR presentations.

The topics presented masterfully illustrate some of the most important challenges associated with the treatment of the tricuspid valve, including preprocedural patient preparation and management of volume overload, the presence of right ventricular pacemaker leads, and proximity to the right coronary artery, as well as the key role of sufficient imaging quality and corresponding expertise in procedural guiding.

We hope that the cases in this issue of *JACC: Case Reports* dedicated to the emerging and complex treatment of the tricuspid valve will provide unique insights and learning on the 1,000 principles and details of TR management and that this valve, once forgotten, will be recognized more than ever in 2023.

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