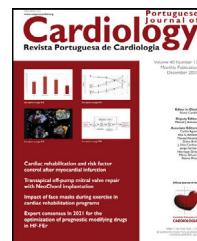


Portuguese Society of
CARDIOLOGY

Revista Portuguesa de **Cardiologia**

Portuguese Journal of **Cardiology**

www.revportcardiol.org


LETTER TO THE EDITOR

Light at the end of the tunnel of preserved heart failure, although important improvements are still necessary



Insuficiência cardíaca com fração de ejeção preservada – luz ao fundo túnel, apesar de ainda serem necessárias melhorias importantes

To the Editor:

We read with great interest the manuscript by J Silva-Cardoso et al. entitled "SGLT-2 inhibitors: A step forward in the treatment of heart failure with reduced ejection fraction".¹ In their article, the authors performed a literature review to analyze how SGLT-2 inhibitors have emerged as the fourth pillar of pharmacological disease-modifying therapy in heart failure with reduced ejection fraction (HFrEF) patients, regardless of the presence or absence of diabetes.¹ After a close reading of the article, we would like to reflect on the current situation of heart failure with preserved ejection fraction (HFpEF).

The extensive evidence with HFrEF lack in HFpEF up to Emperor trial.² In patients with stable HF and left ventricle ejection fraction >40%, the Emperor trial showed a 21% reduction in the primary endpoint (composite of cardiovascular death or HF hospitalization) at a median follow-up of 26.2 months.² This effect was mainly due to a decrease in the risk of hospitalization; indeed, patients on empagliflozin showed a reduction of 27% in the total HF hospitalization that occurred during follow-up.² However, a neutral effect was found for all cause-mortality (hazard ratio (HR): 1.00; 95% confidence interval (CI), 0.87-1.15) and total rehospitalizations (HR: 0.93; 95% CI, 0.85-1.01). Interestingly, non-HF hospitalizations and non-CV-death accounted for 84.2% and 48.1% of the total, respectively.² Observational studies have also confirmed the large proportion of non-CV events in HFpEF patients.^{3,4} There is no doubt that current findings represent a significant advance in the management of these patients, however, these results merit some reflections.

1. HFpEF patients are generally older patients characterized by chronicity and multimorbidity.¹⁻⁵ Thus, if we aim to decrease morbidity and mortality rather than

change the mode in which patients die or are hospitalized, we should recognize HFpEF as a systemic entity rather than just a cardiac issue. Hence, we should: (a) improve our knowledge of the non-CV risk in these patients; (b) increase awareness about it; and (c) promote the creation of multidisciplinary teams to manage non-CV complications properly. The overall assessment of these patients is basic.

2. From a cardiac point of view, we should also expand the traditional perspective of the syndrome as predominant left-sided heart disease by considering pulmonary circulation and right-sided function.⁶ There is a homogeneous voice/clamor among the scientific community moving toward precision medicine. It is especially crucial in HFpEF, in which the pathophysiology is widely heterogeneous.⁷ Along this line of thought, compelling evidence points to the relevant clinical role of pulmonary hypertension and right-sided HF in HFpEF. Indeed, recent authors estimate that 30–50% of patients with HFpEF showed PH/right HF-sided phenotype.⁶ However, it is noteworthy that neither traditional inclusion criteria nor subgroup analyses in HFpEF consider right-sided HF. Indeed, subgroup and post-hoc analyses of HFpEF trials mainly include the same analysis as HFrEF trials. There is no data on the efficacy or safety of HF treatments according to pulmonary hypertension or right-sided HF. We encourage investigators to collect this information and design further trials, not ignoring the other side of the heart. By looking at the heart from another perspective, we may unravel different realities. In a real world of older HFpEF patients, a global assessment of the heart and even more important of the patient is basic.

Author contributions

All authors of this research paper have directly participated in the planning, execution, drafting the study;

Funding

None.

Conflicts of interest

All authors had no conflicts of interest to disclose.

<https://doi.org/10.1016/j.repc.2022.01.008>

0870-2551/© 2022 Sociedade Portuguesa de Cardiologia. Published by Elsevier España, S.L.U. This is an open access article under the CC BY-NC-ND license (<http://creativecommons.org/licenses/by-nc-nd/4.0/>).

References

1. Silva-Cardoso J, Andrade A, Brito D, et al. SGLT-2 inhibitors: a step forward in the treatment of heart failure with reduced ejection fraction. *Rev Port Cardiol (Engl Ed)*. 2021;40:687–93.
2. Anker SD, Butler J, Filippatos G, et al., EMPEROR-Preserved Trial Investigators. Empagliflozin in heart failure with a preserved ejection fraction. *N Engl J Med*. 2021;385:1451–61.
3. Mentz RJ, Kelly JP, von Lueder TG, et al. Noncardiac comorbidities in heart failure with reduced versus preserved ejection fraction. *J Am Coll Cardiol*. 2014;64:2281–93.
4. Santas E, Valero E, Mollar A, et al. Burden of recurrent hospitalizations following an admission for acute heart failure: preserved versus reduced ejection fraction. *Rev Esp Cardiol (Engl Ed)*. 2017;70:239–46.
5. Formiga F, Vidán MT, Nuñez J. Heart failure with preserved ejection fraction. A dim light at the end of the tunnel. *Rev Esp Geriatr Gerontol*. 2019;54:307–8.
6. Guazzi M, Naeije R. Right heart phenotype in heart failure with preserved ejection fraction. *Circ Heart Fail*. 2021;14:e007840.
7. McDonagh TA, Metra M, Adamo M, et al., ESC Scientific Document Group. 2021 ESC Guidelines for the diagnosis and treatment of acute and chronic heart failure. *Eur Heart J*. 2021;42:3599–726.

Julio Núñez^a, Rafael de la Espriella^a, Francesc Formiga^{b,*}

^a Cardiology Department, Hospital Clínico Universitario de Valencia, Universitat de Valencia, INCLIVA, Valencia, Spain

^b Geriatric Unit, Internal Medicine Department, Hospital Universitari de Bellvitge, IDIBELL, L'Hospitalet de Llobregat, Barcelona, Spain

* Corresponding author.

E-mail address: fformiga@bellvitgehospital.cat (F. Formiga).