

Response to letter on the Cape Town Declaration

Peter Zilla*, Ralph Morton Bolman III# and Percy Boateng†

*Christiaan Barnard Department, Groote Schuur Hospital, Red Cross Children's Hospital, University of Cape Town, South Africa and CSIA

#Anschutz Medical Campus, University of Colorado Denver, Aurora and University of Colorado, Denver, Colorado, United States of America and CSIA

†Department of Cardiovascular Surgery, Icahn School of Medicine, Mount Sinai (ISMMS) Medical Center, New York, New York, United States of America and CSIA

Address for correspondence:

Prof Peter Zilla
University of Cape Town/Groote Schuur Hospital
Chris Barnard Division of Cardiothoracic Surgery
Chris Barnard Building
3rd Floor
3 Anzio Road
Observatory
Cape Town
7925
South Africa

Email:

peter.zilla@uct.ac.za

TO THE EDITOR

The letter by Kingsley, Reddy and Yankah on "The Cape Town declaration on access to cardiac surgery in the developing world; is it a true reflection of the needs of SSA?" refers.

This identical letter had been submitted to the "Cardiovascular Journal of Africa" more than a year ago and was published together with our reply (CVJA 2019;2:74-75).⁽¹⁾ Although several subsequent submissions to a long list of global journals had been rejected by their editors on the ground of repeat publication, we welcome the opportunity to comment once more, as time has passed and the structures proposed by the Cape Town Declaration have since emerged.

As requested in the "Declaration",⁽²⁾ all major global societies (AATS [American Association for Thoracic Surgery], STS [Society of Thoracic Surgeons], EACTS [European Association for Cardiothoracic Surgery], ASCVTS [Asian Society for Cardiovascular and Thoracic Surgery] and the WHF [World

Heart Federation]) formed an umbrella body ("Cardiac Surgery Intersociety Alliance" [CSIA]) – with the goal of jointly facilitating access to cardiac surgery in the developing world. It was ratified by all councils and is chaired by Robert Higgins, Chief at Johns Hopkins and President of STS. As called for in the Cape Town Declaration, the main mission of CSIA is to facilitate the establishment of local cardiac surgical capacity rather than fly-in "missions" or sporadic "fly-out" assistance affecting only a few children. As stated in our joint assessment of "Global unmet needs in cardiac surgery"⁽³⁾ "The question as to whether these fly-in or fly-out missions have benefitted a few while harming the many is a controversial topic of ongoing debates. While one may argue that these missions could be seen as trial-runs for the infrastructure and interdisciplinary skills-harmonisation necessary for commencing local open-heart surgery, the long-term verdict is largely less positive. In the long run, 'missions' – financed by NGOs or their governments and mostly deploying big teams for a handful of predominantly congenital corrections and well publicized 'fly-out' missions for a handful of children to private health businesses provided the local governments with fig leaves. Being able to superficially claim that heart surgery was offered to their population, allowed them to camouflage the gap between the population's needs for life-saving surgery and the actually offered miniscule relief for society."

Similarly, the Cape Town Declaration intended to draw attention to the forgotten majority only marginally older than the "children" the authors refer to. Although congenital cardiac defects usually take centre stage from an emotive point of view, RHD remains the most common cardiovascular disease in young adult and adolescent patients requiring surgery in Sub-Saharan Africa and developing countries globally. With an overall need ranging from 200 - 250 operations per million in endemic regions of South Asia and sub-Saharan Africa and 300 - 400 operations per million in endemic hot spots of Oceania, RHD outweighs other indications including congenital heart defects by 3-4:1.^(2,4)

To rather conclude that "Expensive valve replacement surgery in Africa is a disaster and should not be advocated" is out of

sync with time and does not recognise that all successful models are built on the establishment of local adult cardiac surgical capacity first – onto which the paediatric expertise can build. In an era where even time-pressured private facilities in middle- and high-income countries have eventually come on board with valve repairs (two thirds of mitral valves in Europe and America were repaired in 2017/18)^(5,6) and pioneers like Carpentier in Saigon⁽⁷⁾ (signatory to the Cape Town Declaration), Sampath Kumnar at the All India Institute in Delhi⁽⁸⁾ (signatory to the Cape Town Declaration), and Taweesak Chotivatanapong⁽⁹⁾ (signatory to the Cape Town Declaration), have taught those trained in valve replacement how to repair a rheumatic mitral valve with excellent results, and Magdi Yacoub⁽¹⁰⁾ (signatory to the Cape Town Declaration) has successfully pioneered aortic valve repair for rheumatic patients in Aswan – it is unsettling to hear from seasoned surgeons that valve surgery for 4 times more patients than those with CHD,^(2,4) who are almost exclusively in their early 20s, is a futile undertaking.

We acknowledge the good intention of the authors of the letter, but fear that they were misled in not seeing the bigger picture. We also see this continually resurfacing identical letter as an opportunity to give our learned colleagues an occasional update on the activities of CSIA,^(11,12) the wonderful worldwide umbrella the Cape Town Declaration initiated, also in the future.

REFERENCES

1. Kinsley RH, Reddy D, Yankah C. Letter to the editor: The Cape Town Declaration on access to cardiac surgery in the developing world: Is it a true reflection of the needs of Sub-Saharan Africa? Reply: Zilla P, Bolman RM *Cardiovasc J Africa* 2019;2:74,86.
2. Zilla P, Bolman RM, Yacoub MH, et al. The Cape Town Declaration on access to cardiac surgery in the developing world. *S Afr Med J* 2018;108:702-704; *Eur J Cardiothorac Surg* 2018;54:407-410; *Asian Cardiovasc Thorac Ann* 2018;26:535-539; *J Thorac Cardiovasc Surg* 2018;156:2206-2209; *Ann Thorac Surg* 2018;106:930-933; *Cardiovasc J Afr* 2018;29:256-259.
3. Zilla P, Yacoub M, Zühlke L, et al. Global unmet needs in cardiac surgery. *Global Heart* 2018;13:293-303.
4. Zilla P, Morton Bolman 3rd R, Boateng P, et al. A glimpse of hope: Cardiac surgery in low- and middle-income countries (LMICs). *Cardiovasc Diagn Ther* 2019 <http://dx.doi.org/10.21037/cdt.2019.11.03>
5. Beckmann A, Funkat AK, Lewandowski J, et al. German Heart Surgery Report 2016: The Annual Updated Registry of the German Society for Thoracic and Cardiovascular Surgery. *Thorac Cardiovasc Surg* 2017;65:505-518.
6. Bakaeen FG, Shroyer AL, Zenati MA, et al. Mitral valve surgery in the US Veterans Administration health system: 10-year outcomes and trends. *J Thorac Cardiovasc Surg* 2018;155:105-117.
7. Phan KP, Nguyen v PV, Pham NV, et al. Mitral valve repair in children using Carpentier's techniques. *Semin Thorac Cardiovasc Surg Pediatr Card Surg Annu* 1999;2:111-120.
8. Kumar AS, Rao PN. Mitral valve reconstruction: Intermediate term results in rheumatic mitral regurgitation. *J Heart Valve Dis* 1994;3:161-164.
9. Chotivatanapong T, Chaiseri P, Leelataweewud U. Repair of the mitral valve anterior leaflet: Early results. *Asian Cardiovasc Thorac Ann* 1996;4:214-216.
10. Affi A, Hosny H, Yacoub M. Rheumatic aortic valve disease – when and who to repair? *Ann Cardiothoracic Surgery* 2019;8:383-389.
11. Boateng P, Bolman RM, Zilla P. Cardiac surgery for the forgotten millions: The way forward. *Eur J Cardiothorac Surg* 2019;56:217; *Ann Thorac Surg* 2019;108:653; *J Thorac Cardiovasc Surg* 2019;158:819; *Eur J Cardiothorac Surg* 2019;56:217; *Asian Cardiovasc Thorac Ann* 2019;27:338.
12. Call for proposals to be a pilot site for CSIA supported programmes. *Asian Cardiovasc Thorac Ann* 2019;27:339-340.