

In this issue of *Critical Care and Resuscitation*, inevitably, coronavirus disease 2019 (COVID-19) has started casting its dark shadow on the intensive care community. *CCR* and the editorial and publication team have reacted outstandingly by rapidly turning key articles¹⁻⁴ and documents around within 48–72 hours, having them ready for electronic publication and getting them listed in PubMed. This has been made possible by the fact that *CCR* is now in electronic format and by the outstanding work of Liv Sullivan at the College of Intensive Care Medicine of Australia and New Zealand and by the extraordinary copy-editing effort of Laura Teruel. They make a formidable team. With electronic publishing and a growing media profile, *CCR* is now able to track the number of viewers and visits it receives. For our recent rapid electronic publications, we have seen thousands of page views over just a few days, more than any views that the College itself receives during a similar period, and most of them from mobile phones.

Despite COVID-19, general intensive care medicine goes on, as do investigations in other fields of our specialty. Thus, *CCR* continues to provide a forum for research and thinking about key aspects of intensive care practice. In this regard, the editorial by Young and colleagues⁵ explores the challenges of conducting cluster, crossover registry-based studies in the intensive care unit (ICU), while Applefeld et al⁶ argue for the scientific and ethical importance of understanding and adhering to usual care in the control group of any trial. Both are key publications for intensive care trial medicine.

Sepsis is an abiding key topic in our specialty and is further addressed by Chen and colleagues⁷ in an article exploring the importance of infection source for predicting patient outcomes. Glucose control in patients with diabetes remains controversial, with some clinicians advocating permissive hyperglycaemia (10–14 mmol/L) and others advocating conventional glucose control (6–10 mmol/L). The biggest trial dealing with this issue worldwide, LUCID, is from our ICU community, and its protocol and statistical analysis are presented by Poole and colleagues⁸ in this issue of the Journal. Better risk prediction in patients clinically deemed at risk of developing acute kidney injury remains a challenge. Recently, this field has seen the arrival of a new biomarker set — approved by the United States Food and Drug Administration — based on so-called cell cycle arrest biomarker.⁹ Marketed as NephroCheck (Astute Medical), this predictive test has not yet been assessed in an Australian and New Zealand ICU population. A first assessment of its performance is presented by Bitker et al⁹ in this issue of *CCR*.

A forgotten area of intensive care practice relates to large bowel care. A key element of such care in patients with

diarrhoea pertains to the use of so-called rectal tubes or faecal diversion devices. Very little information exists about their safety and complication rate. This topic is addressed by Wilson and colleagues,¹⁰ who report the occurrence of local trauma, bleeding and serious injury in some patients. In the unique world of severe liver failure, ammonia is considered a key toxin that contributes to cerebral oedema and the risk of cerebral tonsillar herniation in such patients. Its removal by extracorporeal techniques seems an important approach to the prevention of cerebral oedema. As ammonia is a small water-soluble toxin, continuous renal replacement therapy may prove useful if initiated early and delivered effectively. In this issue, Warrillow and colleagues¹¹ provide evidence to support this view.

Another key extracorporeal therapy in intensive care is extracorporeal membrane oxygenation. Establishing current practice and understanding its variability is a key first step in developing interventional studies to improve its safety and efficacy. In an important survey of such practice, Linke et al¹² provide an up-to-date glimpse of such variability and identify areas where it can be used as an opportunity for future controlled investigations.

Finally, in a Point of view article and after a massive exposure to COVID-19, a team from Milan argues for a specific syndrome within the COVID-19 acute respiratory distress syndrome population, where the viral illness triggers microvascular (and indeed even macrovascular thrombosis): MicroCLOTS (microvascular COVID-19 lung vessels obstructive thromboinflammatory syndrome).¹³ Although much of this remains speculative and derived by rational inferences based on clinical experience, it provides a rationale for a much stricter approach to thromboprophylaxis based on more detailed monitoring of coagulation by tests such as anti-factor Xa activity and/or thromboelastography.

Once again, *CCR* delivers on clinical relevance to our ICU community and on timeliness in responding to changes in technology and disease. The Journal offers an important forum for what is best in modern academic and clinical intensive care medicine, a craft that our community appears to excel at and which, we are sure, will be on display in the months to come as we respond to COVID-19. As succinctly stated long ago by Propertius and quoted in a relevant editorial¹⁴ in this issue of *CCR*: *Qua pote quisque, in ea conterat arte diem* (to paraphrase: let intensivists do their job).

Rinaldo Bellomo

Editor-in-Chief, *Critical Care and Resuscitation*

References

- 1 Zangrillo A, Beretta L, Silvani P, et al. Fast reshaping of intensive care unit facilities in a large metropolitan hospital in Milan, Italy: facing the COVID-19 pandemic emergency. *Crit Care Resusc* 2020; 22: 91-94.
- 2 Ling L, So C, Shum HP, et al. Critically ill patients with COVID-19 in Hong Kong: a multicentre retrospective observational cohort study. *Crit Care Resusc* 2020; 22: 119-125.
- 3 Venkatesh B. Intensive care services during a pandemic: who should be driving the messaging? *Crit Care Resusc* 2020; 22: 171-172.
- 4 Warrillow S, Austin D, Cheung W, et al. ANZICS guiding principles for complex decision making during the COVID-19 pandemic. *Crit Care Resusc* 2020; 22: 98-102.
- 5 Young P, Bagshaw SM, Forbes AB, et al. Opportunities and challenges of clustering, crossing over, and using registry data in the PEPTIC trial. *Crit Care Resusc* 2020; 22: 105-109.
- 6 Applefeld WN, Wang J, Klein HG, et al. Comparative effectiveness research in critically ill patients: risks associated with mischaracterising usual care. *Crit Care Resusc* 2020; 22: 110-118.
- 7 Chen YS, Liao TY, Hsu TC, et al. Temporal trend and survival impact of infection source among patients with sepsis: a nationwide study. *Crit Care Resusc* 2020; 22: 126-132.
- 8 Poole AP, Finnis ME, Anstey J, et al. Study protocol and statistical analysis plan for the Liberal Glucose Control in Critically Ill Patients with Pre-existing Type 2 Diabetes (LUCID) trial. *Crit Care Resusc* 2020; 22: 133-141.
- 9 Bitker L, Cutuli SL, Toh L, et al. Risk prediction for severe acute kidney injury by integration of urine output, glomerular filtration, and urinary cell cycle arrest biomarkers. *Crit Care Resusc* 2020; 22: 142-151.
- 10 Wilson N, Bellomo R, Hay T, et al. Faecal diversion system usage in an adult intensive care unit. *Crit Care Resusc* 2020; 22: 152-157.
- 11 Warrillow S, Fisher C, Tibballs H, et al. Continuous renal replacement therapy and its impact on hyperammonaemia in acute liver failure. *Crit Care Resusc* 2020; 22: 158-165.
- 12 Linke NJ, Fulcher BJ, Engeler DM, et al. A survey of extracorporeal membrane oxygenation practice in 23 Australian adult intensive care units. *Crit Care Resusc* 2020; 22: 166-170.
- 13 Ciceri F, Beretta L, Scandroglio AM, et al. Microvascular COVID-19 lung vessels obstructive thromboinflammatory syndrome (MicroCLOTS): an atypical acute respiratory distress syndrome working hypothesis. *Crit Care Resusc* 2020; 22: 95-97.
- 14 Udy A. *Qua pote quisque, in ea conterat arte diem*: COVID-19 and Australian and New Zealand intensive care. *Crit Care Resusc* 2020; 22: 103-104.