

Surgical surveillance in resource-poor settings

We congratulate the African Surgical Outcomes Study team, led by investigators from low-income and middle-income countries, for quantifying the scale of global inequality in surgical care, and for providing measurable goals for future improvement efforts (April 21, p 1589).¹ This work also highlights the poor availability of the detailed information necessary to translate these inequalities into potential solutions.^{2,3} Continuous surveillance systems or registries could provide such information but are notoriously challenging; disparate paper-based systems, inadequate resources, and overburdened staff are seemingly insurmountable problems.^{2,4}

The Network for Improving Critical Care Systems and Training (NICST), which is based in low-income and middle-income countries, is successfully using setting-adapted, electronic mobile platforms to close such gaps in the information available to care for acutely unwell patients. This clinician co-designed platform, which has been distributed in Pakistan and Sri Lanka, has been used in south Asia and has supported routine care for more than 114 785 patients. Real-time dashboards enable clinicians to benefit from surveillance in daily decision making,^{2,5} including management of postoperative complications. Aggregate data from more than 10 907 surgeries provide indicators of quality; these indicators include length of stay, unplanned admissions to intensive care units, and antibiotic use. The feasibility of use of this system is now being evaluated in Sierra Leone and Malawi.

Too often the silent partner, patients are key stakeholders: follow-up telephone surveys by the NICST have reported 30-day outcomes for 3736 patients, highlighting deficits in provision of rehabilitation and outpatient services. Encouragingly this information is informing quality

improvement projects, which are being driven by local clinicians in partnership with University College London's Centre for Perioperative Medicine.

Future research and development should focus on evaluating and delivering surveillance platforms, such as NICST, that enable setting-relevant data to facilitate local and national improvements in surgical care, which the Article by the African Surgical Outcomes Study group¹ has shown is necessary.

We declare no competing interests.

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Healthier lives for all Africans

In their Commission, Irene Agyepong and colleagues (Dec 23, 2017, p 2803)¹ provide a comprehensive report on the pathway to healthier lives for all Africans by 2030. As highlighted in the Commission,

we have been involved in training family physicians in Africa for the past 20 years within the framework of the Primary Care and Family Medicine Education (PrimaFamed) network, a South–South cooperation that brings together family medicine, primary care, and public health in more than 20 African countries.² The participating departments interact electronically, share educational strategies, develop distance learning, and build educational and research capacity through annual workshops, taking advantage of their *African Journal for Primary Health Care and Family Medicine*. The effects of the network have been documented, both in their development of departments and training programmes³ and regarding their outcomes (namely, better access to and quality of care for local communities).⁴

African family physicians can strengthen interdisciplinary primary health-care teams in primary care facilities and within communities and, when appropriate, are involved as expert generalists in district hospitals.

All African countries are facing the challenge of scaling up availability of family physicians in primary health care to make quality health care accessible, particularly in urban slums and rural and remote areas. This accessibility requires a substantial proportion (40–60%) of graduates from medical schools in Africa to be trained for family medicine.⁵ More integration between primary care and public health services will be needed to combine facility-based and person-centred care with community-level responsiveness to population needs, and to improve health outcomes.⁶

In 2018, there is an urgent need for financial donors to fund interventions that strengthen the African primary health-care system as a priority, rather than just investing in vertical disease-orientated programmes, and to continue contributing to networks such as PrimaFamed.



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The hepatitis B epidemic in China should receive more attention

China's childhood hepatitis B virus (HBV) vaccination programme is a great public health success, resulting in a prevalence of HBsAg of only 1% in children under 5 years. However, the burden of HBV infection in China is still the highest in the world, with one third of the world's 240 million people

with chronic HBV living in China.¹ Nevertheless, most people with HBV infection in China are unaware that they carry the disease, making HBV infection a truly silent epidemic.²

Among the population with HBV infection in China, 28 million people require treatment, with 7 million of these being urgent because of advanced liver disease and the high risk of developing cancer.² However, less than one in 50 patients in need of treatment receive it, with the biggest barrier to treatment being affordability.² A 2016 study³ sampled 4726 cases in China and revealed that the direct medical costs alone equalled 53.06% of the patient's annual household income. Six medications have been approved for the treatment of chronic HBV, but only lamivudine is included in the Chinese national drug list.⁴ HBV-related diseases have become an important cause of poverty and continue to perpetuate the cycle between poverty and illness in China.

Beyond the heavy economic burden, the discrimination attached to HBV infection remains a major problem in China. This can range from unwillingness to hug or shake hands with people with HBV infection, to losing a job or not being hired. Ignorance about the aspects of HBV is widespread, and many people believe that HBV can be transmitted through contact or by eating together.⁵ In 2016, to implement health-related Sustainable Development Goals, the Healthy China 2030 plan was officially approved by China's Central Committee. By the end of 2017, 30 of 31 provinces, autonomous regions, and municipalities in China had also issued their local Healthy 2030 plans, and full sections of 22 of these plans can be accessed online. All the accessible plans make a statement on the control of communicable diseases. For AIDS, HIV, and tuberculosis, these plans emphasise health education, screening, diagnosis, treatment, and financial reimbursement. However,

for HBV, these plans are still restricted to vaccination and prevention of mother-to-child transmission, with five plans not even mentioning the word hepatitis. The attention paid to HBV is severely inadequate.

In China, the disease burden of HBV is the highest among communicable diseases, and about 10 million people living with chronic HBV will die by 2030,² with most of these deaths being avoidable. The HBV immunisation programme is a great public health success story, but efforts to address other HBV-related problems are lagging behind. To really achieve the Healthy China 2030 goals, China should also mobilise a response to HBV on a scale similar to that of other communicable diseases, such as HIV, AIDS, and tuberculosis, including enhanced education, elimination of discrimination, enhanced screening, and the offer of affordable and effective treatment to patients.

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