

Which children are more at risk?

Child public health policy in southern Africa faces a key question in decisions regarding the targeting of interventions and resources: which indicators most reliably identify child vulnerability? Debate has centred on whether household poverty or orphanhood and household illness (AIDS-related or otherwise) are the best criteria to use. A survey^[1] in this month's issue of the *SAMJ* reveals that if South Africa (SA) is to identify children at high risk, it is essential that both poverty and parental AIDS are recognised and measured. Where poverty and AIDS interact – as is so often seen – children are at highest risk: poverty interacts variously with AIDS orphanhood and parental AIDS illness to exacerbate child mental health, educational and HIV-infection risks.

Paediatric healthcare in SA

Acute rheumatic fever (ARF) and rheumatic heart disease (RHD) remain major health burdens in SA. Primary prevention of ARF and RHD in children depends on prompt and effective diagnosis and treatment of pharyngitis at the primary healthcare (PHC) level. Cost-effectiveness modelling shows that treating only children with ≥ 2 symptoms (CDR2+) on a 3-symptom score (presence of enlarged cervical nodes, absence of rhinitis and absence of rash) with short-term oral or intramuscular penicillin is the most cost-effective for primary prevention and would complement primordial and secondary prevention efforts.^[2]

Blood transfusions (BTFs) are not without risk and pose a significant financial burden on resource-limited services. In a recent Cochrane review, four trials that enrolled a total of 614 infants comparing low (restrictive) and high (liberal) haemoglobin thresholds revealed that there were no statistically significant differences in the combined outcomes of death or serious morbidity at first hospital discharge. The nursery at Groote Schuur Hospital, Cape Town, SA, introduced a restrictive BTF protocol to minimise transfusions and manage costs,^[3] and were able to halve the number of BTFs and achieve significant cost benefits.

Primary healthcare in SA

The largest impact on the SA burden of disease will be in community-based and primary healthcare (PHC) settings and not in referral hospitals, by medical generalists working as multi-professional teams in PHC and rural settings.^[4]

In this issue, two articles address medical training and 'fitness for purpose' for internship, community-service-medical-officer (COSMO)-ship and service in SA in PHC and rural healthcare settings. An editorial by Burch and van Heerden (both educationists at the universities of Cape Town and Stellenbosch, respectively),^[5] commissioned by the *SAMJ*, addresses the question, 'are COSMOs equipped to address priority health needs in SA?' and contextualises the article by Nkabinde *et al.*^[6] that has identified basic priority healthcare needs of the 'communities, region and nation that SA graduates are mandated to serve'.

Nkabinde *et al.*'s^[6] research, Burch and van Heerden inform us, dovetails with a study to be undertaken by the Health Professions Council of South Africa's Subcommittee for Internship Training of the Medical and Dental Professions Board (MDB), which will evaluate the quality and adequacy of internship training from the perspective of clinicians supervising and patients cared for by COSMOs. This additional information should support the drive by the MDB to ensure that interns are appropriately equipped to address priority health concerns in the communities where they will work as

COSMOs. Health sciences faculties would do well to reflect on the key messages of Nkabinde *et al.*'s^[6] article.

Childhood lead exposure

In a survey of 1 349 grade 1 children in Cape Town, Johannesburg and Kimberley,^[7] the mean blood lead level (BLL) was 7.97 $\mu\text{g}/\text{dl}$. Individual BLLs ranged from 0.8 to 32.3 $\mu\text{g}/\text{dl}$, and 74% of the sample had BLLs $\geq 5 \mu\text{g}/\text{dl}$ (the current reference level of the US Centers for Disease Control). This is more than twice the level (of around 3 $\mu\text{g}/\text{dl}$) in the US. In the Kimberley and Cape Town samples, 13% and 18% of the sample, respectively, had BLLs of $\geq 10 \mu\text{g}/\text{dl}$. Despite the discontinuation of leaded gasoline, children's BLLs remain unacceptably high and, in some areas, the proportion of children with very high BLLs ($\geq 10 \mu\text{g}/\text{dl}$) has been rising. The major contributing factor was childhood poverty with one-third of the sample living in a household that included someone whose occupation potentially involved lead use (e.g. vehicle repairs, spray painting, the building or renovation industry, painting, welding, or repairing electrical appliances).

Miracles after being heard for the first time

Too seldom – as bureaucrats, inexperienced and under-qualified (or both), try to shape major change affecting hundreds and sometimes thousands of healthcare staffers – is any mechanism put in place to hear the grievances that will inevitably arise. Provincial healthcare administrations, particularly in the Eastern Cape, have blundered on, with regional officials perplexed when a seemingly perfectly tailored policy goes pear-shaped within months of implementation.

The Foundation for Professional Development partnered with the Nelson Mandela Bay Municipality earlier this year to facilitate a workshop aimed at ironing out differences between overworked managers understandably hostile to one another as the province absorbed 400 former municipal healthcare staff into its swollen ranks. Altered salary packages, work environments and up-skilling (from preventive to curative competencies) were all part of the mix. A medical doctor and labour lawyer led the change management process (using a Gestalt-type approach). The managers moved from opposite sides of the room where they had sat with closed body language, to the middle, before enthusiastically engaging on what they were doing well and what they could do better. Quick and inexpensive solutions were snatched from 'thin air' and the workshop ended with speeches of gratitude for finally being heard. This month's *Izindaba* profiles the workshop.^[8]

JS

- Cluver L, Boyes M, Orkin M, Sherr L. Poverty, AIDS and child health: Identifying highest-risk children in South Africa. *S Afr Med J* 2013;103(12):910-915. [<http://dx.doi.org/10.7196/SAMJ.7045>]
- Irlam JH, Mayosi BM, Engel ME, Gaziano TA. A cost-effective strategy for primary prevention of acute rheumatic fever and rheumatic heart disease in children with pharyngitis. *S Afr Med J* 2013;103(12):894-895. [<http://dx.doi.org/10.7196/SAMJ.7244>]
- Harrison MC, Pillay S, Joolay Y. Resource implications of adopting a restrictive neonatal blood transfusion policy. *S Afr Med J* 2013;103(12):916-917. [<http://dx.doi.org/10.7196/SAMJ.6858>]
- Howe AC, Mash RJ, Hugo JFM. Developing generalism in the South African context. *S Afr Med J* 2013;103(12):899-900. [<http://dx.doi.org/10.7196/SAMJ.7509>]
- Burch V, van Heerden B. Are community service doctors equipped to address priority health needs in South Africa? *S Afr Med J* 2013;103(12):905. [<http://dx.doi.org/10.7196/SAMJ.7198>]
- Nkabinde TC, Ross A, Reid S, Nkwanyana NM. Internship training adequately prepares South African medical graduates for community service – with exceptions. *S Afr Med J* 2013;103(12):930-934. [<http://dx.doi.org/10.7196/SAMJ.6702>]
- Naicker N, Mathee A, Barnes B. A follow-up cross sectional study of environmental lead exposure in early childhood in urban South Africa. *S Afr Med J* 2013;103(12):935-938. [<http://dx.doi.org/10.7196/SAMJ.7157>]
- Bateman C. Partnering up to get Eastern Cape healthcare delivery working. *S Afr Med J* 2013;103(12):889-890. [<http://dx.doi.org/10.7196/SAMJ.7694>]