

Editorial

Are we paying enough attention to adolescent nutrition?

This issue of the journal focuses on studies undertaken in adolescent populations around the world. Roger Hughes' 'In this issue' piece highlights key findings in some of these studies. Particularly challenging is the persistence of under-nutrition alongside overnutrition in South African children. The 2005 National Food Consumption Survey of South Africa results were presented at the South African Nutrition Congress in Pretoria in October 2008. That report concluded that stunting and underweight remained the most common nutritional disorder affecting 20% of children, while 14% were classified as overweight or obese⁽¹⁾. The report highlighted the importance of adequate community-based growth monitoring. While obesity is a growing problem in almost all countries, the continuing impact of undernutrition cannot be ignored at the expense of focusing on the rising rates of obesity. Balancing policies to address both not getting enough and at the same time not getting too much is a real challenge for resource-poor governments. On many levels, shifting the focus to consumption of nutrient-dense plant foods may be a key approach, as well as being more environmentally sustainable.

It is well known that the age at which a girl achieves puberty is affected by her nutrition and living conditions⁽²⁾. In some cultures the onset of puberty signals the time when a young woman can marry and become pregnant. Early onset of puberty leads to earlier age at first pregnancy. Teenage pregnancy is known to carry strong risks for both the mother and the child⁽³⁾. Adolescence is a key time in social as well as physical development. It is critical to ensure that the wider environment in which young people become adults is optimal for both their social and physical development. Habits established around this time are likely to be carried on throughout the rest of life.

The life course approach to health is now well accepted; the challenge is identifying at which point in the cycle one is most likely to be effective in changing the course of events for current and future generations. Internationally, less attention has been paid to improving nutrition around and just after puberty but before young women become pregnant. Reaching young women before they become pregnant is difficult, especially in societies where girls leave school early, but there may be real public health gains by putting more effort into addressing nutrition in this critical age group.

Breaking into the cycle around puberty may not only be good for the mother and child in the short term, but there may be important longer-term benefits. There is a strong link between size at birth (weight, length and head

circumference), hormone profile at puberty and longer-term risk of cancer⁽⁴⁾. Another report from the Nurses' Health Study shows that meat consumption around adolescence increases the risk of premenopausal breast cancer⁽⁵⁾.

Accepting the above, a big challenge is to work out what will be the best way to improve nutrition around puberty and adolescence. It is unlikely that the same approach will be appropriate in all settings. Approaches to achieving dietary change need to be tailored to the constraints operating in each setting and country. In some, the key constraint will be external factors affecting food security (food prices, access to clean water and fuel for cooking), while in others it will be more the internal factors that affect the choices young women make or the pressures they feel that shape their choices.

The answer to our question is NO, we are not paying enough attention to adolescent nutrition. The case is now strong for directing more resources to improving the nutrition of adolescents; this should not be at the expense of maternal and child health services. The potential gains are great. Alongside the development and enhancement of services and programmes focusing on adolescents, it will be vital to develop systems and structures to be able to monitor and evaluate the impact of these programmes. Further development of the skills of the workforce is crucial to the implementation and evaluation of programmes aimed at improving adolescent nutrition.

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References

1. Labadarios D, Swart R, Maunder EMW *et al.* (2008) Executive summary of the National Food Consumption Survey. Fortification baseline (NFCS-FB-I) South Africa, 2005. *S Afr J Clin Nutr* **21**, Suppl. 2, 247–300.
2. Rogol AD, Clark PA & Roemmich JN (2000) Growth and pubertal development in children and adolescents: effects of diet and physical activity. *Am J Clin Nutr* **72**, Suppl., 521S–528S.
3. Fraser AM, Brocket JE & Ward RH (1995) Association of young maternal age with adverse reproductive outcomes. *N Engl J Med* **332**, 1113–1118.
4. Opdahl S, Nilsen TIL, Romundstad PR, Vanky E, Carlsen SM & Vatten LJ (2008) Association of size at birth with adolescent hormone levels, body size, and age at menarche: relevance for breast cancer risk. *Br J Cancer* **99**, 201–206.
5. Linos E, Willett WC, Cho E, Colditz G & Frazier LA (2008) Red meat consumption during adolescence among premenopausal women and risk of breast cancer. *Cancer Epidemiol Biomarkers Prev* **17**, 2146–2151.

Announcement

We are very sad to announce that on Monday 1st December 2008, Professor Lucie Malaba passed away while receiving treatment in South Africa. Lucie was one of our founding associate editors, and was actively working for the journal right up to the time of her death.

Lucie was a star that shone brightly, her broad smile and positive attitude were an inspiration to all of us who were lucky enough to know and work with her. Lucie struggled for many years against kidney failure and overcame many obstacles, but never let it stop her working and travelling. All who knew her will have fond memories of time shared with her. Lucie stayed in Zimbabwe when it would have been easier for her to leave because she believed in and loved her country. Despite huge difficulties she continued to do research and train students. Her work is highly regarded around the world, as are ex-students. Lucie instilled an open enquiring approach that prepared her students well for excellence and leadership. Her work will continue through her students. Her legacy will be to remind us and keep us focused on the important things in life and to remember to live life to the full and never waste a day.

We are going to instigate an annual Lucie Malaba award for the best paper published in *Public Health Nutrition* that makes a significant contribution to improving the health of young women and children in Africa.