- 21 McIntosh K, Ellis EF, Hoffman LS, Lybass TG, Eller JJ, Fulginiti VA. The association of viral and bacterial respiratory infections with exacerbations of wheezing in young asthmatic children. *J Pediatr* 1973; **82**: 578–90.
- 22 Minor TE, Dick EC, DeMeo AN, Ouellette JJ, Cohen M, Reed CE. Viruses as precipitants of asthmatic attacks in children. *JAMA* 1974; **227**: 292–8.
- 23 Horn MEC, Reed SE, Taylor P. Role of viruses and bacteria in acute wheezy bronchitis in childhood: a study of sputum. *Arch Dis Child* 1979; **54**: 587–92.
- 24 Foucard T. The wheezy child. *Acta Paediatr Scand* 1985; **74**: 172–8.
- 25 Burr ML, Eldridge BA, Borysiewicz LK. Peak expiratory flow rates before and after exercise in schoolchildren. *Arch Dis Child* 1974; **49**: 923–6.
- 26 Speight ANP, Lee DA, Hey EN. Underdiagnosis and undertreatment of asthma in childhood. *BMJ* 1983; **286**: 1253–6.

Dipstick test for malaria

In holoendemic rural areas of sub-Saharan Africa more than three quarters of children have continual *Plasmodium falciparum* parasitaemia. The demonstration of the parasite in blood is therefore unhelpful in the diagnosis of the cause of a febrile illness. An easy and rapid method of detecting parasitaemia would, however, be useful in urban areas and in other parts of the world.

In a study reported in the *Lancet* (Christine Beadle and colleagues, 1994; **343**: 564–8) a new dipstick test was compared with conventional blood films in adults and children in Kenya and in experimentally infected volunteers in America. The dipstick contains monoclonal antibodies against a water soluble antigen, *P falciparum* histidine-rich protein 2 (Pf H R P-2). Polyclonal antibodies to the same antigen conjugated to liposomes containing a pink dye are used as the 'antigen detector reagent'. A single test can be done in 20 minutes and a batch of 10 tests takes 30 minutes. Sensitivity of the test depended on the degree of parasitaemia; it was 96.5 to 100% with 60 or more *P falciparum* asexual parasites per μ l blood, 70–80% with between 11 and 60 parasites, and only 11–67% with 10 or fewer. Most patients with symptomatic falciparum malaria have more than 60 parasites per μ l blood. Specificity of the dipstick test was 95% in American volunteers and 88% in Kenyans in a holoendemic area. The test was negative six days after starting treatment.

The authors provide no information about cost but suggest that the simplicity of the test could make it a useful tool.

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