

to the extraordinary campaign being conducted by your science correspondent. Not only are his arguments specious but he has singularly failed to address the large volume of evidence that undermines his point of view. By ignoring the scientific method — the scientific procedures laid down to distinguish fact from fantasy — he has not only discredited himself, he has seriously damaged the reputation of your newspaper.

Furthermore, your hostile attitude to John Maddox is both unfair and irresponsible. The reason, I suspect, that certain scientists dislike his approach is because he applies the scientific method with considerable rigour, as Jacques Benveniste found to his cost.

In my dealings with Maddox, I have never found him to be anything other than intellectually honest and courteous, and I think his response to your reporting of the AIDS issue is entirely appropriate. Far from being a triumph for *The Sunday Times* akin to your thalidomide campaign, I think your perception of the AIDS issue is akin to the Hitler diaries.

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## Nuclear Ukraine

**SIR** — Your article (*Nature* 365, 599; 1993) on the US-Ukraine stalemate over nuclear weapons prompts the following remarks. The United States made a mistake in not recognizing Ukraine as a legitimate successor state to the Soviet nuclear arsenal and is still insisting that Ukraine give up its nuclear weapons to Russia. That policy goes back to President George Bush's ill-advised lecture to the Ukrainian parliament advising it not to leave the Soviet Union. John J. Mearsheimer (*Foreign Affairs*, Summer 1993, p. 50) has suggested that it is not too late to change course and to support a Ukrainian nuclear deterrent against Russia.

Ukraine, the Baltic republics and other former Soviet subject nations are currently targets of Russian neo-imperialist policies. Russia's immediate objectives are aimed at controlling territories necessary for the projection of its naval power. In the Far East, this has meant control of the Kurile Islands. Russia is willing to do without billions of dollars of aid from Japan just to prevent its nuclear submarines from being bottled up in the Sea of Okhotsk. The coastal real estate of the Baltic states is valuable to Russia for the same reason, and Russia has done all it can to put former communists in power there. They succeeded in Lithuania, but opponents of former communists won the elections in Estonia and Latvia. Russia then started a disinformation campaign

against Estonia and Latvia, with Boris Yeltsin himself complaining of "... a massive violation of human rights. ..." of their Russian minorities and halting the withdrawal of the Red Army to "protect" these colonists from the Soviet era. The *New York Times* (22 November 1992) subsequently reported that "a week-long investigation into Mr Yeltsin's allegations in Estonia and Latvia finds little evidence of human-rights abuses, at least as commonly understood".

The pressure continues, however, on the diplomatic front and has more recently taken the form of opposing the admission of the Baltic states to the European Union and of former Warsaw Pact members to NATO. The Cold War may be over, but Russian generals are all former Soviet generals, they still have a huge army, their military/industrial complex is still a drag on the economy and is yet to be dismantled, a sanitized KGB is still in business under a new name, and nobody has yet been punished. Can anybody be surprised?

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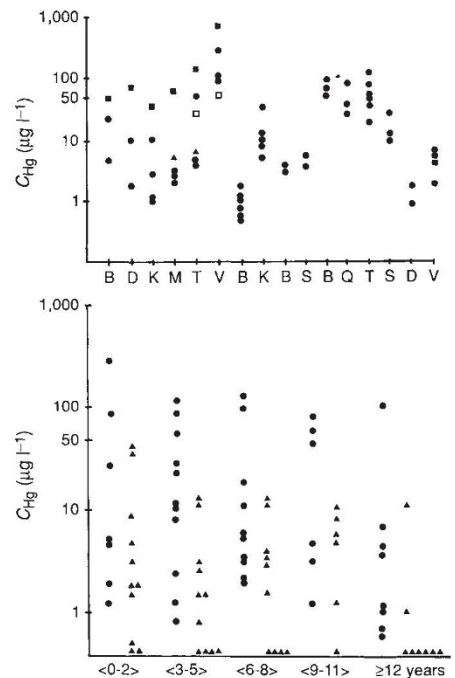
## Mercury exposure

**SIR** — We would like to add to the accounts<sup>1,2</sup> of mercury poisoning that have recently appeared. We discovered an elevated mercury concentration in the urine of a 2-year-old girl in a refugee camp in Germany. Subsequent investigations revealed that other family members and other inhabitants of the camp had high concentrations of mercury in the urine.

The camp is next to a coal-fired power plant and is inhabited mostly by refugees from former Yugoslavia and from Romania. Some families, including those with high mercury levels, have lived there for several years, and many of the younger children were born in Germany. Mercury concentrations were not always elevated. There were families with high levels and apparently unexposed families. Women tended to have a much higher concentrations (see figure).

After a long search for the source of this contamination, a physician from Kosovo helping us as an interpreter discovered that all the exposed families used a cosmetic bleaching ointment containing rose oil and a mercury salt; the ointment had to be buried for a year for proper seasoning. It was sold by a Turkish vendor. In two samples we found concentrations between 708 and 17,200  $\mu\text{g Hg per g ointment}$ .

We went into two camps and investigated all children in whom we had detected elevated mercury values. Their age and urinary and blood mercury concentrations at the time of clinical investigation are shown in the figure. None had any



Top panel, urinary mercury excretion by individual members of 16 different families. (The letters represent the initial letter of the family name.) ■, Mothers; ▲, fathers; ●, children; □, female relatives. Lower panel, mercury concentration in urine (●) and blood (▲) in children at the time of clinical investigation. In some cases it was not possible to collect both samples.

dermatological, neurological or behavioural signs of acrodynia.

One woman with a Hg concentration of 150  $\mu\text{g l}^{-1}$  in urine and 29.9  $\mu\text{g l}^{-1}$  in blood had given birth to a normal baby (50 cm, 3,060 g, 34 cm head circumference). The placenta contained 120  $\mu\text{g Hg kg}^{-1}$ . The mercury concentration in the umbilical blood was 8.8  $\mu\text{g l}^{-1}$ . This boy was four weeks old when we saw him. He was clinically and neurodevelopmentally normal.

There are few data on the incidence of acrodynia at various mercury concentrations, some dating back 40 years<sup>3</sup>. In our patients, much higher mercury concentrations were measured and tolerated without the manifestation of clinical signs in several cases described in the literature. There may be a wide range of individual, possibly also ethnically conditioned, variation of susceptibility in children to low, chronic mercury exposure.

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