Correspondence

Take more care over glacier facts

We find it most unfortunate that as a leading journal you introduced crucial factual errors into an article on Himalayan glaciers (see J. R. Laghari *Nature* **502**, 617–618; 2013, and Correction *Nature* **503**, 464; 2013), particularly in light of lessons learned from the 'glaciergate' scandal that threatened the reputation of the Intergovernmental Panel on Climate Change (IPCC) in 2010.

Glaciers seem to be peculiarly at risk from careless errors (J. G. Cogley *et al. Science* **327**, 522; 2010, and J. S. Kargel *et al. The Cryosphere* **6**, 533–537; 2012), as well as from climate change. Editors should follow the IPCC's example and sharpen up their fact-checking procedures. **Alex S. Gardner** *Clark University, Worcester, Massachusetts, USA. agardner@clarku.edu* *On behalf of 4 co-signatories (see go.nature.com/gx2t9y for full list).

Recycle waste for nourishing soils

On World Soil Day (5 December), it is worth pointing out that there are opportunities for sustainable soil management beyond the farm gates (*Nature* **502**, 607; 2013). We need to rethink modern society's complex product flows so that waste and recycling practices can be adapted for enriching soil, which is a nonrenewable resource. Organic agriculture in

subsistence-farming systems throughout the developing world requires inputs that are in short supply because of limited land, nutrients and organic matter. This deficiency could be remedied by importing nutrient sources and organic matter from other industrial sectors within national boundaries.

Processed industrial and domestic waste could contribute large amounts of nitrogen and phosphorus derivatives to soil, for example, and human urine or slaughterhouse residues could be used to produce indigenous and highly efficient biofertilizers. **Johannes Lehmann** *Cornell University, Ithaca, New York, USA. cl273@cornell.edu*

Please pass the microbes

Living and working among Tanzania's Hadzabe people one of the world's last remaining hunter-gatherer groups — I witnessed the extraordinarily intimate relationship they share with microbes in their environment. This potentially provides them with a healthenriching source of gut microbial diversity, lost long ago in the modern lifestyle of the developed world.

Like the Hadzabe, all humans were presumably once connected to a huge microbial metacommunity through the guts, skin and feathers of animals in their territory. As well as sharing water sources tainted with the urine and faeces of animals as diverse as zebras, giraffes and bush pigs, the Hadzabe often consume the uncooked stomachs and colons of killed animals. They also 'clean' their hands in the animals' partially digested and microbe-laden stomach contents (pictured), helping to transfer microbes among community members.

The lower diversity of gut microbes among populations



Microbial matter as hand cleanser.

in the developed world (see, for example, T. Yatsunenko *et al. Nature* **486**, 222–227; 2012) may increase our susceptibility to opportunistic pathogens and diseases. We should be exploring the value of the Hadzabe people's rich microbial sources, notwithstanding fundamental issues of sanitation and hygiene. Jeff Leach Human Food Project, New Orleans, USA, and London School of Hygiene & Tropical Medicine, UK. jeff@humanfoodproject.com

All journals need to correct errors

Innocent errors are more commonplace than fraud in research papers, so they need to be identified and corrected promptly. We call for more journals to accept their responsibility to ensure that this happens.

We searched for errors in 107 papers in the fields of engineering, materials and computer science, which were based on existing small data sets (see G. Taguchi *et al. Quality Engineering Handbook*, Wiley; 2004). Our search revealed an alarming number of errors. Ten papers had one or more mistakes that were substantial enough to affect the findings and conclusions. There were errors that were not so significant in almost one-third of the papers.

We notified the journals that published substantial errors. Only four of the ten formally corrected their mistakes. These corrections were published 4–8 months from initial notification. The remaining journals declined to publish a correction; some even had a policy not to publish criticisms of their papers.

Journals that were willing to print general corrections (through errata, letters and notes) were found to have corrected 0.11–0.71% of their existing papers. This represents less than 10% of the error rate exposed here (see also R. D. Chirico *et al. J. Chem. Eng. Data* **58,** 2699–2716; 2013).

Although our selection of journals is narrow, our findings hint that many crucial errors may go forever uncorrected. The risk is compounded by the rarity of attempted replication studies (see go.nature.com/dstij3).

It should be standard practice for journals to insist on full data provision by authors and on declarations of individual author contributions (see, for example, go.nature.com/lwkkqo). Prolonged investigation may be necessary in cases of suspected fraud — but honest errors can be corrected relatively quickly. And this demands a consistent correction policy among journals. Jonathan D. Linton University of Ottawa, Canada. linton@uottawa.ca *On behalf of 5 co-signatories (see go.nature.com/ew2i9i for full list).

Doctor Who and the ageing enigma

In his time-travel musings to mark *Doctor Who*'s half-centenary, Andrew Jaffe overlooks one facet of the Gallifreyan narrative: regeneration (*Nature* **502**, 620–622; 2013). Rather than die, time lords can choose to regenerate (purportedly up to 12 times) once their bodies are worn and weary.

Even though time travel is still in the realm of fantasy, progress in the sphere of rejuvenation is palpable. Many of the disagreeable features of ageing are now successfully countered by medical science and technology.

The Doctor would surely advise us to focus more closely on preventing degeneration, especially in light of the boom in life expectancy over the past 50 years and its accompanying social and scientific challenges. **Faisal R. Ali** University of Manchester, UK. f.r.ali.01@cantab.net