Out of the Box



Physical activity is crucial for control of body weight. This claim is supported by knowledge of evolution and studies of energy balance and exercise physiology. This month I also ask, when people eat people, which bits do they prefer?

System? What system?

First though, some warmed-up news of the politics of undernutrition, which means usually or always having not enough to eat. In this issue, John Waterlow chides this journal for neglecting undernutrition⁽¹⁾. He has chastised me too, in private correspondence. He is right.

Why is undernutrition neglected? This is a murky topic. In this issue, Ricardo Uauy⁽²⁾ sums up the main themes of the final *Lancet* paper⁽³⁾ in its five-part series on maternal and child undernutrition published earlier this year, and Barrie Margetts responds⁽⁴⁾. Writing as representatives of an awesome study group supported by the Gates Foundation and the World Bank, and with benefit of a Bellagio retreat, Saul Morris, Bruce Cogill and Ricardo make a series of salient points. Here I gloss just one: their breast-beating conclusion that the 'international nutrition *system*' is 'fragmented and dysfunctional'.

The system (italics mine, for it is no such thing) has five parts. The first part is made up of the nineteen UN agencies whose mandates include food or nutrition. Some, such as the WHO, the FAO, UNICEF, the World Food Programme (WFP) and the World Bank, are notorious for intra- and inter-agency turf wars. Also, the general policy directions of UN agencies, starting with the choice of top executives, tend to be controlled by the USA and other powerful or pliable nations.

The second part is national government aid agencies, also known as 'bilaterals', of which by far the biggest is the US Agency for International Development, and also private donor organisations of which the Gates Foundation is now the most courted. The third part is a rainbow of civil society organisations such as Save the Children, Medicins sans Frontières, the Micronutrient Initiative, the International Baby Food Action Network and the International Union of Nutritional Sciences (IUNS). The fourth part is a pantheon of masters of the nutrition universe such as Nevin Scrimshaw, Urban Jonsson, Cutberto Garza, Philip James and indeed Ricardo, who transcend affiliation and, like so many Gandalfs or Batmen, jet around the globe propagating their various missions.

The 'private sector' is the fifth part. This does not mean the food and drink industry as a whole, but Coca-Cola, Nestlé, Unilever, Kellogg's, Danone and other behemoths that initiate, infiltrate or influence international food and nutrition policies and programmes. It also includes BINGOs (business interest non-governmental organisations) — typically non-profit organisations funded or controlled by transnational industry, such as the International Life Sciences Institute (ILSI). Private sector representatives also jet around the world perpetrating their various interests.

Boyd Orr's baton

Once, somebody believed that all the power players could become an integrated and functioning whole in the service of eliminating world hunger. This was John Boyd Orr. Towards the end of World War II he proposed the FAO, became its first director-general, was thwarted by the USA and the UK, and resigned the post in bitter frustration, saying 'the people are crying out for bread and we are to offer them pamphlets'. He was awarded the 1949 Nobel Peace Prize.

The forum for the current 'international nutrition system' is the UN Standing Committee on Nutrition (SCN), whose 35th meeting this year was in Hanoi, Vietnam. The SCN was set up as a result of the 1974 World Food Conference held in Rome. Fresh from accepting the 1973 Nobel Peace Prize, Henry Kissinger took time out from masterminding the secret bombing of Cambodia that killed around half a million people⁽⁵⁾ to give a keynote plenary address to the Rome conference. Seeming to pick up Lord Boyd Orr's baton, he pledged: 'Within a decade no child will go to bed hungry, no family will fear for its next day's bread, and no human being's future and well-being will be stunted by malnutrition'.

His uplifting words are as apt now as then. Like wars and invasions, global undernutrition generates official statements in which rhetoric is meant to have no relationship with reality. The official approach is to be 'objective'. This means disinfecting such themes of any political or moral bugs and, thus sanitised, treating them as technical problems that – after the bombing – can be fixed with loans and gifts of goods and cash. Official reports on undernutrition include carefully crafted descriptions, but only superficial explanation.

A colleague says these can be compared with a report commissioned by the Roman Senate on reconstruction and development after the great fire, that mapped the fire, rated it on a blaze scale, counted the bodies, deplored the deaths, deeply deplored the high proportion of female, Out of the Box 551

infant and child casualties, measured the ignition point of dry timber, noted that people living in stone mansions were better protected than people living in wooden shacks, quoted survivors saying that the fire was terrible, regretted the lack of rain, observed that the fire would have been less destructive had it occurred when it was raining, applauded the success of firefighters in some districts and the enterprising use of the contents of chamber-pots in others, criticised the absence of sources of water in many districts, suggested that citizens should keep buckets of water handy, sketched a make-it-vourself rainwater butt, recommended less inflammable building materials, catalogued other great fires, observed that fires are an unfortunate aspect of urban life, projected fewer casualties in future fires, featured the pre-prepared imperial plans for a new Rome, and appended an annex on patrician and plebeian socio-economic inequalities. All this, prefaced with a gracious foreword dictated by the Emperor Nero, commending the Senate and the scribes for their vision and diligence.

Does this seem flippant? Well, I don't think that any UN agency was insolent enough to present Dr Kissinger in Rome, two millennia later, with a report connecting the bombing of Vietnam, Laos and Cambodia with the undernutrition of mothers and children in those countries. Other more recent and indeed current examples also come to mind. The causes of all forms of endemic and epidemic malnutrition are beyond the scope of nutrition science. Characteristically, people who do not have enough to eat are victims of oppression, and may, with some reason, see us as among their oppressors.

The UN is broke

Now for the SCN. Its core task is to harmonise UN food and nutrition policies⁽⁶⁾. It has always also included representatives of the bilateral agencies, influential individuals and BINGOs such as the Nestlé Foundation and ILSI. It has so far excluded food and drink companies.

Around the turn of the century, as facilitated by Richard Jolly of UNICEF, an SCN chair of integrity and stature, civil society organisations became more influential. Then with Sonya Rabeneck and now Roger Shrimpton as valiant SCN general secretaries, it seemed that aspects of global food and nutrition policy could be reasoned out by a substantial proportion of the most experienced and knowledgeable people, working together in the public interest. Remarkably, the SCN has proved to be not just a talking shop. To give just two examples: its working groups have helped in the development of visionary global policies and functioning local programmes on infant and young child feeding, and the human right to adequate food.

Evidence of effectiveness has however disturbed the UN agencies, who say the SCN is vital but keep it starved of funds and block it from having a voice of its own.

To be fair, the UN agencies are caught between a rock and a hard place. They are strapped for cash, and the most powerful national governments use their muscle to make the UN steer clear of policies and programmes that might impede big business.

Ann Veneman, previously the US Secretary of Agriculture, and before then a lawyer representing Monsanto, was appointed by the Bush II administration as head of UNICEF and then became the current chair of the SCN, without pretence of due process. She began her term at the SCN by deprecating discussion and demanding deliverables. Like her predecessor Catherine Bertini, whose background also includes Republican politics, she has also insisted that the 'private sector' has full membership in the SCN, but so far has been blocked by the bilaterals, the civil society group and indeed some of the UN agencies. She now shows signs of impatience.

The Boston strangulation

So what is going to happen to the SCN? Having participated in five of its meetings since 2000 I remain hopeful. However, the SCN is subject to four pressures. One is practical – dwindling resources. One is organisational – infirmity of purpose when anybody proposes a coherent structure. Two are ideological – one side insisting that the private sector must become full members, the other believing that as with the environmental movement, civil society organisations must take the lead.

So will the SCN will fade away, be privatised or become independent? Strange to relate, it seems that early this year Ms Veneman may have been complicit in a plot to overthrow the entity of which she is chair. A two-day meeting was convened at Tufts University near Boston by Patrick Webb, formerly of the WFP, now Dean of Academic Affairs at the Tufts School of Nutrition. What actually happened remains obscure, and the editor of this journal will welcome an insider explanation.

The purpose of the meeting was to propose a replacement for the SCN. Also present – so I hear – was Alan Court, a senior UNICEF executive. Also present – so I hear – was the venerable Jo Hautvast, previously an efficient general secretary of the IUNS with a fabled reputation for dealing and wheeling. Representatives of the bilaterals and of civil society organisations were not invited. The people at the meeting, including a mix of UNICEF executives and academics, asked that their identities be kept secret.

The outcome of this conspiracy is an undated, unattributed, unpublished one-and-a-bit-page document circulated to the SCN steering group, which starts by proposing that 'adjustments to structure are required'. 'Reduced partisanship' is stipulated. Shifting metaphors in a succession of verbal speed-bumps, the SCN could include 'a nutrition think-tank, brain trust, or round table, to interact with ad hoc panels'. An Oversight Board is

proposed 'comprising high-level UN functionaries, private sector, large foundations (Gates), and broader spectrum of civil society'. And in general: 'Bring private sector representatives into all levels of structure of the new SCN... private sector CEOs on all Oversight and Working Boards'.

So there you have it: further privatisation of the UN, in the form of a tank-table for academics and industry to fix up agreeable approaches to all forms of malnutrition. Such a plan could do wonders for the career prospects of senior academics and UN 'functionaries' in the malnutrition enterprise. Will this happen? The Boston Strangulation was not formally discussed in Hanoi.

Bulls in the Indochina shop

Instead, in Hanoi the civil society group awoke from slumber. It has new representatives: Urban Jonsson, previously a senior UNICEF executive in Africa, Asia and New York, and – shazam! – Ricardo Uauy, who is IUNS president until late next year. They have already been dubbed 'the bulls in the Indo-China shop'. Continuity is assured by Elisabeth Sterken of INFACT in Canada, the previous chair, who is now the third alternate chair. Ted Greiner, now overall chair of this *chaise-longue* group, previously for many years chair of the SCN bilateral group, has assembled an advisory team of over 20 people, collectively representative of the range of civil society organisations.

So what now? The CSNGO group joined in the orgy of breast-beating with a communiqué from Hanoi, to be found on the Medicins sans Frontières website⁽⁷⁾. 'World nutrition is under threat', it says. The 'dramatic lack of leadership from governments and UN agencies to address these problems' is deplored, and 'No effective leadership, global plan, or global fund have emerged'. And: 'a broader range of social, environmental, political and economic changes will be needed'. True enough.

Shifting metaphors again, a review of the 'global architecture' for nutrition is now promised. This all seems to assume that the experts know best. But who are the experts? In 2002 the civil society group championed 'the right of peoples, communities, and countries to define their own agricultural, pastoral, labour, fishing, food and land policies which are ecologically, socially, economically, and culturally appropriate to their unique circumstances' (8). There again, Henry Kissinger has also said: 'Control food and you control the people. Control money and you control the world'. Next month I follow the money, ask 'undernutrition of what?', and wonder if process can lead to progress.

Cannibalistic best bits

On the topic of apt ecological and cultural food policies in which peoples and communities have rights and entitlements – from different points of view, depending on who eats and who is eaten – here is a riff on nutritional aspects of cannibalism.

It seems that societies whose traditional diets include people, in common with carnivorous animals, prefer the fattier parts of their prey. In New Guinea traditionally the brains of dead relatives are preferred. In China executioners' perks included hearts and brains. Much of the dry matter of brains is made up of essential fats.

Engravings and paintings derived from the accounts of the ones that got away, showing native Brazilians barbecuing and gnawing human arms and legs, may be explained as dramatic license, or because the captives did not notice that the feast started with the more succulent cuts, or else because the flesh of white captives was juicy compared with that of athletic warriors from other tribes. In early colonial days the native Brazilian equivalent of *Cordon Bleu* were steaks of European monks and priests and – juiciest of all – well-marbled papal envoys.

Like fasting and feasting, eating people is a topic you won't find in nutrition textbooks and learned journals. Sure, it's wrong, not to say criminal. But books and journals concerned with addiction and drugs include lots of material on heroin and cocaine. The topic is interesting, and study of the effect of illegal drugs may apply to other psychoactive substances. So I see no good reason for silence on nutritional aspects of cannibalism. The practice is supposed to be extinct, except in cases of Hannibal Lector-type crazed murderers and survivors of plane crashes in the Andes. Hmm. I wonder. Communities living in the forest fastnesses of Mount Hagen in New Guinea are not about to print menus for visiting ethnologists, film-makers or fuzz.

What about preparation and cooking methods? The barbecue was invented by the Caribs, one of its purposes being to grill people. (Can this be where the phrase 'give him a grilling' comes from?) Another technique is roasting people whole on hot stones. Another is the *kleftiko* method, again using hot stones, usually of dismembered parts buried in pits, sometimes lined with clay gypsystyle. Another tradition is to bury the dead and then dig them up when the flesh falls off the bone. The legendary giant iron pots used to make missionary stew, if real, must be of relatively recent origin, given the technology needed to make the pots.

Criminals were boiled alive in water up to the reign of Henry VIII in Britain, and boiling in oil was a punishment elsewhere in Europe and in Asia, but I find no record of boiled villain for dinner. What about other methods? Are people ever poached, steamed, fried, battered or toasted? We know they have been baked into pies, for the story of Sweeney Todd and Margery (or Sarah) Lovett is based on events that did indeed occur in London around 200 years ago. But this brings us into a different while associated field: cannibalism implies purpose, and well-designed studies will control for inadvertent anthropophagy.

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Activity makes you slim

During this last year I have read more dieting books than I have had hot breakfasts. A common theme of earlier regimes is that physical activity is a waste of time. In Britain, John Yudkin and Derek Miller of Queen Elizabeth (now King's) College used to explain that to work off a business lunch you would have to run a marathon or walk up and down Ben Nevis. Now though, 'don't diet' dieting books and expert reports advocate regular sustained moderate and preferably vigorous physical activity.

John Yudkin and Derek Miller – and followers like Audrey Eyton⁽⁹⁾, who I somehow can't see on a treadmill – would have been right if the only relevant measurements were of the energy value of a (decidedly hospitable) lunch and of physical activity only during the time of exercise. But they were wrong, and their views have had a pernicious effect.

Being sedentary fellows, ignorant of exercise physiology, they did not take the training effect into account. This has four aspects. First, the amount of physical work over a period of months needed to get anybody fit enough to walk up and down mountains – or to be vigorously active for at least half an hour a day – adds up to the energy equivalent of a whole lot of business lunches and supper parties. Second, the residual effect of physical activity keeps your body at a higher rate of energy turnover after the activity. Third, resting metabolic rate is a function of lean tissue, and the fitter you are the more lean tissue you have. Fourth, as a literature review by Neil King of the University of Leeds shows, physical activity usually does not make you hungry⁽¹⁰⁾. Fit active people are in higher energy balance all the time.

Oh, and another point, before stopping bopping John Yudkin and Derek Miller, Herman Tarnower⁽¹¹⁾, Irwin Stillman⁽¹²⁾, many other 'dieting doctors' and more recently Gary Taubes⁽¹³⁾. The issue is not body weight. Not, not! The issue is body fat. When you become physically active, your body composition gradually changes. You gain lean tissue and you lose body fat. After six months you might weigh much the same – bearing in mind that lean tissue is 20% heavier than body fat – but have a waist circumference 2 to 4 in (5 to 10 cm) less. This is one of the impressive number of reasons why gauging body fatness by BMI, which takes no account of body composition, is a mistake.

From the evolutionary point of view, as supported by careful measurements that have been taken since the days of Wilbur Atwater and Francis Benedict, your average basically sedentary person is in energy balance roughly 1670–2510 kJ (400–600 kcal) below the natural and normal human level – the range allowing for size, gender and age. This estimate, supported by an elegant comparison in the USA of the Amish people (14) compared with people in Colorado (15,16), seems incontrovertible to me. The takehome message? Be and stay active, eat and drink your fill of lots of fresh and benignly processed food and drink, and thus always be in good shape.

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