



Have Your Say



This is your College and we are interested to hear what you have to say about issues as they relate to nutritional and environmental medicine. You may have a testimony, an opinion, some research information, you may agree or disagree with something (tell us why). Just send a letter addressed to:

The ACNEM Journal, P O Box 298, Sandringham, 3191 or email: mail@acnem.org

Fredrik Reinfeldt, Now That You Are Sweden's Prime Minister, Are You Prepared To Listen?

Our modern society is increasingly awash with radiation from different types of apparatus, not least from the new wireless techniques. Many researchers suspect that the resulting "electrosmog" may be the cause of the increase now seen in various types of cancer disease.

BBC News recently discussed the increase in skin cancer in young persons and Sara Hiom, head of the highly respected organisation Cancer Research UK, pointed out that "Non-melanoma cancers are increasing at an alarming rate." The same thing was observed by the Swedish Radiation Protection Authority (SSI) in one of the most recent issues of their journal under the heading "More people die of melanoma than in traffic accidents."

More and more money is being invested in understanding the molecular mechanisms behind different forms of cancer, and even more money is being pumped in to develop new medicines for treatment. Strangely though, extremely little is spent on exploring the reasons for the great increases and at the present time there are really only a few Swedish foundations, for example "Cancer-och Allergifonden" (The Cancer and Allergy Foundation) and "Hjälpfonden" (The Help Foundation), which are actively trying to investigate the basic causes.

Among these causes, increasing international attention is being focussed on our modern electronic equipments such as mobile telephones and TV/computer screens and their chemical and physical discharges, such as of flame retardants and electromagnetic radiation.

Very extensive national research programmes have been started in many countries, but not in Sweden.

For several years my colleague Örjan Hallberg and I have endeavoured to get research projects started on the causes of child cancer. At an early stage, child cancer came to be associated with the magnetic fields surrounding power lines and other similar installations. A discretionary policy has been established here in Sweden based on a magnetic field strength of 0.2 microtesla (μT) but this has not been made law. For children exposed to magnetic fields exceeding 0.4 μT the risk of cancer is doubled (mobile telephones: at least 1-10 μT :

in a commuter train: 10-100 μT). However, our ambitions have been rejected as unthinkable and as uninteresting because the current view has been that child cancer is not increasing. Now, however, a major review made within the EU has shown that this view is quite wrong; child cancer really is increasing!

Recently, Ann Charlotte Dreifaldt, at the University Hospital in Örebro, Sweden, has shown that it is in any case not breast-feeding which is the cause of the increase in child cancer.

Personally, I believe rather that a detailed study should be made on the various forms of child cancer (for example leukaemia, CNS tumours, sarcoma, lymphoma, neuroblastoma, Wilm's tumours, and so on) with regard to their correlation geographically and in time with the expansion of radio, television, mobile telephony and wireless broadband. In both England and France, strong recommendations have already been issued concerning the use by children and young persons of mobile telephones and hands-free equipment and major reductions in the limiting values. Since 1997, there has been a dramatic increase in the use of mobile telephones by children and young persons.

A study should also be made on the occurrence of tumours in the face and head in children since that time. Teenagers born between 1977 and 1978 show a five- or six-fold increase in nevi (birthmarks) compared with a comparable group of teenagers born 20 years earlier. Today, it is not uncommon for 10-year-olds to have facial nevi on both sides of their faces.

Earlier studies have shown that mobile telephone users, particularly young users, have a greater risk of suffering auditory nerve tumours. An increased risk for astrocytoma and meningioma has also been found. A clear relationship has, in addition, been found between radiowaves and adult cancer. Dr. Djemal Beniashvili and colleagues at the Edith Wolfson Medical Centre in Holon, Israel, have demonstrated a possible connection between magnetic fields at power-line frequency and breast cancer in elderly women. The increase was more than 100% and it was considered highly statistically significant. Naturally, these

reports, and others, need further confirmation before a final answer can be given. However, and this is the key point, no-one would actively turn their back on wisps of smoke coming from their place of work or their homes. Quite the reverse; they would call for the fire service! But the mental fire service, to which I myself belong, is given no resources; the smoke flows out in ever denser clouds but people just sit and watch.

Yurekli and colleagues have very recently published the work "GSM base station electromagnetic radiation and oxidative stress in rats." In this study, they investigated the effects of very low levels of mobile telephone radiation. As markers they used a number of different molecules as a measure of the oxidative stress in the rats. The exposure levels used were as low as 11.3 milliWatts/kg (we humans are supposed to stand 2 Watts/kg), which can be compared with the levels we are subjected to from base stations. When the animals were subjected to these low levels, clear and very disturbing signs of oxidative stress were seen in the animals and, very importantly, the observed increases can represent a risk for the development of certain types of leukaemia. Is this a risk you want?

Another study which has attracted great attention is that by Reif and co-workers, "Human responses to residential RF exposure." Here, increased numbers of certain white blood cells were observed in the blood of residents around an antenna park on the summit of Lookout Mountain in Colorado, USA. This study was started on the initiative of the American authority The National Institute of Environmental Health which commissioned Colorado State University to investigate the effects of weak, non-thermal (i.e. non-heating) long-term exposure from the radio and television masts within a radius of almost ten kilometres. This study followed from the extremely alarming results found by The Colorado Department of Public Health and the Environment in July 2004. They had found statistically significant increases in the numbers of persons with brain tumours living close to just this antenna park on the summit of Lookout Mountain. Do you also want a brain tumour?



Shall I continue? There are many, many more reports I could tell you about, and more of them appear every day. Or shall we instead turn to another important thing? It is a fact that we do not at the present time have any hygienic limiting values for weak, non-thermal long-term exposure from radio and television masts, or from mobile phone and WiFi base stations. The truth is that it has mistakenly been assumed that such exposure does not result in any stress on our cells and that there is therefore no risk. The recommendations (NB, not to be compared with legally established hygienic limiting values) which exist at present only concern acute heating effects caused, for example, by microwaves. And the persons behind these recommendations have themselves very close relationships with the industry which they are appointed to supervise and regulate. Are you surprised?

The Swedish Radiation Protection Authority (SSI) continues to maintain that studies on rats do not show any increased risk of cancer. This is in spite of the fact that epidemiology clearly shows that we require at least five years of exposure to develop such cancers; in other words studying rats, which can only be exposed for two years (they just do not live longer!), is not only unscientific, it is stupid. In view of the close relationship between the SSI and the telecom industry, I do not know which is worse: that they do not know better at SSI, or that really they do know better . . . ? Where they do make an entirely different evaluation of the risks is at the leading insurance companies which – for safety's sake – do not accept insurance for injuries caused by electromagnetic fields. So, consider yourself cheated!

At an early stage I took up the question as to whether there is any guarantee that it is wise

and safe to subject ourselves to whole-body radiation, 24 hours a day, wherever we are, with the same mobile radiation which has been shown in laboratory studies to cause serious injuries and effects. Also at an early stage, I urged responsible persons to think seriously about the full-scale experiment which is now in progress with us as the laboratory animals. Since then, many other persons have borrowed the forms of expression I had coined for use in their own articles and books and the waves of debate are now high throughout the world. Most recently, 31 researchers, in connection with a scientific conference in Italy, agreed together to raise a warning voice, *inter alia* regarding mobile telephony and the risks for childhood cancer (the Benevento Resolution of 19 September 2006). Furthermore, a very large number of studies have shown that mobile radiation affects the regional blood-flow in the brain, the brain EEG, short-term memory, the ability to concentrate, and also the duration and quality of dream-sleep - the portion of our sleep in which much of our normal recovery should take place. In addition, ecological studies point to the fact that in areas with poor mobile coverage, i.e. where the transmitter levels are high - such as in countrified areas, it is here that health is deteriorating most rapidly just at present. The fact that mobile radiation also causes direct injuries to our genetic material (i.e. breaks in the DNA molecule), amongst other places in the nerve cells of the brain, can only be seen as making the situation even more alarming. At the present time I do not know whether the radiation has damaged our immune defence or what is happening. On the other hand it is quite clear that something serious has happened and is happening. We can no longer ignore this fact and my colleagues and I have therefore repeatedly exhorted responsible

authorities and politicians to take action. Do not allow this question to become another long-drawn example of non-action – like the greenhouse effect; take action while there is still time! [The latest development has been that we were refused an opportunity to meet the former Swedish Minister of Health and Social Welfare, Morgan Johansson, on the grounds that he did not have time. I hope, and say silent prayers, that his successor has more time . . . and more courage? Our new prime minister in Sweden has said “. . . I will go looking for problems in our society . . . Everyone will feel that I am their prime minister, that I am prepared to listen . . .” (The newspaper Metro on 6 October 2006). But will he listen to me? Will he go looking for me?]

Truly independent research projects must be started immediately in order to ensure our public health! These projects and the research groups working with them must be completely free from all forms of commercial interests. Public health must not have a price tag! This is the clear responsibility of the elected bodies in every country! So – here in Sweden – all of you in the Party Alliance which has just come to power, appoint a minister who has sufficient courage – we have seen too many ostriches.

In the meantime, I consider – together with all the other scientists behind the Benevento Resolution – that children and young persons must be advised to abstain from using all these sources of radiation; there is too great a risk that they represent a very real danger!

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Autism: Pesticides on Farms May be a Trigger

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Children who are exposed to agricultural pesticides while developing in the womb are six times more likely to develop autism.

The first eight weeks after conception seem to be the most vulnerable time, and the risk increases dramatically if, during that time, their mothers were living close to farms that had used pesticides, and especially dicifol and endosulfan.

Researchers from the National Institutes of Environmental Health Sciences in the USA made the connection after they studied the records of 465 children with autism who were born between 1996 and 1998 in California.

On average, the risk increased six-fold, although this varied depending on the amount of pesticides used and the distance of the mother from the farm. Women who lived within a 500-metre radius of the farm were at greater risk.

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