

A presentation on Health hazards over use of mobile phones

Contents

1. Introduction

- 2. How do Cell Phone Towers work?
- **3.** What is the radiation produced by a cell phone?
- **4.** How are people exposed to the energy from cellular phone towers?
- **5.** Do cellular phone towers cause cancer?
- **6.** what CAN we do?
- 7. Precautions
- **8.** Conclusions



Health hazards over use of mobile phones



Introduction : Someone has rightly said: Everything in this world has its pros and cons. The same is

true for the Mobile Communication technology. Even Alexander GRAHAMBELL, who invented the first telephone, wouldn't have imagined in his wildest dreams that telephone technology would go this far!

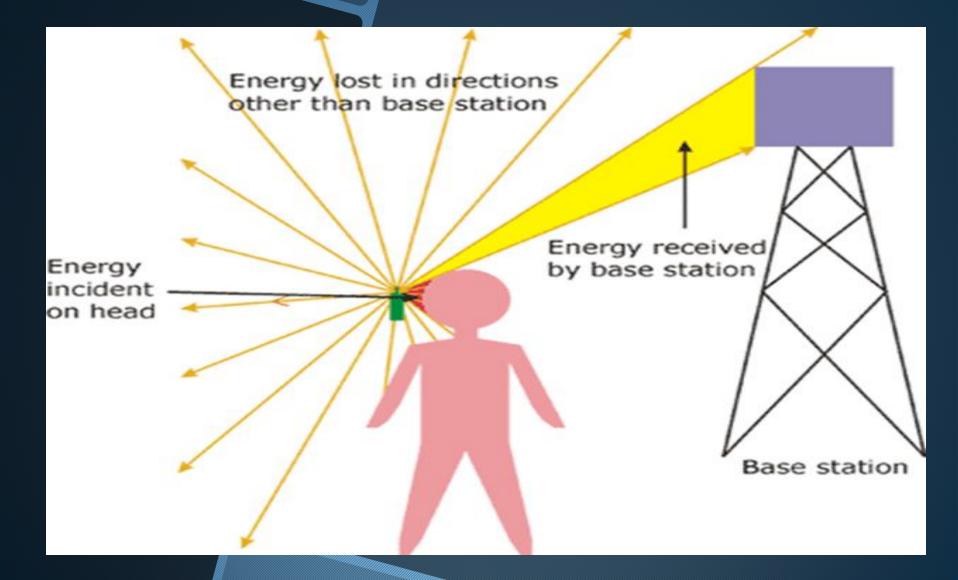
And here we are with a cell-phone in every hand making our lives simpler and easier to be in contact with whoever we desire. In the last report published by TRAI, there were 770 Million cell phone subscribers in India as on 31st Jan 2011! All the major subscribers are going berserk in an attempt to capture this burgeoning market and thereby we are witnessing a rapid increase in cell phone towers in every nook and corner in our cities.

The operators are, in reality, wielding a double-edged sword. In a bid to provide seamless services, they are installing these towers wherever required. However, in doing so, they are completely neglecting the adverse effects of cell phone radiations. The safety of cell phone towers has been a subject of extensive scientific debate for quite some time. There is a growing body of scientific evidence that the electromagnetic radiation they emit, even at low levels, is dangerous to human health

How do Cell Phone Towers work?

Let's discuss briefly how cell phone technology works: the cell-phone emits out signals to the tower for device recognition. The radiations come into the phone and are emitted out as well. Thus, the cell-phone users are exposed to a form of electromagnetic radiations called radio frequency energy, also known as RF from the give and take of signals between the cell phone and the tower

How Cell Phone Towers harms us



What is the radiation produced by a cell phone?

Like televisions, alarm systems, computers, and all other electrical devices, Cell phones (also called mobile phones) are radio devices that use Radiofrequency (RF) energy emit electromagnetic radiation. They operate at low power (less than 1 watt) by transmitting and receiving electromagnetic radiation in the radiofrequency (RF) end of the spectrum. Radiation which is called "ionizing" can be absorbed by tissue and break molecules apart, such as gamma rays and x-rays, are known to cause cancer. The concern is that the cell phone and it's antenna (the source of the radiation) are held close against the head) The damage to the DNA molecules is thought to be the cause. The radiation that a cell phone uses is also part of the same electromagnetic spectrum, but is not ionizing. For this reason, the US FDA can regulate these devices to ensure that the radiation doesn't pose a health hazard to users, but only once the existence of a public health hazard has been established. (See "It's Not a Food or **Medical Product, So Why FDA?'')**, **RF energy was mistakenly** thought to similarly cause cancer

How are people exposed to the energy from cellular phone towers?

How are people exposed to the energy from cellular phone towers?

Various researches have revealed that there are hazardous effects of living in close vicinity of cellphone tower radiations such as radiation effects, thermal effects, non-thermal effects, etc. Studies have shown that even at low levels of this radiation, there is evidence of damage to cell tissue and DNA, and it has been linked to brain tumors, suppressed immune function, depression, miscarriage, Alzheimer's disease, and numerous other serious illnesses. Children are at the greatest risk, due to their thinner skulls, and rapid rate of growth. Also at greater risk are the elderly, the frail and pregnant women

Do cellular phone towers cause cancer?

During the last 5 years of these researches it was found that those living within 400 meters of cell phone towers had a newly-diagnosed cancer rate three times higher than those who lived further away. Breast cancer topped the list, but cancers of the prostate, pancreas, bowel, skin melanoma, lung and blood cancer were all increased.

A cell-phone tower installed at the top of one of the hostels of Indian Institute of Technology, Bombay has been in news for a while. The tower has become a reason for the conflict between the students and the institute authorities. The students are against setting up of the tower over the tops of hostel fearing the adverse effects that it would have on their health. They are on to go the legal way for having the tower removed. Ironically, a IIT-Bombay professor seemed to support them and submitted a report on 'Cell Tower Radiations' to the Department of Telecommunications in December 2010 describing about the unfavorable effects of the cell-phone tower radiations not only over human beings but also on animals, birds and environment.

A view of tower in pitampura

Suvidha Kunj, H-4&5, Pitampura

what CAN we do?

The Telecommunications Act prevents citizens from opposing the towers based on concerns about RF emissions, but we can oppose them on numerous other valid grounds. There are still rights we and our local elected officials maintain, that allow us local control of the number, size and placement of cell towers, while still providing for adequate cell phone coverage. Numerous communities have called for moratoriums on tower construction, allowing them needed time to study the issue, and enact strict ordinances that require the industry to respect community desires, such as building the minimum towers necessary, in appropriate locations. During these moratoriums, communities are preparing non-industry biased studies of cell phone tower need, and creating cell tower Master Plans, to help protect the rights and health of citizens, while complying with the law.

At the end, it all boils down to the money that the cell phone companies pay to the owner of property where the cell tower is installed. We have to understand that these towers present a serious risk to everybody around them. Instead of thinking about short term monetary gains, we must think about long term health hazards as well. WHAT!? THERE'S A NEW STUDY SAYING RADIATION CAUSES BRAIN TUMORS, INFERTILITY, HEADACHES, NAUSEA, AND CANCER? BURY IT! BUSINESS IS BOOMING!!!

Sellular

Precautions:

1.First, use a headset or speakerphone mode. That moves the phone (and it's antenna) away from your head.

2.Second, consider reserving the use of mobile phones for shorter conversations or when a conventional phone is not available.

3.Third, the effects of cellular damage are greatest on growing, developing organisms (i.e., the young), so limit children's use of cell phones!

4.Finally, in a car, use an external antenna mounted outside the vehicle to move the source of the radiation farther from you!

Conclusions:

science does not support that the radiation may not be likely to cause cancer, time may prove differently! And in any case, it may cause some other type of damage (certainly accidents in cars from being distracted while fumbling with the phone!)