

Life Cycle of a Cell Phone

By: Joe Pomponi

Mohamed Al Ali

Mohammed Al Alawi

Son Sulee

Materials in a Cell Phone

- Rare earth metals are found within cell phones
- These include the elements in the lanthanide series of the periodic table
- Cell phones also include metals such as copper and silver
- The touchscreen of a cellphone is basically made of polyester and glass

Marketing of a Cell Phone

- Many commercials are played daily for different types of phones
- A huge competition to market what is the best phone
- Phones come out almost annually in order for a company to generate a profit

Packaging and Transporting of a Cell Phone

- Cell phones are transported in trucks
- These forms of transportation burn fossil fuels which in turn affect the environment
- Usually cell phones are packaged in cardboard boxes but sometimes they are packaged in plastic, which is hard to reuse

Sale of a Cell phone

- There are designated stores that sell cell phones exclusively
- Such as in malls there are cell phone stores
- The stores also offer contracts so if a phone breaks or is damaged it can be replaced with a new one

Consumer Use of a Cell Phone

- Almost everyone in the world owns a cell phone
- It is useful for everyday life, such as people can use it to call family members in emergency or family that is located across the world
- The need of a cell phone is for communicating with people and the want includes all of the games and apps on the phones

Why Cell Phones Aren't Good for the Environment

- Only about 1% of cell phones get recycled
- Since cell phones contain the rare earth metals, the mining process for those metals is dangerous and rids the world of them forever
- Cell phones have sound waves that can affect people and could cause hearing problems and diseases in extreme cases
- Crude oil is found within cell phones and oil is not a good thing for a sustainable future
- The batteries found within cell phones are difficult to recycle

Ways to make Cell Phones more Sustainable

- People should learn to recycle cell phones more often as they contain materials that cause damage to the environment
- To promote this idea, cell phone companies should advertise along with their phones that it can be recycled after it has lived its life. The companies should also include an incentive for recycling, possible some money off their next cell phone if they recycle their old one
- Encourage cell phone companies to use more materials that can be recycled instead of rare earth metals
- Since cell phones require a lot of manufacturing in factories, the factories need to find ways to avoid polluting as much as possible

Sources

- <http://www.pbs.org/wgbh/nova/next/physics/rare-earth-elements-in-cell-phones/>
- <http://www.epa.gov/osw/education/pdfs/life-cell.pdf>