LCA of Hysterectomies at Magee-Womens Hospital of UPMC



Study conducted by Thiel, Bilec, Landis, Woods, Eckelman, Sherman

Composition of Municipal Solid Waste from Hysterectomies



Environmental Impacts of Hysterectomies



Traditional Cotton Growing

- Organophosphates (bad for human central nervous system) used to kill all organisms
 - takes 5 years for earthworms to return to soil afterward
- Artificial fertilizers applied (to maintain soil stability)
- Cotton = 2.5% of cultivated land
 15% of chemical insecticides in agriculture
 10% of pesticides



From: The Responsible Company. Yvon Chouinard and Vincent Stanley (2012)

Target: Cotton



- Make sure they are laundered
- Work with suppliers to find alternatives
 - Organic cotton
 - Other fibers
 - Etc.

To learn how to conduct a Life Cycle Assessment, sign up for:

CEE 1209/2209: INTRODUCTION TO LIFE CYCLE ASSESSMENT (FALL SEMESTERS)



Back to

WHAT WE DID!

Material Selection affects

PRODUCTION OF THE PRODUCT



Does the product utilize wasted resources?

Does the product utilize renewable resources?



Material Selection affects

USE OF THE PRODUCT

How durable is the product? Can people reuse it?





Material Selection affects

DISPOSAL (EOL) OF THE PRODUCT



Is the product easy to recycle or reuse at the end of its life?





How will people dispose of it?

What can we do differently? (as engineers)



Function

Focus on Function First

KICKSTARTER

Silic : A shirt that cleans itself.



Self Cleaning Clothing With Hydrophobic Nanotechnology. Ultra Soft, Breathable Fabric That Stops Stains From Sweat And Drink



Created by Aamir Patel



4,039 backers pledged \$298,251 to help bring this project to life.

LC Thinking Exercise: Critical Viewing

