

## **“The Promise and Peril of Permaculture” Video Notes**

- Permaculture = “nexus of nexi”
  - Beneficial design approach that encompasses agriculture, architecture, ecology, economics, land access, community issues- all connections between systems
  - Aim self-sufficiency in not only food but beyond – livelihoods
- Permaculture Design Certificate (PDC)
- Peril of permaculture affects those interests (corporate agriculture, utility companies, pharmaceutical companies...) that suffer from the benefits people & communities could enjoy. These perils are typically financial but ultimately, without practicing permaculture, everyone suffers in the long run.
- “best business decision is the same as the best ecological decision” – from INHABIT video

## **Reading Notes**

### Permaculture: A Designer’s Manual

- Cooperation is required for common survival therefore the author argues authority should be rejected because personal responsibility is key
- Destructive systems (including consumerism & overconsumption) are “investments in our own annihilation” – the opposite of permaculture is extinction
- Beneficial design aimed at self-reliance and energy consumption or energy generation
- Basic “law of return” – cannot simply take from resources without putting something back = imbalance in a system
- Design Principle #2: The Problem is the Solution
  - These are perspectives- does the designer want to acknowledge the benefits and potentials? Or only perceive conditions as problems?

## **Notes from daily observations**

- Personal responsibility over authority concept relates to regulation concept in Cradle to Cradle book
  - Regulation is another mechanism to allow pollution/ destruction at a controlled & monitored rate but does not necessarily solve ecological concerns
  - This is a concern I have long thought about as I work in an environmental regulatory agency
- A colleague of mine said "there are no weeds, only misplaced plants." This fits quite well when describing beneficial design in permaculture. Thinking back on McDonough & Braungart's Cradle to Cradle, design is the result of intention. Intentionally encouraging "weed" growth to advance self-sufficiency and energy consumption/ production might push us to transition away from the undesirable connotation of the word "weed."
- Related to Design Principle #2- I see this constantly with shoreline stabilization! Waterfront owners perceive vegetated riverbanks or shorelines as problems and wish to “protect” the uplands with rock or bulkheads after clearing the vegetation. There are so many benefits to vegetated shorelines, including stabilization, but people developing these sites (the designers) incorrectly perceive natural banks as problems.



## LIVING SHORELINES SUPPORT RESILIENT COMMUNITIES

Living shorelines use plants or other natural elements—sometimes in combination with harder shoreline structures—to stabilize estuarine coasts, bays, and tributaries.



**One square mile** of salt marsh stores the carbon equivalent of **76,000 gal of gas** annually.



Marshes trap sediments from tidal waters, allowing them to **grow in elevation** as sea level rises.



Living shorelines improve **water quality**, provide fisheries **habitat**, increase **biodiversity**, and promote **recreation**.



Marshes and oyster reefs act as natural **barriers** to waves. **15 ft** of marsh can **absorb 50%** of incoming wave energy.



Living shorelines are **more resilient** against storms than bulkheads.



**33%** of shorelines in the U.S. will be **hardened** by **2100**, decreasing fisheries habitat and biodiversity.



Hard shoreline structures like **bulkheads** prevent natural marsh migration and may create seaward **erosion**.



The National Centers for Coastal Ocean Science | [coastalscience.noaa.gov](http://coastalscience.noaa.gov)

Some graphics courtesy of the Integration and Application Network, University of Maryland Center for Environmental Science ([iain.umces.edu/symbols/](http://iain.umces.edu/symbols/))