





7. Nuclear :

a) Where does plutonium come from?

b) What about plutonium presents the greatest proliferation risk?

c) What are delay neutrons?

d) How do delay neutrons facilitate nuclear electricity?

e) What problem arises due to delay neutrons?

8. When we start running out of oil, how will the changes that take place affect the availability of petroleum and environmental impact of oil extraction?

9. The Cal Energy Crisis:

a) What created the Cal energy crisis? Feel free to refer to PURPA, Deregulation, AB 1890, Grey Davis.

b) Explain how a smart grid increases price elasticity and might have mitigated the crises.

10. What's the difference between a perpetual motion machine of the 1<sup>st</sup> kind and a perpetual motion machine of the 2<sup>nd</sup> kind? For each, please draw an energy flow diagram.