

FRAMEWORKS AND MODELS IN ENGINEERING SYSTEMS ENGINEERING SYSTEMS DESIGN (ESD.04J / 1.041J)

SPRING 2007

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ASSIGNMENT A2:

Date assigned: February 8, 2007

Date due: February 15, 2007

Value: 5 points

In class we have introduced the idea of systems and related concepts. For this assignment, we ask you to describe a particular system and to use that system as a way of further developing your systems thinking skills.

The system you select should be “large”, have important technical content, and should relate to an important societal issue. We characterize those systems as socio-technical and the issues as Critical Contemporary Issues (CCI).

Issues relating to the behavior of such systems are reported in the media every day. For this assignment we ask you to get a current article from some news source concerned with the system of interest to you. Then, we ask you to describe this system, explaining what issues relating to your system make it newsworthy, and any complexity or uncertainties inherent in your system of interest—it is virtually guaranteed that any interesting system you select will have a good deal of complexity and uncertainty. You will want to discuss how your system relates to its “relevant environment” and identify key issues relating to its performance.

After you have identified the system you are interested in from current news sources, you may want to seek additional sources to enhance your understanding and the issues that make it of current interest, thus making your answer more substantive. Please cite those sources.

To help calibrate you on the level of detail we are looking for, please limit your response to three pages (not including the list of sources). Please attach the original article with your submission.