De George’s Criteria for Whistleblowing

Permissible:
1. Harm that will be done is “serious and considerable”
2. Concern reported to immediate superiors
3. Exhaust organizational channels available. If #2 unsatisfactory.

Obligatory:
4. Documented evidence that would convince an impartial observer that the organization is wrong.
5. Strong evidence that making the information public will prevent the harm.

Review for Final Exam
1. Ethical Methodology
2. Engineering Registration
   P.E. Process
   Texas Code -
   Board’s Power -
   Define and apply “practice of engineering”
   Determine who needs the P.E.

3. Honesty
   Types of misusing the truth
   Trimming and cooking
   Confidentiality and its misuse
   Expert witnessing
   Conflicts of interest

4. Environment
   Global warming
   Anthropocentric vs Non-anthropocentric
   Three Types of Firms
   Criteria for Cleaning
   Scope of engineering obligations to the environment

5. Dr. Hann’s Lecture on the Environment
   National Environmental Policy Act (1970)
   (Environmental Impact Statements)
   Valdez Principles
   Protection of biosphere
   Sustainability
   Reduction and proper disposal of waste
6. Safety, Risk, and Liability

Risk definition
(probability x consequences)
Risk expert (utilitarian)
Lay Public (RP)
Gov. regulator (reduce false negatives)

Standards of Proof
- 95%
Criminal Law - beyond reasonable doubt
Tort Law - 51%
Fault Tree - from fault to cause
Event Trees - from event to effects
Normalizing Deviance (short time)
Tight Coupling (unanticipated)
Complex Interaction

7. Computer Ethics

Definitions
Intellectual property and computer programs - patent or copyright?
Privacy and social utility - CMW’s
Computer Crime
Therac 25 and individual and corporate responsibility. Major: AECL
Computer Code

8. Engineers and Employees

Employment at will and public-policy exception
3 cases
PED’s and PMD’s
Hitachi Study
Critical/Uncritical Loyalty
De George’s Criteria


Relativism, absolutism, laxism, rigorism
CT Norms
Exploitation, paternalism, positivism vs. negative rights, CT norms can conflict with each other and local norms
Norms may be violated or infringed
Briber, extortion, grease payments, gifts

10. Mr. Chandler’s Lecture

Consider only job-related factors
Establish fair processes for making personnel decisions and follow them
Document your decisions
Affirmative action - attempt to make the results of personnel decisions look like the feeder group
11. Engineering Professionalism

Voluntary engineering societies

* Umbrella organization
  NSPE
* Major decisions
* Specialized societies
* Mandirosian case

Enforcing Ethics

* ABET
* State Boards
* NCEES
* EOA