Professional Ethics

- Golden Rule: "Do to others as you would have them to you." - Jesus Christ

- Morals: one's own sense of what is right & wrong
- Ethics: standard's of right & wrong that are devised by organization

- Professional Ethics: standards used to guide professionals' conduct at all times
  - individual citizens do not have the resources to understand the consequences of the actions of engineers
  - cannot provide guidance for morally questionable technologies (Ex: Nukes)

- Engineering Design Process is Utilitarian — find best solution amongst alternative choices
- Code of Ethics is Rule-Based

- Self-Regulation is permissable by law (i.e. Professional Governance Act)
  - Practice of Professional Engineering: advice or services that are based on engineering or ancillary to engineering
  - Professional Engineer: one who is registered as a P.Eng. with the regulatory body
  - Engineer-in-Training: one who holds an accredited degree of engineering while working towards obtaining a P.Eng. designation

  - One cannot assume responsibility of work without P.Eng.

- EGBC Code — Principle 1: hold paramount the safety, health and welfare of the public including the protection of the environment and the promotion of health and safety in the workplace
  - "Public" should be interpreted as people with relative innocence, helplessness, or passivity
    - in the context of engineering; those whose lack of information or time for deliberation renders them vulnerable to the powers an engineer wields

- Conflict of Interest
  - a person in a position of trust has competing professional and personal interests

  - Actual: present circumstance is CoI
  - Potential: present circumstance may soon result in CoI due to converging interests
  - Apparent: outside party perceives present circumstance as CoI

  - Automatic Mental Processes
    - "inbuilt" biases towards certain things will make conflicts of interest inevitable

  - one who is in a CoI must attempt to avoid, recuse, and disclose situation to stakeholders

Whistleblowing

- disclosure of information to stop/hinder damage to public
- usually done when regular channels of correction (i.e. management) have failed
- Duty to Report in EGBC Code of Ethics
  - applies to situations in a regulated practice
- EGBC & Engineers Canada have whistleblower insurance

Contract Law

- Formation requires 3 Components:

  1. one makes an offer with intention of forming contract
  2. another accepts offer
  3. offer & acceptance include some exchange of benefit

- Acts of God
  - when contract becomes impossible to fulfill, parties may be exempt from contract

Tort Law

- restoration and compensation for breach of civil duty owed to another party
- Elements of Tort

  1. Breach of established common law duty
  2. Intent
  3. Harm/Loss/Damage

Professional Negligence

- Requirements
  1. Duty of Care to those contracted with, and those in harms way
  2. Breach of Duty: must exercise skill and care of a reasonable & prudent P.Eng
- Negligent Misrepresentation: fraudulent direction resulting in damage
- Limit Liability
  - Exclusion Clauses
  - Limitation of Liability Clauses
  - Disclaimers in reports
  - Professional Liability Insurance

Employment Law

- Sources
  - Legislation
    - Federal organizations: Canada Labour Code
    - Private enterprises: BC Employment Standards Act & Regulations
      - determines minimum wage, vacation, holidays, etc.

- Occupational Hazard
  - Workers have 3 fundamental rights:
    1. Right to Participate
    2. Right to Know
    3. Right to Refuse Unsafe Work

- Employment Termination

  - Without Cause: employer must give minimum notice
  - With Cause: no notice required
  - resignation requires 2 week notice

  - Constructive Dismissal: poor employer conducts resulting in employee objection

  - Non-Competition: cannot obtain business from clients of former employer

Business Organization

- 3 Business Types

  1. Sole Proprietorship: sole owner responsible & liable for all obligations
  2. Partnership: non-incorporated where partners are responsible & liable for all obligations
  3. Corporation: incorporated where shareholders are not liable for obligations

IP Law

- Copyright: exclusive right to reproduce or distribute the work
  - protects expression of idea
  - 50 years plus life of author
- Patents: right to exclude others from making using and selling an invention
  - protects fundamental aspects
  - 20 years

- Trademarks: word/symbol/design used as an identifier of business
  - choose a distinct trademark for market distinction