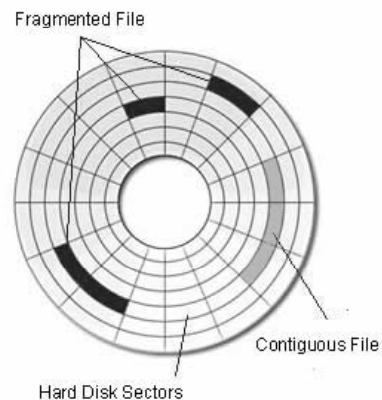


# Data Security and Digital Crime

Dannelly's CSCI 101 Sections  
Week Six

## How Data is Stored on Disks

- 1s and 0s
- Sectors
- Directory
  - file deletion
- Disk Fragmentation
- File Compression



<http://www.detroit.com/rmf/data-recovery-how-to.html>

## "Permanent" Storage Media

- Computer Hard Drive
- Optical Disks
  - CD
  - DVD
- Tape Backup System
- Solid State Drive
  - Flash Drives
  - Solid State Hard Drives

## Harmful Software

- **Virus**
  - usually destroys files
- **Worm**
  - objective: destroy the network, not your PC
- **Trojan Horse**
  - a virus that arrives inside something else
- **Spyware**
  - runs on your computer and steals information

## Protection

- **Anti-Virus Software**
  - looks for known viruses and common virus formats
- **Firewalls**
  - prohibits unauthorized external access
- **Use good Passwords**

## Computer Crime

- **Types of Computer Crime**
  - Making and Spreading Viruses
  - Stealing Corporate Data
  - Destroying Corporate Data
  - Denial of Service Attack
    - you can shut down cnn.com by quickly hitting it with thousands of bogus requests
- **Most corporate computer crime is done by employees**