

## Searching the WWW

*Locating the right information on the WWW requires effort*

© 2004 Lawrence Snyder




## Looking In the Right Place

Google is not the first place to look

- Go directly to a site -- [www.irs.gov](http://www.irs.gov)
- Guessing a site's URL is often very easy, making it a fast way to find information
- Go to right site -- [dictionary.cambridge.org](http://dictionary.cambridge.org)
- Go to the library -- [www.lib.washington.edu](http://www.lib.washington.edu)
- Go for the kind of information you want -- [www.npr.org](http://www.npr.org)

Ask, "What site provides this information?"




## Search Engines

No one controls what's published on the WWW ... it is totally decentralized


To find out, *search engines crawl* Web

- \* Two parts
  - *Crawler* visits Web pages building an *index* of the content (stored in a database)
  - Query processor checks user requests against the index, reports on known pages


Only a fraction of the Web's content is crawled



## Google Advanced



The screenshot shows the Google Advanced Search interface with various filters like Language, File Format, Date, Occurrences, and Domains.



## Boolean Queries

Search Engine words are independent


Search for ►

- \* Words don't have to occur together
- To be explicit about occurrences use Boolean queries and quotes
- \* Logical Operators: AND, OR, NOT
  - monet AND water AND lilies
  - "van gogh" OR gauguin
  - vermeer AND girl AND NOT pearl



## Demonstration


- Google Images
  - \* monet AND water AND lilies
  - \* "van gogh" OR gauguin
  - \* vermeer AND girl AND NOT pearl



## Queries


Searching strategies ...

- \* Limit by top level domains or format
- \* Find terms most specific to topic
- \* Look elsewhere for key words, e.g. bio
- \* Use exact phrase only when universal
- \* If too many hits, re-query
- \* "Search within results" using "-"



## Queries


- Once found, ask if site is best source
  - \* How authoritative is it?
  - \* Can you believe it?
  - \* How crucial is it that the information be true?
    - Cancer cure for Gramma
    - Hikes around Seattle




## Truth on the Web

- Much Web information is wrong
- Using the Web effectively means recognizing quality information
  - Information from reliable organizations is usually preferred -- check out ownership
  - Look for accuracy, currency, ...
  - Follow links to verify that the content supports the original page


**Best: Locate independent verification**



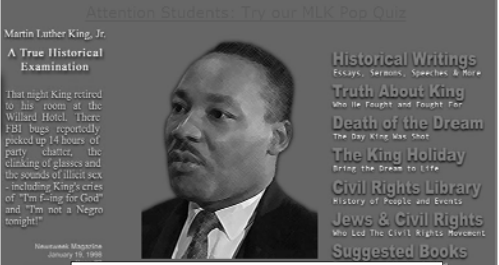
## A Bogus Site




<http://www.burmesemountaindog.org/>




## A Bogus Site



<http://www.MartinLutherKing.org>



## True Site, Bogus Implication




<http://www.dhmo.org>




## April Fool's Prank Site


"The US National Institutes of Health is to crack down on scientists 'brain doping' with performance-enhancing drugs such as Provigil and Ritalin, a press release declared last week. The release, brainchild of evolutionary biologist Jonathan Eisen of the University of California, Davis, turned out to be an April Fools' prank. And the World Anti-Brain Doping Authority website that it linked to was likewise fake."  
*—Nature magazine*



## April Fool's Prank site




[http://wabda.org/Home\\_Page.html](http://wabda.org/Home_Page.html)



## Unit I Project


Create a bogus (fictitious) Web page  
 To appreciate how easy it is to fake "quality" info you will build a bogus Web page

- Modify photograph, changing its meaning
- Write misleading text
- Add "authenticity" links, fake credentials ...



## Unit I Project

- \* Your page should look as legitimate as possible, but contain false information
- \* A site visitor should start out believing your site, but by the time they finish reading, they should realize that it's a hoax
- \* Forget subtlety!



## Turn In Steps

- Publish your page by uploading to the Web server
- copy your Project1A files into a Project1B folder
- Submit your Word or .txt with project URL in Catalyst Collect It
- Do not touch anything in your 1A folder after the deadline

\* So the TAs can grade it We will check the timestamps