Hyperlink Design & Architecture

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Introduction & Approach

Background
- 3rd Topic *Link Design and Architecture*
- Rosenfeld Ch 6 on Labels; FaceBook Fun
- "He said true things, but called them by wrong names."

Methodology
- Definitions, Origins, and Theory
- Quick History of Hypertext/Hypermedia
- Rules for Authors
- Putting Theory into Practice
- Information Scent
- Search Engine Optimization
Definitions

What is a Hyperlink?
- A segment of text or a graphical item that serves as a cross-reference between parts of a hypertext document or between files or hypertext documents.
- The area from which the hyperlink can be activated is called its anchor; its target is what the link points to, which could be any number of destinations.

What is Hypertext?
- A linkage between related information. Hypertext is the foundation of the World Wide Web, enabling users to click on a link to obtain more information on a subsequent page or from a Web site anywhere in the world.
- Umbrella term for all links, whether appearing as text (word, phrase or sentence) or as an icon or other graphical element.
- The terms "hypertext," "hyperlink" and "link" are used synonymously.
Further Defined

Norman – 1988 “the next step in writing technology is already visible on the horizon: hypertext”

- It can’t be explained, has to be experienced
- “hyper” is a higher-level text that comments on and expands the main text, allowing reader freedom to explore or ignore the material as interests dictate
- Can’t assume linear reading, as exemplified in bound materials like books, magazines, comics

Reinforces IA as a critical component of User Experience
Origins

- Hypertext invented by Ted Nelson in early 60’s, although can be traced back to Vannevar Bush’s *Atlantic Monthly* article “As we may think” in 1945

- Project Xanadu – not ELO soundtrack or ONJ movie
  - Never really took off; did inspire many others
  - Current WWW falls short of Nelson’s vision
Hypertext Theory

- “...the Web is a linking medium and we know from hypertext theory that writing for interlinked information spaces is different than writing linear flows of text.

- George Landow, a Professor of English literature, coined the phrases *rhetoric of departure* and *rhetoric of arrival* to indicate the need for both ends of the link to give users some understanding of where they can go as well as why the arrival page is of relevance to them.”

- 1992 – Landow wrote *Hypertext: The convergence of contemporary critical theory and technology*
The Rhetoric of Hypermedia

- Landow co-authored *Hypermedia and Literary Studies* with Paul Delany in 1994
- One article, *The Rhetoric of Hypermedia: Some Rules for Authors*, begins with three related questions hypermedia authors must confront:
  - “What must they do to orient readers and help them read efficiently and with pleasure?
  - Navigation information to make one’s way
  - How can they inform those reading a document where the links in that document lead?
  - Exit or Departure information
  - How can they assist readers who have just entered a new document feel at home there?”
  - Arrival or Entrance information
The Medium is the Message

- At the core of Hypertext and Hypermedia is the assumption that linked text is in fact useful, interesting, and significant
  - Greatest challenge lies within author’s interpretation at BOTH ends of the hyperlink
  - High risk of annoying and irritating reader if links do not act this way

- “Because links play such a primary role in hypertext, they influence the content they convey and thus exemplify the principle that the medium is the message”
Rules for Authors

1. The very existence of links conditions the reader to expect purposeful, important relationships between linked materials.

2. The emphasis upon linking materials stimulates and encourages habits of relational thinking in the reader.

3. Since the reader is predisposed to expect such significant relationships among documents, those that disappoint appear particularly incoherent and insignificant.

4. The author must provide devices that stimulate the reader to think and explore.

5. The author must employ stylistic devices that permit readers to navigate materials easily and enjoyably.
Rules for Authors

6. Devices of orientation permit readers (a) to determine their present location, (b) to have some idea of that location’s relation to other materials, (c) to return to their starting point, and (d) to explore materials not directly linked to the current document.

7. Avoid linking to words/phrases that only provide appropriate points of arrival but give no suggestion of where the link might lead on departure.

8. Place the link in close proximity to a text that indicates the probable nature of the link destination.

9. When creating documents, assist readers by phrasing statements or posing questions that provide obvious occasions for following links.

10. Linked graphic materials must appear with appended texts that enable the user to establish a relationship between a point of departure and that of arrival.
Putting Theory into Practice
Jakob Nielsen’s “Alertbox” Series
Guidelines for Visualizing Links

- With few exceptions, textual links should be colored and underlined to achieve the best perceived affordance of clickability.

- Following these guidelines for web site or application design will make it easier for users to immediately determine what links they can click, reducing the probability that they’ll overlook important links.

Use Old Words When Writing for Findability

- Familiar words spring to mind when users create their search queries. If your writing favors made-up terms over legacy words, users won't find your site.

- "Speak the user's language" has been a primary usability guideline for more than 20 years. The fact that the Web is a linguistic environment further increases the importance of using the right vocabulary.

- Search is how people discover new websites and find individual pages within websites and intranets. Unless you're listed on the first search engine results page (SERP), you might as well not exist. So, the first duty of writing for the Web is to **write to be found**.

- If pressured to use fancy words, leverage Controlled Vocabularies and Metadata to supplement Hyperlink Topology
(n): The extent to which users can predict what they will find if they pursue a certain path through a website. The term is part of information foraging theory, which explains how users interact with systems using the analogy of animals hunting for food.

Informavores will keep clicking as long as they sense (to mix metaphors) that they're "getting warmer" -- the scent must keep getting stronger and stronger, or people give up. Progress must seem rapid enough to be worth the predicted effort required to reach the destination.

Ensure that links and category descriptions explicitly describe what users will find at the destination. Faced with several navigation options, it's best if users can clearly identify the trail to the prey and see that other trails are devoid of anything edible.

The two main strategies are to make your content look like a nutritious meal and signal that it's an easy catch. These strategies must be used in combination: users will leave if the content is good but hard to find, or if it's easy to find but offers only empty calories.

Dual strategy is the reason behind showcasing sample content on the homepage (appear nutritious) and prominently display navigation and search features (demonstrate that users can easily find what they're looking for).
Information Foraging

- The content of pages associated with these links is usually presented to the user by some snippets of text or graphic. Foragers use these proximal cues (snippets; graphics) to assess the distal content (page at the other end of the link).

- Information scent is the imperfect, subjective, perception of the value, cost, or access path of information sources obtained from proximal cues, such as Web links, or icons representing the content sources.
Google SEO Starter Guide

1. Create unique, accurate page titles
   - Create unique title tags for each page

2. Make use of the "description" meta tag
   - Accurately summarize the page's content

3. Improve the structure of your URLs
   - Use words in URLs

4. Make your site easier to navigate
   - Use mostly text for navigation

5. Offer quality content and services
   - Create content primarily for your users, not search engines

6. Write better anchor text
   - Write descriptive and concise text

7. Use heading tags appropriately
   - Imagine you're writing an outline

8. Optimize your use of images
   - Use brief, but descriptive filenames and alt text
   - Supply alt text when using images as links
   - Imagine you're writing anchor text for a text link
Morville’s Ambient Findability

“Findability requires definition, distinction, difference. In physical environments, size, shape, color, and location set objects apart. In the digital realm, we rely heavily on words. Words as labels. Words as links. Keywords.

While the Web’s architecture rests on a solid foundation of code, its usefulness depends on the slippery slope of semantics. It’s all about words.

Imprecise and undependable, their meaning shifts with context...the challenges of communication are part of the human condition, unsusceptible to the eager advances of technology.”

Smart agents, the semantic web, artificial intelligence - the web still needs humans to create/share/label data before the machines can leverage on our behalf. Starts and ends with/ being human.
Conclusion

We *HEART* Hypertext!

“What I’m trying to say, Mary, is that I want your site to be linked to my site.”

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FaceBook Album Cover

He said true things,
but called them by wrong names.

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