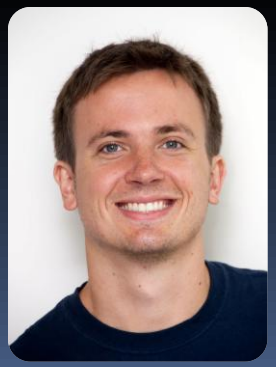
DAN GARCIA
UC Berkeley

NSDL

ANNUAL MEETING

Social Computing in the Ensemble Pathway

LUKE SEGARS
UC Berkeley



PETER BRUSILOVSKY
University of Pittsburgh

ensemble

Ensemble Computing Pathway

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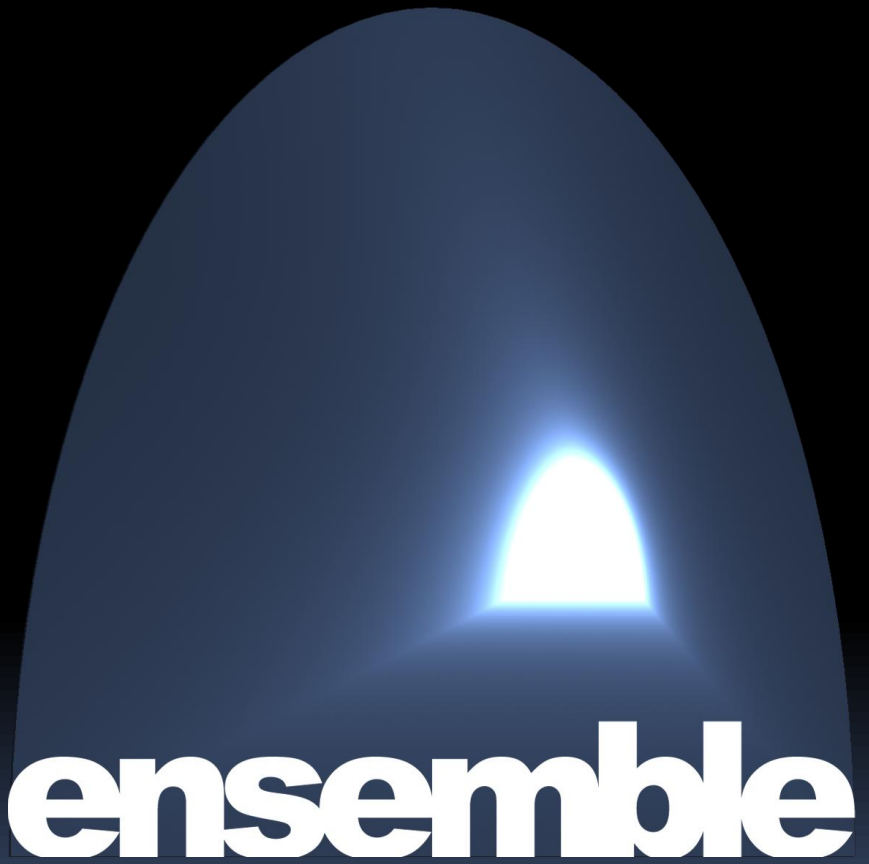
- Goal: a unifying site for the computing education community
- Team Effort!
  - UC Berkeley, Villanova, Virginia Tech, Portland State, Texas A&M, University of Pittsburgh
- Features
  - Content
  - Tools
  - Communities



Ensemble Communities

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- Support for groups doing shared work
  - Content uploading
  - Commenting
  - Rating
  - Tagging
  - Forums
  - …
- A meeting and work place independent of parent organizations

Social Computing

User Participation

"How can we encourage & reward users to help us build and sustain a great site?"

Social Navigation

"How can we display what users have done to help navigate a great site?"

Social Computing : Luke

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User Participation

"How can we
encourage & reward
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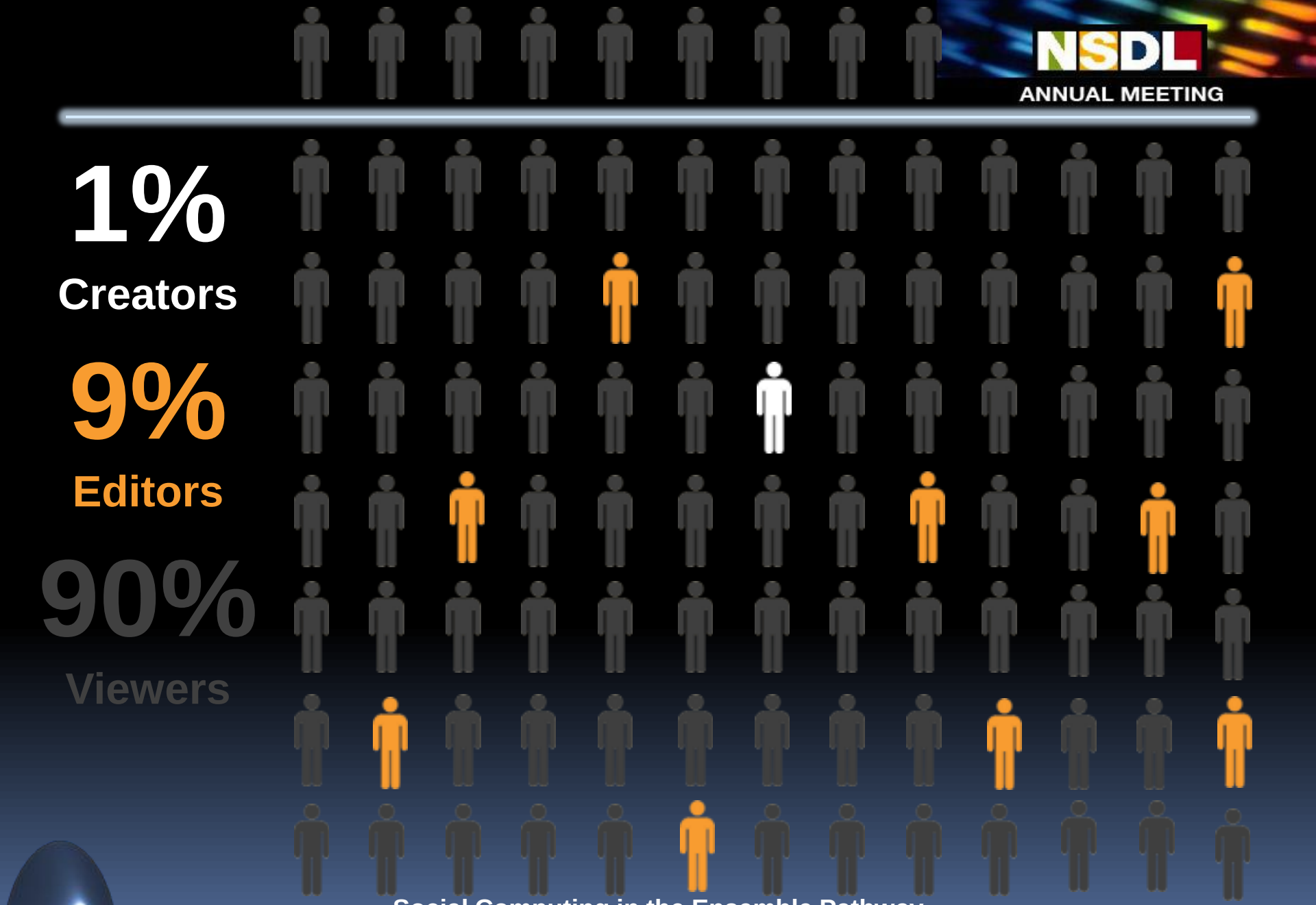
Wow.


1%
Creators
9%
Editors
90%
Viewers

Badges

As you use Stack Overflow to ask and answer questions, you'll earn badges, which appear on your u
and in your user card.

Altruist × 201	First bounty you manually awarded on another person's question
Announcer × 57	Shared a link to a question that was visited by 25 unique IP addresses
Autobiographer × 35259	Completed all user profile fields
Benefactor × 3974	First bounty you manually awarded on your own question
Beta × 2586	Actively participated in the Stack Overflow private beta
Booster × 8	Shared a link to a question that was visited by 300 unique IP addresse
Citizen Patrol × 7386	First flagged post
Civic Duty × 6004	ed 300 or more times
Cleanup × 4811	First rollback

D - Z

ASPEN YOUTH EXPERIENCE
Sarah Sanderson
Senior Vice President
Promo-Wholesale.com

Creator

15 pts		Leave 20 comments on other people's work.
10 pts		View 100 different pieces of content.
5 pts		Author of the Month
4 pts		Group Builder
2 pts		Event Planner

more activities

Positive actions earn **badges**

Badges accumulate into **roles**

Roles progress through **ranks**

We'd love feedback!

lukes@eecs.berkeley.edu

Social Computing : Peter

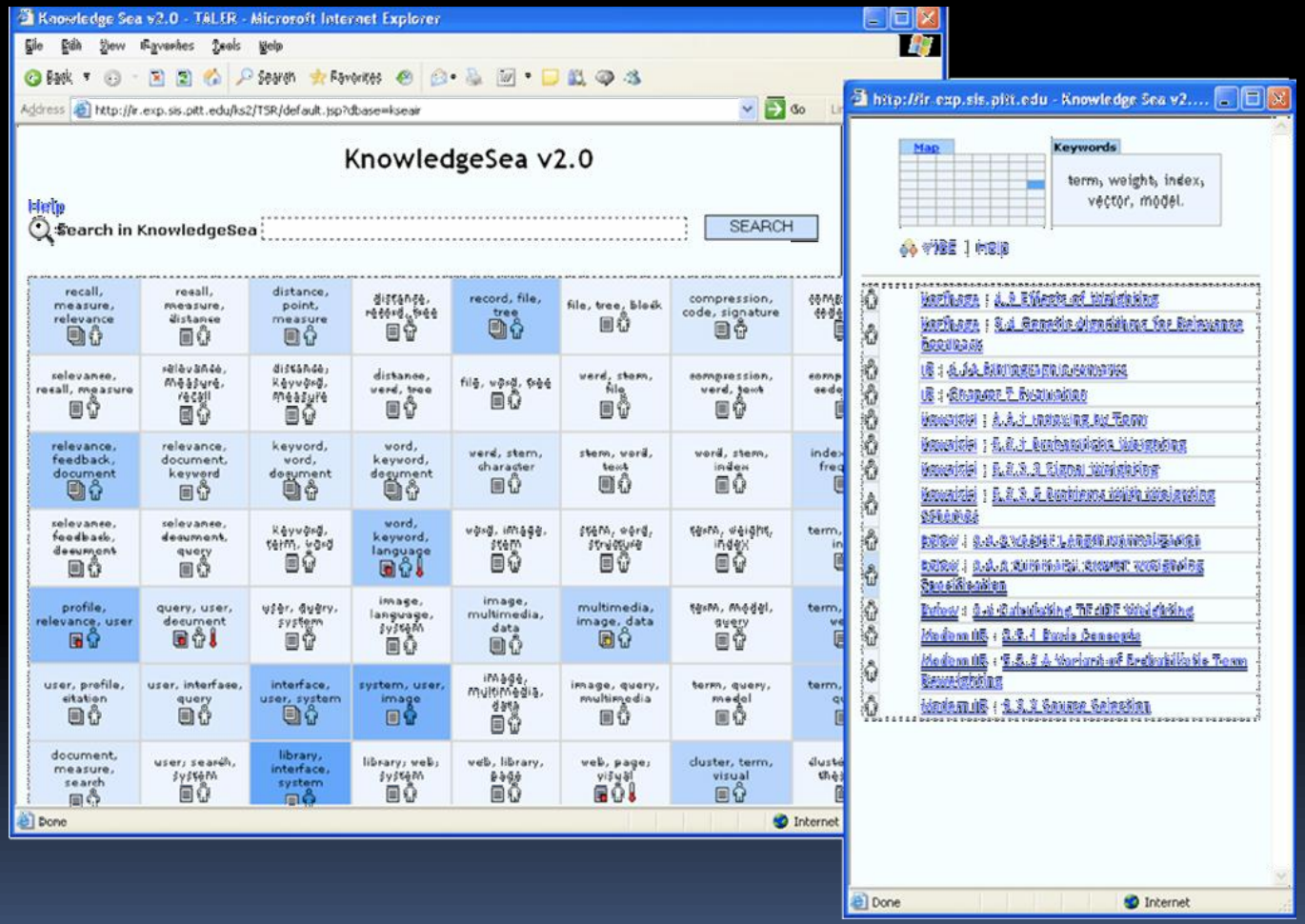
Social Navigation

"How can we display
what users have done
to help
navigate
a great site?"

A Social Place

- An academic library is a social place
- Where people go?
- Which are currently read books?
- Which books are checked out often?
- Which pages are important?
- Which books would suite my interests?

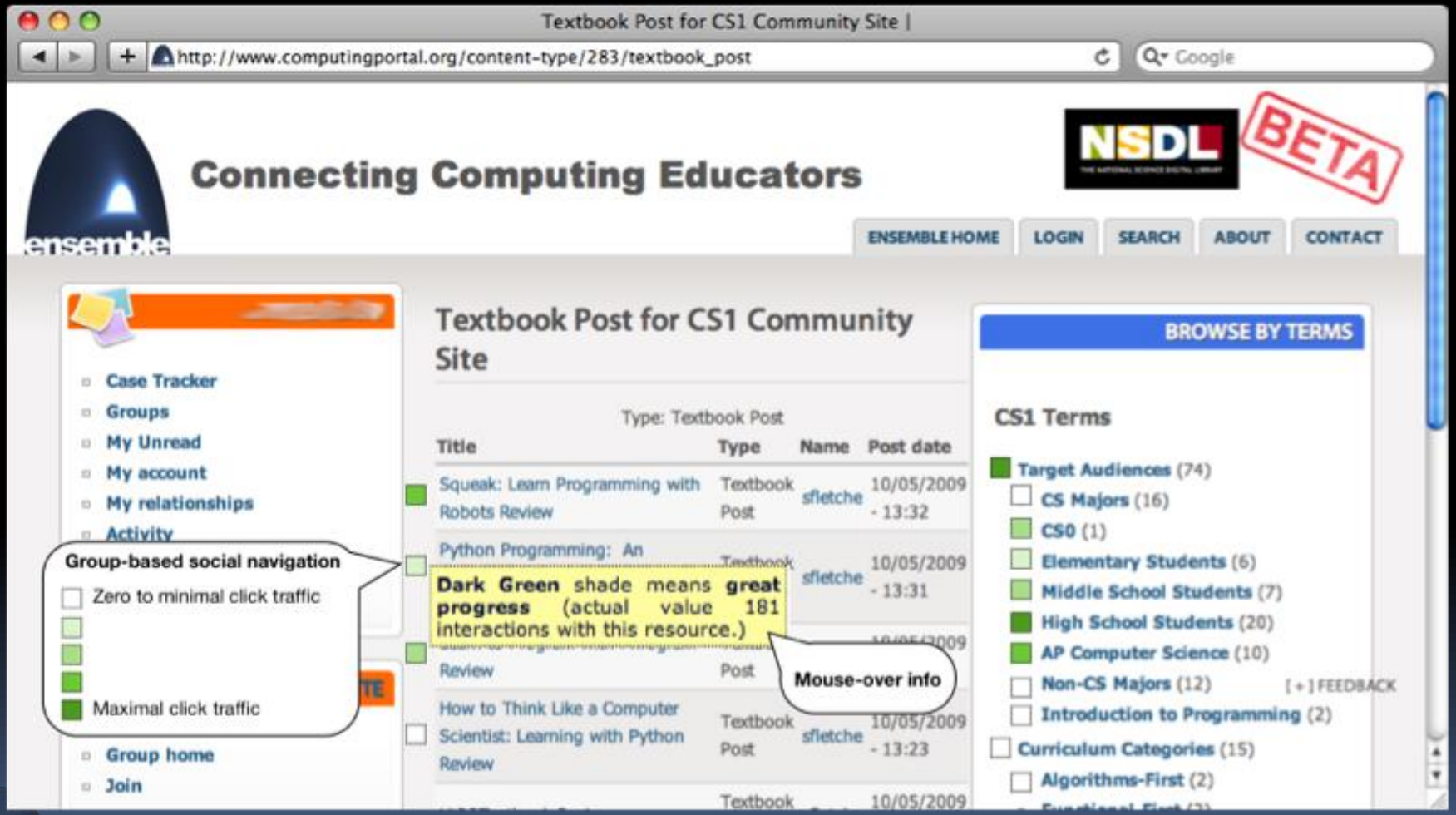
Social Navigation in Information Space



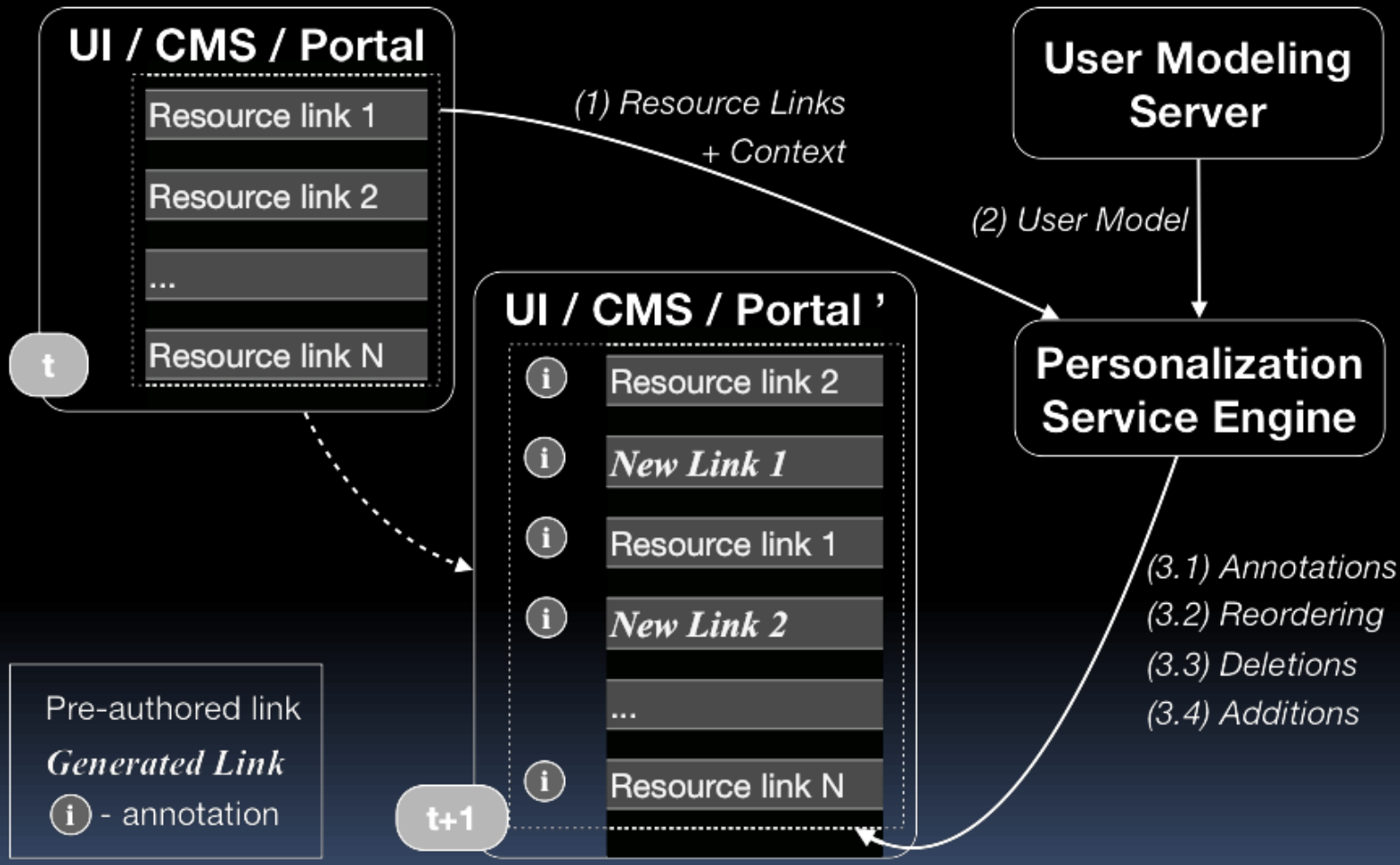
Social Information Access Techniques

- Supporting social navigation requires gathering, processing, and applying information about user activity
- Three aspects
- which kind of past user behavior it collects
- how these traces are processed to form "community wisdom"
- how this wisdom is used to help DL users
- how the information is used to enhance the user experience

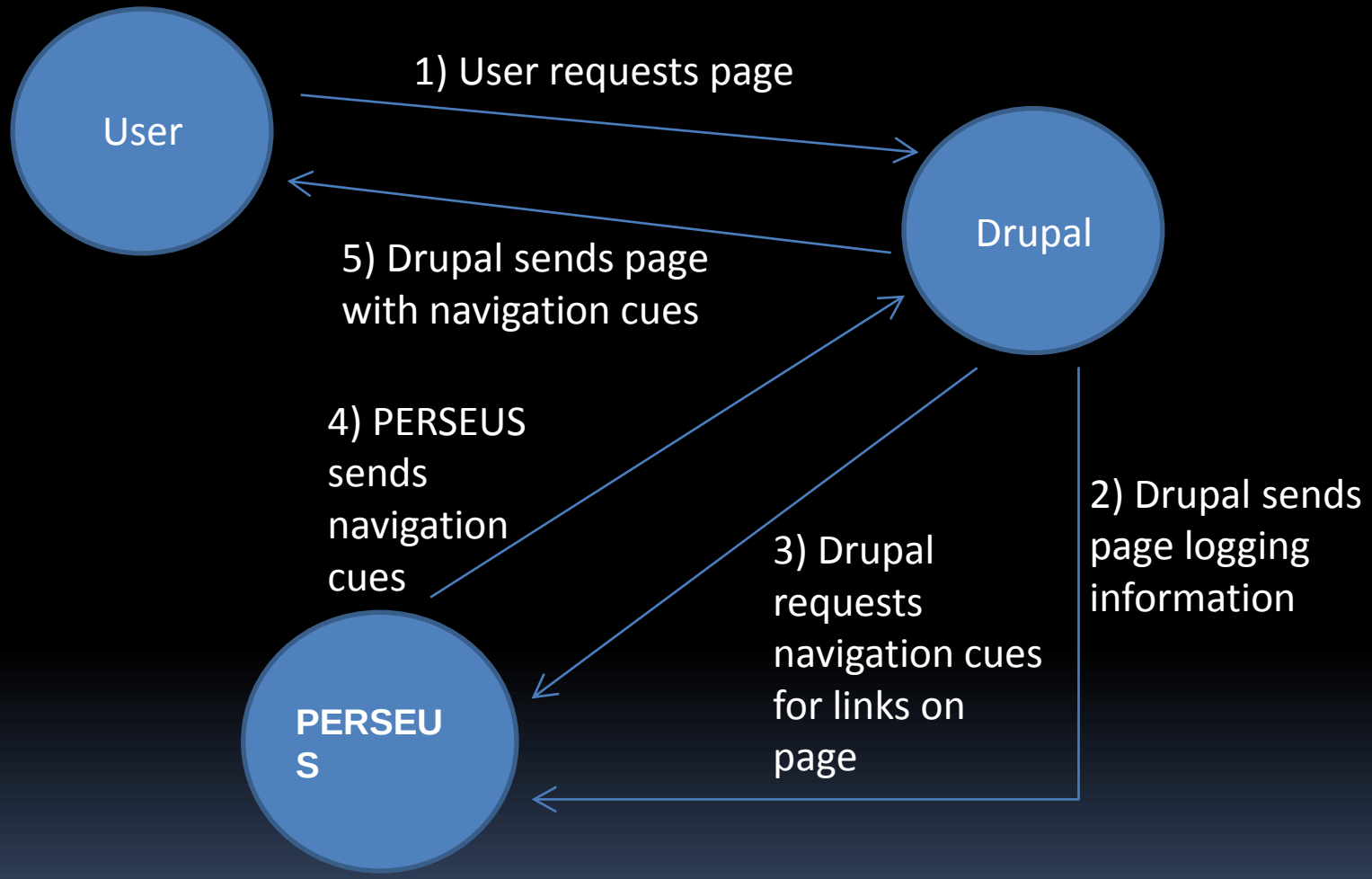
Traffic-based Social Navigation



Service-Based Social Navigation



Implementation in Drupal



Which Behavior?

- Clicks and reading time
- CRT
  - Comments
  - Ratings
  - Tags
- Decomposition
- Composition

CRT in Ensemble

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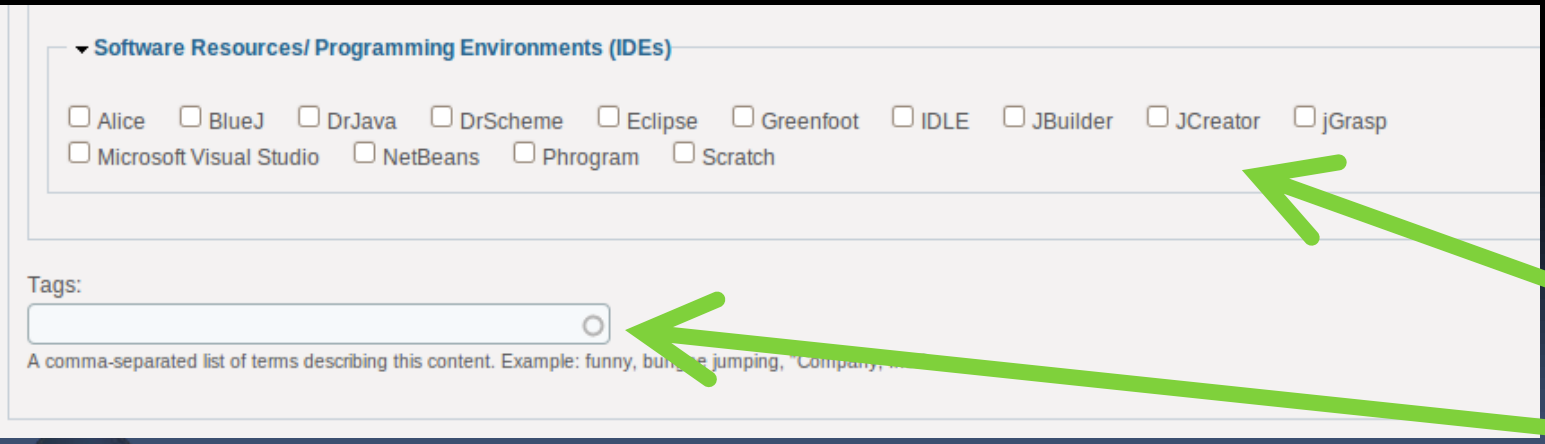
Rate
(using Fivestar module)

Comment



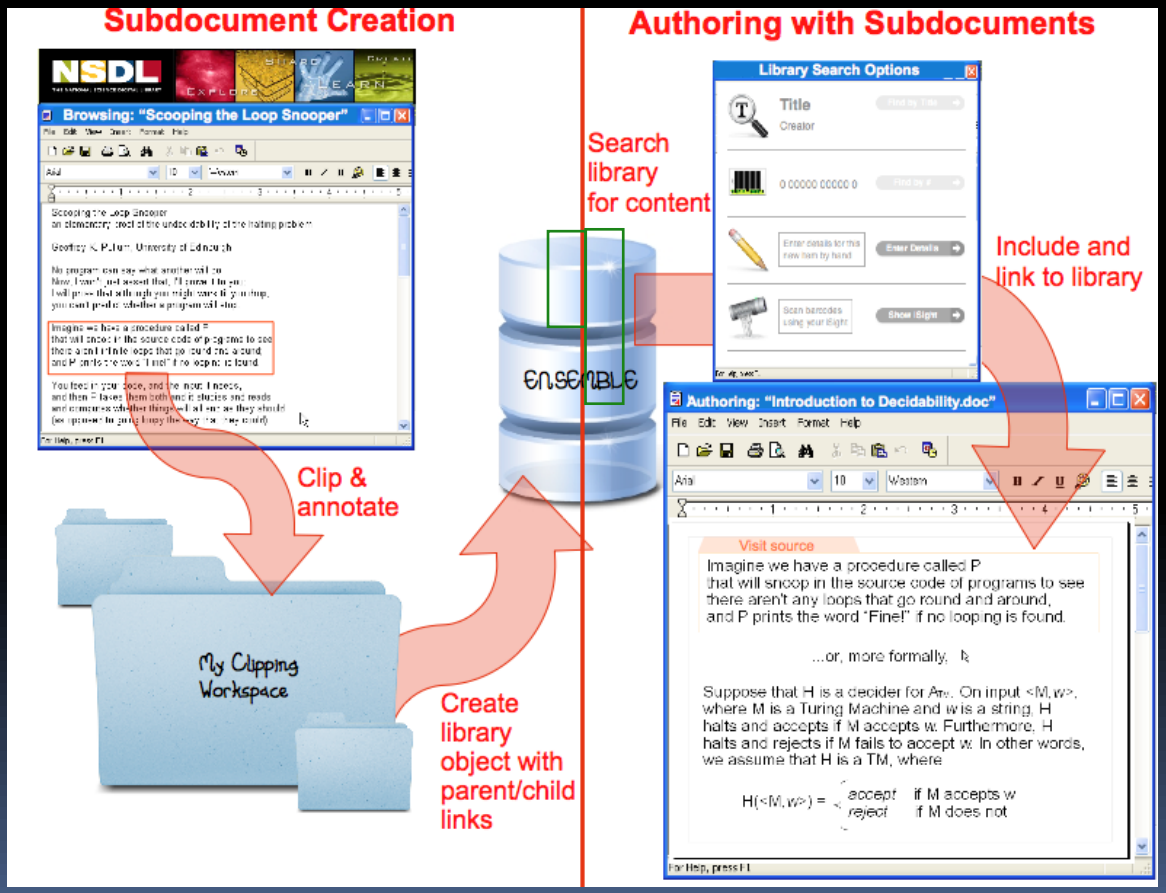
Tagging

Controlled vocabulary

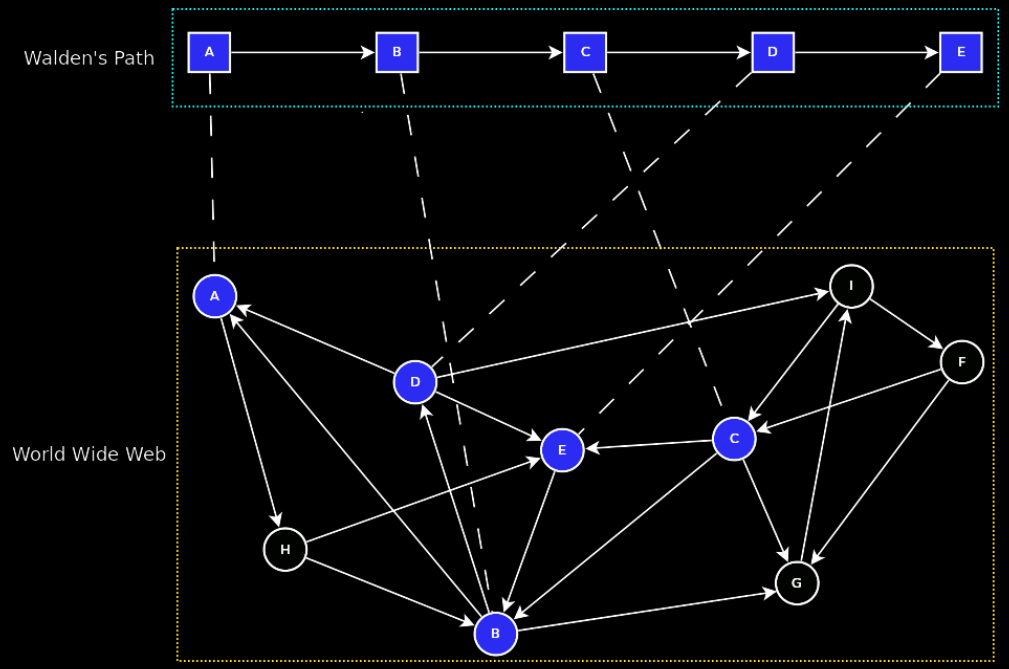
Free-form

Subdocuments

Extracting a part of an object and remixing it with other parts, possibly of other objects, supports reuse and new object creation as well as creating a social footprint



Composition : Paths



- A Walden's Path is an enclosing structure that defines a sequence of Web pages with annotations.
- This enables creation of a narrative structure while maintaining connection to the original resources.

- Just as selection of sub-elements of resources supports creativity, joining resources provides another option in new object creation

Where Are We?

- Traffic-based social navigation
  - fully implemented and being used by the portal
- Comments, Ratings, Tags
  - information is collected in the log, used for badges, work on using it for social navigation
- Decomposition and Composition
  - working on the logging part