

# Dynamic Personal Archives: Tracking How Ideas Progress Over Time

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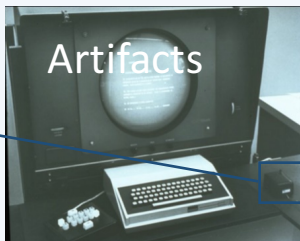
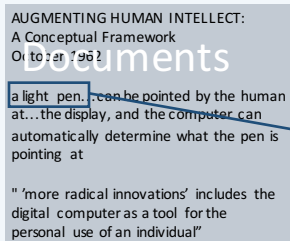
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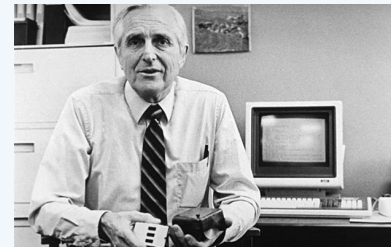
## Motivation

- Normally, libraries and archives organize resources by media type
- Instead, how can we **connect** these resources by the overarching keywords, people, objects, and **ideas** that they share?
- We want to be able to track the **evolution/development** of an idea



## Problem

- **Challenge:** the ideas are developed over different times, come in different media forms, and are explained with changing terminology, examples, and frameworks
- We are working with the **Douglas Engelbart Archives** as a case study

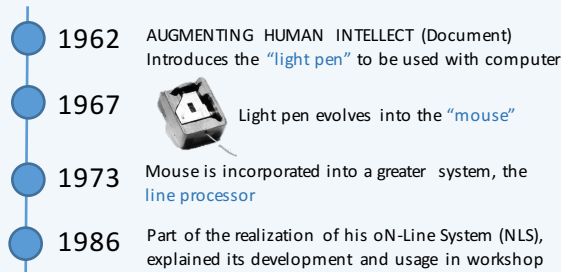


### About Douglas Engelbart

- Pioneer in interactive computing, introducing windows, video conferencing, and the mouse
- Archives provide over 147 videos (talks, lectures, workshops, etc.), over 26 publications, and handwritten documents and photos

## Approach

- We want to identify when an idea:
  - **Expands** with more detail
  - **Diverges** into sub-ideas
  - **Converges** with other ideas
  - **Formalizes** into a key term
  - **Changes** how it is referred to



- **NLP:** automatically identify transitions in keywords, similarities in descriptions
- **Crowdsourcing:** allow visitors to contribute links between resources

## Next Steps



- Allow users to share their path of exploration
- Mine visitors' natural paths of exploration to identify non-obvious connections
- Build and deploy tool, evaluate with experts using it to navigate through archives

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