Applying Multi-Document Summarization to the Singapore Memory Portal

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Singapore Memory Portal (SMP)
https://www.singaporememory.sg/

- Cultural heritage portal by the National Library, Singapore
- Crowd-sourced from the public
  - Collect memories (reminiscences) about Singapore’s history, culture, society, life/lifestyle and landscape/architecture
THE CASE
Cultural heritage portals are not organized to support user learning
These are our pioneer train drivers, senior drivers with more than 30 years experience since the ‘1930s, who have driven various steam locomotives on...

Remembering our Pioneer Train... by N/A

When I was at the age of 7-12 years, I walked a lot, to school, library (with a short trip by bus). I lived at Everton Park and studied at Silat Pri...

Walking down KTM railway track... by N/A

(This is an excerpt from an interview with retired KTM train operator Mr. Abdul Haimi) KTMK: Dear Mr. Halim, please tell us about yourself. AH: I...

KTM train passing by Choa Chu Kang (CCK), where I live.

KTM train by N/A

They shut the rail And a lost world is created The weed grows the birds make it their home Over the rusty...

KTM locomotive in Tanjong Paga...

KTM locomotive in Tanjong Paga by N/A

In 1988, I was 17 years old. I was catching the KTM train from KL to Singapore. I was alone and I just...
Collections

irememberAlkaffMansion

Share with us your memories and stories of love and celebration at Alkaff Mansion!

VIEW THIS COLLECTION

ADD MEMORIES

What’s Your SG Environment Story?

If you have a story to share, we want to hear from you!

VIEW THIS COLLECTION

ADD MEMORIES
The case

- Knowledge organization
- Summarization
- Visualization

Of portal content to support User Learning

Assumption

Learning about a topic involves synthesizing information into a coherent understanding
-- some kind of knowledge organization that links related aspects
Organizing heritage resources to tell a story

Museum and heritage professionals realize that for heritage resources to engage the general public, they need to be organized to tell a story, embedded in a narrative context, or stimulate storytelling.

(“Are museums about stories or objects?”, 2009)
Knowledge organization scheme with 2 levels

Upper-level Taxonomy
- To support user browsing
- To provide a topical overview and browse structure

Lower-level Ontology relations
- To support user learning and information synthesis
- To represent the types of information available on specific topics
Our approach

- We asked students to read postings on a particular topic and write an essay (in point form) on the topic

- They also drew a mind map to represent important concepts and relations

- We study how users synthesize an understanding of a topic, as reflected in the essay

- Analyze the types of information selected and how they are organized
Organization structure
Basic facts

- Most of the essays start with one to three sentences summarizing the basic facts about the topic
- Suggests that people have some idea what constitutes basic facts about a particular type of event or entity
Festivals

Basic facts

- name and alternative names
- definition (what it is)
- date of origin (when first held)
- origin story (how it came about)
- typical date (e.g., month it is typically held)
- frequency (e.g., annual)
- associated people group (who celebrates it)
- the main activities and performance items

May include related festivals and a short interesting or amusing fact about the festival
Ongoing system development
Thank you very much!