

title

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Overview

- 1 first part
- 2 second part
- 3 third part
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- 5 Conclusions

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The importance of social recommendation systems:

- ▶ Entertainment: Unruly Media¹, 65% of viewers: recommendation, while only 57% of viewers: browsing.
- ▶ Commercial: 30% profits of Amazon is from recommendation².

¹<http://www.marketingcharts.com/online/>.

²Amazon's recommendation secret 2012.

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How to recommend media data to individual users based on content and context features?

◆ Problem Definition 1

Given a social user u , a social item relevance function f_l , our context-aware media data recommendation algorithm automatically constructs a user profile $p(u)$, and detects a list of most relevant data, S_v , such that for any media data $v_i \in S_v$ and $v_j \notin S_v$, the following condition holds:

$$f_l(p(u), v_i) \geq f_l(p(u), v_j). \quad (1)$$

✓ Solution 1

Correlation-based feature selection

- ▶ Relevance checking: symmetrical uncertainty(SU)
- ▶ Redundancy removal: propose a new concept feature contribution FC
 1. Global-based algorithm
 2. Group-based algorithm

In this proposal, we will address three research questions:

- ▶ Context-aware individual recommendation
- ▶ Context-aware group recommendation
- ▶ Context-aware continuous streaming recommendation