

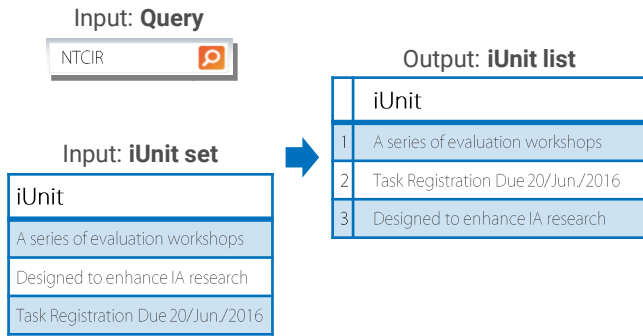
# NTCIR-12 MobileClick-2 Task

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MobileClick-2 aims to **provide direct and immediate mobile information access** by automatically generating a concise two-layered summary for a given query

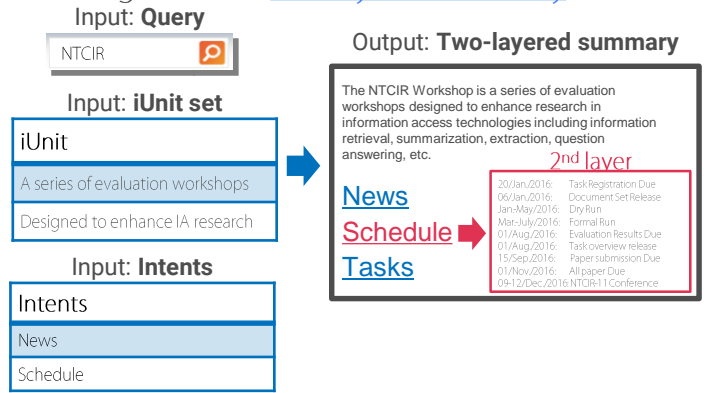
## iUnit Ranking Subtask

Given a query and a set of iUnits, rank them based on their estimated importance  
 Note: iUnits are information pieces relevant to a given query



## iUnit Summarization Subtask

Given a query, a set of iUnits, and a set of intents, generate a **two-layered summary**



## Dataset

**Queries:** Prepared queries for four categories (CELEBRITY, LOCAL, DEFINITION, and QA)

**Documents:** Download top 500 search results from a commercial search engine for each query

**iUnits:** Manually extracted substrings of the documents as iUnits

**Intents:** Manually cluster iUnits and extracted each cluster as an intent

## Evaluation

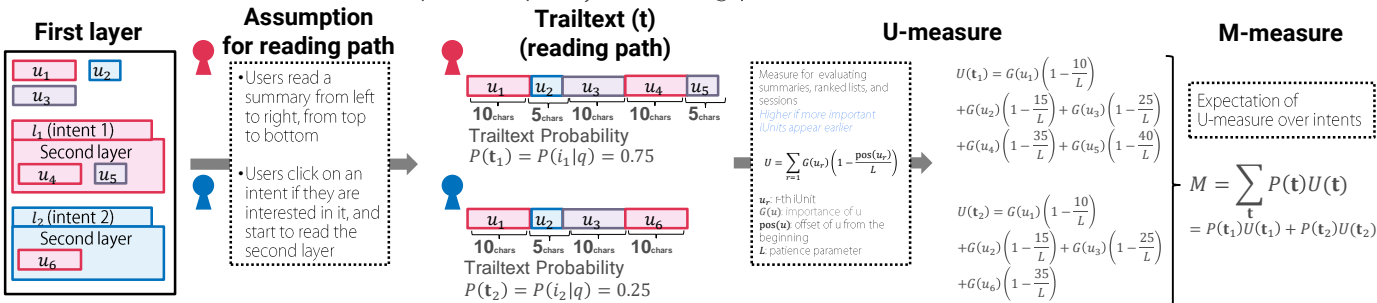
**iUnit importance:** Two assessors manually evaluated each iUnit in terms of a particular intent at a five-point scale. Importance of iUnit  $u$  in terms of  $i$ :  $g_i(u)$ .

**Intent probability:** Ten users voted for one or more intents in which they were interested. Probability of intent  $i$  given query  $q$ :  $P(i|q)$

**Global importance:** Expected iUnit importance over intents.  $G(u) = \sum_i P(i|q)g_i(u)$ .

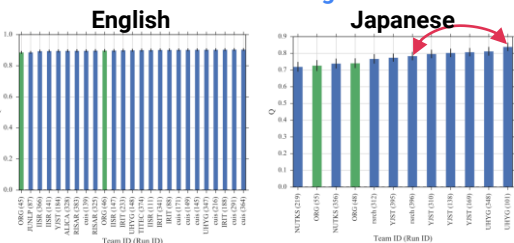
**iUnit ranking evaluation:** Ranked lists of iUnits are evaluated in the same way as ad-hoc retrieval evaluation, that is, Q-measure and nDCG with the global importance.

**iUnit summarization evaluation:** Expected quality of reading paths (trailtexts) of users with different intents



## Evaluation Results (Red arrows indicate significant differences)

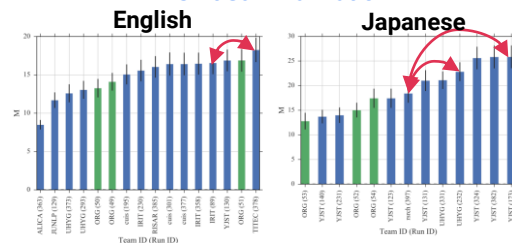
### iUnit Ranking



Submitted runs showed similar performance

UHYG, YJST, and rsrch significantly outperformed the baseline method

### iUnit Summarization



TITEC and YJST are the top, but did not significantly outperform the best baseline

YJST and UHYG significantly outperformed the baseline

## Leader Board

