# Compilation Techniques for Pedagogically Effective Bilingual Learners' Dictionaries

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### Summary

- Background and aims
- · Presentation of senses and logico-semantic ordering
- Semantic interrelatedness and core meanings
- Semantic transparency and morphological productivity
- · Lexical categories in Chinese
- Arabic headword selection criteria
- Multiword expressions in Arabic
- · Pedagogical selection criteria
- Interactive Parallel Text a new paradigm
- Future Work

# Shortcomings of existing dictionaries

- · Archaic headwords and senses
- Inappropriate examples
- Overly prescriptive approach
- · Learner-unfriendly sense ordering
- Omission of important multiword expressions

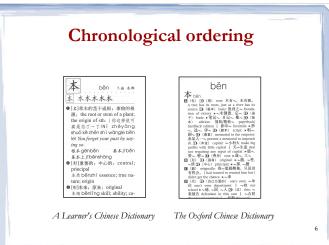
# Pedagogically effective dictionaries by CJKI

- The CJKI Chinese Learner's Dictionary
- The Kodansha Kanji Learner's Dictionary
- The CJK Arabic-English Learner's Dictionary

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- Chronological
- Frequency-based
- Logico-semantic

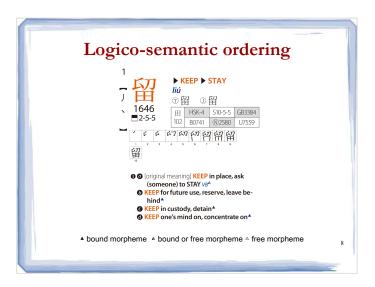


# Frequency ordering

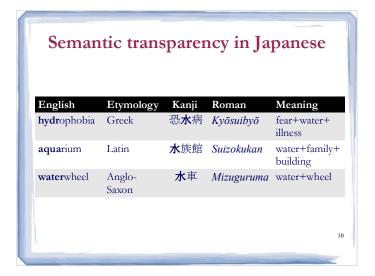
Entry for 本 běn in A Chinese-English Dictionary: a Basic Dictionary for Chinese Language Learning (Foreign Languages Press, 2007)

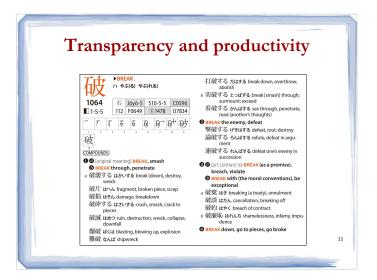
#### 本 běn

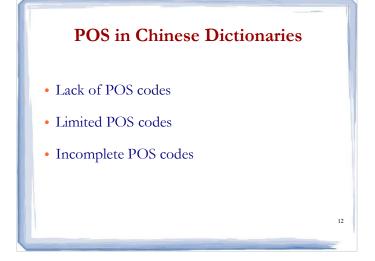
- 1. <名 *n.*> booklet
- 2. ( $\sim$ 儿) <名n.> capital; principal
- 3. < 2n.> root or stem of a plant; generally referring to the origin of the matter
- 4. <名n.> version; edition and book binding
- 5. <量 *meas.*> used to indicate the copy of books
- 6. <代 pron.> one's own; native

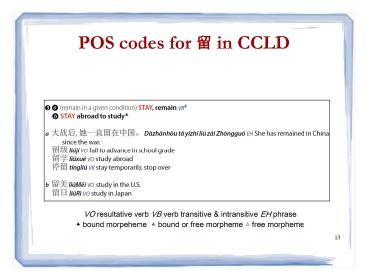


# Interrelatedness of senses List A 1 a KEEP in place, ask to stay b KEEP for future use, reserve, leave behind c KEEP in custody, detain d KEEP one's mind on, concentrate on List B 1 keep in place, ask to stay 2 reserve, leave behind 3 detain 4 concentrate on









# **Character Meanings**

- The Equivalent
- Core Meaning
- Interrelatedness of Senses

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# Traditional criteria for selecting Arabic headwords

- Quran and classical literature
- · Copying from past dictionaries
- · Analyzing authentic texts found in corpora
- Subjective judgment of lexicographer
- 'Importance' based on frequency and lexicographer's discretion

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## Multiword expressions in Arabic

- Omission of multiword expressions
   (الشَّرْقُ الْأَوْسَطُ 'assharqu l'awSaTu 'the Middle East')
- Omission of derived words (بسُرْعَة) bisur'atin 'quickly')
- Inclusion of infrequent words
   (غمد Hamd 'praise')
- Exclusion of common words
   (مُسَامَحة musaamaHa 'forgiveness')

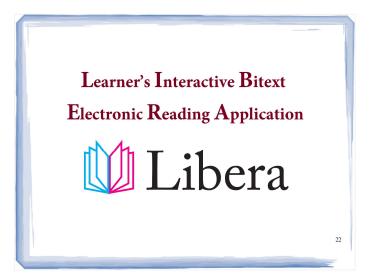
Pedagogical selection criteria

- Potential headwords drawn from corpora, textbooks, learners' dictionaries, websites, and other sources
- Special efforts made to include modern words such as blog and ATM
- Rare/archaic words omitted by relying on modern corpora and sources
- · Dialectal words omitted regardless of their corpus frequency
- MWEs systematically included as main entries or subentries rather than as examples
- Important derived words, especially adverbs, systematically included
- · Headword/senses culled by lexicographers to maximize relevance20

**Future Work** 

- Lexical categories
- · Headword selection
- Multiword expressions
- Pedegogically effective tools

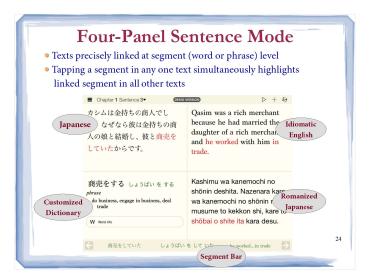
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# Interactive Parallel Text (IPT)

- Allows learners to effortlessly read vast amounts of L2 texts
- New medium for accessing comprehensible L2 texts
- · Libera a cutting edge platform for reading enjoyably
- Texts precisely linked on segment level
- Interactive links highlight L2 segment and activate glosses, grammar notes, audio, and transcriptions

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