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Evaluating Digital Library Holistically

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Digital Library Issues

- Rapidly growing number
- Universal involvement
- Diversity in content format and user background
- High cost
- Heavy development & light assessment



Digital Library Structure & Stakeholder

Key components

- Content
- Technology
- Service
- User
- Interface
- Context

Core stakeholders

- Developer
- Researcher
- Administrator
- User
- Librarian
- ...

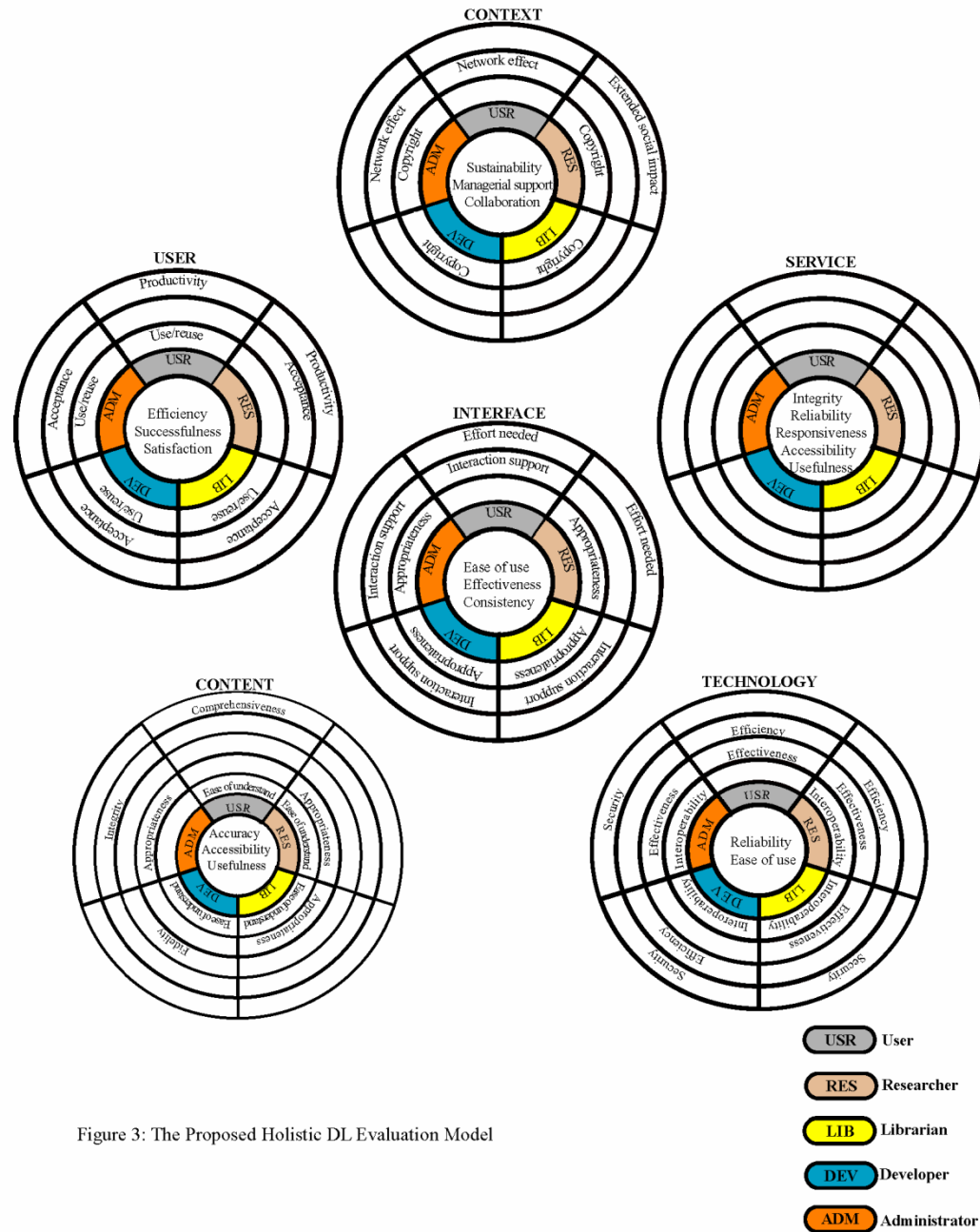


Figure 3: The Proposed Holistic DL Evaluation Model



Content -- Accessibility

----The extent to which (fulltext) content is open for access without barrier

Various Barriers

- Technological
- Intellectual
- Economic
- Institutional



御定全唐詩

百諸家子 中國哲學書電子化計劃

[線上圖書館](#) -> [御定全唐詩](#) -> 御定全唐詩總目一~總目五 < 1 /131



Content -- Accuracy

The extent to which any visible errors (e.g., typo, incorrect information) are detected in digital information.



Japanese Maps of the Tokugawa Era

The Library

[home](#) : [browse](#) : [advanced search](#) : [preferences](#) : [my favourites](#) : [about](#) : [help](#)

Search results for 日本

[search again](#)

[Refine your search](#)

[Try advanced search](#)

results 1-15 of 66 item(s)

[select all](#) : [clear all](#) : [add to favorites](#)



☐ 1. Page 32

☐ 2. Page 36

☐ 3. Page 41



☐ 6. Page 1



☐ 7. Shinsen Nihon koku
oezu

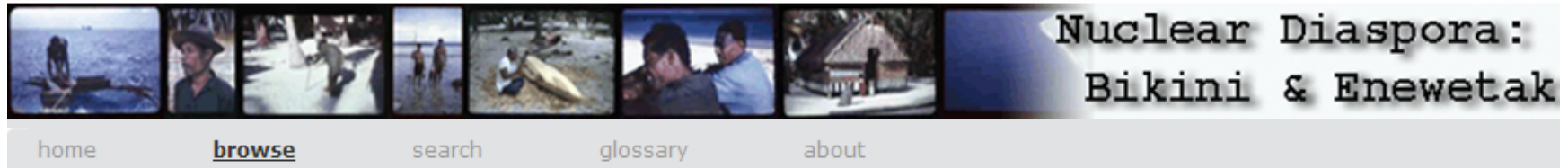


☐ 8. Kaisei dai-nihon enbi zu



Content -- Usefulness

The extent to which digital information is helpful to users to achieve their information seeking goals



[Home](#) > [Browse](#)

BROWSE ROBERT C. KISTE COLLECTION BY:

- [Title](#)
- [Photographer](#)
- [Reference Number](#)
- [Category](#)
- [Date](#)
- [Place](#)
- [Collection](#)
- [Newest Slides](#)
- [Recent Comments](#)



Content -- Comprehensiveness

The extent to which digital collection covers everything within a predetermined scope in terms of subject, time, language, format...

WorldCat® Local

Single-search access to 881+ million items from your library and the world's library collections



WORLD
DIGITAL LIBRARY



HATHI
TRUST

Digital Library



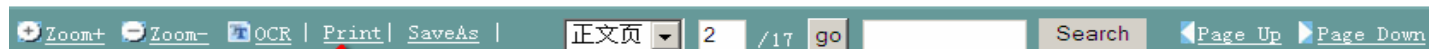
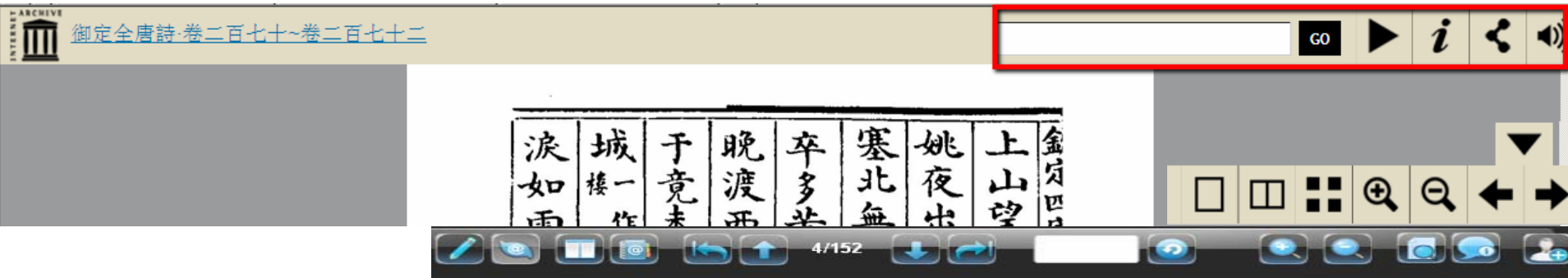
大学数字图书馆国际合作计划

China Academic Digital Associative Library



Technology – Ease of Use

The extent to which a digital technology is free of complexity for use



print / save one page at a time



余华·《活着》

告辞时，突然发现自己像个孕妇一样步履艰难了。然后我与一位当上了祖母的女人坐在门槛上，她编着草



Technology – Interoperability

The extent to which a DL can work together smoothly with other systems or transformed /upgraded to other platforms

Search results for 'boxer rebellion' limited to Libraries Worldwide



[Home](#) > [Browse](#)

Pacific Rim Library

Browse:

 any field

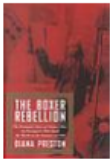
Databases (28)


[WorldCat.org](#) (3151)
[WorldCat](#) (3023)
[OAlster](#) (474)
[U.S. Congressional Serial Set, 1817-1980](#) (187)
[WorldCat Dissertations and Theses](#) (114)
[ArticleFirst](#) (48)
[Academic Search Complete](#) (31)
[Business Source Complete](#) (18)
[World Almanacs](#) (15)
[MLA International Bibliography](#) (14)
[Anthropology Plus](#) (5)
[Art Abstracts](#) (5)
[Education Abstracts](#) (5)
[GPO Monthly Catalog](#) (1)
[MEDLINE](#) (1)
[History of Science, Technology & Medicine](#) (1)
[ACM Digital Library](#) (0)

Results 1-10 of about 3,421 (.55 seconds)

[Select All](#) [Clear All](#)

Save to:

- 

The boxer rebellion : the dramatic story
by Diana Preston
Book : Document Computer File
Language: English
Publisher: New York : Walker, 2000.
Database: WorldCat
Libraries that own this item: [WorldCat Libraries](#)
[Editions and formats »](#)
- 

Boxer Rebellion
by Che Zhang; Guang Yi; Sheng Fu; Lihua Li;
DVD video : NTSC color broadcast system
Language: English
Publisher: Taipei, Taiwan : Bonzai Media Corp., [200-?]
Database: WorldCat
Libraries that own this item: [WorldCat Libraries](#)

义和团

☒ 古籍
 ☒ 民国图书
 ☒ 民国期刊
 ☒ 现代图书
 ☒ 学位论文
 ☒ 绘画
 ☒ 视频
 ☒ 英文

☒ 古籍 ☐ 民国 ☐ 民国期刊 ☐ 现代 ☐ 论文 ☐ 绘画 ☐ 视频 ☐ 英文

共检索到 9 条记录,
耗时 0.015 秒

義和團檔案史料

(一)

佚名編

共检索到 11 条记录,
耗时 0.0 秒

庚子义和团运动始末

吴宣易

1

共检索到 38 条记录,
耗时 0.0 秒

义和团运动史论文选

编: 义和团运动史研究会



共检索到 1 条记录,
耗时 0.015 秒

义和团时期华北农民问题初探

李俊



1

共检索到 0 条记录,
耗时 0.063 毫秒

共检索到 0 条记录,
耗时 0.016 毫秒

1

共检索到 391 条记录, 耗时 0.016 秒

The practice of group work.

Sullivan,
Dorothea,|American Association of





Interface – Consistency

The extent to which an interface is designed with all essential elements (e.g., color, layout, font, background, terminology) consistent across sections & pages



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[个性化首页](#)

御定全唐詩

检索

☒ 古籍 ☒ 民国图书 ☐ 民国期刊 ☐ 现代图书 ☐ 学位论文 ☐ 绘画 ☐ 视频 ☐ 英文



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[个性化首页](#)

高级检索

范围: ☒ 全部 ☐ 现代图书 ☐ 硕博论文 ☐ 期刊 ☐ 古籍 ☐ 民国图书 ☐ 英文

检索词

检索项

并且

并且

并且

书名

作者

关键字

出版机构

请选择检索结果排序方式

记录数: 20 /页

排序: 书名

检索

重置



Interface – Interaction Support

The extent to which a DL interface supports HCI by visualizing interaction status, facilitating users to take further action, etc.



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Taylor_box21num35







Japanese and Korean children

Description

There are about 375,000 Japanese children grow up together, mingling with commercial life, it is expected that

Title:

Japanese and Korean children,

Record ID:

kda-m102

Names & Dates

Created:

1908/1922



Search results for **'boxer rebellion'**

Format

- ☒ **All Formats (594)**
- ☐ Book (483)
- ☐ eBook (116)
- ☐ Thesis/dissertation (11) ←
- ☐ Microform (10)
- ☐ Article (77)
- ☐ Peer-reviewed (57)
- ☐ Video (21) ←
- ☐ DVD (8)
- ☐ VHS (8)
- ☐ Film (4)
- ☐ Archival material (10)
- ☐ Journal, magazine (3)
- ☐ Image (1)

Refine Your Search

Author

[Naixuan Lao](#) (6)

[United States](#) (6) ←

[Robert Hart](#) (5)

[Yong Wu](#) (5)

[Zhongguo She Hui ...](#) (5)


[Show more ...](#)




Service –Responsiveness

The extent to which digital service agent/staff can provide prompt and positive responses



 **Talk to Ying**

 Ying Zhang is online.

Hi!

Type here, press "Enter" to send

Your Name:

[Get your widget at wimzi.com](http://wimzi.com)



University of California Libraries


~ 24/7 real-time research help ~

Name

Email Address


Confirm Email Address

Please select:


Select One 

Your Question:

What is your Internet Connection?

Select One 

Are you using a software firewall?
(ex: Norton Internet Security)

Select One 

Connect 

Exit 



Service –Integrity

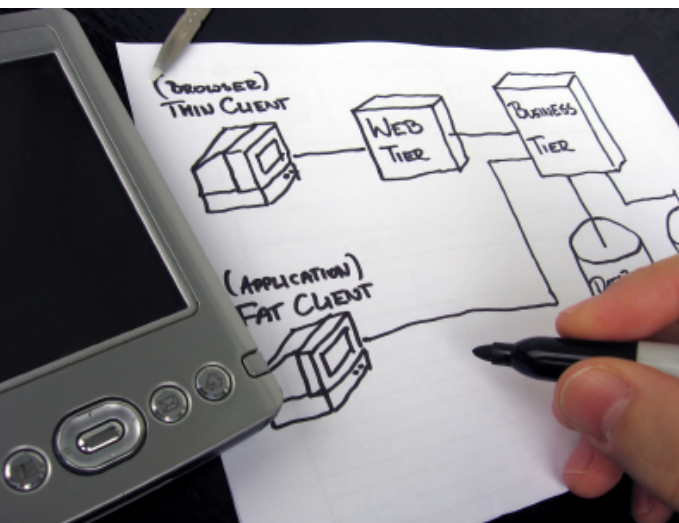
The extent to which a digital service is integrated into main flow of DL use in a transparent way





User

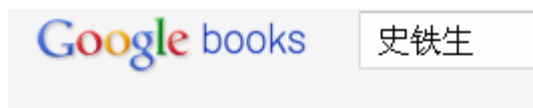
- Successfulness
- Efficiency
- Satisfaction
- Productivity (user/researcher)



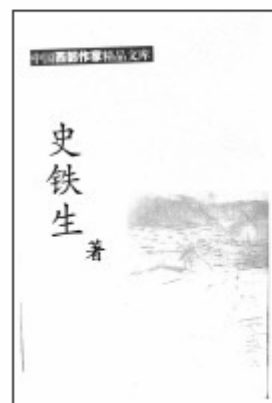


Context

- Collaboration



我的遥远的清平湾



史铁生

★★★★★ 0 Revi



广州出版社, 2001

本书收录了史铁生:
情深厚,回味无穷,对



我的遥远的清平湾

著: 史铁生



- Sustainability



arts and humanities data service

From April 2008 the Arts and Humanities Data Service (AHDS) will no longer be funded to provide a national service. However, the JISC have very kindly provided funding for a further year to keep the website available, to maintain and update the AHDS cross-search catalogue, and for the Centres to continue to deliver AHDS collections. The catalogue will allow users to search across the collections of the AHDS partners, including new



Summary



- **What have been done well?**
 - **Context:** Collaboration | Copyright compliance
 - **Technology:** Interoperability
 - **Interface** – Interaction support
- **What could be done better?**
 - **Content** -- Accessibility
 - **Interface** – Ease of use, Consistency
 - **Service** – Accessibility



Conclusion

- Digital Library (DL) has to be evaluated
- DL evaluation needs to cover all aspects from content, technology, interface, service, user to context
- Users' different voices should be heard and taken into consideration
- The holistic model is ready for use

Zhang, Y. (2010). Developing a holistic model for digital library evaluation. *Journal of the American Society for Information Science and Technology*, 61(1): 88-110.



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Thank You!