<table>
<thead>
<tr>
<th><strong>Title</strong></th>
<th>Layered approaches to open access: proposal to the CAS presidency</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Author(s)</strong></td>
<td>Zhang, Xiaolin</td>
</tr>
<tr>
<td><strong>Citation</strong></td>
<td>Promoting 21st Century Scholarly Communication, The University of Hong Kong, May 17, 2007</td>
</tr>
<tr>
<td><strong>Issued Date</strong></td>
<td>2007</td>
</tr>
<tr>
<td><strong>URL</strong></td>
<td><a href="http://hdl.handle.net/10722/44100">http://hdl.handle.net/10722/44100</a></td>
</tr>
<tr>
<td><strong>Rights</strong></td>
<td>This work is licensed under a Creative Commons Attribution-NonCommercial-NoDerivatives 4.0 International License.</td>
</tr>
</tbody>
</table>
中国科学院开放获取的政策选择
Suggested Strategies of Open Access for Chinese Academy of Sciences

Xiaolin Zhang, National Science Library
Promoting 21st Century Scholarly Communication: The Role of Institutional Repositories in the Open Access Movement
The University of Hong Kong Libraries
17-18 May 2007
Suggested Strategies of OA for CAS

- 1. Introduction to CAS
- 2. Challenges of OA for CAS
- 3. Institutional Strategies of OA for CAS
- 4. Implementation Measures of OA in CAS
Suggested Strategies of OA for CAS

1. Introduction to CAS
   - General Make-up of CAS
     - 103 Research Institutes in 28 cities
     - Research staff > 25,000
     - Graduate Students > 30,000
     - Library system of 100+ libraries
## 1. Introduction to CAS

### Scientific Production of CAS

<table>
<thead>
<tr>
<th>Category</th>
<th>2001-2006年</th>
<th>TOP5%</th>
<th>2001-2006年</th>
<th>TOP10%</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total</td>
<td>17086</td>
<td>5831</td>
<td>34171</td>
<td>11182</td>
</tr>
<tr>
<td>GeoScience</td>
<td>643</td>
<td>405</td>
<td>1286</td>
<td>864</td>
</tr>
<tr>
<td>Engineering</td>
<td>4600</td>
<td>1223</td>
<td>2491</td>
<td>27.08%</td>
</tr>
<tr>
<td>Chemistry</td>
<td>3607</td>
<td>1496</td>
<td>7213</td>
<td>27.65%</td>
</tr>
<tr>
<td>Environment</td>
<td>359</td>
<td>130</td>
<td>718</td>
<td>33.15%</td>
</tr>
<tr>
<td>Agriculture</td>
<td>201</td>
<td>75</td>
<td>402</td>
<td>34.33%</td>
</tr>
<tr>
<td>Biology</td>
<td>1416</td>
<td>456</td>
<td>2831</td>
<td>32.20%</td>
</tr>
<tr>
<td>Math</td>
<td>826</td>
<td>137</td>
<td>1652</td>
<td>32.14%</td>
</tr>
<tr>
<td>Physics</td>
<td>3190</td>
<td>1522</td>
<td>6380</td>
<td>45.78%</td>
</tr>
<tr>
<td>Medicine</td>
<td>1875</td>
<td>134</td>
<td>3749</td>
<td>7.74%</td>
</tr>
</tbody>
</table>
Suggested Strategies of OA for CAS

1. Introduction to CAS

   History of Involvement of CAS in OA
   
   - 2004 President Lu of CAS signed Berlin Declaration
   - 2005 Chairman Chen of NSFC signed Berlin Declaration
   - 2005 International Conference on Open Access to Scientific Information at Beijing, hosted by CAS Library
   - 2006 Policy Study on Open Access to Scientific Information by CAS Library
     
     - Introduction of PLOS and BMC to Chinese gov. agencies
Suggested Strategies of OA for CAS

- 1. Introduction to CAS
- 2. Challenges of OA for CAS
- 3. Institutional Strategies of OA for CAS
- 4. Implementation Measures of OA in CAS
Suggested Strategies of OA for CAS

2. Challenges of OA for CAS
   - Lack of actions so far, but why?
   - Personal level:
     - Lack of awareness of OA and its development
     - Lack of understanding of issues, strategies, best practices
     - Lack of easy access to supporting infrastructure and tools
     - Lack of incentives, both direct and indirect ones
Suggested Strategies of OA for CAS

2. Challenges of OA for CAS

- Lack of actions so far, but why?
- Organizational level:
  - Lack of understanding what is at issue with OA
    - Limited to a library issue or an access issue
  - Lack of organizational commitment
    - Need political will to tackle with intertwined problems
    - Need institutional authority to fight with entrenched interests
    - Need organizational effort to devise systematic mechanisms
  - Lack of concerted organizational strategies
    - Approaches, policies, organizational mechanisms, and tech/financial measures
  - Lack of supporting infrastructure
    - Best practices, tools, services, personnel, tech systems
2. Challenges of OA for CAS

- Lack of actions so far, but why?
- National level:
  - Lack of awareness and understanding
    - What is at stake with OA for China?
    - Is it just a library/access/institutional issue?
  - Lack of proactive commitment
    - Whose responsibility?
    - Who will take the lead or be the first to sort out the entwined issues?
  - Lack of concerted national strategies
    - Approaches, policies, national coordination, and tech/financial measures
  - Lack of supporting infrastructure
    - Best practices, tools, services, personnel, tech systems
2. Challenges of OA for CAS

- Realization of some reality problems hindering OA
  - Strong will to publish in "established" journals, in any cost
  - Primarily being evaluated by publishing and being cited
    - personally and institutionally
  - Misunderstanding and lack of ready help of IP rights issues
  - Preventive publishing handling fees ($1500 is too much)
  - Delimma with STM journal publishing strategy (trends for market-driven and international collaboration)
  - Intertwined responsibilities among multiple funding agencies
  - Lack of support for "public good"
- ……
Suggested Strategies of OA for CAS

2. Challenges of OA for CAS

- Need to redefine the issue and the strategy for OA
- An information strategy issue
  - Not just a library issue or personal issue
  - An information access issue where innovative capability of CAS/Country is at stake
- An IP and knowledge assets management issue
  - Whether or not CAS/Country can capture, preserve, and sustainably access to its and world scientific products?
  - How to manage and protect the IP/K-assets for CAS/Country?
- A public policy or political issue
  - Public’s right to access the output of publicly supported research
  - Science’s (including scientists and those funding research) responsibility to promote and ensure public access to knowledge
Suggested Strategies of OA for CAS

- 1. Introduction to CAS
- 2. Challenges of OA for CAS
- 3. Institutional Strategies of OA for CAS
- 4. Implementation Measures of OA in CAS
3. Institutional Strategies of OA for CAS

- Systematic approach to the OA strategy
  - Define the OA strategy within the frameworks of
    - institutional IP strategy
    - knowledge assets management
    - responsibility for public access to knowledge
    - so to define institutional and funding agencies’ responsibility for promoting and supporting OA

- Establish an institutional policy on OA
  - break-through by influential research organizations
  - tackle the issue in a smaller and more controllable situation
  - combine more easily with institution’s IP strategy
  - integrate more easily with institution’s info infrastructure
Suggested Strategies of OA for CAS

3. Institutional Strategies of OA for CAS

- Systematic approach to the OA strategy
  - Select a phased approach to implement OA
    - Require deposit of research papers in open institutional repositories and designated open subject repositories
    - Support OA publishing in quality OA journals or in journals with selective OA publishing
    - Encourage OA publishing of research journals
  - Develop a supporting framework
    - High-level OA advisory body
    - OA clearinghouse and support mechanism
    - OA tools to support undertaking by person or by institution
    - OA repository systems
    - Evaluative and promotional services for OA materials
3. Institutional Strategies of OA for CAS

- Systematic approach to the OA strategy (continued)
  - **Establish** educational and promotional mechanisms
    - Develop OA promotion appealing to scientists and management/funding agencies (not academic papers)
    - Publicize success stories in OA publishing and deposit
    - Publicize and train for effective use OA repositories
    - Establish open forum for promotion and education
  - **Re-organize** institutional infrastructure to support OA
    - Put someone (some unit) in charge of OA promotion and support
    - Devise series of measures to support the supporting framework
    - Improve the info infrastructure to utilize and integrate OA resources
Suggested Strategies of OA for CAS

- 1. Introduction to CAS
- 2. Challenges of OA for CAS
- 3. Institutional Framework of OA for CAS
- 4. Implementation Measures of OA in CAS
4. Implementation Measures of OA in CAS

(1) Develop an OA strategy statement for CAS
   - put in a larger context and responsibility
     - as part of CAS IP strategy
     - as part of CAS knowledge asset management and e-science-based knowledge environment development
     - as part of CAS public policy strategy: contribution, responsibility, accountability, and capability to lead the national drive for innovation
   - define CAS layered OA approaches
     - Require deposit of research papers in CAS IR system
       - IRs of research institutes/IR at CAS Library
     - Support OA publishing
       - in quality OA journals/in journals with selective OA publishing
   - Implement
     - deposit fulfillment as part of project evaluation
     - repository usage as part of research ”citations”
     - OA publishing into research output
Suggested Strategies of OA for CAS

4. Implementation Measures of OA in CAS

(2) Develop CAS organizational mechanisms for OA

- establish an OA promotion committee with high level officials and VIP scientists for strategies and policies
- establish an CAS OA office (maybe within CAS Library) to
  - implement the policies
  - provide legal, administrative, and financial support
  - promote and evaluate OA in CAS
  - collaborate with foreign and domestic research organizations
- charge the CAS Library as CAS OA supporter to
  - maintains an OA clearinghouse/portal
  - establishes an OA support team to work with CAS OA Office
  - prepares OA supporting tools
  - operates CAS OA repository, or support institutes for their IRs
Suggested Strategies of OA for CAS

4. Implementation Measures of OA in CAS

(3) Develop OA implementation procedures

For scientists

- guidelines for fulfilling the deposit requirements
- guidelines for OA publishing and support for it
- guidelines for evaluation research with OA publishing and deposit

For institute

- guidelines for implement the deposit requirements
- guidelines for supporting OA publishing
- guidelines for evaluation research with OA publishing and deposit
- guidelines for evaluation and promotion of OA materials
Suggested Strategies of OA for CAS

4. Implementation Measures of OA in CAS

(3) Develop OA implementation procedures

- For publisher
  - Legal policy guidelines and license addendum
  - CAS-initiated negotiation with publishers to help ensure individual scientist’s rights for OA deposit
  - Procedural help to scientists to negotiate with publishers

- For funding agencies
  - CAS-initiated communication with funding agencies for their support to scientists’ rights for OA deposit
  - CAS-initiated negotiation with funding agencies to support OA publishing (in terms of funding and of evaluation)
Suggested Strategies of OA for CAS

4. Implementation Measures of OA in CAS

- (4) Develop OA supporting systems
  - OA portal
  - OA IR system
    - CAS IR at CAS Library
    - IRs at research institutes, with integration service at CAS Library and other subject-field integration service providers
  - Integration linkage with CAS information service system
  - OA technical supporting tools
    - software of IR systems and OA publishing
    - tools and services to promote and evaluate OA deposit papers (value-added services)
Suggested Strategies of OA for CAS

4. Implementation Measures of OA in CAS

(5) Develop OA supporting capabilities

- Clearinghouse materials
  - Exemplary policies of research and educational organizations
  - Best practices in OA deposit and OA publishing
  - OA evaluation and promotion documents
  - Success stories

- Supporting materials
  - author license addenda
  - lists of ”green” and OA journals with their policies/evaluation
  - use manuals for IR deposit procedures
  - services to evaluate and promote OA deposit materials

- Personnel support:
  - recruitment and training and re-organization
Suggested Strategies of OA for CAS

4. Implementation Measures of OA in CAS

- Roads to implement
  - Strategy report to CAS presidency
  - Implementation initiative to CAS presidency
  - Implementation of some of the supporting infrastructure while formal decision is considered
  - Mobilize forces for promotion
Suggested Strategies of OA for CAS

谢谢！
Thanks!