Roles of Office of International Relations in Promoting Research Collaboration

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ABSTRACT

As a part of academic excellence, the quality of research has always been a target for universities, especially for a research-intensive university. The importance of international research collaborations brings growing attention, not only because the world is ‘getting flat’ and becoming more accessible, but also due to more channels and funding being available for such collaborative activities. While the number of projects and their corresponding grants have become a routine parameter in valuing (or measuring) the international research collaborations, other influences resulting from collaborations are always underestimated or even ignored. The speaker is trying to approach this using the data of publications in some representative schools at Peking University. Moreover, the speaker would like to share with the participants the practice and ideas of what an Office of International Relations can do in promoting international research collaborations. A brief introduction to Peking University will be also presented.
Roles of Office of International Relations in Promoting Research Collaboration

Dr. Ruqing Zheng
Peking University
February, 2007

Outline

- General Information
- The International Research Collaboration at Peking University
  → Projects
  → Publications
  → Opportunities and Challenges
- What Can We Do?

General Information

History

- Founded in 1898 - “Imperial University of Peking”
- From 1912 – “Peking University”
- Disciplinary Relocation in 1952
- Centennial Anniversary in 1998
  - Defined the goal to be a world-class university in the 21st century
- Merged with Beijing Medical University in 2000

Fast Facts

- Students: 30,791
  - Undergraduates: 14,125
  - Master's Students: 11,224
  - Ph.D. Students: 5,442
- Faculty Members: ≈ 5000
  - Humanities & Social Sciences: 1140
  - Natural Sciences: 1040
  - Medicine: 820
  - 8 Affiliated Hospitals: ≈ 2000
**The Academic Structure**

- Faculties: 5
  - Faculty of Sciences
  - Faculty of Humanities
  - Faculty of Social Sciences
  - Faculty of IT & Engineering
  - PKU Health Science Center
- Schools/Colleges/Departments: 41
- Research Institutions and Centers: 271

**Educational System**

- Bachelor’s Degree: 4 years
  - 101 Undergraduate Programs, 4 Double-Major Programs
- Master’s Degree: 2-3 years
  - 244 Master’s Programs
- Ph.D. Degree: 3-5 years
  - 201 Ph.D. Program
- MD program: 8 years
  - 2 years’ general education in main campus
- Postdoctoral fellows: 500

**Total Annual Expenditure: 2.5 Billion RMB**

- Research Grants: 38%
- School Enterprises: 4%
- Regular Government Budget: 13%
- University Foundation: 13%
- Special Government Fund (211+985): 28%
- University Income: 23%

**A Profile of Research Activities**

- Number of ongoing projects: ≈ 2000
- Annual research grants: ≈ $80M
  - Of the amount, ≈ 1/5 from NSFC
  - Life science related, ≈ 1/3
  - IT related, ≈ 1/7
- International papers per year: ≈ 2000
  - Average IF: 2.0
The Priorities in Research

- Information Science and Technology
- Nano-science and Technology
- Bio-medical Science
- Environment and Resource Studies
- Physical Sciences
- Humanities and Social Sciences

Projects of International Collaborations

- Small Number: ≈ 100 projects/year (incomplete statistics)
- Small Scale: ≈ 100 K RMB/project
- Some Exceptions: > 1M RMB/project
  - Environment & Sustainability Project
  - Bill Gates Foundation, 1.9 M $ in Life Science
- Free Exploration vs. Application-oriented Research
- Mechanism: "Overseas R & D"

Publications

SCI Publications* with International Collaboration at PKU

<table>
<thead>
<tr>
<th>Year</th>
<th>Total</th>
<th>IF</th>
<th>International Collaboration</th>
<th>IF National Collaboration</th>
</tr>
</thead>
<tbody>
<tr>
<td>2002</td>
<td>174</td>
<td></td>
<td>27 (15%)</td>
<td>3.55</td>
</tr>
<tr>
<td>2003</td>
<td>125</td>
<td></td>
<td>20 (16%)</td>
<td>3.22</td>
</tr>
</tbody>
</table>

*First-Author based only

SCI Publications* in College of Chemistry, PKU

<table>
<thead>
<tr>
<th>Year</th>
<th>Total</th>
<th>IF</th>
<th>International Collaboration</th>
<th>IF National Collaboration</th>
</tr>
</thead>
<tbody>
<tr>
<td>2005</td>
<td>418</td>
<td>2.40</td>
<td>71 (17.0%)</td>
<td>3.55</td>
</tr>
<tr>
<td>2006</td>
<td>362</td>
<td>2.60</td>
<td>59 (16.3%)</td>
<td>3.32</td>
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</tbody>
</table>

*First-Author based only
**Publications**

SCI Publications in School of Basic Medicine, PKUHSC

<table>
<thead>
<tr>
<th>Year</th>
<th>International Collaboration</th>
<th>National Collaboration</th>
</tr>
</thead>
<tbody>
<tr>
<td>2004</td>
<td>15%</td>
<td>11%</td>
</tr>
<tr>
<td>2005</td>
<td>13% (IF=4.1, compared to 3.2)</td>
<td>16%</td>
</tr>
<tr>
<td></td>
<td>Harvard: 26%</td>
<td>43%</td>
</tr>
</tbody>
</table>

**Publications**

SCI Publications at PKU

<table>
<thead>
<tr>
<th>Year</th>
<th>Number</th>
<th>International Collaboration</th>
<th>First-Author Based</th>
<th>Number</th>
<th>IF</th>
<th>International Collaboration</th>
<th>First-Author Based</th>
<th>Number</th>
<th>IF</th>
</tr>
</thead>
<tbody>
<tr>
<td>2005</td>
<td>3008</td>
<td>785</td>
<td>26.4</td>
<td>3.12</td>
<td>2011</td>
<td>2.00</td>
<td>343</td>
<td>17.1</td>
<td>2.74</td>
</tr>
<tr>
<td>2006</td>
<td>2929</td>
<td>817</td>
<td>27.9</td>
<td>3.06</td>
<td>2006</td>
<td>2.01</td>
<td>358</td>
<td>17.8</td>
<td>2.39</td>
</tr>
</tbody>
</table>

**Publications**

SSCI & AHCI Publications at PKU

<table>
<thead>
<tr>
<th>Year</th>
<th>First-Author Based</th>
<th>Non F-A Based</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>2004</td>
<td>Number</td>
<td></td>
<td>204</td>
</tr>
<tr>
<td></td>
<td>126</td>
<td>78</td>
<td></td>
</tr>
<tr>
<td></td>
<td>International Collaboration</td>
<td>17 (13.5%)</td>
<td>55 (70.5%)</td>
</tr>
<tr>
<td></td>
<td>National Collaboration</td>
<td>10 (7.9%)</td>
<td>23 (29.5%)</td>
</tr>
<tr>
<td>2005</td>
<td>Number</td>
<td></td>
<td>74</td>
</tr>
<tr>
<td></td>
<td>28</td>
<td>46</td>
<td></td>
</tr>
<tr>
<td></td>
<td>International Collaboration</td>
<td>12 (42.9%)</td>
<td>41 (89.1%)</td>
</tr>
<tr>
<td></td>
<td>National Collaboration</td>
<td>3 (10.7%)</td>
<td>5 (10.9%)</td>
</tr>
</tbody>
</table>

**Publications**

AHCI

2004: 4 (First-Author: 3)

2005: 13 (First-Author: 8)
Opportunities and Challenges

1) Faculty Structure: 1/3-1/3-1/3
2) Resources at PKU Level
   a. Partner Universities
   b. Visitors
   c. Foreign Experts

How to Promote International Research Collaboration

University Day

The Practices in Promoting International Collaborations

Sister Universities

University Organizations & International Meetings

Student Exchange
**What Can We Do?**

**“China Strategy” at LSE and LSE China**

- Initiated in 2003
- >10 Programs with PKU:
  - PhD Co-supervision
  - Double MS degrees
  - PKU-LSE Summer School
  - Research Collaboration
  - Public Policy Training Program
  - ....

**IARU: “Global Changes and Sustainability”**

- Movement of People
- Longevity and Health
- Energy, Resources and Environment
- Security

**Members of IARU**

<table>
<thead>
<tr>
<th>ANU</th>
<th>ETH Zurich</th>
<th>NUS</th>
<th>PKU</th>
<th>UC-Berkeley</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cambridge</td>
<td>Copenhagen</td>
<td>Oxford</td>
<td>Tokyo</td>
<td>Yale</td>
</tr>
</tbody>
</table>

**What Can We Do?**

**Beijing Forum**

“The Harmony of Civilization and Prosperity for All”
- Korea Foundation for Advanced Studies
- Beijing Municipal Government

Beijing Forum 2007 ------ Nov. 2-4, 2007
“Diversity in the Development of Human Civilization”

**Sino- German University Presidents Meeting**

**Participants:**

<table>
<thead>
<tr>
<th>Germany</th>
<th>China</th>
</tr>
</thead>
<tbody>
<tr>
<td>Humboldt-Universität</td>
<td>Peking University</td>
</tr>
<tr>
<td>Freie Universität</td>
<td>Tsinghua University</td>
</tr>
<tr>
<td>Universität Heidelberg</td>
<td>Fudan University</td>
</tr>
<tr>
<td>TU München</td>
<td>Zhejiang University</td>
</tr>
<tr>
<td>RWTH Aachen</td>
<td>Shanghai Jiaotong University</td>
</tr>
<tr>
<td>Universität Tübingen</td>
<td>Nanjing University</td>
</tr>
<tr>
<td>Universität Freiburg</td>
<td>Xi’an Jiaotong University</td>
</tr>
<tr>
<td>LMU München</td>
<td>Tongji University</td>
</tr>
<tr>
<td></td>
<td>University of Science and Technology</td>
</tr>
</tbody>
</table>
Student Exchange

- Co-supervision or Sandwich Program
- Study Abroad Supported by CSC

Ideal Model:
“Research and Project Development Division”

- Qualified staff:
  - Professional backgrounds
  - People skills
  - Communication
  - Teamwork
  - Networking
- Well defined roles and responsibilities

Ideal Model:
“Research and Project Development Division”

- Coordination with various administrative units
- Functions (technical support):
  - Fundraising
  - Proposal preparation
  - Research policies
  - Lawyers
  - Consultants...

🌟 All to offer advice and assistance to the academic community.

Thank You!