How to Win International Grants

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Identifying Available Research Grants

- Many available
- Highly competitive
- Best option is the designated International funds or Programmes
- Targeted funds for Developing or Middle Income countries
Some Examples of International Funds
GrantsNet: International Funding Index

- http://sciencecareers.sciencemag.org/career_magazine/previous_issues/articles/2008_08_08/noDOI.17874891371734369206
- http://sciencecareers.sciencemag.org/funding
International Funds


- **Africa Grantmakers' Affinity Group** Search for organizations that fund projects in Africa, by category and/or country
- **Australia Regional Funding and Grants Register** Search for a grant, a grantwriter, funding and finance options, and more.
- **Canadian Foundations** Brought to you by Charity Village -- various grant-giving foundations throughout Canada.
- **Canadian Grants** The site of Big Online, a fee-based subscription service of available funding sources in North America with an emphasis on Canada.
- **Canadian Sources of Funding** Links to online databases and directories of funding agencies and foundations of interest to Canadian individuals and organizations.
- **Current Members Of the European Foundation Centre** Visit the websites of these organizations to find funding opportunities.
- **Fogarty International Center** Research grants, training grants, fellowships and other opportunities related to global health.
- **Health-Related Research Funding and Training Opportunities Database** Focused on the UK, but also includes funding opportunities from other countries.
http://grants.nih.gov/grants/how_to_apply.htm
http://grants1.nih.gov/grants/forms.htm
IDRC's research programs and projects (International Development Research Centre, Canada)

- IDRC's core research funding falls under four broad program areas. Follow the links to learn more about specific funding programs.

- **Environment and Natural Resource Management**
  - Climate Change Adaptation in Africa
  - Ecosystem Approaches to Human Health
  - Environmental Economics

- **Rural Poverty and Environment**
  - Urban Poverty and Environment
  - Water Demand Management

- **Information and Communication Technologies for Development**
  - Africa
  - Asia
  - Connectivity Africa
  - ICT4D in Middle East Project
  - Connectivity and Equity in the Americas
  - telecentre.org
General call for applications

Applications for IFS Research Grants are welcome from young scientists in developing countries to do research on the sustainable management, use or conservation of biological or water resources. This broad statement covers natural science and social science research on agriculture, soils, animal production, food science, forestry, agroforestry, aquatic resources, natural products, water resources, etc.
Project proposals are welcome at the IFS Secretariat throughout the year. For administrative purposes, we have two application deadlines, 30 June and 31 December.
The following requirements are directional to the type of information that is requested:

- You are asked to explain the relevance of your proposed project in relation to environmental and socio-economic conditions in your country/region.

  A scientific hypothesis/research question must be put forward. The objectives of your research must be stated in a way that can be met by carrying out the research plan.

  Your research plan normally requires 1-2 pages to provide enough information for the IFS Advisers to evaluate your project proposal. Purely technical transfer of existing, established technologies or extension projects will not be accepted. Convincing proof must be presented on that you have access to basic research equipment and facilities necessary for your project.

  An itemized budget for the project is an absolute requirement. The maximum budget is USD 12000. Only indicate budget items that can be funded by IFS.

  The institution that will administer your grant must be based in a developing country.
IFS supports

- Travel/Publication Grants
- Purchasing Services
- Mentoring Programme
- Capacity Enhancing Workshops
- Service and Maintenance of scientific equipment
Malaysian Grantees

- No. of hits: 81 grantees, 126 grants (Multiple grants)
- Grantee: IBRAHIM, Nazlina
  - Nationality: Malaysia
  - Country in which research was done: Malaysia
  - Institution in which research was done: City
  - Title of research project: Characterization of a styrylpyrrole derivative as anti-herpesvirus compound
  - Scientific area:
  - Number of grants received: Natural Products 1 (2006)
http://www.hhmi.org/grants/individuals/ (Howard Hughes Medical Institute)

- Infectious diseases and parasitology
- BUT
- Have to wait for COMPETITIONS
http://www.fic.nih.gov/programs/research_grants/ (Fogarty International Centre)

AIDS Int'l. Training & Research Program (AITRP) - Announcement Contact Jeanne McDermott, PhD Receipt Date August 14, 2009 Peer Review October-December 2009 Council Review January 2010 Earliest Start April 2010 Eligibility Full awards are U.S. only. Planning grants are institutions in low- and middle-income countries only.
Brain Disorders in the Developing World (BRAIN) - R21 Announcement Contact Kathleen Michels, PhD Receipt Date Non-AIDS Applications: May 15, 2009; May 14, 2010 AIDS Applications: August 21, 2009; August 23, 2010 Peer Review October/November 2009, 2010 Council Review January 2010, 2011 Earliest Start April 1, 2010, 2011 Eligibility U.S. & foreign institutions, at least 2 investigators (one from institution in high-income country & one from institution in low- to middle-income country) must collaborate on application as PI & Co-Investigator, PI may be from low- to middle-income country or from U.S. or other high-income country institution.
**Brain Disorders in the Developing World (BRAIN) - R01 Announcement**

Contact Kathleen Michels, PhD

Receipt Date
Non-AIDS Applications: May 15, 2009; May 14, 2010
AIDS Applications: August 21, 2009; August 23, 2010

Peer Review
October/November 2009, October/November 2010

Council Review
January 2010, 2011

Earliest Start
April 1, 2010; 2011

Eligibility
U.S. & foreign institutions, at least 2 investigators (one from institution in high-income country & one from institution in low- to middle-income country) must collaborate on application as PI & Co-Investigator, PI may be from low- to middle-income country or from U.S. or other high-income country institution.
Research priorities

The WCRF International Regular Grant Programme addresses one or more of the key research priorities highlighted below:

- Strengthen the evidence on topical research areas of diet and cancer
- Evaluate life course exposures
- Evaluate the role of body fatness and physical activity in relation to cancer risk
- Address behavioural change in relation to cancer risk
- Address dietary patterns
- Address cancer survivors
- Improve relevant methodologies
- Address molecular/genetic epidemiology
Pharmaceutical Companies

- Not the usual Multicentre Drug Trials
- Investigator/Clinician initiated
- Eg. Rahman Jamal (UKM)
- Thalassaemia patients and Iron chelator
- RM300,000
International Association for the Study of Pain


- Have to be members
- USD15000
- 3 grants per year
The application period for PDF's International Research Grants Program will open on Monday, November 2, 2009. Please note that our application deadlines have changed and applications for this program must be submitted by Tuesday, February 2, 2010.

- USD 75000/year for 2 years
International Collaborative Research Grant

The grants scheme was established to improve health in developing countries by:

- Funding research into major health issues of developing countries, and
- Developing research capacity in both developing countries of the region and in Australia and New Zealand.
Some Success Stories
Example: NIDA grant by Dr Mahmud Mazlan

- International Program of NIDA Collaborator
- Richard Schottenfeld, M.D.
  Department of Psychiatry, Yale University School of Medicine, New Haven, Connecticut, United States
  and
  Mahmud Mazlan, M.D.
  Addiction Medicine
  Substance Abuse Center
  Muar, Malaysia

- Professional Grant writers
Example: Wellcome Trust & Salmaan Inayat 2003

- [http://www.wellcome.ac.uk/Funding/index.htm](http://www.wellcome.ac.uk/Funding/index.htm)
- An international portion of Wellcome Trust
- Now no longer available
- Requires a local sponsor/collaborator
How to apply: The unsuccessful NIH experience

- Salmaan and NIH Fogarty RO3
- Proposal 70 pages
- Details:
  - Sponsor (David Ross, Colorado)
  - Parent Grant
  - Previous research
  - Preliminary findings
Review of Research Grants (NIH)

REVIEW CRITERIA:

- Significance
- Approach
- Innovation
- Investigator
- Environment
Review Criteria (continued)

- **Significance:** Does the study address an important problem? How will scientific knowledge be advanced? What are the societal benefits?

- **Approach:** Are design and methods well-developed and appropriate? Are problem areas addressed?

- **Innovation:** Are there novel concepts or approaches? Are the aims original and innovative?

- **Investigator:** Is the investigator appropriately trained?

- **Environment:** Does the scientific environment contribute to the probability of success? Are there unique features of the scientific environment?
Writing of Grant Proposal

- Identify research projects
- Confer with funding agency
- Develop your ideas
- Write your application
- Prepare the application
- Consider design issues, human subject issues, methodological issues
- Submit & follow progress
Keys To Success

- Find collaborators and mentors who are experienced in writing and winning grants
- Importance of early networking (post doc days)
- Make contact with scientific staff at appropriate stages of the review/award cycle
  - Priority Heads/Cluster Heads
  - Scientific Review Administrators
- Recognize that peer review has a special culture based on standing study sections composed of senior academic researchers with long histories of service and expectations of style, academic rigor, and hypothesis-based research
Some Suggestions

- Identify area/focus of funders/announcements
- Current issues/local/focus/problems/topics
- Focus of resources, expertise, infrastructure, and funds
- Types of support provided by funding agencies
- Research advisors – overseas researchers, adjunct professors
- High quality grant proposals
FY 2010 NIH Budget
$31.0 Billion – Percent Total by Mechanism

- Research Centers: 9.9%
- Intramural Research: 10.8%
- Research & Development Contracts: 11.1%
- Research Training: 2.7%
- Research Management and Support: 4.6%
- Facilities Construction: 0.4%
- Other Research, Superfund, Office of the Director: 7.8%
- Research Project Grants: 52.9%
NIH Grant Mechanisms

- **R01** Traditional investigator-initiated grant
  - < $500K/yr, 3-5 yrs. Need approval if more than $500K for any year of the grant

- **R03** Small Grant
  - < $100K for 2 yrs

- **R21** (NCI) Exploratory/Developmental Grant
  - < $275K for 2 yrs

- **R13** Conference Grants
  - amount dependent on score, timeliness, budget, NIH interest
Grantsmanship

Steps in preparing a successful grant application
Step One – Scoping

- Identify possible research projects
- Use web-based NIH data-bases and resources
- Identify candidate NIH Institutes/Centers
- Identify candidate NIH grant initiatives
  - Program announcement (PA)
  - Request for applications (RFA)
  - Investigator initiated application
- Review NIH grant application procedures – PHS 398 Instructions
Step Two – Make NIH Contacts

- Confer with NIH Program Directors
  - Assess the “fit” to the Institute/Center
  - Find out what’s new – PAs and RFAs
  - Decide on mechanism – e.g., RO1, R03, R21
  - Find collaborators
  - Identify review issues – Dos and Don’ts
  - Define product and focus application
Step 3 Develop Your Idea

- Review literature
- Generate preliminary data
- Enlist collaborators, include letters of commitment
- Review successful grant applications of other colleagues
Step 4 Writing the Application

- Clear, concise writing style
- Be focused
- Don’t rush
- Critique, critique, and critique again
- Follow up with NIH program directors before and after review
Step 5 Preparing the Application

- Follow instructions – PHS 398
- Never assume that reviewers “know what you mean”
- Refer to literature thoroughly
- Present a clear rationale for the proposed work
- Make sure that the experimental approach is thorough and detailed
- Include well-designed tables and figures
- Anticipate human subject issues
General Design Issues

- Will it work?
- Supporting preliminary data
- Valid Instruments
- Pilot data
- Reality check – subject burden
- Will compliance rate(s) be adequate
Methodological Issues

- Sampling Methods
- Power Calculations
- Theoretical-based Intervention
- Compliances
- Data Acquisition and Management
- Participant Training and Monitoring
- Data Analysis
Human Subjects Issues

Four criteria
- Risks*
- Protections
- Benefits to subjects and others
- Importance of knowledge

- Data Safety and Monitoring Plan for clinical trials
- Exemptions applicable
- Inclusion plans
  - Minorities, women, children,

*Risks include the possibility of physical, psychological, or social injury resulting from research.
More Human Subject Issues

- Recruitment and informed consent
  - Vulnerable populations
  - Incentives
  - Informed Consent
    - Participation
    - Use of information
    - Future analysis

http://ohrp.osophs.dhhs.gov/humansubjects/guidance/45cfr46.htm
Step 6 Submit the application

- Include cover letter
  - Request Institute assignment for funding
  - Request study section assignment for review
  - Indicate potential conflicts
  - Suggest expertise but not reviewers by name
- Multiple Institute assignments acceptable
- Institute or CSR review predetermined (you can’t choose)
- Meet submission deadlines
  - If late, ask for exception and provide reason
    - Weather, health, study section activities
    - Exceptions never granted prior to submission
Step 7 Monitor Review Process

- Contact Scientific Review Administrator for information and to express any concerns
  - Timing
  - Institute assignments
  - Study section assignment

- Provide input about needed expertise - Do Not Suggest Reviewers by Name!

- Identify possible conflicts of study section reviewers – *e.g.*, professional, personal, financial, institutional

- Be mindful that NIH review administrators are typically managing multiple meetings involving about 100 applications per round
Step 8 Post Review Followup

- Contact Program Director for information and guidance
- Discuss outcome of merit peer review
  - Review summary statement
  - What the scores mean (Institute ranking)
  - Strengths and weaknesses
  - Recommendations for improvement
- Discuss Institute program priorities
- Likelihood of funding
- Next steps
Summary

- Higher chance of success with International Grant offers
- Requirement for Sponsors/Collaborators
- Close/Known working relationship with sponsor; Importance of networking
- Meets criteria eg Young researchers, country qualifies, concept paper, topics, announcements
- Contact person for information and details
- Pure hard work and effort but keep trying!
Thank You

- Wishing you success in applying for research funds