

# Bioengineering Research Partnership Program Evaluation at the National Heart, Lung, and Blood Institute



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# NHLBI BRP Evaluation Group

- **Division of Heart and Vascular Disease**
  - Tim Baldwin, Martha Lundberg, Sunil Pandit,
- **Division of Lung Diseases**
  - Andrea Harabin, Gail Weinmann
- **Division of Blood Diseases and Resources**
  - Pankaj Ganguly, Phyliss Mitchell
- **Office of Science and Technology**
  - Cheryl Howard, Carl Roth
- **NIH BECON**
  - Mike Huerta, Chris Kelley, Jeff Schloss, Dan Sullivan, Fei Wang
- **Contractor: Humanitas, Inc.**
  - Stephanie Karsten, April Smith, Maura Kephardt, Lynne Firester, Anne Wengrovitz



# Purpose of Feasibility Study

- **RATIONALE:** Given both the costs and duration of the BRP PA, it is timely and important for the NIH to develop appropriate evaluation methodology.
- FY05 support about \$31.5M. However, despite the size and continued growth of the NIH-wide BRP program, little tracking and no systematic analysis has been conducted to determine whether the goals of the program are being met.

# Specific Goals of the BRP Announcement

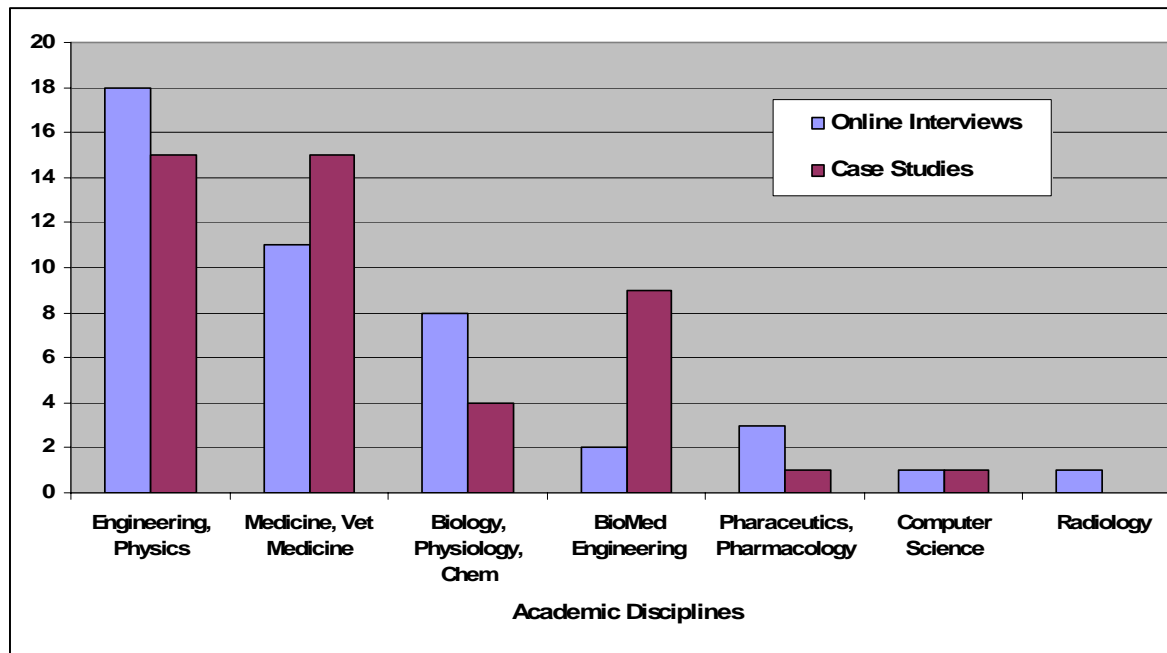
- Encourage basic, applied, and translational bioengineering research that could make a significant contribution to improving human health
- Encourage collaborations and partnerships among the allied quantitative and biomedical disciplines

# Scope of Feasibility Study

- Specific Aims:
  - Evaluate, through information obtained from a small number of case studies and/or questionnaires of National Heart, Lung, and Blood Institute (NHLBI)-awardees, the extent to which there are recognized standards of performance that could be used to assess success; and
  - Provide recommendations that will be useful to the NIH in administering the program.

# Data Set

## Academic Disciplines of Lead BRP Awardee Investigators



**Engineering/Physics and Medicine/Veterinary Medicine are the two most common academic disciplines reported by respondents in the online interviews and summarized in the case studies.**

# Conclusions

- Key metric: Are we increasing Collaborations?
- Need to strip away subjective bias with adequate Comparison Group: unfunded, but competitive applicants
  - Ask for Partnership information directly
  - Did they get funding elsewhere?
- Identify collaboration effort before and after the PA

# Near-term Recommendations

- Emphasize reviewer orientation and training about the basic premise of the BRP Program for the proper peer-review of applications.
- Speed up renewals of funding to avoid delaying important research.
- Enhance cross-disciplinary research by identifying government health needs and organizing conferences to foster learning and new relationships.



# Next Steps (I)

- Program participation approved through May 2007 receipt date:  
<http://grants.nih.gov/grants/guide/pa-files/PAR-06-459.html>
- Focus Areas:  
<http://www.nhlbi.nih.gov/funding/inits/brp-areas.htm>
- Further participation will require compelling evidence that mandates PAR continuance

# Next Steps (II)

- Interim: sub-analysis (telephone interviews) to determine policy issues and guide effective decisions: what is the public health impact?
- Perform assessment of unfunded applications:
  - key personnel
  - IRG assignment
  - Type: hypothesis, design, or hybrid
  - Costs
- Determine if Full-scale evaluation is needed:  
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