

**SUPPORTING STATEMENT FOR PAPERWORK REDUCTION SUBMISSION**  
**(3145-0157)**  
**SURVEY OF EFFECTIVENESS OF INSTRUMENT DEVELOPMENT FOR**  
**BIOLOGICAL RESEARCH**

**A. JUSTIFICATION**

**1. CIRCUMSTANCES MAKING COLLECTION OF INFORMATION NECESSARY**

On September 11, 1993, President Clinton issued Executive Order 12862, "Setting Customer Service Standards," which clearly defined his vision that the Federal agencies will put the public first. To accomplish this, President Clinton called for a "revolution within the Federal government to change the way it does business." He expected this process to require continual reform of government practices and operations to the end that, "when dealing with the Federal agencies, all people receive service that matches or exceeds the best service available in the private sector."

Section 1(b) of this E.O. requires agencies to "survey customers to determine the kind and quality of services they want and their level of satisfaction with existing services" and Section 1(a) requires agencies to "survey front-line employees on barriers to, and ideas for, matching the best in business." These Presidential requirements established an ongoing need for the National Science Foundation (NSF) to engage in an interactive process of collecting information and using it to improve program services and processes.

**2. HOW, BY WHOM, AND PURPOSE FOR WHICH INFORMATION IS TO BE USED**

The Division of Biological Infrastructure in the Directorate for Biological Sciences supports the Instrument Development for Biological Resources (IDBR) program as part of the Research Resources Cluster. The IDBR Program supports the development, production, and distribution of novel instrumentation that addresses demonstrated needs in biological research in areas supported by the NSF Biology programs. Support is provided through two tracks: Type A proposals (Innovation) support the development of novel instrumentation that provides new research capabilities or, where appropriate, the improvement of current technologies by at least an order of magnitude. Type B proposals (Bridging) support the transformation of "one of a kind" prototype or high-end instruments into devices that are broadly available and utilizable by the user community. Research instrumentation developed through support of the IDBR proposal should not be limited in application to the PI's laboratory. Critical to the evaluation of the intellectual merit of both Type A and Type B proposals is a dissemination plan which demonstrates how knowledge and use of the instrumentation will be made available to the associated user community.

The purpose of this survey is to collect customer satisfaction information on the effectiveness of the program in bringing the development of instrumentation to completion and providing access

to the instrumentation by the biological community it is designed to serve. This can be measured through a variety of outcomes including, but not limited to publications, collaborative science efforts, the formation of user groups, the identification and/or procurement of additional supporting programs or funding (iCORPs, SBIR, STTR, IDBR Type B, etc.), and commercial development partners. The results of this survey will be used by NSF staff to improve the IDBR program. The results of the survey will be shared with IDBR principal investigators and their teams through an IDBR Principal Investigators meeting, to be held in May 1-2, 2014. The results will also be shared through e-mail correspondence with those PIs who do not attend. More generally, the results of the survey will inform the NSF staff and scientific community as to the effectiveness of the IDBR program in generating new and novel scientific instruments and devices that are transformative in how research supported by the Directorate of Biological Sciences is conducted and the mechanisms by which such instrumentation is made available to colleagues in the scientific community.

### **3. USE OF AUTOMATION**

The proposed survey will be conducted electronically, through the internet. We will use Survey Monkey to construct and administer the survey. Using Survey Monkey, the participants will be notified by e-mail, and their responses will be kept anonymous. Our participants will be made up of IDBR awardees from years 2009 – 2014 (approximately 125 participants). Prospective responders will be provided with contact information (e-mail and telephone number) from appropriate NSF staff in case there are questions or concerns.

### **4. EFFORTS TO IDENTIFY DUPLICATION**

No other federal agency or directorate/division within NSF is involved in an effort to obtain this information from IDBR awardees.

### **5. SMALL BUSINESS CONSIDERATIONS**

Not applicable.

### **6. CONSEQUENCES OF LESS FREQUENT COLLECTION**

Not applicable.

### **7. SPECIAL CIRCUMSTANCES FOR COLLECTION**

Not applicable.

### **8. FEDERAL REGISTER NOTICE**

The agency's notice, as required by 5 CFR 1320.8(d), was published in the *Federal Register* on January 12, 2011, at 76 FR 2151 and no substantive comments were received.

## **9. OUTSIDE CONSULTATION**

Discussions with IDBR awardees, individuals who serve on the IDBR proposal review panels, and other Program Directors have led to a concern as to whether the IDBR program was doing all that it could to support the goals of the IDBR solicitation with respect to developing instruments and devices that were accessible to the broader scientific community either through robust dissemination action or commercialization. For this reason, it was decided to explore through a customer satisfaction survey the extent to which awardees are able to accomplish these goals, other correlations to success and failure, and actions that could be taken by the IDBR Program Directors and Staff to make these goals more achievable.

## **10. GIFTS OR REMUNERATION**

Not applicable.

## **11. CONFIDENTIALITY PROVIDED TO RESPONDENTS**

No personal information will be collected from participants and none will be documented in any project deliverables. Information will be used for internal purposes only to assess the program's stated objectives.

## **12. QUESTIONS OF A SENSITIVE NATURE**

No questions of a sensitive nature will be asked.

## **13. ESTIMATE OF BURDEN**

It is estimated that it will require approximately 30-45 minutes for a respondent to complete the survey. We estimate that we will have 125 respondents, for a burden total of 83 hours.

## **14. COST TO RESPONDENTS**

None

## **15. CAPITAL/STARTUP COSTS**

Not applicable.

## **TOTAL COST TO THE FEDERAL GOVERNMENT**

This will be considered a part of the administration of the program and not an additional cost.

## **16. CHANGES IN BURDEN**

There are no changes in burden. This proposed collection fits within the limits of our generic clearance.

## **17. PUBLICATION OF COLLECTION**

Not applicable.

## **18. SEEKING APPROVAL TO NOT DISPLAY OMB EXPIRATION DATE**

Not applicable.

## **19. EXCEPTION(S) TO THE CERTIFICATION STATEMENT (19) ON OMB 83-I**

There are no exceptions.

### **B. STATISTICAL METHODS**

#### **B.1. Universe and Sampling Procedures**

Individuals sampled will be those who have received IDBR awards for the period 2009-2014. These individuals will receive an e-mail explaining the purpose of the survey, a link to the on-line survey through Survey Monkey, and NSF program officer and staff contact information should they have any questions.

#### **B.2. Survey Methodology**

The survey will be web-based, with the invitation to respond sent by email.

#### **B.3. Methods to Maximize Response**

Every effort will be made to maximize the participants' response to the survey. Participants will be informed of the survey through an e-mail from the NSF Program Director. The survey will be on-line and accessed by a link provided in the e-mail. Questions will be relevant, brief, and explicit. The survey should take no longer than 30 minutes to complete. The survey is returned with a simple click of a button on-line.

#### **B.4. Testing of Procedures**

Pre-testing was done with internal staff to gauge the estimated time needed to complete the survey.

#### **B.5. Contacts for Statistical Aspects of Data Collection**

The program directors for the IDBR program, Robert Fleischmann and Joyce Fernandes will be the points of contact for data collection and analysis.

### **Attachments**