Response to Findings and Recommendations of the Report of the 2011 Committee of Visitors Science and Technology Centers Program

INTRODUCTION

The Science and Technology Centers (STC) Program Committee of Visitors (COV) met in Arlington, VA on May 16-18 2011. The committee reviewed all STC program actions for the period 2003-2010. The review was undertaken to provide NSF with an independent evaluation of the: (i) Quality and effectiveness of the STC merit review process and (ii) Management of the STC Program, both pre-award and post award.\(^1\)

The STC COV was composed of seven members and was chaired by Dr. Patrick Looney. Committee members were given access to all program actions for the review period, approximately 380 proposal declines for two STC competitions and the award portfolio of the 17 active centers. The committee chair assigned specific jackets to the committee members for review, with the objective of looking at different stages of the STC competition and award management practices.

As a result of its evaluation, the STC COV provided a number of findings and recommendations for program improvement. These findings were reviewed by the Office of Integrative Activities (OIA) staff and NSF Senior Management, and actions were taken on some of these items immediately during the new competition that started May 31, 2011.

NSF RESPONSES and ACTIONS TO SPECIFIC COV RECOMMENDATIONS

Overall, the COV report is very complimentary, and OIA expresses its appreciation to the members of the STC COV for their constructive recommendations and insightful findings. OIA is particularly appreciative of the COV’s comments pointing to the importance of the STC program and endorsing the shared governance model (between OIA and directorates) of managing the competition and individual centers.

OIA also recognizes that the report points out a few opportunities for improvement. The following summarizes NSF actions and responses to the concerns and recommendations of the STC COV.

Quality and Effectiveness of Merit Review Process

- **Clarification of Cost Sharing Policy.** NSF staff shares the COV view that the cost sharing policy - voluntary cost-sharing is prohibited - is not clearly communicated to the proposing institutions. While there is no evidence that voluntary cost sharing influences decision making, the program will continue emphasizing and clarifying the policy, both to the external community in future solicitations and to the reviewers for the current competition at all stages of the review process.

\(^1\) The COV did not attempt to evaluate impacts of the STC program portfolio which were the subject of the recent AAAS program review, http://php.aas.org/programs/centers/capacity/documents/stc_aas_full_report.pdf.
• **Reviewer training to provide substantive comments on relevant review criteria.** For the present competition, we developed and implemented in Fastlane, a reviewer template that is consistent with the pre-proposal review criteria and which provides guidance to reviewers about the STC Program criteria. Furthermore, this issue was given special attention in the reviewer briefing session prior to the panel meetings that were just held for the current STC competition. Based on the feedback we have received from the reviewers, we plan to consider developing an internet based training module for all reviewers who participate in future STC proposal reviews.

• **Improve jacked documentation on rationale for final recommendation in cases where there is no clear panel recommendation.** Starting with current competition, consistent reviewer and panel summary templates were implemented in Fastlane to emphasize the review criteria and try to ensure consistency of the reviews. We have also standardized our review analysis process to ensure that there is sufficient documentation showing the decision making process.

• **Provide more detailed summaries from the Blue Ribbon Panel (BRP) review.** Starting with this competition, in order to improve the transparency of the process, we will ensure that the BRP summary includes a detailed context statement about panel considerations and the decision making logic.

Qualifications of the Reviewers

• **Reducing proposal pressure.** NSF staff shares this concern, and a discussion on the impact of further limiting the number of submissions is warranted. We plan to consider the pros and cons of further limiting proposal submission for any of the future competitions.

• **Improving balance across reviewer characteristics.** This is a problem across practically all programs at NSF. As a first step in the STC Program we have revised the conflict rules, under the guidance of the General Counsel’s Office, so that we can broaden the reviewer pool. We plan to continue striving to achieve an appropriate balance at each stage of the competition within the constraints imposed by these new rules.

• **Reviewer training—unintended consequences of bias.** This training was instituted in the last completion and was continued in the current competition with the objective of further emphasizing the importance of this issue. We will continue fine tuning this training as we go through the different stages of the current competition.

Post Award Management

• **Incorporation of various models of site visits, as appropriate.** The practice of reverse and virtual site visits is on-going. At this stage, we are developing plans to strengthen criteria and documentation supporting the selection of a particular site visit model as well as to draw together best practices and lessons learned.

• **Education and Diversity plans strengthening.** We are currently working with representatives of Directorate for Education and Human Resources on providing more guidance to the perspective STCs on different resources and practices that can improve their education plans as they develop.