

PROGRAM TERMS AND CONDITIONS

Definitions. ‘Host Company’ is an eligible Phase II SBIR firm who has been approved by NSF and ASEE to host a postdoc at their site; ‘Fellow’ or ‘Research Fellow’ is an ASEE approved fellowship awardee who has been assigned to a Host Company; ‘Collaborative Match Proposal’ (CMP) is the document nominating a fellowship candidate that is submitted by an eligible company for review by ASEE staff.

GENERAL

NSF will provide a \$78,000 stipend per year of the direct stipend for each participating fellow plus the cost of the participant's individual health insurance. NSF funding is also requested to support up to \$1,500 per Fellow per year in the program for professional travel, up to \$3,000 relocation costs (each way), and up to \$3,500 per year per Fellow for professional development programming organized through ASEE. Program Terms and Conditions include the Roles and Responsibilities of the Fellow and Host Company as described in this proposal and are subject to change during the period of performance of this grant.

PROGRAM FELLOWS MUST BE U.S. CITIZENS OR U.S. PERMENANT RESIDENTS

Eligibility. ASEE proposes that all prospective Research Fellows meet the following eligibility guidelines in order to apply or begin a fellowship in this program. Each Fellow must be a U.S. citizen, U.S. national or legal permanent resident at the time of their application to the host company. Fellows must have been awarded, within seven years prior to the date of application to the host company, a Ph.D., Sc.D., or other earned doctoral degree in a field of study supported by the NSF from an accredited program in the field and have not participated in another corporate/industrial postdoctoral fellowship at a company laboratory within six months of their application to the host company. Fellows must not have been a postdoc, contractor, consultant, employee, or in any way paid for services by the Host Company in the past. Fellowship applications will be accepted from all persons regardless of race, ethnicity, and gender according to NSF fellowship guidelines.

Non-Eligibility. In addition to persons who do not meet the above criteria, prospective Research Fellows who have been or are currently funded by an award or sub-award of an SBIR grant involving the Host Company or will be funded by any other federal government grant or contract during their postdoctoral appointment are not eligible to participate in this program.

Reporting. Fellows will be required to submit semi-annual progress reports, due every six months from the start of their appointment in the program. The second or final semi-annual report will serve as a final report from the fellow discussing their accomplishments in the program. The final report will take a different form to include the period since the last semi-annual report and a summary of overall activities and outcomes. Fellows will be required to complete an exit survey and other closure documents when departing the program as part of the final report. (See Fellows Roles and Responsibilities for details.)

NEW ELIGIBILITY REQUIREMENTS FOR NSF APPROVED PHASE II COMPANIES

Eligibility. Only active, NSF approved, SBIR Phase II / IIB / TECP grantees are eligible to participate in this program. However, due to funding cycles, it is common for a company to have started their Phase II effort when they request a postdoc. This means that a Phase II project may end before a postdoctoral appointment is over. Unfortunately, for many companies, the end of Phase II funding means the end of the project. Historically, this issue has left postdocs in a state of limbo when the project ended. In support of its Fellows, ASEE proposes to require that the remaining Phase II effort of a Host Company cover at least 75% of the proposed period of performance of the Fellow. Under this requirement, the minimum Phase II project effort needed at the start of the appointment to host a Fellow for 1 year will be 9 months.

Reporting. Host Company mentors will be required to provide semi-annual mentoring reports describing the professional and technical development of the fellow. The mentoring report is due every six months from the start date of the Fellow. The mentor is responsible for submitting the semi-annual mentor report and the semi-annual progress report authored by the Fellow to ASEE for review.

RESEARCH FELLOW SCOPE OF WORK WILL BE AN 80/20 SPLIT

Fellowship appointments are designed to engage the undivided, full-time professional efforts of the Fellow in mutually agreed upon research and professional development activities with the Host Company. The tasks to be performed by the Fellow in this program will be based on the mutual interests and goals of the Fellow and the Host Company. ASEE proposes that the scope of technical work of the Fellow be primarily focused on one or more objectives or deliverables of the NSF SBIR Phase II project effort over the course of the fellowship. Eighty percent (80%) of the effort of the Fellow will focus on the Phase II project scope of the host company. Under current program guidelines, SBIR Phase II project scope includes efforts to publish, patent, or otherwise report or disseminate the outcomes of the Phase II program.

The Host Company will be required to allocate the remaining 20% of the effort to professional development activities that will 1.) increase the opportunity of the Fellow to be employed at the Host Company or 2.) increase the likelihood the fellow will create a new business enterprise. Professional development activities in this context would include writing and performing on new technical research grants, participating in Host Company business development efforts, business and entrepreneurship training (e.g., I-CORPS™), technical or management certification, or the development of new ideas for the mutual benefit of the Fellow and Host Company. Host Companies and Fellows will jointly develop professional development activities with measurable outcomes for the Fellow. These activities will be in addition to the professional development programming to be provided through ASEE. Host Companies must allow Fellows to attend all professional development activities sponsored by ASEE. The scope of work of the Fellow will be captured in the Research Plan, IDP, and the Work and Training Plan components of the program application. Fellows who author new grants for the Host Company are expected to be a PI on the grant. If awarded, Fellows will be allowed leave up to six months from the IPERF to perform as a PI on the grant with the Host Company and return to the program as funds allow. Temporary professional development activities in excess of 20% must be requested in writing by the Fellow for review by ASEE.

VARIABLE APPOINTMENT TERMS UP TO TWO YEARS

Appointments are initially made for one year only and are renewable in exceptional cases for a second term upon annual review and mutual agreement of the Fellow, Host Company, and ASEE subject to the availability of funds for this purpose. Appointments will begin at the mutual convenience of the Fellow and the Host Company, but not later than 45 days after the appointment has been approved by ASEE and are subject to Phase II period of performance requirements set by ASEE. General company policies apply to Research Fellows. As self-employed guest researchers, Fellows are responsible for their time and attendance. Failure to adhere to a reasonable work schedule could result in termination. Formal offers to participate in the SBPRDF program may only come from ASEE. All applicants must meet citizenship eligibility requirements at the time of their application to the program. Appointments are assigned to the Fellow / Host Company pair and then the Fellow. Reassignment of a Fellow to another company or replacement of departing Fellow at a Host Company is not guaranteed in this program. ASEE seeks to maximize the number hosts and Fellows in the program to the benefit our Fellows.

Host Company can host only one Fellow, for an IPERF Fellowship. Multiple appointments of more than one Fellow are invalidated even if the company holds more than one Phase II awards.

FELLOW SELECTION POLICY FOR HOST COMPANIES

The IPERF program seeks to become the gold standard and a catalyst in support of SBA Summary Policy Directives and NSF's mission to broaden participation and accelerate U.S. competitiveness in innovative research. In furtherance of these objectives of the NSF and the SBA, ASEE proposes that all eligible

companies and fellowship applicants submit a Diversity Statement that will be reviewed for compatibility with the broadening participation mission of NSF and this program. Host Companies will be expected to select Ph.D. degree recipients from the ASEE database who support the aforementioned objectives and meet the requirements described in the Term and Conditions section of this proposal.

Diversity Statement. All applicants will provide an essay describing their past and present commitment to broadening participation of under-represented minorities in science and engineering as defined by NSF. Similar to the Research Plan and the Work and Mentoring Plan, the Diversity Statement will be evaluated as part of the fellow application. The Diversity Statement will address questions such as, “How will your appointment as a Research Fellow in this program support broadening participation in STEM?”, “What have you previously done in support of broadening participation or diversity in STEM?”, and “What is your continuing commitment to broadening participation?” The Diversity Statements from the fellowship applicant and host company will be evaluated and used in ASEE’s decision to approve a proposed match.

Emphasis on Demographic and Geographic Diversity. ASEE aims to increase demographic and geographic diversity of the participants in NSF innovative research program by prioritizing the support of postdoctoral Fellows who are, 1.) socially and economically disadvantaged, first generation doctoral degree holders in a S&E field, Fellows who elect to participate in projects in states that are underserved by NSF programs as defined by the Established Program to Stimulate Competitive Research (EPSCoR), and demonstrate and provide verifiable past and present commitment to the broadening participation mission of the NSF. Such persons include, for example, underrepresented minority (URM) groups in S&E, defined by the NSF as Black or African Americans, Hispanic or Latino Americans, Native Americans or American Indians, Alaska Natives, Native Hawaiians, and Native Pacific Islanders, verified Level 2 participants in the LSAMP program, recipients of the LSAMP Bridge to the Doctorate program scholarship and the McNair Scholars Program (MSP) which supports first generation college students of all backgrounds. The 2014 NSF Doctorate Recipients From U.S. Universities reports first generation college students were less likely to participate in postdoctoral education. Including McNair recipients tap a diverse pipeline of applicants in support of the aims of this program. Economic disadvantage will be determined from documented receipt of Pell Grants or related federal need-based grant support during the majority of their undergraduate education. Participation in the aforementioned programs will be validated. ASEE believes the implementation of these policies and the proposed promotion effort will produce cohorts of highly qualified demographically diverse entrepreneurs who will impact underserved communities.

RESEARCH FELLOWS ARE INDEPENDENT CONTRACTORS, SOME SUB CONTRACTORS

Independent Contractors. Research Fellows in this program are independent contractors of ASEE (self-employed guest researchers), and in no case would they be considered employees of ASEE, NSF, or the Host Company. All stipend payments and other reimbursable expenses would be reported to the Internal Revenue Service (IRS) on federal 1099-MISC forms, providing an effective reporting of all tax information for the Fellow. A memorandum which addresses the tax liability for all participants would be sent to all fellows as part of their appointment packet. The terms of appointment will be issued by ASEE and signed by the Fellow / Host Company team and may be tailored to meet the needs of either party.

Fellows May Perform as Sub-Contractors. ASEE proposes an innovation to break down a barrier that has led to low participation of research-oriented minority owned and women own businesses in SBIR/STTR and federal government contracting. Since most small businesses fail within 2 years, the SBA uses the length of time in business as a means of measuring the potential for success of a company. The SBA requires two years of business history in order to qualify for set aside programs and contract vehicles (e.g., the 8A Business Development Program and GSA IT Schedule 70.) Businesses that do not meet the time requirement for such programs are often forced to engage larger firms in burdensome subcontractor agreements in order to provide their unique skills to the government.

ASEE proposes a pilot that will allow a subset of Fellows to establish their business performance history as a government contractor during their appointment in the program. These Fellows will take part in training to help them establish norms associated with good contracting practices coordinated by ASEE. These Fellows will be required to register in the appropriate databases as a small business and maintain their time

as a contractor. ASEE believes this pilot could produce a wave of research-oriented small businesses led by savvy researchers who are ready to support government research needs.

HOST COMPANY MENTORING AND WORK PLANNING

Companies are required to secure the time commitment of an in-house mentor for each of the participants in the program. The mentor must be an employee of the host company and ideally not the direct supervisor of the fellow. The company mentor must certify completion of ASEE specified mentor training and the individual development plan (IDP) within 30 days of the appointment start date. ASEE has identified mentor training materials from several sources including the National Research Mentoring Network. Mentors will also be responsible for submitting semi-annual mentor reports, due every six months, summarizing the interactions with the Fellow and assessing their progress on the research plan.

The mentor proposed by the host company will be required to develop a comprehensive work plan and training program for each of the participants under his or her guidance in this program. Work plans will be required to address the research goals and expected outcomes of the proposed research, and explain how on-the-job skills training and professional development will be provided to the Fellow. The work plan will address how the mentor will interact with the participant and include a proposed meeting schedule. The Host Company will provide a statement regarding the commitment of funding, the availability of facilities and equipment for the proposed work in this plan. Fellows will be permitted to publish their research results in the open literature only with the specific approval and guidance of the host company. ASEE will review all work plans to ensure coherence with program goals and expected outcomes.

FELLOW LEAVE POLICY

As independent contractors, Research Fellows are expected to coordinate sick and vacation leave with their supervisor as the occasion arises. Leave in excess of two consecutive weeks must be arranged and approved by ASEE and the Host Company. Fellows will be allowed to arrange an unpaid absence for family/medical reasons. Requests for an unpaid absence must be arranged with and approved by the Host Company and ASEE. Approval carries the expectation that the Research Fellow will return to their Host Company within the ensuing 90 days to complete the agreed upon fellowship commitment. An absence exceeding 90 days may result in the termination of the fellowship appointment. The time remaining in the fellowship appointment after the leave of absence is subject to the availability of funds and other program objectives. Once a fellowship offer is made by ASEE, the applicant must accept the offer according to the timeframe in the terms and conditions of the program or forfeit the appointment.

PROGRAM ROLES AND RESPONSIBILITIES

In this section, the Roles and Responsibilities for each party in each phase of the proposed program lifecycle are described. The main elements of the program lifecycle of this fellowship are: 1.) Pre-Application, 2.) Application; 3.) Adjudication and Pre-Appointment; 4.) Appointment; 5.) End of Appointment; and 6.) Reporting.

RESEARCH FELLOW ROLES AND RESPONSIBILITIES

PRE-APPLICATION

Prospective Fellows should add their profile to the program website so they will be found by a company. Once their profile is complete, prospective fellows will be encouraged to contact the companies on the program website to seek opportunities.

APPLICATION

Prospective Research Fellows will be required to show that they meet all program eligibility requirements at the time of application and submit proof of eligibility in the program, (e.g., proof of citizenship, degree completion certification, etc.) as part of their application. Applicants must agree to attend all professional development activities sponsored by this fellowship program and agree to assign all intellectual property

ownership rights to their work performed under the program to the host company pursuant to the host's standard terms of employment or engagement.

ADJUDICATION AND PRE-APPOINTMENT

Prospective Research Fellows will be expected to respond promptly to inquiries regarding their application or have their application denied by ASEE. Upon approval of their appointment, Research Fellows will be expected to report to the Host Company on the agreed upon start date and relocate to the vicinity of the Host Company within 30 days of the start date.

APPOINTMENT

It is important for Fellows to complete the fellowship in a way that supports positive future relations between the Fellow and his/her supervisor and/or mentor and colleagues; and that maintains the integrity of the partnerships, contractual agreements and expectations that ASEE has established with program stakeholders. Fellows are expected to complete a minimum of one year in the fellowship.

During the appointment, Fellows are expected to follow host-company policies including but not limited to, for example, reporting of time and attendance, security protocols, and code of conduct. As self-employed guest researchers, Fellows are responsible for their time and attendance. Failure to adhere to a reasonable work schedule or violation of host-company policies could result in early termination. Fellows must submit all semi-annual reports on time to remain in compliance with program guidelines and submit all reimbursement requests in a timely manner. Only itemized receipts for expenses will be considered for reimbursement, meals will be reimbursed at the GSA approved local M&IE rates.

END OF APPOINTMENT

At the end of the fellowship, the Research Fellow will be required to provide a final report of aims, activities, and outcomes covering the final six months of their appointment to ASEE in the format of the semi-annual report for the program. The final report will also include an abstract and a list of all inventions made and/or reported during the entire fellowship period as part of their final report. Fellows will be expected to consult with their Host Company to identify and highlight any data that are proprietary in the report and supply a public narrative for proprietary information. Barring any extenuating circumstances, Fellows must facilitate the closure or transition of all projects assigned to them while in residence at the Host Company. Fellows will be required to complete all program exit materials including, for example, exit questionnaires and program evaluations. Fellows must agree to repay ASEE any unused portion of stipend overpaid to the Research Fellow within 30 days of the end of the fellowship. Fellows are to leave peaceably and immediately return all written and electronic project property to the Host Company. Program stipend, health insurance coverage, and other ASEE provided benefits elected by the Research Fellow will be terminated effective the last day of the fellowship. Fellows must also disclose to the host company any inventions made, i.e. conceived or actually reduced to practice, and any other intellectual property created or developed during their time at the program. Invention means any discovery or innovation that may be patented or otherwise protected under the U.S. patent laws.

Early Program Departure. Leaving the IPERF program before completing a substantial portion of the 12-month fellowship year is considered voluntary departure or withdrawal. Fellows are expected to consult with ASEE staff before announcing a withdrawal to the Host Company. ASEE will be available to assist with possible arrangements to accommodate fellowship completion. Fellows who voluntarily withdraw and terminate their fellowship surrender their good standing in the program.

If a Research Fellow voluntarily departs before the agreed upon end date of their appointment, the Fellow will be required to submit a written letter of resignation providing a minimum of 30 days' notice to the host-company and ASEE of their intention to depart the program, shorter notice of departure must be arranged with ASEE. Research Fellows who voluntarily part from their Host Company with 9 or more months left on their fellowship may request placement in another host-company in a separate contemporaneous written correspondence to ASEE within 1 week of written notice of resignation. Fellows are not guaranteed re-assignment to another company; reassignment requests will be reviewed and decided on a case by case basis by ASEE. If a reassignment request is approved and another position is not found for the fellow within

30 days of the resignation date, the Fellow will be released from the program. Terms of voluntary or involuntarily departure of a Fellow are subject to closeout requirements described in *Fellows Roles and Responsibilities - End of Appointment*.

REPORTING

Research Fellows will be required to submit semi-annual progress reports due every six months from the start of their appointment in the program. With the exception of the final report, semi-annual reports will be deemed overdue and stipend payments will be withheld if semi-annual reports are not received 7 days before their due date. The final report is the fourth or final semi-annual report due in this program. The final stipend payment to the fellow may be withheld until the final report is received. Payment of stipend may also be withheld until any overdue report is received.

Failure of the Fellow to perform the aforementioned roles and responsibilities may result in the termination of the Fellow from the program. ASEE reserves the right to recover program funds paid out to the Fellows in violation of the Terms and Conditions of this program.

HOST COMPANY ROLES AND RESPONSIBILITIES

PRE-APPLICATION

Prospective Host Companies will be required to post a description of their postdoctoral job opportunity on the program website and respond to inquiries from postdocs in a timely manner.

APPLICATION

After a prospective Fellow formally submits their application to a prospective Host Company on the website, the host company will be expected to perform the necessary due diligence to determine if the Fellow is a technical and organizational fit. This may be done via interviews, telephone conversations, or other mechanisms available to the host company. The CMP will include, for example, general terms of the collaboration, total compensation, company policies, research plan, work and training (mentoring) plan, and a list of candidates interviewed by the company. The CMP must certify that the proposed research plan is in support of the Phase II deliverables and expected outcomes and include a statement regarding the commitment of funding, the availability of facilities, equipment, and resources, and background information principal investigator and mentor. ASEE will review the CMP and, upon approval, distribute program documents for final adjudication. ASEE will be responsible for finalizing agreements and making all offers.

ADJUDICATION AND PRE-APPOINTMENT

Prospective Host Companies will be expected to respond promptly to inquiries regarding their application or have their program application denied by ASEE. Upon approval of the appointment, Host Companies will be expected to prepare to receive the new Fellow and ensure that all equipment, space, and means to perform the project work are in place upon arrival of the Fellow. Supervisors should allow up to 30 days after the agreed upon start date for the fellow to relocate to the vicinity of the work site. Host Company mentors will be expected to certify completion of ASEE specified mentor training during this time.

APPOINTMENT

Upon approval of the host company application by ASEE, the appointment and execution of the proposed mentor, research work and training plan begins. An individual development plan (IDP) for the fellow is due to ASEE within 30 days after the appointment start date. Host companies will be responsible to provide and maintain a safe and comfortable work environment and all means to perform the agreed upon work during the appointment. Host companies are responsible for the safety of the Research Fellow during the fellowship at the host company. This responsibility includes, but is not limited to, the maintenance of appropriate insurance coverages and periodic audits of environmental conditions and the implementation of any remedies to ensure the safety of the Research Fellow.

Host companies shall certify that they have communicated all Host Company policies to the Research Fellow as part of their on-site orientation. Mentors and supervisors are expected to provide regular feedback

on performance and provide guidance to the Fellow. The Host Company will commence its proposed professional development activities for the Fellow and allow the postdoc to attend all professional development activities sponsored by ASEE. During the year, the Host Company will be required to perform regular reviews to determine continuance of the Fellow for the duration of the fellowship. Host Companies are required to comply with all reporting requirements during the appointment. Any anticipated deviations from the original research, work and training plan must be reported to ASEE and revisions to these plans submitted to ASEE for review. NSF approved changes to the Phase II project scope that affect Fellow must be reported to ASEE within 15 days of NSF approval.

END OF APPOINTMENT

The Host Company will be expected to sign off on the final progress report from Research Fellow, submit final mentor report covering the performance of the Research Fellow and complete and return Host-Company exit questionnaire and other related forms to ASEE within 15 days of appointment end date.

EARLY PROGRAM DEPARTURE

Fellow Released by Host Company. The Host Company may end the work agreement with a Research Fellow at any time during the period of performance of the fellowship upon breach of any one or more terms and conditions of the program. A Host Company who intends to release a Research Fellow before the end of the fellowship is required to notify ASEE of intent to release the fellow and provide to ASEE documentation in support of the cause of the termination. The Host Company must certify that attempts were made to encourage corrective action by the Fellow. After review by ASEE, the Host Company must provide at least 30 days' notice to the Research Fellow of the end of their appointment.

Departure of Research Fellow. In the event a Research Fellow departs the Host Company before the end of their fellowship, the Host Company is required to acknowledge receipt of letter of resignation from the Fellow. Barring any extenuating circumstances, the Host Company must meet with the Fellow to plan the closure or transition of all active projects assigned to the Fellow while at the host-company. Complete a program Host Company exit survey and any other End of Appointment items defined by ASEE.

Closure of the Host Company or Early End of Research Program. In the event the Host Company must cease operations during the period of performance of the postdoctoral appointment the Host Company will be required to preemptively inform the Research Fellow and ASEE of any potential of the early end of the research program at least 30 days in advance of the event and plan the transition and closure of projects with the Fellow. In the event of a company closure, ASEE will work with the Fellow to reassign the postdoc within 30 days of the end of the project.

REPORTING

Per the Terms and Conditions of this program, the Host Company mentor will be responsible submitting the semi-annual mentor and progress reports to ASEE every six months from the start date of the Fellow. The Fellow is expected to author the progress report. The mentor is to write the mentor report and submit both the mentor report and the Fellow's progress report to ASEE.

ADDITIONAL CONTINUOUS RESPONSIBILITIES

Host Companies will be required to abide by all of the Terms and Conditions of the IPERF program and the NSF SBIR program during the period of performance of the Research Fellow. Host companies will be required to ensure the scope of agreed upon work remains the focus of the work of the Fellow and notify ASEE of any NSF approved changes to the NSF SBIR Phase II program effort. Any changes to the scope of the Research Fellow as a result of a change in project scope must be submitted to ASEE for approval. Failure of a Host Company to perform according to or is found in violation of the aforementioned Roles and Responsibilities or Terms and Conditions of this program may result in the termination of Host Company.