

INSTRUCTIONS FOR REVIEWING SBIR PHASE II APPLICATIONS – TECHNICAL PROPOSAL

SBIR Phase II Applications

The Phase II application includes two components: (a) **Technical Proposal** - includes a description of the technical feasibility by presenting results from Phase I, objectives, work plan, key personnel, outside services, etc (see section 3.3 (E) of the Request for Application); and (b) **Commercialization Plan** – includes a brief information about the company, Phase I outcomes, and relevant technical objectives; potential market, customer and competition, marketing strategy; intellectual property; and financing (see section 3.3 (Q)-). Although the entire application is being mailed to you, we need your assistance with reviewing the Technical Proposal. As a technical reviewer **you are not expected to evaluate the commercialization plan** but if you want to read it and want to comment on it that would be fine.

Conflict-of-Interest: It is imperative that SBIR avoid even the **appearance** of conflict-of-interest. Therefore, you must disqualify yourself as a reviewer if 1) the applicant or consultants (if any) is employed at your home institution; 2) you served either as thesis advisor, postdoctoral advisor or a collaborator on a research project or coauthor on a joint publication with the applicant within the past four years; 3) you acted or will act as a paid consultant to the company, or will gain some benefit from the project; or 4) you have any affiliation or financial interest in the firm or the investigators submitting this proposal. If you have a situation about which you are uncertain, please contact the SBIR Office at 202-401-4002 for an opinion.

Confidentiality: The Department of Agriculture receives research proposals in confidence and is responsible for protecting the confidentiality of their submission and contents. For this reason, confidentiality must be maintained -- **therefore DO NOT copy, quote, or otherwise use material from this proposal**. If you believe that a colleague can make a substantive contribution to the review, please consult us before contacting your colleague. When you complete the review, **please destroy this proposal and maintain its confidentiality. If you are unable to review, please contact the SBIR office, destroy the proposal and maintain its confidentiality.**

Reviews: The SBIR program will be utilizing the new Web-Based Peer Review System (PRS) that has been developed by USDA-CSREES. Information about the PRS system is contained in the cover letter that accompanies each proposal for review. If you are accustomed to reviewing academically-oriented proposals, you will find SBIR proposals to be different; they are narrowly oriented, have a more applied focus, and most deal with a product or service. The following points should be considered in preparing your review and should receive approximately equal weight, except the first three which should receive twice the value of the other points.

Scientific and Technical Feasibility: Evaluate the technical merit of the proposed project and the appropriateness of the methods to be used, with special emphasis on innovativeness and originality. A proposal must contain adequate information to be reviewed as a two year research and development project. The proposal must also present a detailed research and development plan that clearly indicates how the PI proposes to achieve the Phase II objectives. The most useful reviews point out the proposal's strengths and weaknesses and include specific criticisms that you feel are warranted.

Degree to Which Phase I Objectives were Met: The proposal should list the Phase I objectives and describe the Phase I results in enough detail to permit a critical evaluation of whether the objectives were fully met and technical feasibility established. It is expected that this section will constitute a significant portion of the proposal.

Importance of the Problem: Briefly discuss the importance of the problem or opportunity and the anticipated economic or social benefits of the proposed research. In your opinion can the proposed work be judged to be in the public interest by satisfying one or more of the following objectives, 1) develop sustainable agricultural production systems, 2) protect natural resources and the environment, 3) create a safe, nutritious and affordable food supply, 4) develop value-added food and non-food products from agricultural materials, 5) enhance global competitiveness, and 6) enhance economic opportunity and quality of life, especially for people in rural areas.

Investigator and Resource Qualifications: Discuss the principal investigator's qualifications and those of his/her staff and consultants (if any). Do they have the necessary training to carry out the experimental plan? If the PI is currently employed by an employer other than the small business submitting this proposal (e.g. university), is it clear that the PI would be employed for a minimum of 51% of his/her time by the small business during the period of the grant? (While the PI must work more than one-half of his/her time for the small business during the entire grant period, there is no minimal time requirement for what percentage of the PI's time is spent working on the proposed research.) Is the necessary instrumentation available. Are adequate facilities available that the small business either owns or controls for the duration of the grant through a rental or lease arrangement? If a consultant or sub-contractor is involved, is there a letter from him/her verifying his/her willingness to participate in the project? If a Cooperative Research and Development Agreement (CRADA) exists, is there a letter from the CRADA partner verifying the existence of the CRADA agreement? For an applicant to gain full credit in the review process for the involvement of consultants, sub-contractors or CRADA partners, letters verifying these arrangements must be attached to the proposal.

Budget: Comment only if you feel one or more budget items are unclear, inappropriate, or substantially insufficient or excessive. There are two budget items you do not need to address. First, SBIR applicants are allowed by law to request a small fee or profit (not to exceed 7%) because they are for-profit organizations. They do not have to specify how these funds will be spent. Secondly, starting with FY 1996, Congress has exempted the USDA SBIR program from any restrictions on indirect cost reimbursement rates. While other USDA grant programs continue to be limited to 19% on indirect costs, SBIR applicants can request higher rates if they can justify them, usually by virtue of having an indirect cost rate that was negotiated with government auditors. For small business firms indirect cost rates of over 100% are not uncommon. All other SBIR programs provide full cost recovery of indirect costs and thus the USDA SBIR program is now the same as the other SBIR programs.

Hazardous Procedures and Ethical Considerations: When a proposal involves potentially hazardous materials or biological agents, comment on potential or actual problems and how the principal investigator would provide protection. If the proposal involves 1) recombinant DNA or RNA research, 2) use of vertebrate animals, or 3) human subjects, is the Assurance Statement (Form CSREES-2008) attached to the proposal?

Format: Proposal guidelines call for 1 inch margins with font size no smaller than 11 point. If you feel the proposal has exceeded these limits, you may wish to comment on this fact in your review. Proposals are also limited to 50 pages but this page limit does not include letters from consultants or subcontractors, letters of recommendation/endorsement, the Assurance Statement Form (Form CSREES 2008) or the NEPA Exclusion Form (Form CSREES 2006). These materials plus any other additional materials should be placed in an appendix. Reviewers are not asked to read more than 50 pages and thus if the proposal contains a long appendix you are free to ignore it if you wish.

Duplication: Does the proposed research substantially duplicate any ongoing or previous research that you are aware of? Would the proposed research result in the development of a technology or product that already exists? If the PI has received or has applied for patent(s) pertaining to the proposed technology, does the proposed research constitute a legitimate feasibility study, or does it substantially duplicate earlier work carried out by the PI?

Reviewer's Recommendation: Summarize your recommendation in terms of the final action that SBIR should consider. Please do not give your score in the text of your review, but instead check your score at the top of the review screen that you will access through the PRS system (excellent, very good, good, fair or poor). A rating of excellent implies a high priority for funding, while a rating of good suggests a low priority for funding. Lower ratings will have little chance of funding.