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**NRAC FULL PROPOSAL REVIEW FORM**

Project Code/Title: 03-Gomez-Chiarri: The Northeast Bivalve Hatchery Health Consortium …

Date Due:  **Dec. 9, 2022**

Please provide the information requested below. Length and detail of responses may vary according to the nature of the proposal. We value your honest appraisal and the format allows you to be as expansive as you deem necessary (feel free to use a separate sheet if necessary). Your comments and scoring will be shared with the principal investigator but with complete anonymity.

1. **Science, Technology, and/or Extension Program Design (technical merit of all aspects of the project, 30%):** Does this proposal use top quality science and/or technology, or demonstrate extension scholarship? Is (are) the PI(s) familiar with relevant previous and contemporary investigations? Are the objectives and hypotheses explicit and clear? Is the experimental plan clear and the statistical design appropriate? Is the methodology described in the plan appropriate to meet the objectives for a research or extension project? Will this work advance understanding of the science and the contemporary problems that the industry faces? If this is an Extension-demonstration or education project do the PI(s) provide an adequate plan to evaluate the success of the effort? Are the proper metrics provided? Can the PI(s) properly assess the short-term, medium-term, long-term outcomes projected?

*Comments:*

The team proposes to start a regional consortium that addresses larval mortality/crashes, with the intention of identifying causes and suggesting protocols to reduce those losses. This is absolutely a major issue that the industry faces and this work will dramatically increase our understanding of the causes of these crashes.

The work is ambitious and will collect a large amount of data and will be a challenge to analyze but the information yielded will still be some of the best quantitative data to date about hatchery larval performance.

*Rating: Maximum score = 30*

Excellent (numerical value = 30) \_\_\_X\_\_\_

Very Good (numerical value = 27) \_\_\_\_\_\_\_

Good (numerical value = 24) \_\_\_\_\_\_\_

Fair (numerical value = 21) \_\_\_\_\_\_\_

Poor (numerical value = 18) \_\_\_\_\_\_\_

1. **Industry Relevance and Probability of Success (30%):** Are the benefits and potential impacts related to industry utility such as increased farm-gate value or grower profitability? Will the project likely provide usable results that can be adopted by the industry in a timely manner? Alternatively, if it is a development effort toward a new technology, will this project’s results increase the team’s capacity to compete for external funds to support the next iteration of research and outreach needed to take the results to application? Will this project create an opportunity for information to be turned over to the industry for refinement and adoption that will eventually become self-sustaining?

*Comments:*

The proposed work addresses the source of seed for the shellfish industry in the region, which is a lynchpin in current and potentially increased production. As proposed, industry will gain valuable information simply from the testing results for their own samples – which has the potential to allow hatchery managers to make improvements ‘on the fly’. Additionally, the collected data offers the opportunity to produce usable results broadly for hatcheries.

While it’s not clear if this project is self-sustaining past this funding, there is a clear benefit to even a two-year study of these issues.

*Rating: Maximum score = 30*

Excellent (numerical value = 30) \_\_X\_\_\_\_

Very Good (numerical value = 27) \_\_\_\_\_\_\_

Good (numerical value = 24) \_\_\_\_\_\_\_

Fair (numerical value = 21) \_\_\_\_\_\_\_

Poor (numerical value = 18) \_\_\_\_\_\_\_

1. **Integration with Extension (20%):** Does this work identify the key stakeholders? Stakeholders include those individuals (industries and agencies) not directly involved in the project. Is the extension plan appropriately designed to reach the targeted stakeholders? How will the results of this work address the needs of key stakeholders? Will this project extend our knowledge to all stakeholders? Are the expected outputs, outcomes, and impacts clearly described? Is the budget appropriate for effective integration?

*Comments:*

The team identifies Extension partners (as currently available) as well as potential industry stakeholders. There is explicit involvement in the proposal as well as the inclusion of private hatcheries in the sample group. While immediate test results are specific to participants, the aggregate data and the conclusions from those data will address the needs of shellfish hatchery operators in the region (and beyond, in all likelihood). The outputs and outcomes are generally described but pose some challenges in terms of quantification as written (e.g., how will improved health management as influenced by this work be assessed by the team?).

*Rating: Maximum score = 20*

Excellent (numerical value = 20) \_\_\_\_\_\_\_

Very Good (numerical value = 18) \_\_\_X\_\_\_\_

Good (numerical value = 16) \_\_\_\_\_\_\_

Fair (numerical value = 14) \_\_\_\_\_\_\_

Poor (numerical value = 12) \_\_\_\_\_\_\_

**4. Capacity (10%):** Is (are) the principal investigator(s) and specified members of the research (extension) team qualified to conduct the research (program)? Is there industry representation as part of the team? Have the investigators clearly articulated they have adequate facilities and equipment to complete the project. Is the overall budget appropriate given the scope of the project? Is there a reasonable chance the project will be completed on-time?

*Comments:*

This is a very strong team that is capable of successfully completing the proposed work in a timely fashion. The team has adequate facilities and equipment for this project. Budget is appropriate.

*Rating: Maximum score = 10*

Excellent (numerical value = 10) \_\_\_\_X\_\_\_

Very Good (numerical value = 9) \_\_\_\_\_\_\_

Good (numerical value = 8) \_\_\_\_\_\_\_

Fair (numerical value = 7) \_\_\_\_\_\_\_

Poor (numerical value = 6) \_\_\_\_\_\_\_

**5. Accountability (10%):** Does the investigator and her/his team have a successful track record of previous NRAC funding being adopted by the industry? Have they leveraged NRAC funding for additional resources to solve bigger problems that can be funded by NRAC alone? Is there evidence that the investigator(s) has (have) an established record indicating a high probability of success on the proposed work? Does the PI(s) have an established record of completing projects on-time meeting the objectives laid out in previous projects? Can this project integrate or be leveraged with funding from other work of the investigator(s)? Does the investigator(s) have a track record that suggests this project will be a good investment for NRAC resources?

*Comments:*

The team is accountable and productive. They do what they say and have demonstrated that in previous projects.

*Rating: Maximum score = 10*

Excellent (numerical value = 10) \_\_X\_\_\_\_\_

Very Good (numerical value = 9) \_\_\_\_\_\_\_

Good (numerical value = 8) \_\_\_\_\_\_\_

Fair (numerical value = 7) \_\_\_\_\_\_\_

Poor (numerical value = 6) \_\_\_\_\_\_\_

Non-Applicable – First Time Applicant \_\_\_\_\_\_\_

**6*.* Total score: \_\_98\_\_\_**

**Rating Excellent \_\_\_X\_\_**

**Very Good \_\_\_\_\_\_**

**Good \_\_\_\_\_\_**

**Fair \_\_\_\_\_\_**

**Poor \_\_\_\_\_\_**

**Final Recommendation: Must fund \_\_\_\_X\_\_\_**

**Fund if resources are available \_\_\_\_\_\_\_\_**

**Encourage Resubmission next year \_\_\_\_\_\_\_\_**

**Do Not Fund \_\_\_\_\_\_\_\_**

**7. Strengths:** What are the major strengths of this proposal? If you provided a rating of excellent for any of the categories above but did not comment, would you please share why you rated a particular category as “excellent”?

The biggest strength of the proposal is the effort to draw data from the multiple operations and get past the isolation of these issues. The team has also proposed a brilliant solution to anonymization of samples that hopefully assures private sector partners of the confidentiality of the process.

**8. Weaknesses:** Identify the weaknesses of this proposal. Are there any flaws (design, methodological, etc.) that might seriously compromise the scientific integrity, value and/or validity of the work? If you rated an evaluation area as fair or poor, how might that area of the proposal be improved?

No substantial weaknesses in the proposal beyond the quantity and ‘messy’ nature of the data collected – which will still be the best data generated on this issue to date.