Subject:Random Notes for Faculty, Mentors, and Grant Writers (and others)Where:Mentor Connect Workshop in New Orleans, LA, February, 2019Who:Dr. Elizabeth J. Teles, Teles Consulting LLCContact:email: ejteles@yahoo.com text: 703-346-1000

- 1. Make sure that the project aligns directly with ATE goals (i.e.; technician education to prepare technicians for the advanced technical workforce to help business and industry be more competitive and more secure and environmentally friendly). ATE is a program, not just series of grants. ATE is about TECHNICIAN EDUCATION. It is a workforce program. Keep in mind that ATE is NOT:
 - a. Just training. Courses should be for credit and provide pathways to careers and jobs. Courses should provide learning and skills that students can build on (stackable credentials).
 - b. General science, technology, engineering, and mathematics (STEM) education. General STEM education is very important, but it is not the focus of ATE.
 - c. Transfer engineering, computer science, chemistry, biology, etc. Some students may eventually go into those programs, which is fine, but the goal should be preparation for jobs students can get with community/technical college credentials.
 - d. Short term training for industry. It is about associate degree programs. This doesn't mean; however, that you can't use some of that material for direct industry training as a broader impact
- 2. Provide a description of the technician area you are targeting. Reviewers are very knowledgeable about technician education and careers, but may not know
 - a. Particular technician areas (e.g.; logistics, "constructioneering," other emerging or newly-emerging areas).
 - b. How some more traditional technician education programs are changing in your area (e.g., manufacturing into robotic manufacturing, networking into cyber security).
 - c. Merging areas of technology that might be different in your location than in other parts of the country (e.g., mechatronics, energy technicians).
- 3. Provide information about what a technician in the discipline you are targeting actually does and how your program prepares them to do it.
- 4. Prepare a one-page summary of your project (a concept paper). Send this short summary to a program officer to get feedback. It should be sent by the faculty with the grants office copied. If you need a phone conversation, set up a time by phone and have faculty and grants staff both on the phone. The grants office can organize the logistics for the call, but faculty should be on the phone to describe the vision.
- 5. For one of the "small new to ATE" projects, you should already have some things in place on which the new project will build. What is in place now? How many students are in the program(s)? What can you realistically do as first steps to meet the identified need?
- 6. The project summary is the hardest to write but the most important because it what reviewers see first. It is the overview of what you will do and why. You need to grab the attention of reviewers, but don't overwhelm them. Many proposals put too much there. [Hint: Read a few abstracts of recently funded ATE projects.] Note, however, that the project summary MUST be submitted in three parts (project overview, intellectual merit, and broader impacts). In contrast, a project abstract, prepared later when the project is funded, will usually be in two parts. The first paragraph of the abstract is primarily the project overview and broader impacts. The second paragraph of the abstract is mainly the intellectual merit.

- 7. The supplementary documents that the ATE program allows in proposals are very specific. Also, ATE guidelines for supplementary documents differ from the PAPPG, but these guidelines are clearly laid out in ATE program solicitation. If the proposal includes things that are not allowed, the proposal will likely be sent back without review. What is allowed:
 - a. List of people getting grant support (other than PI, Co-PIs, Senior Personnel, and participants)
 - b. Letters of true collaboration that make clear commitments to the project
 - c. Vitae of evaluator
- 8. Equipment, Facilities, and Other Resources Form (generally about two pages.)
 - a. Use it wisely what is available on your campus that will be used IN THIS PROJECT for which you are not requesting funds from NSF? The form requests information in three parts:
 - i. Equipment
 - ii. Labs and other facilities
 - iii. People not supported by grant funds but whose work will be important to project (e. g. a recruiter not budgeted in the grant proposal, but who will be working on the project as part of his or her college job)
 - b. Don't use a specific percent of time for any personnel named such as saying "our administrator will commit to 5% of his or her time to work on the project." Specific time and dollar amounts are likely to be construed as cost sharing which is strictly prohibited in the ATE Program. Say instead, "Dean X will support this project as part of his regular duties at the college by overseeing all new technical programs and working with industry;" or, "The recruiter will work on this project as part of the college plan to recruit students to technical programs."
- 9. If you include a logic model in your proposal, it will be helpful to place this document in an earlier part of the proposal, such as following motivating rationale. This can guide the reviewers reading your proposal. (Hint: Make sure the print is large enough to read.)
- 10. For evaluation, make sure funds are fully justified. Include the rate and time (either as days and rate per day or hours and rate per hour) and several sentences justifying the expense. Travel expenses can also be included, if justified. Describe in some details what evaluation activities will take place for the funds requested.
- 11. Get copies of funded proposals to see the formats that have been used and ideas for how to present your vision. Look at a variety of proposals including several among those institutions have not been part of Mentor-Connect. There is a big danger of looking too "cookie cutter" when proposals are developed using a single proposal format. Never copy wording from one proposal directly into another.
- 12. What will be the spark that will make your proposal stand out? Make reviewers think "Boy, I wish I had thought of that."
- 13. For your Advisory Board, list names and affiliations (e. g., industry partners) and describe the specific role they will play in the project. Include a table that is supported by your letters of collaboration (unique letters or a joint letter signed by several industry partners that shows they have met with you and jointly agreed to support the project).
- 14. If you plan to have an impact on specific groups (e.g., women or minorities), make sure there is a real plan to impact those groups. (e.g.; The fact that 58% of the students at the college are women does not mean you will impact them).
- 15. Don't use percentages without providing the corresponding base numbers to support. (What does 10% increase mean?)

- 16. If improving or changing current programs, include information about numbers of students in those programs and why this project will make those programs more relevant for the jobs in the area.
- 17. Be specific about curriculum changes and why they are needed. Make sure if you are planning on certificates embedded in or with pathways to associate degrees, describe what courses are included in those certificates and how and why business and industry will value them.
- 18. Similarly, if you plan on having students earn various certifications, explain how those certifications fit into degrees and programs, how students are prepared to sit for those certifications, how they are paid for, and who and why industry values them.
- 19. Include funds for professional development for faculty who teach in the programs. Technician programs change rapidly, and faculty must be prepared to develop up-to-date courses and teach them. They must be prepared to use new equipment and be certified in various areas (when that is needed.)
- 20. Use local or regional statistics on jobs/need for the program. Knowing that there are 10,000 jobs available in the United States for technicians is meaningless unless those are jobs in your area.
- 21. Also make sure the jobs are for technicians or can be filled by technicians. Knowing there are 20,000 computer jobs in your area is also meaningless unless some of those jobs are be filled by the technicians you are preparing. For example, maybe 800 of those jobs can be filled with technicians.
- 22. Plug into the ATE Community and use all the resources available.
- 23. Think about disseminating locally to schools, other colleges, businesses in your area and not just at meetings like HI-TEC and AACC. Use students as ambassadors.
- 24. In prior support, mention if you have been a Mentor-Connect participant. It is OK to mention other prior support, even if not from NSF, if it is relevant to this project.
- 25. Overload pay is allowed as long as it is the written policy of institution to allow. It must be at a rate allowed by the college and cannot be inflated because the funding is coming from NSF.
- 26. Try not to over-reach or promise too much. Having a few specific goals and objectives with related activities to accomplish those goals and then having a good evaluation plan to see if those goals have been accomplished is better than promising too much.
- 27. In doing an advanced award search in the NSF database, the ATE program element code is 7412. This can make searching easier.