**Practical tips for grant applications**

1. Use review criteria to guide your writing, which give reviewers pointers for what to say. Before writing, explain your grant to a high school kid for the significance (how important) and innovation (how cool). If the response is “so, what?” you can’t convince reviewers. Do not use the significance section to simply review the field; it will drop your score significantly. Avoid redundancy!
2. Use lay, straight forward and concise language, and short paragraphs. No grant is too simple but many are too complicated to understand. Fancy words hurt you more than help you. Don’t write a grant like a manuscript, i.e., assume reviewers are in your field. Give it to entry level graduate students to read and understand.
3. Don’t describe techniques details if you can cite your own papers to show your expertise. Describe the power of the approach in general terms so a non-specialist will understand the purpose and potential of the approach.
4. Secure collaborators for anything you may be criticized for lack of expertise and ask them to check if your language is pro enough. For example, if you propose transgenics, consider what they can and can’t do, variability in transgene expression, strain effects, mosaic, etc. Otherwise, you get dropped below score 3 (just for that).
5. Translational (human) components are a big winner. Mix/match *in vitro* and *in vivo,* translational and basic approaches. Justify any non-human species for which aspect(s) it mimics humans. A bias that mice don’t mimic humans could kill your grant.
6. Think hard about Pitfalls. Reviewers can prove “we do not expect any difficulties” is false and drop your score.
7. Pay attention to statistics. A lack of number justifications is a big score dropper (consider having a statistical consultant).
8. Put the draft aside for 2 weeks and then critique it as if it is somebody else’s grant to see if the science and verbiage make sense to you.
9. Don’t simply copy-paste scientific (e.g., hypotheses) and non-scientific (e.g., biosketch, human and animal research, facility) sections from your other grants into your new submission. Every grant needs to be tailored. Copy-paste errors can be out of context. Do not copy-paste the same text to different places (it happens all the time), and reviewers can get pretty irritated about this.
10. The real deadline is 1 month before the deadline (except RFAs with short notices). Give yourself and your colleagues plenty of time to work on it. Don’t fantasize your colleagues can drop their own tasks to work on your grant; they have their own deadlines.
11. A month before its due, rout the silly thing, get all supporting letters, subcontracts etc. Doing these easy tasks later will be stressful and is also not considerate to your collaborators.
12. Organize the files! Use a folder, subfolders and a “final’ folder; name files intelligently (narrative10242011DR) to know what version and who edited it (DR).You’ll be surprised at how often people are half way through a file only to discover it was the wrong one, and how often people load the wrong files for final submission.
13. Spell check, proof read and have someone else freshly read the final version to catch any overlooked errors.
14. Download the current forms specific to the grant you are applying for. Recycling an old form could result in rejection. NIH changes the forms rather frequently.
15. PI has full responsibility. Don’t expect your assistant or G&C to catch errors for you. Check EVERYTHING in your SF424 file before submission. PDF conversion can change your figures. Verify the budget is loaded for every year--the funding agency cannot give you what you don’t ask for.
16. If you have last minute remorse, or feel the grant is not ready, postpone for a cycle. Submit only your best product to get a reasonable score on the first submission.
17. Submit at least 2 business days before the deadline. Do not expect G&C to click “submission” immediately after your email, you don’t know how long the line is. You want time to fix anything that might be wrong and still resubmit it on time.
18. Check everything again on the Commons version after submission. The Commons is not smart enough to catch scientific or formatting errors. Even if you submit a piece of junk, you could get a message of ‘submission without error’. You may still have time to correct it if you submit it early enough.
19. Do not ask G&C to resubmit a revised grant if you are past the deadline, it causes automatic retraction. Contact the SRO to see if corrections can be made through supplemental materials.
20. After the grant is reviewed, don’t hesitate to contact your Program Director (PO) for advice. Be proactive: a conversation with your PO could change the fate of your grant especially if it has a borderline score. If your first submission is unscored, consider a new application; the next round of a fundable score is nearly impossible, especially for a new investigator.