IES NCER Grant Writing Webinar FY2022

Corinne Alfeld

Program Officer, National Center for Education Research

Transcript

Transcription is provided in order to facilitate communication accessibility and may not be a totally verbatim record of the proceedings.

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Hi, everyone. Welcome to the "Grant Writing Webinar." My name is Corrine Alfeld, and I'm a program officer at the National Center for Education Research. And I will be walking you through the content of this webinar.

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Today's webinar will provide you with instruction and advice for writing a successful IES grant application. We will focus on the National Center for Education Research's primary research grant program 305A, but much of the content is helpful for IES grant applicants in general. The most important message we want to convey is read the RFA carefully. You can look at our funding opportunities page to see what competitions are open. For applicants new to IES, we advise you to view our "Basic Overview" webinar first.

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Today, we will discuss a number of aspects of IES grants, including their intent and the different grant competitions you can apply under. We will focus on NCER's primary grants program described in the 305A RFA. Normally, we would also discuss NCSER's grants program, 324A, but that is not being competed this year. We will go through the components of the 305A RFA, the application submission and review process, and the role of IES program officers as a resource for you as you develop your grant application.

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Before getting into the nuts and bolts of the grant application, I will start with the big picture.

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IES is the independent research arm of the U.S. Department of Education authorized by the Education Sciences Reform Act in 2002. We are non-partisan and are charged with providing rigorous evidence to inform education practice and policy, and sharing this information with educators, parents, policymakers, researchers, and the public.

The overall mission of IES is to describe the condition and progress of education in the United States, identify education practices that improve academic achievement and access to education opportunities, and evaluate the effectiveness of Federal and other education grant programs.

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This graphic represents the organizational structure of IES. We are led by a director who is advised by the National Board for Education Sciences. Our Science Office oversees the scientific peer review processes for IES grant applications and IES reports. IES has four centers:

The National Center for Education Statistics is the primary Federal entity for collecting and analyzing data related to education.

The National Center for Educational Evaluation and Regional Assistance conducts unbiased large-scale evaluations of education program supported by Federal funds, provides technical assistance, and supports the development and use of research and evaluation.

The National Center for Education Research, NCER, and the National Center for Special Education Research, NCSER, award research grants.

The grant programs we are discussing today are managed by NCER and NCSER.

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The objectives of our grant programs are to

Develop or identify education interventions, this term refers to practices, programs, policies, and approaches, that enhance education outcomes and can be widely deployed.

Identify what does <u>not</u> work and thereby encourage innovation and further research.

Understand the processes that underlie the effectiveness of education interventions and the variation in their effectiveness. Develop measures of academic achievement and progress.

Support research and national leadership on core issues.

Another way of thinking about the objectives for the research grant programs is to provide answers to three questions.

What works to improve student education outcomes?

What doesn't work?

How do interventions improve education outcomes – including for whom do they work and under what conditions?

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Under the Education Research Grants Program, NCER supports a sustained program of research to build knowledge and understanding of education, practice, and policy with these four intended outcomes.

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To encourage rigorous education research that is transparent, actionable, and focused on meaningful outcomes, all applications in the Education/Special Education Research Grants program are expected to incorporate the principles outlined in the IES-wide Standards for Excellence in Education Research, or SEER, as applicable. The principles are listed on this slide and include, for example, pre-registering your studies, making research findings, methods, and data available to others, and analyzing costs.

SEER codifies practices that IES expects and increasingly requires to be implemented as part of IES-funded causal impact studies, but note that many standards and associated recommendations are applicable to other types of research, and IES increasingly requires applicable standards to be followed in those studies as well. IES-funded researchers should consult grant and contract documents for more information about how SEER applies to your project.

For more information about SEER, please visit our SEER website at ies.ed.gov/seer.

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Collectively, IES-funded research should yield outcomes and products that are meaningful, inform stakeholders about the costs and practical benefits and effects of interventions, programs, policies, and practices on relevant outcomes for learners and contribute to scientific knowledge and theory of teaching, learning, and organizing education systems. Researchers receiving funding through this program are to disseminate evidence in a way that is useful to and accessible by educators, parents, policymakers, researchers, and the public.

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Let's talk about the basics of the Requests for Applications or RFAs. There was much more detail provided in the RFAs, but I will hit some of the high points here.

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You can find more information about the IES funding opportunities available on our website. You can also find information about deadlines and webinars to assist applicants. Program officers are also hosting a series of virtual technical assistance sessions that you may attend.

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As of August 2021, IES has announced six separate FY 2022 research and research training competitions. This webinar primarily focuses on the first one listed, Education Research Grants or 84.305A. Be sure to read the full Request for Applications for a more detailed description of each competition.

It is important to note here that due to limited funds available for the new FY '22 awards, NCSER will not be able to compete our regular competitions, including our primary grant program. Instead, we are competing a new Research to Accelerate Pandemic Recovery in Special Education, 84.324X, grants program, which is funded with money provided to us in the American Rescue Plan.

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Once you select the competition under which you will apply, the RFA is your guide to preparing high-quality applications. We provide a great deal of detail in our RFAs about the requirements you must meet, as well as recommendations for how to write a high-quality application.

Reviewers also use information in the RFAs to evaluate your application for its scientific merit.

The RFAs cover specific information on what you need to know before writing your application and what you need to include in your application. The sections of the RFA containing this information may differ among RFAs, but they all include this information.

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If you have any questions about the RFAs, talk to the designated IES program officer. It will be helpful for you to first view our webinars for applicants prior to contacting a program officer.

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Let's talk about the basics of the 305A Request for Applications or RFAs. There's much more detail provided in the RFA, but I will hit some of the high points here.

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When preparing a grant application, the first and most important thing to do is read the RFA. Even if you're resubmitting an application and you're pretty familiar with the requirements of the Education Research Grants program, there are some changes this year, and we want to make sure that you are aware of them. In addition, we think it's important for everyone involved in the preparation of the application, including you as the PI, your team members, such as your co-PIs, statisticians, methodologists, and developers, to read the RFA. In addition, the sponsored projects office should also read the RFA, since, for most institutions and organizations, those are the ones who will be submitting the applications for you.

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Grant writing is a process that starts with an idea and progresses through several stages. Grant writing tends to be an iterative process since the majority of grants do not receive funding the first time around. Our goal with this webinar is to try to teach you to write the most competitive application you can so that you may be one of the lucky ones to receive funding the first time around. Or if you don't get funded the first time around, you can learn some new information about ways that you can improve your application.

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Before we get into specifics, I want to provide some general grant writing tips.

When writing a competitive grant application, think about the proposal as a persuasive essay. You want the reviewers to understand what you are proposing to do, why the resulting findings will be important to both theory and practice, how the research will be carried out, how your project team has the personnel and resources to successfully complete the work, and that you will broadly disseminate the findings to those that can make use of them.

In the opening paragraph of your project narrative, you should clearly lay out the proposed work and it's importance. The reviewers will use this paragraph to guide their reading of the rest of your application. In a sense, the opening paragraph gives them a roadmap to your proposed work, and they can use it to organize the details that follow.

Remember that you will be writing for several types of reviewers: those that know your subject area, those that know the methods you will be using, and those who may be less familiar with one or both, but understand education research. You need to convince these different types of reviewers that the

research you're proposing is important and that your project team can carry it out. To this end, provide enough context for reviewers to understand your research and avoid confusing them by using convoluted sentences, jargon known only to specialists, and improper spelling and grammar.

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Every RFA includes a set of General Requirements.

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Your application must meet a set of general requirements to be accepted for review. You, as the applicant, must meet eligibility requirements to apply for and receive a grant. Your proposed project must meet the RFA's requirements about population, education outcomes, and education settings. All applications must also include a dissemination history and plan. I'll say more about that later.

For the main Education Research Grants program in NCER, you must also indicate what topic and project type you are applying to. Please see the 305A RFA for further details.

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Institutions that have the ability and capacity to conduct rigorous research are eligible to apply. Eligible applicants include, but are not limited to, non-profit and for-profit organizations, and public and private agencies and institutions, such as colleges and universities.

Some IES grant programs may restrict applicants to specific organizations or require specific types of organizations to take part. These required applicants have included Minority-Serving Institutions or State Education Agencies.

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The legislation that established NCER set out the specific populations that can be addressed by the research. These include learners from pre-kindergarten through adulthood. If you apply to the Education Research Grants program, you should describe the population of learners you are addressing and how they fall within this range.

Research focused on learners with or at risk for disabilities must apply to NCSER for funding. This year, NCSER is only competing "Research to Accelerate Pandemic Recovery in Special Education" or 324X, which supports

research on children or youth with or at risk for disabilities. There's a standalone webinar available to explain that competition.

There's one exception – if your research is focused on research for students and adult education with disabilities, you may apply to NCER, the Education Grants program.

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In the Education Research Grant programs competed by NCER, academic outcomes are required. These can be measures of learning or progression through the education system.

Projects under certain topics are required to address additional outcomes:

—Research under the social and behavioral topic must also include social and behavioral outcomes.

-Research seeking to change learner outcomes through changing educators must include examination of the educator outcomes expected to change.

And then, when relevant to your project, you should also include other outcomes, such as labor market outcomes.

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Your research must be relevant to education in the United States and must address factors under the control of the U.S. education system. The RFA acknowledges the wide range of formal settings in which education is delivered and describe these different settings.

In addition, there are also formal programs under the control of education agencies that take place outside of school, including afterschool distance learning or online programs.

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IES promotes dissemination to multiple audiences, researchers, practitioners, policymakers, community, parents, and students. Think about dissemination from the planning stage and make sure that folks on the project have some dissemination experience.

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The Education Research Grants program and the Special Education Research Grants program, when it's competed, has a unique topic and project type structure.

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NCER's primary grant program is 84.305A. These are education research grants. We recommend that all applicants familiarize yourselves with the requirements and recommendations of 305A, even if you intend to apply to another program.

Under the 305A RFA, you will need to apply under a topic and project type combination. The topic refers to the education sub-field you will be working in. The project type refers to the type of research you will be conducting.

You can think of it as a matrix of topic and project type, you apply to the cell that your work falls in.

Other IES research grant programs may include topics as well, and the project type is usually described within the topic.

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NCER uses a topic structure to encourage focused programs of research and to provide opportunities for applicants to consult with program officers who oversee each topic while preparing their applications.

Your application must be directed to one of the topics. The topics are intentionally broad to encourage a wide range of innovative ideas and research questions.

NCER's Education Research Grant program in FY '22 includes 11 topics. The RFA for the Education Research Grants program provides a discussion of the purpose and needed research under each topic.

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Applications to 305A also require you to indicate a project type.

IES supports the development and validation of measures for use by educators and education researchers, exploratory research, development and pilot testing of interventions, and efficacy trials that build a body of knowledge in the education sciences, along with practical tools necessary that lead to meaningful change in education practice. All of these project types are necessary for generating evidence and solutions to improve education practice.

The descriptions regarding project type in the Education Research Grants RFA may be useful when submitting an application to another grant program that supports similar types of research.

All applications must identify one project type. The four project types are Measurement, Exploration, Development and Innovation, and Initial Efficacy and Follow-Up.

Please note that IES does not accept <u>replication</u> project applications under this grant program. If you are interested in carrying out a replication project, you should check out the RFA for Systematic Replication competitions offered through NCER 305R.

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Under the description of each Project Type, the 305A RFA includes a Requirements section for the specific content that you must address in the project narrative in order for the application to be sent forward for a review.

In addition, there is a section titled Recommendations for Strong Applications. These are meant to improve the quality of your application. The peer reviewers are asked to consider these recommendations in their evaluation of the quality of your application. IES strongly encourages you to incorporate the recommendations into your project narrative and relevant appendices.

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Measurement supports the development and validation of new instruments or refinement and validation of existing ones for specific purposes, contexts, and populations. A Measurement project will result in a valid instrument that can be used by education personnel or researchers to measure learner outcomes for specific populations and contexts. Measurement projects can also address purposes, such as measuring educator knowledge, skills, and abilities, guiding instruction, improving educator practice, evaluating educator job performance, or assessing the effectiveness of schools or school systems.

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These are a few examples of funded Measurement projects. You can find more examples of funded projects by project type on the website by going to Funding Opportunities and clicking on Search Funded Research Grants and Contracts. Once you are here, you can search by a variety of factors, including goal or project type, topic, center, year, etc.

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Exploration supports projects that identify relationships between individual, educator, school, and policy-level characteristics and education outcomes, and factors that may influence or guide these relationships. Findings from

Exploration projects point out potentially fruitful areas for further attention from researchers, policymakers, and practitioners, rather than providing strong evidence for adopting specific interventions or assessment tools. As this slide shows, a variety of methodological approaches may be used.

Under Exploration, IES does not support work to test the causal impact of a fully developed intervention that's ready to be implemented in education settings. However, it would be appropriate to propose a series of short-term, small-scale controlled experiments to identify core features that could be included in a fully developed intervention.

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On this slide are some examples of Exploration projects that IES has funded.

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Development and Innovation supports the development and pilot testing of new or modified education interventions that are intended to produce beneficial impacts on learner outcomes. A Development and Innovation project will result in a fully developed intervention, evidence of the intervention's theory of change, and data that speak to the intervention's feasibility, fidelity of implementation, and promise for improving learner outcomes.

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These are some examples of funded Development and Innovation projects.

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Initial Efficacy and Follow-Up supports initial efficacy studies of education interventions and longer-term follow-up studies of rigorously evaluated interventions.

Initial Efficacy projects test interventions that have not been rigorously evaluated previously to examine the intervention's beneficial impact on education outcomes in comparison to an alternative practice, program, or policy.

Follow-Up projects test the longer-term impact of an intervention that has been shown to have beneficial impacts on education outcomes on previous or ongoing evaluation study.

Initial Efficacy and Follow-Up projects should provide practical information about the benefits and costs of specific interventions to inform the intervention's theory of change, its implementation, its usefulness for education personnel, and future research.

IES is interested in studies of interventions that can reasonably be expected to have meaningful effects on important education outcomes. IES expects applicants to describe and justify the effect sizes that they anticipate for the interventions that they propose to evaluate.

Again, if you intend to replicate an efficacy study, you should apply under the Systematic Replication competition.

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Here are some examples of previously funded Initial Efficacy and Follow-Up projects.

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Now, we'll talk about the heart of the application, the Project Narrative.

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The project narrative is the main component of your application and is composed of four sections: significance, research plan, personnel, and resources. It should be a maximum of 22 pages. Any additional pages will be removed before review.

The requirements vary by Project Types, so be sure to read the requirements very carefully in the RFA. The requirements are the minimum necessary for an application to be sent forward for scientific peer review.

A reminder, all IES RFAs contain requirements. So be sure to review them as you write your application.

The recommendations also vary by Project Type, and these are used by reviewers as they score your application and are meant to make your proposal stronger and more competitive.

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The Significance Section describes your overall project. It should describe your research question or questions to be answered along with the factors, intervention, or instrument that you plan to examine, develop, or evaluate.

You need to provide a compelling rationale for the project, which includes a theoretical justification or your Theory of Change. And then you'll also need to

include an empirical justification or description of the evidence that supports your Theory of Change. And then lastly, you should include a practical justification why others should care about your project, what are the real-world implications, and why would the expected results matter in education practice or policy?

When you're writing the Significance Section, don't assume that the reviewers know the significance of your work. Some of the reviewers might not be in your field, so that you need to convince them why your particular question is important.

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Now, I want to discuss two key pitfalls when it comes to the Significance Section. The first is related to a lack of clarity in your description of what you were analyzing, be it what it is to be measured in a Measurement project, what is to be explored in an Exploration project, and what is to be developed or evaluated in a Development project or an Initial Efficacy project. A common comment from reviewers is that it's not clear what is being addressed or whether it is under the control of the education system. If these things aren't clear, then the reviewers may have trouble following the rest of your proposal or finding your research idea relevant to the type of research IES supports.

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The second pitfall is related to the Theory of Change. Including a theory of change helps to make clear the relationships you are proposing to analyze, and those that underlie the research you intend to do. If you're applying for an Exploration project and you don't indicate why a factor is expected to be related to education outcomes, then that is problematic. The reviewers need to know the theory behind why you think that factor is related to an outcome. And if you're applying for Development and innovation or an Initial Efficacy project, they need to know why the proposed intervention should improve outcomes versus current practice. And then if you're applying for a Measurement project, you need to clearly specify how an instrument will measure a specific factor or outcome and how you will link this to education outcomes. So, I do want to stress that all of these elements of the theory of change that I'm talking about now should be described in your narrative, but a graphic can be helpful as well. In your theory of change, you should make it clear what you expect to happen, in what order, and why something is expected to be related to an education outcome. This could all be represented in a visual graphic, but discussing why it should improve education outcomes related to current practice would be something that you should describe in more detail in the narrative.

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Your theory of change should describe how the instrument, factor, or intervention addresses the outcome that you are targeting, why it should work, and why there is a need for it. Be clear about the target, for instance, learner or teacher knowledge and skills, and how this addresses the need that you specified.

The theory of change for an intervention should also describe the instructional techniques or practices and why they are appropriate for the population and the change you intend to bring about, as well as a description of how the intervention will be delivered. It's also important to be clear about which aspects are different from the counterfactual and what the interventions' core ingredients are. In other words, which specific aspects of your intervention do you expect will drive the change in education outcomes?

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Here we have an example of a simple theory of change graphic that goes through the process of what is expected to change and why. In a simple theory of change, you should include the target population, the main components of the intervention, the underlying processes targeted by the intervention that may explain any changes in your proximal and distal outcomes of interest, and then also your outcomes of interest. This is just an example. You could elaborate on this depending on your intervention and research questions. For example, you may want to include factors that affect the relationship between the factor or intervention of interest in education outcomes in your theory of change as well.

For graphical models of the theory of change

- Do not overwhelm the reader with an overly complicated model
- Do not use color as a key because applications are often reviewed in black and white.

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Moving on to the next section, the research plan. In the research plan, you will describe the actual work that you intend to do. You should be very specific about your research questions and, depending on your project type, you'd want to describe how you intend to examine the relationships between factors in education outcomes, develop and pilot-test the intervention, evaluate the efficacy of an intervention, or develop and/or validate an instrument.

It's important to ensure that the application flows across all sections of the narrative. In other words, your research plan should be aligned to your Significance section, and it helps to have a step-by-step process so it's really clear to the reviewers what you plan on doing. For example, if you're proposing to develop an intervention, the process for iteratively developing it and refining each aspect of it, including collecting and using feedback data, should be really clear. And a timeline is strongly recommended. In fact, if you don't include a detailed timeline in your application and your application is recommended for funding, your program officer will ask you to provide a timeline. So, it's important to go ahead and include this in the application for the reviewers as well.

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In the Research Plan, you should provide a description of the setting where you'll be doing the research. For example, the size and characteristics of the setting, classrooms, school, and/or surrounding community, as well as the population that you're addressing in your sample. In describing your sample, you should define your sample and discuss sampling procedures, including justification for any exclusion or inclusion criteria. You should specify the sample size and demonstrate that it will provide enough power to address each of your research questions. You should also address attrition, including how likely it will be and any strategies that you intend to use to prevent it in the course of your study. And lastly, you should discuss generalizability, including how the setting that you're working in will affect the generalizability of your findings, and the extent to which your sample and sampling procedures will allow you to draw inferences for the population you're addressing. If you're using secondary data, you should describe the setting, population, and sample for the data sets that you plan to use.

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Another thing that you need to describe in your research plan is your outcome measures, including both proximal and distal outcome measures. You should include outcome measures that are sensitive to the changes in performance that the intervention is intended to bring about, as well as measures that are not strictly aligned with the intervention and could, therefore, capture changes in the control or comparison group. Your measures should be aligned with your Theory of Change. For instruments, factors, or interventions that are designed to directly assess or link to change the teaching and learning environment, and in doing so, indirectly affect education outcomes, you should include measures of learnerss' education outcomes, as well as measures of the intermediate

outcomes, like teacher behaviors, that are hypothesized to be directly linked to the intervention. And you should also include measures that are of practical interest to learners, parents, and educators, such as grades, attendance, tardiness, dropout rates, disciplinary actions, or graduation rates. For Development and Innovation and Initial Efficacy and Follow-Up projects, we also encourage the use of widely-used common measures of learner outcomes to facilitate the field's ability to synthesize findings across studies. Consider the issue of multiple comparisons when you're deciding which measures to use and how many.

And finally, it's important to justify the use of every measure. So, if you have measures that are not actually linked to your research questions, this will likely be questioned by the reviewers. In your description of your measures, you should also discuss the psychometric properties of each measure, including the reliability and validity.

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You should specify the purpose of all of your measures, including non-outcome or process measures. For instance, for a Development and Innovation project, you should specify which measures you will use to inform the iterative development process. These could be things like qualitative data from focus groups or rating scales on the usability of an intervention by an end-user. They could also be preliminary outcomes, but you'll have to explain how that measure will then feed back into the iterative process of development.

If you are proposing a Development and Innovation or an Initial Efficacy project, you'll also need to include measures to assess the fidelity of implementation of the intervention. And also note that if the intervention includes a training component, you should identify measures to assess the fidelity of the training. So, for these measures, you should describe how they'll capture the core of the intervention, and will allow you to determine whether the intervention is operating as you intended. You should also identify measures of comparison group practices, so you can compare the treatment and comparison groups to make sure that the comparison group doesn't receive key elements of the intervention and that the two groups are getting substantially different services. You'll want to measure practices that could be happening in either group, but that you hope or assume are only present in the intervention group.

And then, depending on the project type you proposed, you might also need to include measures of usability and feasibility. This is any type of feedback provided by the users of the intervention, such as teachers, about whether

intervention can be used by a teacher and can be implemented with constraints of an education setting.

For qualitative measures, you should describe the items to be used, the validity, and the procedures for collecting and coding and for monitoring and maintaining inter-rater reliability.

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Your analyses will depend on your design, but in general, you should describe all planned analyses and describe how these analyses will address each of your research questions. And for qualitative data, you also need to be sure that you discuss how you'll analyze it; for example, coding for common themes, and also how it will address your research questions.

For your analysis of quantitative data, you should present your model for each analysis. You should also discuss how you plan to address any clustering or nesting and how you'll account for missing data. For causal impact studies, you should also discuss a plan for checking for baseline equivalence on your outcomes of interest across the intervention and control groups, as well as overall and differential attrition. Then you should also propose to conduct sensitivity tests to assess the influence of key procedural or analytic decisions on the results.

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For Measurement projects, you are encouraged, but not required, to describe how you will estimate the costs for educators and education systems to implement the fully developed and/or validated instrument.

For Development and Innovation projects, you are required to describe a plan for determining the costs associated with implementing the fully developed intervention in the context of the pilot study.

For Initial Efficacy and Follow-Up projects, you are required to include a cost analysis plan. You are also required to include a cost-effectiveness analysis plan or rationale for why a cost-effectiveness analysis cannot be done.

Specific recommendations for the cost and cost-effectiveness analysis plans are provided in the RFAs.

IES provides resources to help you plan and conduct a cost analysis. There's also a Cost Analysis Help Desk out of Teachers College, Columbia University. These resources and the Help Desk are linked here.

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Now, I'm going to move on to the third section of the Project Narrative, the Personnel Section. The purpose of this section is to name each person on your team and describe their relevant expertise, their responsibilities, and their time commitment. You'll want to include personnel of both the primary and secondary institutions, as well as any consultants. The purpose of this section is to show that your team has the appropriate qualifications to carry out every aspect of the proposed work. This includes the appropriate methodological and content-related expertise, as well as project management skills and experience disseminating to a variety of audiences.

In its research grants program, IES is interested in including individuals from groups that have typically been underrepresented in the education sciences. So, you should also describe the backgrounds and experiences of project team members in light of this.

You also need to demonstrate that each team member has an appropriate level of effort given their expertise in the project responsibilities. You will need to provide CVs for each member of the research team. And it's also advisable to make the CVs specific to the project rather than submitting generic CVs. And we do recommend that you use the SciENcv to create IES biosketches. And be sure to include your ORCID numbers in your biosketches, if you and your team have them.

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Here are some strategies for writing the personnel section if you are a seasoned versus an early career researcher. For experienced researchers, it will be important to highlight that you have enough time to devote to the project. For instance, reviewers are not going to want to see a PI who only has 2% time on the project. It's also important to adequately describe your credentials because some of the reviewers may not do research in your area and may not be aware of the extent of your experience.

If you are an early-career researcher, the strategies are different. You'll need to show that you have adequate expertise to do the work and to manage the project. So, if relevant, you could show how this work is a continuation of the work that you did in graduate school or during a postdoctoral fellowship.

This will establish your expertise in this area. And then you'll also want to talk about any experiences that you've had that show that you have the appropriate project management skills. And then you should also highlight your publication record as evidence that you have the appropriate expertise in the particular 18

content area. Generally, it's advisable to have a senior researcher on your team. Reviewers are typically more comfortable if you have a senior person to turn to for advice as either a co-PI or a co-investigator, or even as a consultant or an advisory board of senior researchers. You just want to make sure to include enough of their time on the grant that it's taken seriously. So again, if you have someone for 2% time and that's the person whom you're going to for advice, it doesn't really look like you're going to get their active engagement in the project.

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The final section of a Project Narrative is the Resources Section. The purpose of this section is to describe how you have the institutional capacity to complete a project of the proposed size and complexity, as well as your access to the resources at the primary and secondary institutions that you need to successfully complete the project. In this section, you should also describe your plan for acquiring any resources that are not currently accessible, will require significant expenditures, and/or are necessary for the successful completion of a project.

In the Resources Section, you will also want to describe your access to the institutions who will participate in the project and the education settings in which the research will take place. Then in Appendix E, you can include letters of agreement from each of the institutions involved, or from states, school districts, or schools. You'll want to be sure to show that each of these partners understands their role. So, the letter should be specific and show that your partners know what they would be asked to do, and how much time is involved. If you plan to use data from another source, whether it's school records or an existing dataset, you want to show that you have access to this data. I'll talk more about this in the next slide, but for this round of applications, we recognize that it might be difficult to provide these letters because of school closures associated with COVID-19. So there is some flexibility.

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Reviewers will consider team members' experience disseminating research findings and products from past projects to a range of audiences in addition to applicant's plans for disseminating the findings of the proposed study. It is important to note that Dissemination is a separate review criterion, even though it is part of the Appendix. Applications that do not contain a Dissemination History and Plan in Appendix A will not be peer-reviewed.

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This table shows the required and optional appendices and what information must or should be included in each. These are described in more detail in the RFAs, but I'll discuss them briefly. As I mentioned a couple of slides ago, Appendix A is required for all applications and should describe your dissemination history and the plans to disseminate the findings from the project. Appendix B is only required for resubmissions. This is the place where you would include your response to the previous reviewer's comments. Or if your application is one that you consider to be new, but that is similar to a previous application, you should describe why it should be considered a new application. Appendix C is optional, and you can use it to include figures, charts, and tables that supplement the project narrative, as well as give examples of measures to be used in the project. Appendix D is also optional. It can be used for examples of materials to be used in the intervention or instrument that you're focused on. Appendix E is for letters of agreement from the school partners and/or data sources depending on what's applicable for your particular project. If you have consultants on your project, you can also include letters of agreement from each consultant in Appendix E.

One thing to note about Appendix E, IES understands that due to school closings associated with COVID-19, you may have difficulty providing letters from schools, districts, and other education sites that would participate in or provide data for the proposed research. If you are unable to provide these letters in your application, include a description in Appendix E of why you were not able to obtain letters and your plan for securing them if your application is recommended for funding. Reviewers will be instructed not to penalize applicants for failure to include letters of agreement due to the coronavirus pandemic. Special conditions may be placed on the grant awards if these letters are not received by the award date.

And then Appendix F is required for Exploration and Initial Efficacy and Follow-Up proposals, and this should include your Data Management Plan. Please note that this is a new requirement for Exploration projects. This plan should describe the process for making the final research data from the proposed project accessible to others. The RFA describes the specific information that you should include in your Data Management Plan, as well as the resources that may be helpful in developing that plan.

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You will need three things to apply for an IES grant. First, you need the RFA, which contains information for writing your project narrative. Second, you need the IES Application Submission Guide, which describes information related to

submitting your application and provides an overview of the funding process. Lastly, you need the application package, which can be found on grants.gov. In terms of registration for grants.gov, the first tip, and perhaps the most important, is to start this process early. Initial registration can take more than five business days, and even if you're already registered, the annual update that you have to complete could take more than three days. It's your institution that needs to register. All applications must be submitted electronically through grants.gov. Applications received by grants.gov are date and timestamped to the second. So, your application must be fully uploaded and submitted by the date and time specified in the RFA. IES will not accept late applications. Letters of intent are encouraged, but not required. If you submit an LOI, a program officer will contact you. Regardless, you may contact a program officer for help with any questions that you might have.

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Let's talk now about the application submission and review process. This general information applies to multiple grant competitions.

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The other critical document, besides the RFA, to use when you apply for an IES research grant is the Application Submissions Guide. The guide contains important information about submission procedures and IES-specific guidance and recommendations to help ensure that your application is complete and received on time without errors through grants.gov.

Any person involved in the preparation and submission of the application should review the IES Submission Guide to ensure a complete and on-time submission.

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As I just mentioned, all applications must be submitted electronically through the grants.gov website. Grants.gov requires applicants to use the Workspace interface. Grants.gov marks alerts in red, and these should be attended to as failure to follow the grants.gov requirements will result in an unsuccessful application.

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IES uses a scientific peer review process for the review of grant applications. This process is overseen by the IES Standards and Review Office. First, applications are reviewed for compliance and responsiveness to the RFA.

Applications that are compliant and responsive are assigned to a review panel. Two or three panel members conduct a primary review of each application. There's a triage process so that only the most competitive applications are reviewed by the full panel. As a result, applicants whose applications were triaged receive the review comments from the primary reviewers, but no scores. Applicants whose applications go to full panel receive the review comments from the primary reviewers, the full panel's review scores, and a summary of the panel's discussion of the application.

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The review panel score is primary in the decision to fund an application, as it addresses the scientific merit of the application.

Other criteria are used in making funding decisions. IES may ask clarification and budget questions to determine the importance of these criteria.

At times, IES may be limited by budgetary constraints so that it cannot fund all the applications rated as outstanding or excellent.

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The Applicant Notification System or ANS is housed at iesreview.ed.gov. After you receive an email notification, you may sign in to ANS to review the status of your application, the reviews of your application, and, if your application went to full panel, the review scores and panel discussion summary.

We encourage you to discuss your reviews with the program officer and consider re-applying.

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IES program officers are here to help you with your application. Please don't hesitate to reach out if you have any questions.

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Program officers are a resource for you. They are not involved in the IES review process, so they can provide objective feedback on your application. Program officer contact information is provided in the RFA for each topic. You can email your initial research idea to your program officer or discuss prior reviews with a program officer. As you develop your application, program officers can comment on your content and framing of the research.