



New Jersey Governor's Council for Medical Research and Treatment of Autism

Request for Applications (RFA)

July 1, 2022

I. Postdoctoral and Graduate Student Fellowship Program

II. Concept Projects

IMPORTANT DATES:

Publication of RFA: February 1, 2021

Letter of Intent due (required): February 19, 2021

Application due: March 31, 2021

Notification of award: June 30, 2021

Project start date: July 1, 2021

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www.nj.gov/health/autism/

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INTRODUCTION

Autism spectrum disorder (ASD) is a group of complex neurodevelopmental disabilities defined by significant impairments in social interaction and communication as well as the presence of unusual or restricted behaviors and interests. These disorders, for which there is presently no cure and only limited treatments, generally have lifelong effects. The Centers for Disease Control and Prevention (CDC) estimates an average of 1 in 59 children in the United States has ASD, as reported in the [MMWR Surveillance Summaries, April 27, 2018/ Vol. 67 / No. 6](#). As part of the same CDC study, the prevalence rate for the New Jersey sites was established at 1 in 34 children, the highest among the sites studied. The prevalence of ASD continues to increase in New Jersey. New Jersey's higher rates can be attributed in part to increased awareness and detection of Autism.

The Governor's Council for Medical Research and Treatment of Autism (Council) was created by a State appropriation in 1999 and has been issuing research, clinical and educational enhancement grants since 2000. The mission of the Council is to "advance and disseminate the understanding, treatment, and management of ASD by means of a coordinated program of biomedical research, clinical innovation, and professional training in New Jersey."

As per P.L. 2007, c.174 monies from one-dollar surcharges on fines and penalties from traffic violations are deposited by the State Treasurer into the Autism Medical Research and Treatment Fund to sponsor the Council to fund autism research and treatment in the State of New Jersey. Currently, the Council funds 20 research grants that are a combination of clinical research, basic science research, fellowship program, pilot grants and the [New Jersey Autism Center of Excellence \(NJACE\)](#).

The Council is in the New Jersey Department of Health (DOH)- Office of Research Initiatives. The DOH is responsible for releasing and administering all Council Grant Programs and is responsible for ensuring that grantees comply with all regulatory, fiscal, programmatic, and administrative matters according to the New Jersey Department of Health guidelines. To learn more about the work of the Governor's Council for Medical Research and Treatment of Autism please visit <http://www.state.nj.us/health/autism/index.shtml>.

The New Jersey Department of Health promotes the application of all health in all policies to ensure the best outcomes for New Jersey residents. As described by the Center for Disease Control and Prevention (CDC), Health in All Policies applies health consideration into policymaking processes outside the health sector and where people live, work and play. The DOH focus is on improving health outcomes for New Jersey residents at all life stages. Core activities are to use data to drive measurable health improvements, identify and target

vulnerable populations for interventions, to eliminate health disparities and promote collaboration across sectors to develop health policies and achieve health equity.

PROGRAM DESCRIPTION AND GUIDELINES

The purpose of this grant program is to support research capable of advancing the mission of the Council and to offer funding for three initiatives: Postdoctoral and Graduate Student Research Fellowships and Autism Concept Projects. Postdoctoral Fellowships are two-year awards of \$65,000 per year for a total of \$130,000. Graduate Student Fellowships are two-year awards of \$30,000 per annum. The Autism Concept Projects are one-year awards not to exceed \$50,000 designed to test innovative ideas that address important problems relevant to autism. It is estimated that a total of \$1,300,000 may be awarded for the three initiatives. At the end of the grant, grantees may request no more than one no-cost extension for the Postdoctoral and Graduate Student Research Fellowships, for the maximum of one year. Grants awarded for the Autism Concept Project will not be eligible to receive a no-cost extension.

The awards for this funding cycle are intended to promote ASD research in New Jersey, not to provide long-term support. The data and results gained by using the Council's funds will allow investigators from New Jersey to develop stronger proposals for submission to the National Institutes of Health (NIH) and biomedical research foundations. Grantees shall recognize and agree that both the initial provision of funding and the continuation of such funding under the grant agreement is expressly dependent upon the availability to the Department of funds appropriated by the State Legislature from State and/or Federal revenue or such other funding sources as may be applicable.

Applicants may not apply for both a Fellowship and a Concept Project grant in the same cycle. Given the competitive nature of these grants, applicants are encouraged to submit one well-developed and responsive application as opposed to multiple applications.

All non-funded applicants in any given grant cycle are eligible to resubmit once in the next application cycle. The applicant must revise the non-funded application based on reviewer feedback. All reapplications will be reviewed as new competing proposals.

Postdoctoral and Graduate Student Fellowships (CAUT22AFP)

The Council welcomes investigators with new approaches to examine the origins, mechanisms, and treatment of Autism Spectrum Disorders (ASD). The fellowships are intended to promote collaboration among researchers currently working on ASD-related projects and to encourage researchers in other fields to enter this compelling area of research. The research projects will address one of the IACC Objectives listed in Appendix 1, which constitute a subset of the

[Interagency Autism Coordinating Committee \(IACC\) 2016-2017 Strategic Plan](#). The data and results gained should allow investigators from New Jersey to develop strong proposals for submission to the NIH and biomedical and international funding sources. Preference will be given to projects judged to have the potential for attracting grant support from federal or other organizations; particularly any that promote health equity for vulnerable populations, i.e. disabled, LGBTQ, racial and ethnic minorities.

Postdoctoral Fellowships are two-year awards of \$65,000 per year that provide an annual stipend of \$50,000, a research allowance of \$14,000, and a travel budget of \$1,000. No part of the award may be used for institutional overhead or indirect costs. Non-research activities, such as teaching, may not occupy more than 10% of the fellow's time. Postdoctoral candidates must hold a Ph.D., M.D., or equivalent graduate degree prior to activation of fellowship, and must be accepted for postdoctoral training under the supervision of an appropriate mentor at a qualifying academic research institution in New Jersey.

Graduate Student Fellowships are two-year awards of \$30,000 per year. They provide an annual stipend of \$25,000, a research allowance of \$4,000, and a travel budget of \$1,000. No part of the award may be used for institutional overhead or for tuition. Applicants must be full-time graduate students in residence in a proposed course of study directly related to autism. Students must begin study in the semester following fellowship activation unless special permission is received prior to activation date. The Council prefers to support graduate student candidates who have completed the first year of graduate study and are concentrating on research projects at least 80% of their time. Applicants may serve as teaching assistants while holding a Graduate Student Fellowship without special permission.

Fellowships will not be awarded to applicants with other simultaneous or overlapping fellowships. A candidate may not apply for a Concept Project grant in the same grant cycle. Funding for the second year of the Fellowship is contingent upon the availability of funds, the submission and approval of a Progress Report, and a recommendation from the mentor. The Progress Report must be favorably reviewed and recommended to the Autism Council for continued funding. Postdoctoral and Graduate Student Fellowship awards will begin on July 1, 2021. A Final Narrative Report is required and must be submitted to the office within 60 days of termination of a Fellowship. The detailed elements required in the narrative are described in Appendix 2.

Autism Concept Projects (CAUT22ACP)

The Concept Projects will test innovative ideas that address important problems relevant to autism. These are high-risk studies that have the potential to reveal entirely new avenues for investigation. Applicants must describe how the new idea will enhance the existing knowledge of autism or develop an innovative and novel course of investigation.

Concept projects may generate sufficient preliminary data to enable the Principal Investigator (PI) to prepare an application for future research. Presentation of preliminary data is not consistent with the intent of the Concept projects. While the inclusion of preliminary data is not prohibited, the strength of the application should not rely on preliminary data.

The Council will fund Concept Projects with an emphasis on encouraging (1) experienced investigators to pursue new directions in autism research, or (2) new investigators who want to gather preliminary data for larger research projects. Suitable projects include development of new research technologies; and investigation of novel scientific ideas, model systems, tools, agents, targets, and technologies that have the potential to substantially advance autism research.

The maximum period of performance is 1 year.

The anticipated direct costs budgeted for the entire period of performance will not exceed \$50,000. Indirect costs are 15%. All direct and indirect costs of any subaward (subgrant or subcontract) must be included in the total direct costs of the primary award. The applicant may request the entire maximum funding amount for a project that may have a period of performance less than the maximum 1 year. All investigators at or above the level of postdoctoral fellow (or equivalent) are eligible.

Proposal Narrative:

1. 2. Research Plan (Maximum 4 pages for a through d below).
 - a. Specific Aims (½ page)
 - b. Significance (1 page)
 - c. Innovation (½ page)
 - d. Approach (2 pages)
3. Description of the Research Environment (½ page).
4. Bibliography and References cited (as needed)

The Autism Concept awards will begin on July 1, 2021. A Final Narrative Report is required and must be submitted to the office within 60 days of termination of the Autism Concept Project.

ELIGIBILITY

Applicants cannot conflict with the Council's Code of Ethics (www.nj.gov/health/autism). Applications that are not compliant with the Code of Ethics will be disqualified.

Qualifying Individuals

Individuals with the skills, knowledge, and resources necessary to carry out the proposed program as the Principal Investigator are invited to work with their organizations to develop an application. **Applicants must be affiliated with a New Jersey State medical school, a New Jersey State academic institution, a New Jersey State research organization or a New Jersey State public or private non-profit entity with a demonstrated capability to conduct grant funded research.** The Council will not award grants to unaffiliated individuals. Individuals from underrepresented racial and ethnic groups as well as individuals with disabilities are encouraged to apply. Individuals of any nationality or citizenship status may apply provided they hold employment or affiliate with a qualifying entity, as described below. Applicants are encouraged to collaborate with researchers in the United States or out of the country who could contribute additional professional expertise or consultation. The structure of the collaborative arrangement should be described in the application.

Qualifying Entities

Public and private non-profit entities in the State of New Jersey may apply for a Council grant under this RFA. A qualifying entity is defined as any research qualified New Jersey academic institution, New Jersey research organization, or New Jersey public or private non-profit entity with a demonstrated capability to conduct grant funded activities. In no case can an individual be a qualifying entity. The qualifying entity shall have established procedures to receive and administer Federal and State grants, including a Grant Administration Office (or equivalent) that is responsible for overseeing grant programs and procedures for the protection of human subjects as regulated by the NIH, and an Institutional Review Board (IRB) that will approve proposed activities.

PROTECTION OF HUMAN SUBJECTS AND GENOMICS INFORMATION

Compliance with NIH regulations for the protection of human subjects and the inclusion of women, children and minorities in clinical studies is required for all grantees.

The Council requires compliance with NIH, the [Office for Human Research Protections \(OHRP\)](#) in the U.S. Department of Health and Human Services (HHS) and institutional guidelines defined for the protection of human subjects in research. Violations of these regulations and guidelines must be reported and reviewed by the appropriate institutions and the Council, including but

not limited to IRB overseeing the research, the associated institution, and the laboratory's senior scientist.

The Council shall have the right to arrange for observation and/or auditing without prior notice of any research activity and research records associated with research funded by the Council. It is the responsibility of the applicant as a potential recipient of a Council grant to assure that the rights and welfare of all human subjects used in any Council sponsored research are protected. Any applications involving human subjects must be reviewed and approved by the appropriate IRB. IRB approval must be obtained before patient enrollment can start, at the latest by the end of the first year.

Grantees are strongly encouraged to share human data with the [NIMH Data Archive](#) (NDA) if compatible with the design of the pilot project. The NDA has sample language for informed consent, as well as other resources.

FUNDING AVAILABILITY, OBLIGATIONS AND DEADLINES

Approximately \$1,300,000 will be made available for the Postdoctoral and Graduate Student Fellowships and the Autism Concept Projects. Maximum funding for the Postdoctoral Research Fellowships are two-year awards of \$65,000 per year including the stipend, research allowance and travel; no part of the award may be used for institutional overhead or indirect costs. The Graduate Student Fellowships are two-year awards of \$30,000 per year including a stipend of \$25,000, a research allowance of \$4,000, and a travel budget of \$1,000. No part of the award may be used for institutional overhead or tuition. Fellowships will not be awarded to applicants with other fellowship awards. The Autism Concept Project is a one-year award of \$50,000 to test innovative ideas that address important problems relevant to autism.

Letters of intent are required and due February 19, 2021. Applications must be submitted by March 31, 2021. The projected start date is July 1, 2021.

Eligibility requirements are stated in the eligibility section above. Multi-year awards are made through one-year contracts. Each funding award within the two-year period will be contingent upon the availability of funds. Support for the second year of all grants is contingent upon submission and approval of the first-year comprehensive progress report due by November 1, 2022. Progress reports must detail the actions towards meeting the yearly project objectives. Applicants will meet their stated objectives, or clearly demonstrate how they are moving towards achieving those objectives, as a condition of funding for the following year. Progress reports must be favorably reviewed by a review panel, convened by the Office of Research Initiatives, and recommended to the Council for continued funding. A final progress report is

required within 60 days of termination of the grant. However, concerning the Concept Projects, one final project evaluation shall be due within sixty days after the end of the one-year contract.

Successful applicants must abide by all programmatic and fiscal requirements of the NJ Department of Health, including:

1. Terms and Conditions for the Administration of Grants;
2. General and specific grant compliance requirements issued by the granting agency; and
3. Applicable Federal Cost Principles relating to the applicant.

LETTER OF INTENT

A Letter of Intent (LOI) is required and is due by February 19, 2021. Although a LOI is not binding and does not enter into the review of a subsequent application, the information that it contains allows the SAGE team to be notified that you have approval to upload a grant application and, it allows the Office of Research Initiatives' Council staff to estimate the potential review workload, and plan the review. The LOI is required as a notification of approval to upload the grant application into SAGE by the due date (March 31, 2021). If you fail to send a LOI by February 19, 2021 you will not be able to initiate the grant application in SAGE. Conversely, should the applicant decide not to submit a grant application and the LOI has been submitted by the due date, the applicant will not be obligated to initiate a grant application in SAGE.

The letter of intent must include the following information:

1. Descriptive title of proposed project
2. The specific IACC question and objective being addressed (selected from Appendix 1)
3. Principal Investigator name, address, email, and telephone number
4. Participating institutions and organizations
5. Title of the funding opportunity selected:
 - a. Postdoctoral and Graduate Student Fellowship (AFP)
 - b. Concept Project (ACP)
6. Brief overview of project (1-page maximum): Significance, aims and approach

Send the letter to NJGCA@doh.nj.gov. If you do not receive an acknowledgement of receipt within 2 business days, please call 609-633-8740.

APPLICATION SUBMISSION

During the application process, questions may be addressed to NJGCA@doh.nj.gov until March 31, 2021.

The Office of Research Initiatives' Council staff will only accept applications submitted electronically through the New Jersey System for Administering Grants Electronically (SAGE) at www.sage.nj.gov by 4:00 PM March 31, 2021. The detailed narrative questions for the Postdoctoral and Graduate Student Fellowship Program are described in **Appendix 2**.

After an applicant logs on to SAGE, the applicant's Authorized Official must authorize the applicant as an approved user and assign the applicant to the grant before the applicant can access the application. Before logging on to SAGE applicants should refer to "Instructions for On-line Grant Applications" under "Grant Opportunities" on the Council's website (www.nj.gov/health/autism).

For the grant applications, character limits for the proposal abstract, proposal lay abstract and proposal narrative are included in SAGE. The character limits do not represent the expected length of the response. They are merely maximal lengths allowed in the online form.

Applicants should be cautious while utilizing the cut and paste function of most word processing programs to transfer text into narrative boxes within the SAGE application. The SAGE will not recognize certain formatting, including certain scientific notations, bullets, tabs, tables, graphs, and photographs. Therefore, in addition to completing the text boxes in SAGE, it is **required** to attach the full proposal (abstracts and narrative) with tables, charts and illustrations as a Word or PDF document, uploaded in the "Miscellaneous Attachment" section.

In many SAGE pages a "View PDF" button will be available that will automatically create a PDF. These dynamic PDFs can be printed or saved to your computer for reference. It is useful to review the PDF files for accuracy prior to submitting the application electronically.

GRANT REVIEW AND FUNDING DECISIONS

Review Process

All proposals will be reviewed in accordance with the Grant Review Process set forth herein. The determination of grant awards will be made through a two-step review process:

1. Administrative Review (Office of Research Initiatives' Council staff):

Upon receipt, all grant applications will be reviewed by the Office of Research Initiatives' Council staff for compliance with all applicable New Jersey State statutes and regulations, and to ensure completeness and accuracy. In the event a grant application needs correction due to a budgetary issue, the applicant will be contacted to provide a revised budget. In the event the Office of Research Initiatives' Council staff determines that an application does not meet the

administrative requirements, the application will be denied, and will not be forwarded for independent scientific merit review.

2. Scientific Merit Review (Independent Scientific Merit Review Panel)

Members of the Independent Scientific Merit Review Panel(s) will convene to evaluate all research grant applications. The Panel(s) will judge the applications on significance to ASD and feasibility (see details in Appendix 3). The panels will assign scores to each application.

Funding decision

The results of the review will be forwarded to the Council, through the Senior Executive Service Director, for final review and action. The Scientific Advisory Committee (SAC) will review the results of the Review Panels and may provide additional advice to the Senior Executive Service Director and the Council. Based on that advice, Council may decide to fund a project only under certain conditions, including but not limited to funding only the first specific aim.

The Council will make the final funding recommendations, considering the mission of the Council and the potential impact of the grant on the understanding, prevention, evaluation and treatment of ASD. The authority to authorize or not authorize grants is fully vested in the Council according to New Jersey statute P.L. 2007, c.168 (NJSA C.30:6D-60).

RESULTS NOTIFICATION

All applicants including Principal Investigators and institutions will be formally notified of the outcome of their application at the conclusion of the selection process, anticipated to be no later than June 30, 2021. However, this date is subject to change without notification to the applicant’s institution. At that time, formal notification will be made to the institutions of successful applicants. Contracts will be initiated shortly thereafter by the NJ Department of Health. Non-funded applicants also will be notified. Blinded reviews will be provided to both funded and non-funded applicants; no further information shall be provided.

NJDOH KEY CONTACT INFORMATION

Grants Management Officer (Fiscal Information)- Trischa Zumbach
trischa.zumbach@doh.nj.gov (609) 913-5000

Program Management Officer (Program Information) – Taina Sampeur
tania.sampeur@doh.nj.gov (609) 633-8740

SAGE Help Desk (SAGE Helpdesk/ Reviewer/ GMO)- Cynthia Satchell-Gore
cynthia.satchel-gore@doh.nj.gov (609) 376-8503

APPENDICES

Appendix 1 – Selected IACC objectives

QUESTION 1 HOW CAN I RECOGNIZE THE SIGNS OF ASD, AND WHY IS EARLY DETECTION SO IMPORTANT?

1. Reduce disparities in early detection and access to services.
2. Improve/validate existing, or develop new tools, methods, and service delivery models for detecting ASD in order to facilitate timely linkage of individuals with ASD to early, targeted interventions and supports.
3. Support research to understand the underlying biology of sex differences in ASD, possible factors that may be contributing to underdiagnosis, unique challenges that may be faced by girls/women on the autism spectrum, and develop strategies for meeting the needs of this population.

QUESTION 2 WHAT IS THE BIOLOGY UNDERLYING ASD?

1. Foster research to better understand the processes of early development, molecular and neurodevelopmental mechanisms, and brain circuitry that contribute to the structural and functional basis of ASD.
2. Support research to understand the underlying biology of co-occurring conditions in ASD and to understand the relationship of these conditions to ASD.
3. Support large-scale longitudinal studies that can answer questions about the development of ASD from pregnancy through adulthood and the natural history of ASD across the lifespan.

QUESTION 3 WHAT CAUSES ASD, AND CAN DISABLING ASPECTS OF ASD BE PREVENTED OR PREEMPTED?

1. Strengthen understanding of genetic risk and resilience factors for ASD across the full diversity and heterogeneity of those with ASD, enabling development of strategies for reducing disability and co-occurring conditions in ASD.
2. Understand the effects on ASD risk and resilience of individual and multiple exposures in early development, enabling development of strategies for reducing disability and co-occurring conditions in ASD.
3. Expand knowledge about how multiple environmental and genetic risk and resilience factors interact through specific biological mechanisms to manifest in ASD phenotypes.

QUESTION 4 WHICH TREATMENTS AND INTERVENTIONS WILL HELP?

1. Develop and improve pharmacological and medical interventions to address both core symptoms and co-occurring conditions in ASD.
2. Create and improve psychosocial, developmental, and naturalistic interventions for the core symptoms and co-occurring conditions in ASD.

3. Maximize the potential for technologies and development of technology-based interventions to improve the lives of people on the autism spectrum.

QUESTION 5 WHAT KINDS OF SERVICES AND SUPPORTS ARE NEEDED TO MAXIMIZE QUALITY OF LIFE FOR PEOPLE ON THE AUTISM SPECTRUM?

1. Reduce disparities in access and in outcomes for underserved populations.
2. Improve service models to ensure consistency of care across many domains with the goal of maximizing outcomes and improving the value that individuals get from services.

QUESTION 6 HOW CAN WE MEET THE NEEDS OF PEOPLE WITH ASD AS THEY PROGRESS INTO AND THROUGH ADULTHOOD?

1. Support research and implement approaches to reduce disabling co-occurring physical and mental health conditions in adults with ASD, with the goal of improving safety, reducing premature mortality, and enhancing quality of life.
2. Support research, services activities, and outreach efforts that facilitate and incorporate acceptance, accommodation, inclusion, independence, and integration of people on the autism spectrum into society.

QUESTION 7 HOW DO WE CONTINUE TO BUILD, EXPAND, AND ENHANCE THE INFRASTRUCTURE SYSTEM TO MEET THE NEEDS OF THE ASD COMMUNITY?

1. Expand and enhance the research and services workforce and accelerate the pipeline from research to practice.

Appendix 2 – Abstracts and Narrative Questions – Postdoctoral and Graduate Student Fellowships (CAUT22AFP)

Abstract of Research Plan: State the plan’s long-term objectives and specific aims, referring to the autism relatedness of the project, and describe concisely the methods for achieving the goals. Avoid summaries of past accomplishments and the use of the first person. The abstract is meant to serve as a succinct and accurate description of the proposed work when separated from the application. (4,000 characters maximum)

Lay Abstract of Research Plan: Describe your research project in simple, non-technical language that is understandable by a person not trained in science. This abstract is meant to serve as a public description of the proposed research and, should the award be made, it will be used in press releases and various NJGCA publications. (2,000 characters maximum)

Proposal Narrative (32,000 characters maximum):

- A. **Specific Aims:** Describe the specific aims of the project.
- B. **Significance:** Explain how this project has the potential to effect direct clinical impact and advance the current knowledge in ways that can improve the physical and/or behavioral health and well-being of individuals with ASD. How will scientific knowledge, clinical care or public health be advanced? Briefly summarize how the project meets the definition for either clinical research. State the IACC objective (see the subset of IACC objectives in the funding priorities section above) that is addressed by the proposed project and summarize the expected outcomes.
- C. **Preliminary Data:** If applicable, discuss any preliminary data, and experience pertinent to this application.
- D. **Experimental Design:** Clearly state the purpose and nature of the research project including (1) your hypothesis (2) background and significance, (3) experimental design and research methods, including data collection methods and planned statistically sound analyses for each specific aim.
- E. **Literature:** Literature cited

Appendix 3 – Review Criteria – Postdoctoral and Graduate Fellowship Research Program (CAUT22AFP)

The Independent Scientific Merit Review Panel will perform two levels of review:

- Each panel member will review his/her assigned proposals for scientific and technical merit and significance and determine an initial score for each proposal.
- The panel will then convene for group discussion and scoring.

The reviewers will consider the following aspects of the application in order to judge the likelihood that the proposed research will have a substantial impact on the field of autism. Each of these criteria will be addressed and considered by the reviewers in assigning the overall score weighting them as appropriate for each application. Note that the application does not need to be strong in all categories to be judged likely to have a major scientific impact and thus deserve a high priority score. For example, an investigator may propose to carry out important work that by its nature is not innovative but is essential to move the field forward.

Significance:

- Is the research proposal relevant to the selected IACC priority?
- Does the research proposal address an important problem?
- Will the proposed project advance the current knowledge in ways that may improve clinical practice for patients with ASD?
- How will the successful completion of the aims change the concepts, methods, technologies, treatments, services, or preventive interventions for ASD?
- If applicable, will the proposed pilot project lead to an intervention that can be adopted and implemented in community settings should it prove effective?

Innovation:

- Is the proposed research innovative, including novel concepts, approaches, and/or methods?
- Does the application challenge and seek to shift current research or clinical practice paradigms?

Approach, Experimental Design and Capability:

- Are the overall strategy, methodology, and analyses well-reasoned and appropriate to accomplish the specific aims of the proposed project?
- Does prior research and theory provide a rational basis for the proposed project?
- Is the proposed project adequate in terms of experimental design and analyses, anticipation of potential problems, consideration of alternative approaches, and benchmarks for success?
- Does the design have adequate methodological quality and power to increase the likelihood of producing statistically sound conclusions?

Training:

- How do the training plan and mentorship from the advisor and two or more mentors align with the applicant's career goals?
- What is the likelihood of the applicant developing into an independent ASD researcher based on the training and mentoring plans and the proposed projects?

Environment:

- Will the scientific environment in which the work will be done contribute to the probability of success?
- Are the institutional support, equipment and other physical resources available to the investigator adequate for the project proposed?

Research Subjects (if applicable):

- Is the availability of subjects adequate and system of education and protection of subjects appropriate?
- Is the protection of subjects appropriate considering 1) risk to subjects, 2) adequacy of protection against risks, 3) potential benefits to the subjects and others, 4) importance of the knowledge to be gained, and 5) data and safety monitoring for clinical trials.
- Are the plans for inclusion of minorities and members of both sexes/genders, as well as the inclusion of children, justified in terms of the scientific goals and research strategy proposed?

Budget:

Is the budget reasonable and justified for the project proposed? Is there evidence of institutional commitment and/or cost sharing in the proposal.

Appendix 4- Instructions for Completing SAGE Grant Application

Initiate a Grant Application in SAGE

1. Accept the NJDOH SAGE agreement after reading it in its entirety.
2. Click Save and next.
3. The application will open a new screen
4. Click the appropriate button to begin the process to complete your grant application.
5. Unlike previous years, the Autism FY2022 grants are focused on Concept Projects, Postdoctoral Fellowships and Graduate Student Fellowships only.
6. Using the appropriate checkbox, indicate the type of grant you are seeking.
7. As an example, you will see the header “Research Project Type” and four selection buttons: Bridge Grants, Concept or Pilot Grants, Postdoctoral Fellowship and Predoctoral/Graduate Fellowship
8. If you are seeking funding for the Autism Concept Project, click the button “Concept or Pilot Grants” and proceed as required while saving your information.
9. If you are seeking funding for the Autism Postdoctoral Fellowship, click the button “Postdoctoral Fellowship” and proceed as required while saving your information.
10. If you are seeking funding for the Autism Graduate Fellowship, click the button “Predoctoral/Graduate Fellowship” and proceed as required while saving your information.
11. As you continue to hit “save next” SAGE will save your information and let you know if mistakes need to be corrected or to proceed to the next screen.
12. You may also use the menu drop box to command each screen, however if you skip or miss a screen that requires information input you will need to correct the mistake by either correcting or adding the required information. SAGE will not allow you to move to the next screen and, or submit your application if a mistake is detected.
13. Clicking “save next” is the best way to move through the grant application. However, using the forms menu drop box and following the commands will help you input additional information that may be needed to complete the section of your application.
14. **PLEASE NOTE**, you will not be able to submit your application unless all sections are populated with the required information. If any information is missing, you must correct before the system will allow you to submit your application.
15. **The Red Box** will appear indicating the pages that must be corrected before submission can occur.
16. If you encounter problems completing your SAGE application please contact the SAGE Help Desk GMO; Cynthia Satchell-Gore; cynthia.satchel-gore@doh.nj.gov