IES Postdoctoral Research Fellow Position at UTHealth

The Children’s Learning Institute (CLI) within the UTHealth Department of Pediatrics seeks a candidate who demonstrates interest in postdoctoral research training focused on developmental and academic outcomes of preschool and early elementary children with or at risk for disabilities. Candidates need interest and background in one or both of the offered training topics: (1) Early Interventions & Assessments, and/or (2) Scalable Professional Development (PD) for Educators of Young Children. Our training framework is focused on helping fellows understand the benefits of Research-Practice Partnerships (RPPs) and develop skills to become valuable partners with practitioners through all stages of their research career. We believe future generations of education and child development researchers must be directly trained to value rigorous and relevant research within RPPs to produce scholarship that is relevant, scalable and addresses the most pressing needs of young children with or at risk for learning disabilities.

This Postdoctoral Research experience is a competitive training program funded by the Institute of Education Sciences (IES) National Center for Special Education Research (NCER) that will support a total of four fellows for two years each. Fellows will work with a primary mentor and a secondary mentor as well as team of educators, clinicians, and experts at CLI on aspects of education research design, partnerships, data collection, statistical analyses, dissemination through scholarly publications and presentations, and the development of grant applications. Planned training will occur within several strands that include required and optional activities. For example, one training strand will ensure fellows understand how to conduct rigorous research that meets the IES Standards for Excellence in Education Research and What Works Clearinghouse standards. Another training strand will ensure fellows enhance their professional skills by working within multidisciplinary teams at CLI as well as other researchers and educators focused on improving outcomes of young children with or at risk for disabilities.

We expect Postdoctoral Fellows will produce scholarly publications, participate in preparation of research grants, and conduct their own original research project within an active project. Much of Fellow’s training will occur through the leadership roles and management of aspects of an active grant at CLI to include the Fellow’s original research. Therefore, applicants’ cover letter should indicate how their interests align with one or more of the five active projects detailed below. The Fellow will be matched with one of three primary mentors at CLI - Susan Landry, Ph.D., Tricia Zucker, Ph.D., April Crawford, Ph.D. Fellows will also work with several secondary mentors, including Yoonkyung Oh, Ph.D., Michael Assel, Ph.D., and Cheryl Varghese, Ph.D.

This position is funded by the Pathways to the Education Science Research Training program, which was established by IES to develop a pipeline of talented education researchers who bring fresh ideas, approaches, and perspectives to addressing the issues and challenges faced by the nation's diverse students and schools. Should you wish to obtain more information regarding The Pathways Training Program and its mission, please refer to it’s website at https://ies.ed.gov/ncer/projects/program.asp?ProglD=95 for details.

The position is for two years and the salary will be $60,000 annually with benefits. Candidates will also receive a small stipend to cover research costs.

Minimum Requirements:

- Applicants must have a Ph.D. or Ed.D. in a relevant discipline (e.g., education, public policy, psychology, developmental psychology, educational psychology, curriculum instruction, and special education, economics, sociology, political science, public health or related fields).

Description of Qualified Candidates:

- The applicant must have a record of research productivity through publications and presentations related to child development, education, or school-related public policy.
- Competitive applicants should also possess skills in applied statistical methods; applicants with advanced statistical skills should explain their current knowledge.
- Ability to work both independently and as a collaborative team member
- Excellent interpersonal, verbal, and written communication
- Strong organizational skills

Required Application Materials:
Interested applicants should submit the following materials to CLI-directors@uth.tmc.edu

1. A cover letter detailing:
   a. The applicant’s research interests and fit with the position
   b. How their research experience and interests align with one or more active training grants
   c. Citizenship status
2. Curriculum vitae
3. Scholarly writing sample
4. Names and contact information for three references

**Ongoing Research Training Grants**

*Topic 1: Early Interventions & Assessments*
Possible Mentors: Landry, Zucker, Crawford, Oh, Assel

Aligned with NCSER’s Early Intervention and Early Learning in Special Education topic, these projects focus on early interventions for children with or at risk for disabilities.

**Expansion of the CIRCLE Progress Monitoring (CPM) System.** A measurement grant funded by the Brown Foundation and our SEA supports the development of reliable and valid screening assessments used for moving children ages 3-7 to higher tiers in Response to Intervention models. CLI has developed the CPM for grades pre-k and kindergarten and they are used to assess over 263,400 students per year. Past measurement work on the CPM involved collaboration between CLI and the Texas Education Agency and was funded by the U.S. Department of Education. This project is directed by Dr. Susan Landry and Co-Is include Drs. Assel leading item development and Dr. Montroy examining psychometric properties of the final item pool. The current focus is expansion of the language and literacy subtests of CPM to Grade 1. Our next steps are to add STEM measures to Grade 1 and seek funding for development of aligned pre-k to Grade 5 measures that are available at low cost. Fellows can participate in the continued expansion of this measure to: (a) include multiple progress monitoring timepoints, and (b) to more fully address appropriate screening of students with various special needs conditions.

**Development of Reading RULES!:** A Development and Innovation project funded by IES (R305A180094) seeks to iteratively develop and pilot test an innovative kindergarten literacy program. Specifically, this project aims to develop a Tier 2 small-group intervention in decoding, writing, and listening comprehension for kindergarten children at risk for serious reading difficulties. Eligible students are identified with screening measures; then curriculum-based measures (CBM) are used to place children at the appropriate point in the curriculum sequence. This project is directed by Drs. Tricia Zucker and Colby Hall and will be in the pilot study stage when the proposed training program begins. The larger Reading RULES! Program has been the subject of two other IES studies (R324A100129; R324A180221) and was developed at CLI. Fellows on this project can participate in: (a) a RPP where research staff are embedded in a school district using qualitative and quantitative data to inform the development process; (b) the final stages of the pilot study and interpretation of findings to guide final revisions to the intervention; (c) adaptations of the larger Reading RULES! Program to include
computerized CBM tests that guide teachers more precisely in placing students in the curriculum sequence.

**Pre-K Home and Classroom Interventions for Spanish-Speaking English Learners.** This initial efficacy study focuses on language development and is funded by IES within the Early Learning Programs & Policies topic. Young English learners (ELs) living in poverty are at risk for later reading difficulties and are less likely than their peers to encounter the level of responsive, extended conversations in their homes and preschools needed for school readiness. Furthermore, many types of dual language programs in U.S. schools operate in ways that delay regular exposure to English until later grades, rather than systematically teaching in ways that build on students’ knowledge of their home language to accelerate English proficiency. The proposed project will evaluate a dual-language approach that: a) maintains and improves the home language of DLLs who speak mostly Spanish in their homes via parent coaching, and b) simultaneously coaches teachers to use an explicit cross-language transfer approach in which sophisticated concepts are introduced in Spanish before English. The expected outcome of this project is increased understanding of effective classroom instruction and family engagement approaches for DLLs at risk of later reading difficulties. The research sample will include 90 pre-kindergarten (pre-k) classrooms that use a dual language model called Transitional Bilingual in which 90% of pre-k instruction is in Spanish and 10% is in English. A sample of 720 Tier 2 eligible children and their families within these classrooms will participate. Eligible 4-year-old children will meet screening criterion and speak Spanish at home. We expect almost all Hispanic or Latino participants. The primary child outcomes include Spanish and English oral language measures as well as secondary benefits for executive function and social-behavioral outcomes.

**Topic 2: Scalable Professional Development (PD) for Educators**

*Possible Mentors: Zucker, Crawford, Landry*

Aligned with NCSER’s Professional Development for Educators topic, these projects evaluate PD approaches for inclusion classroom teachers of young children with or at risk for disabilities.

**Developing Talkers: Building Effective Teachers:** This initial efficacy study is funded by IES and directed by Dr. Tricia Zucker. Researchers will evaluate the impact of two theoretically distinct versions of an intervention called Developing Talkers that uses a multi-tiered system of support. PD is designed to improve teacher facilitation of academic language skills and the academic language skills of kindergarten students. The two versions are the Scripted Approach and the Teacher-Inspired Approach. Researchers will monitor teacher uptake of evidence-based practices during a first stage of intervention. At the second stage, researchers will provide additional individualized professional development (PD) resources based on teacher performance using a Sequential Multiple Assignment Randomized Trial (SMART) design. Researchers will explore aspects of teacher cognition, such as memory and vocabulary and other behavioral factors, including, self-efficacy and social norms, that may explain changes in teacher knowledge and behavior. Fellows can participate in: (a) analysis of profiles of teachers’ cognitive and non-cognitive traits associated with uptake of evidence-based practices, or (b) use mixed methods approaches to understand how scripted versus teacher-inspired approaches impact teachers’ approaches to PD/learning and instruction.

**Continuous Improvement for Teachers:** This is an initial efficacy study funded by IES (R305A180406) and directed by Dr. April Crawford. In this replication study, researchers will implement three contrasting professional development approaches (guided self-study, facilitated professional learning communities, and remote coaching) of the Texas School Ready! (TSR) PD model. **TSR** is embedded in 25 community-based lead agents across Texas. By testing the efficacy of the intervention in 440 classrooms with contrasting PD approaches, researchers will identify cost-effective approaches that maximize impact while also taking into account local needs and constraints. Key outcomes include pre-k teachers’ beliefs, knowledge, and instructional practices and children's academic and social skills. Fellows can participate in: (a) mixed methods studies of participant’s videotaped instructional activities and responses to guided reflection prompts; (b) analysis of detailed fidelity data (e.g., coach responsiveness ratings, teachers’ online module component usage) to understand components for success.