

The <u>Alliance for Learning Innovation (ALI)</u> brings together more than 100 education nonprofits, philanthropy, and the private sector to advocate for building a better research and development (R&D) infrastructure in education. ALI calls for increased capacity in education R&D and supports the research and development of evidence-based and learning-science grounded innovation that centers students and practitioners, improves talent pathways, and expands the workforce needed in a globally competitive world.

ALI applauds the U.S. Department of Education for taking meaningful steps to reimagine the Institute of Education Sciences (IES) to deliver on the promise of high-potential, high-impact research and innovation.

In June 2025, ALI, in partnership with <u>InnovateEdu</u> and the <u>Learning System Leadership Network</u> (LSLN), produced a comprehensive blueprint aimed at rebuilding a nimble, high-impact R&D system at the federal level: <u>A Blueprint for the Future of the Federal Role in K-12 Education R&D</u>. The broader blueprint initiative involved convening more than 150 experts, engaging bipartisan policymakers, developing actionable policy <u>recommendations</u>, and outlining a fresh vision for the future of education R&D (ed R&D). Select recommendations will also be explored in "implementation memos" as part of the Blueprint in Action series to facilitate taking action in key opportunity areas. Please visit https://www.alicoalition.org/publications/future-report/ for more.

The key functions of federal ed R&D must:

- Invest in Research & Innovation: The federal government is the only entity that can invest in the full spectrum of R&D, from longitudinal research on student learning, evaluating how effectively federal education funds are being used, to supporting entrepreneurs in scaling their evidence-based education tools. The federal government should leverage its unique position to invest in ed R&D that develops and scales cutting-edge approaches and tools, including AI, through rapid-cycle innovation processes that address real-world challenges, stimulate market competition, and ultimately benefit student learning outcomes.
- **Empower State and Local Leaders:** The federal government must understand and respond to the needs of state and local education leaders, utilizing its resources to collaboratively address their most pressing questions. This collaboration will enable states and local leaders to identify and implement effective strategies that support their education goals.
- Collect and Analyze Meaningful Data: High-quality, interoperable, and timely data
 underlie all R&D efforts. For an effective ed R&D system, the federal government
 must collect and measure data that reveals the condition of education and what
 works to improve it. The federal government is uniquely positioned to collect and



publish this information, enabling comparisons across states and sectors. ALI encourages IES to consider the proper balance and investment in its data efforts, with particular emphasis on Statewide Longitudinal Data Systems and the School Pulse Panel.

Specifically, ALI recommends the following:

- 1. Prioritize and streamline federal data collections to balance burden and benefit.
 - Sustain and modernize the National Assessment for Educational Progress (NAEP). NAEP, the Nation's Report Card, plays a vital role in helping not just state and federal government leaders but also employers and communities make decisions about the quality and comparability of state educational programs. States and communities use it to benchmark student achievement, employers use it to locate new bases of operation, and federal policymakers use it to assess investments. The scope, frequency, and staffing of NAEP must be sustained, as any reductions will hinder stakeholders' ability to extract timely insights about the condition of the nation's education system. IES should also pursue opportunities to modernize NAEP, such as leveraging AI (with humans in the loop) for assessment item generation and testing.
 - Establish a panel or empower an existing board such as the National Board for Education Sciences (NBES) to evaluate the relevance of data collection. Foundational data collections and surveys should continue without interruption. That includes Integrated Postsecondary Education Data System (IPEDS), Common Core of Data, National Teacher and Principal Survey, and foundational assessments such as NAEP and the International Assessments (e.g., Programme for International Student Assessment (PISA), Trends in International Mathematics and Science Study (TIMSS), etc.). We would also encourage the Department to leverage existing administrative data collections as statistical products including data from the National Student Loan Data System (NSLDS), program data reported to EdFacts, and the Civil Rights Data Collection. To ensure other tools, such as additional sample surveys, are valuable and efficient, the federal government should convene a panel of experts, including ample representation from K-12 and postsecondary educational leaders, to conduct a data review and recommend streamlined data collections and infrastructure. The panel's recommendations could be provided to Congress to update the relevance of data collections and surveys and to minimize unnecessary burdens on stakeholders.
 - Design for end users. Those responsible for contributing student data (e.g.,



administrators, educators, families) are often the last to see its benefits, and rarely is their user experience considered when public dollars fund data infrastructure. Systems should be designed with these and other appropriate state and local end users in mind. For instance, some data, like 50-state longitudinal survey data, is best gathered and disseminated from the federal government. But the end users of that data-state policymakers, education and workforce decisionmakers, and researchers-should be consulted about what is gathered and how it is made accessible. For example, public-facing products like dashboards allow policymakers and researchers to access public aggregate-level cross-agency data in one place.

- Expand technical assistance to support states with data modernization. Many states are resource-constrained and would benefit from federal support as they build their own secure, interoperable data systems and further their evidence-based policy goals. The federal government could serve as a force multiplier to state statistical agencies by providing funding as well as analytical capacity and training for state agencies and individuals. This could be accomplished through something like an expanded Privacy Technical Assistance Center, or it could be achieved by certifying a set of "go-to" technical assistance providers from which states can seek assistance. Enhanced capacity support should also enable states to access data from other states or the federal government for a specific, identified purpose, through partnerships with trusted, public-interest entities that have secure and privacy-protected platforms to facilitate sharing on a case-by-case basis.
- 2. Leverage grantmaking to advance impactful, practitioner-relevant research on pressing topics, with specific input on the identification of those topics.
 - Create a national education research agenda to address the most pressing problems of practice. Federal education R&D leaders should work with state and local entities to create a cohesive national research agenda that directs investment in critical areas of focus and drives progress on the Secretary of Education's policy priorities.² This agenda should be developed with state and local input and address challenges communities face across education's pressing problems of practice.³ In practice, this could look like a group of interagency leaders from agencies like IES, the National Science Foundation (NSF), the National Board for Education Sciences (NBES) and others co-developing research questions with state education agency (SEA) and local education agency (LEA) leaders and community members on a

¹ https://dataqualitycampaign.org/wp-content/uploads/2024/11/DQC-Transition-Memo.pdf

² https://www.federalregister.gov/documents/2025/05/21/2025-09093/proposed-priorities-and-definitions-secretarys-supplemental-priorities-and-definitions-on

³ https://www.alicoalition.org/publications/pressing-problems-of-practice-facing-us-education/



recurring four-year basis to ensure research and evidence are relevant and timely and that funding is being strategically deployed throughout basic and applied research, as well as development efforts.

- Incentivize researchers to partner with state and local education leaders. Federal education research grants should prioritize proposals that have a plan for engaging SEAs, LEAs, parents, and other community stakeholders throughout the R&D process. Grantmakers at NSF, IES, and other agencies working on education topics should stipulate that research design must include input from these stakeholders, and be able to demonstrate that the work will meet the needs of state and local leaders. The success of this approach is exemplified by Alabama's progress in its student math outcomes after leveraging federal research and partners to work towards its math achievement goals.⁴
- Coordinate and leverage research conducted across all federal agencies. Research investments are made across several science agencies that can benefit student achievement and boost learning outcomes. Ed R&D infrastructure should leverage work done at NSF and the National Institutes of Health (NIH) as major drivers of basic research, with IES and other agencies focusing on complementary applied R&D activities. As mentioned above, a group of interagency leaders should convene to oversee the development of a national education research agenda and coordinate this work.
- **Fund regular evidence reviews.** There is already a corpus of information about what we know about education best practices, but the utilization of that knowledge, historically, has not been prioritized. Efforts like the National Reading Panel⁵ demonstrate the value of concerted efforts to review results of investments from NSF, NIH, and philanthropy; make sense of the current evidence base; and publish the current state of evidence on a particular topic that is accessible, digestible, and actionable by the field. In partnership with the NIH, NSF, and other research agencies, IES should aim to replicate the National Reading Panel effort in other areas of research with an emphasis on translating knowledge into actionable insights for state and local education leaders.
- **Evaluate the efficacy of ed R&D investments.** IES or an independent entity should evaluate federally funded R&D programs for their effectiveness in improving

⁴ https://www.alicoalition.org/blog/how-state-rd-investments-are-improving-math-outcomes-inalabama/

⁵ https://www.nichd.nih.gov/sites/default/files/publications/pubs/nrp/Documents/report.pdf



student outcomes and increasing returns to taxpayers. IES should consider using pay-for-success models⁶ and outcomes-based contracting⁷ more frequently across key programs to ensure that there is a clear return on investment (ROI). Evaluation provides transparency to the public, ensures ineffective education R&D investments are reformed or eliminated, and identifies bright spots that can be scaled.

3. Improve the reach and utility of evidence dissemination.

- Invest in the Development side of R&D to build in reach and utility from the design. Specifically, grow the Accelerate, Transform, & Scale Initiative (ATS)⁸ and continue to co-invest in the National AI Research Institutes program at NSF.⁹ Both programs make strategic investments in high-potential innovations that leverage emerging technologies and push the frontiers of what is possible in education innovation. Additionally, to facilitate the type of rapid-cycle R&D needed in the age of AI, the government should partner with the private sector and technology organizations to develop and support a national testing and trialing infrastructure for educational technologies and interventions, enabling states and districts to host "testbeds" for innovation and rapid-cycle research and development.
- Authorize and invest in modern infrastructure for knowledge mobilization. Evidence synthesis-making the results of research more accessible and actionable-is a major opportunity for the federal government to provide value to the ed R&D ecosystem.¹⁰ If R&D is to truly drive better outcomes in teaching and learning, Congress should improve knowledge mobilization-getting research findings into the hands of educational leaders and practitioners. Building on this report's recommendation to convene interagency leadership to recreate the success of the National Reading Panel, research agency leaders should regularly convene and publish research findings and leverage implementation science and the federal government's platform to keep state and local education leaders and the general public informed on its evolving insights. This could be done in connection with the legally required annual Condition of Education¹¹ report to share with the nation what has been learned from recent investments in ed R&D.

⁶ https://socialfinance.org/what-is-pay-for-success/

⁷ https://obc.southerneducation.org/

⁸ https://ies.ed.gov/ats-initiative/

⁹ https://new.nsf.gov/funding/opportunities/national-artificial-intelligence-research-institutes

¹⁰ https://mitpress.mit.edu/9780262543224/teach-truth-to-power/

¹¹ https://nces.ed.gov/programs/coe/



- Leverage tech-based solutions and widely used platforms to synthesize and translate research to end users. IES and other science agencies could build or invest in products that make research more discoverable and actionable. Current research databases are hard to search and use. There should be better tools for educators and administrators to quickly locate relevant research, utilizing a simple search interface that allows users to ask questions in plain English instead of using complicated search terms. IES should require research studies to include clear, searchable metadata so AI tools and users can easily find, organize, and highlight the findings, helping bridge the gap between research and real-world practice. Helping educators understand the cost of an intervention, the strength of the research base that underpins that intervention, and the expected outcome can also enable feedback loops. One model IES could draw inspiration from includes the Education Endowment Foundation, which uses direct engagement and behavioral science to encourage the uptake of education research in the classroom.
- Empower states to develop their capacity to conduct ed R&D. For states to execute R&D, they must have access to federal technical assistance and field-building resources. This could include more modern and searchable knowledge mobilization platforms, virtual collaboratives, and professional learning communities to facilitate dialogue and application of research findings. The federal government has historically played this role through the Regional Education Laboratories and Comprehensive Centers and must continue to as state education agencies assume greater autonomy in education.
- 4. Support states and districts through more responsive technical assistance and capacity building, including building states' capacity for using evidence and creating a culture of continuous improvement.
 - **Deploy state-level innovation labs.** Current law requires Regional Educational Labs to partner with districts, states, and other education stakeholders to identify high-priority needs and ensure that applied research is conducted to address them. The Regional Educational Laboratory Southeast did this effectively in partnership with Mississippi education leaders to produce significant gains in reading proficiency. These labs should consistently leverage modern best practices

¹² https://www.alicoalition.org/blog/using-ai-to-make-research-more-accessible-and-ultimately-improve-learning/

¹³ https://educationendowmentfoundation.org.uk/about-us/how-we-work

¹⁴ https://ies.ed.gov/ies/2025/01/education-sciences-reform-act-2002-0

¹⁵ https://www.alicoalition.org/success-story/how-state-and-federal-rd-investments-helped-make-the-mississippi-miracle-possible/



to support state-led innovation and educational achievement, such as being responsive to local needs, involving communities and practitioners, and pursuing an array of research methods to answer challenging research questions. IES could partner with state education leaders to design a set of priorities for regional education labs that could be used in an outcomes-based contracting process to ensure the labs are supporting strong alignment between state goals and federal ed R&D capacity.

- Incentivize Research-Practice-Partnerships (RPPs). RPPs have been proven to meaningfully shift practice for educators and local education leaders through mutually beneficial collaborations that promote the research on problems of practice, ideally improving the relevance of the research. RPPs, such as the Houston Education Research Consortium (HERC) and Wisconsin's Rural Education Research and Implementation Center are flexible and meant to be built based on the infrastructure of each partner. One such model for this could include federal funding to states to develop a research office that organizes these partnerships at the local level, with a reimagined IES serving as the network lead for these state research offices.
- Support R&D capacity-building positions or intermediaries. The federal government could fund non-profit intermediary organizations to run communities of practice for state education agencies to collaborate and share the results of their research and development efforts (this could include things like AI implementation, career pathways, summer learning, addressing chronic absenteeism, etc). Federal rules under the Elementary and Secondary Education Act (ESEA) as amended by the Every Student Succeeds Act (ESSA) currently support roles at SEAs to oversee federal programs like NAEP and statistical coordinators and could extend flexibility to also designate research-specific coordinators where one does not exist.

Please reach out to Sara Schapiro (<u>saras@alicoalition.org</u>), Executive Director of the Alliance for Learning Innovation if there is anything that ALI can do to support the IES redesign work.

¹⁶ https://rpp.wtgrantfoundation.org/about/

¹⁷ https://nnerppextra.rice.edu/resources/key-milestones-for-establishing-a-research-practice-platform-partnership/

¹⁸ RESEARCH-PRACTICE PARTNERSHIPS IN EDUCATION: THE STATE OF THE FIELD Caitlin C. Farrell, William R. Penuel, Cynthia E. Coburn, Julia Daniel, and Louisa Steup | 2021. https://wtgrantfoundation.org/wp-content/uploads/2021/07/RPP_State-of-the-Field_2021.pdf.

¹⁹ <u>https://reric.wisc.edu/about/</u>



Alliance for Learning Innovation

All4Ed

AACTE: American Association of Colleges for Teacher Education

AASA

Accelerate

AERDE

AI4STEM Education Center

American Institutes for Research

American Chemical Society

AnLar

Association of Science and Technology Centers (ASTC)

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CAST

Committee for Children

Consortium for School Networking - CoSN

Data Quality Campaign

In Tandem

Democrats for Education Reform

Digital Promise

Dr. Pamela Cantor MD

Education Collaboratory at Yale University

Education Development Center

Education Knowledge Broker Network

Education Modified

Education Reform Now

Education Reimagined

Educurious

Edventure Labs

Evidence Advocacy Center

ExcelinEd

Federation of American Scientists (FAS)

Foundation for American Innovation

FullScale

Getting Smart

High Tech High Graduate School of Education

i4PL: Leading Learner-Centered Education



Improvement Scholars Network

InnovateEDU

Institute for Advancing Computing Education

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Leanlab Education

Learner-Centered Collaborative

LearnHaus

Leon Hunter

Mathematica

Dr. Matthew Finster

Matt Giani, Research Associate Professor, The University of Texas at Austin

Modern States

National Center on Education and the Economy

National Council of Teachers of Mathematics

National Education Association

National Girls Collaborative Project

National Parents Union

National School Boards Association

National Science Teaching Association (NSTA)

New America

New Classrooms

Progressive Policy Institute (PPI)

Project Evident

Reinvention Lab at Teach For America

Remake Learning

Results for America

RTI International

SERP

SETDA State Educational Technology Directors Association

Silver Arrow Strategies, LLC



SparkNC

SRI International

Dr. Stacey L. Brockman

STEM Connector

STEM Learning Ecosystems

StriveTogether

Surge Institute

Teach For America

Teach Plus

The Education Trust

The Learning Agency

The Study Group

The Tech Interactive

The Workforce Vault Corporation

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Throughline Learning

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Data Science 4 Everyone