

Selecting and Measuring the Effectiveness of Evidence-Based Practices

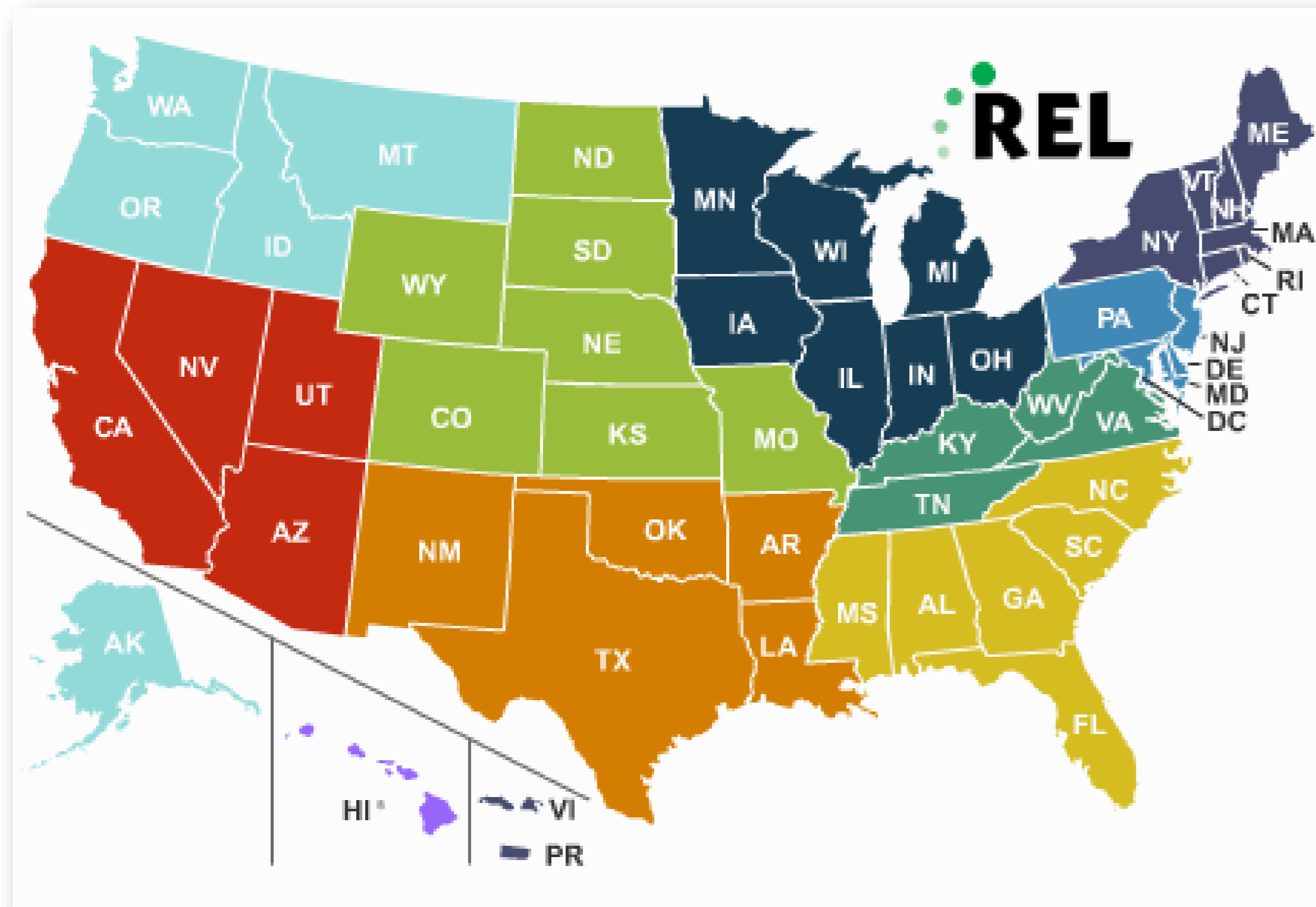
September 29, 2021

Dr. Lenay Dunn, Deputy Director
Regional Educational Laboratory West (REL West) at WestEd

Purpose of today's presentation is to share:

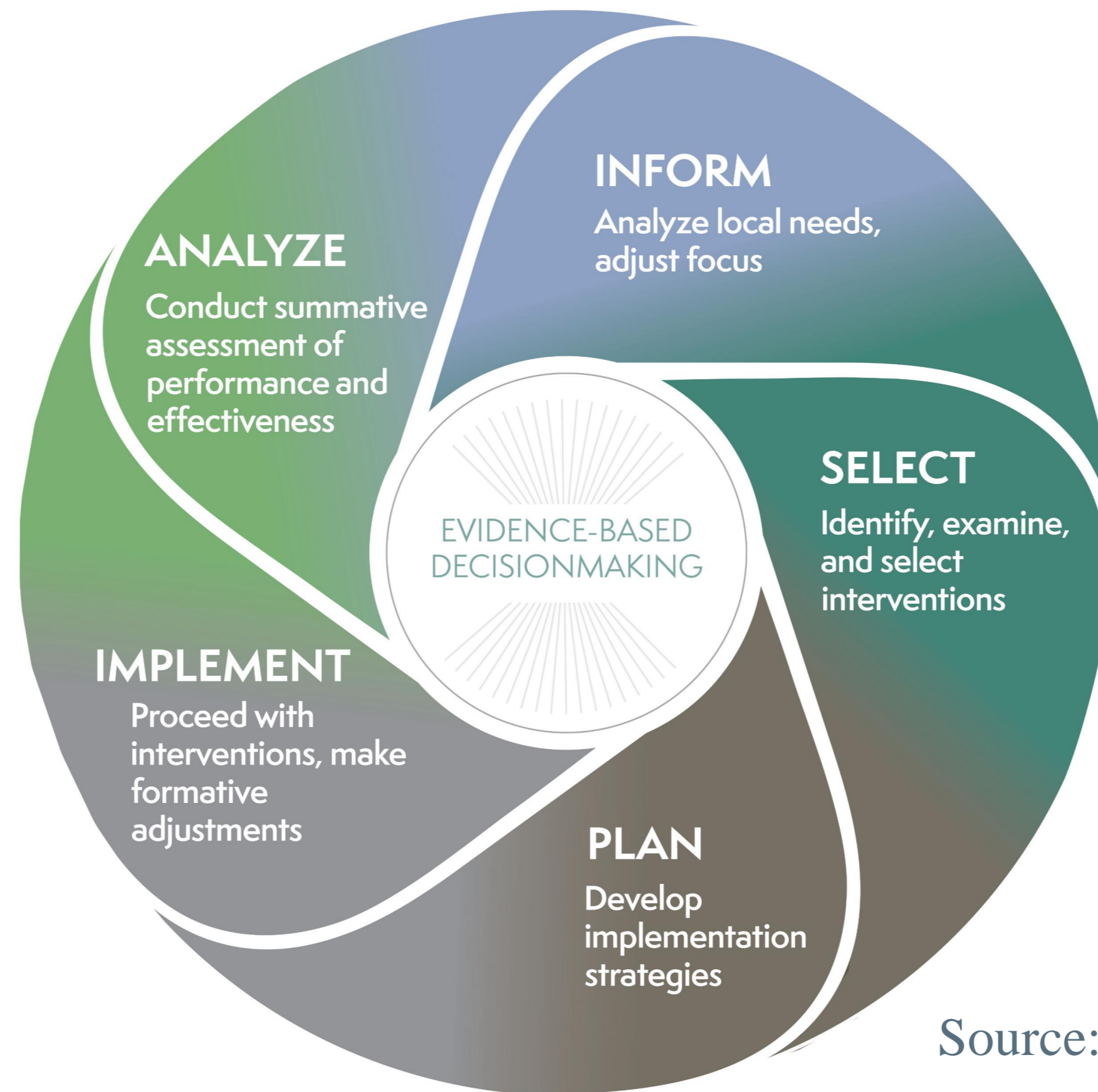
- resources for approaching evidence-based practices through a continuous improvement framework
- key concepts for assessing research and evidence to inform the selection of evidence-based practices, especially related to ARP fund use
- key concepts for measuring progress and outcomes to assess the effectiveness of evidence-based practices
- an opportunity to participate in a virtual workshop to further explore these concepts

Ten RELs work in partnership with LEAs, SEAs, and others to use data and research to improve academic outcomes for students



Evidence-Based Practices as Continuous Improvement

Framework: Evidence-Based Improvement

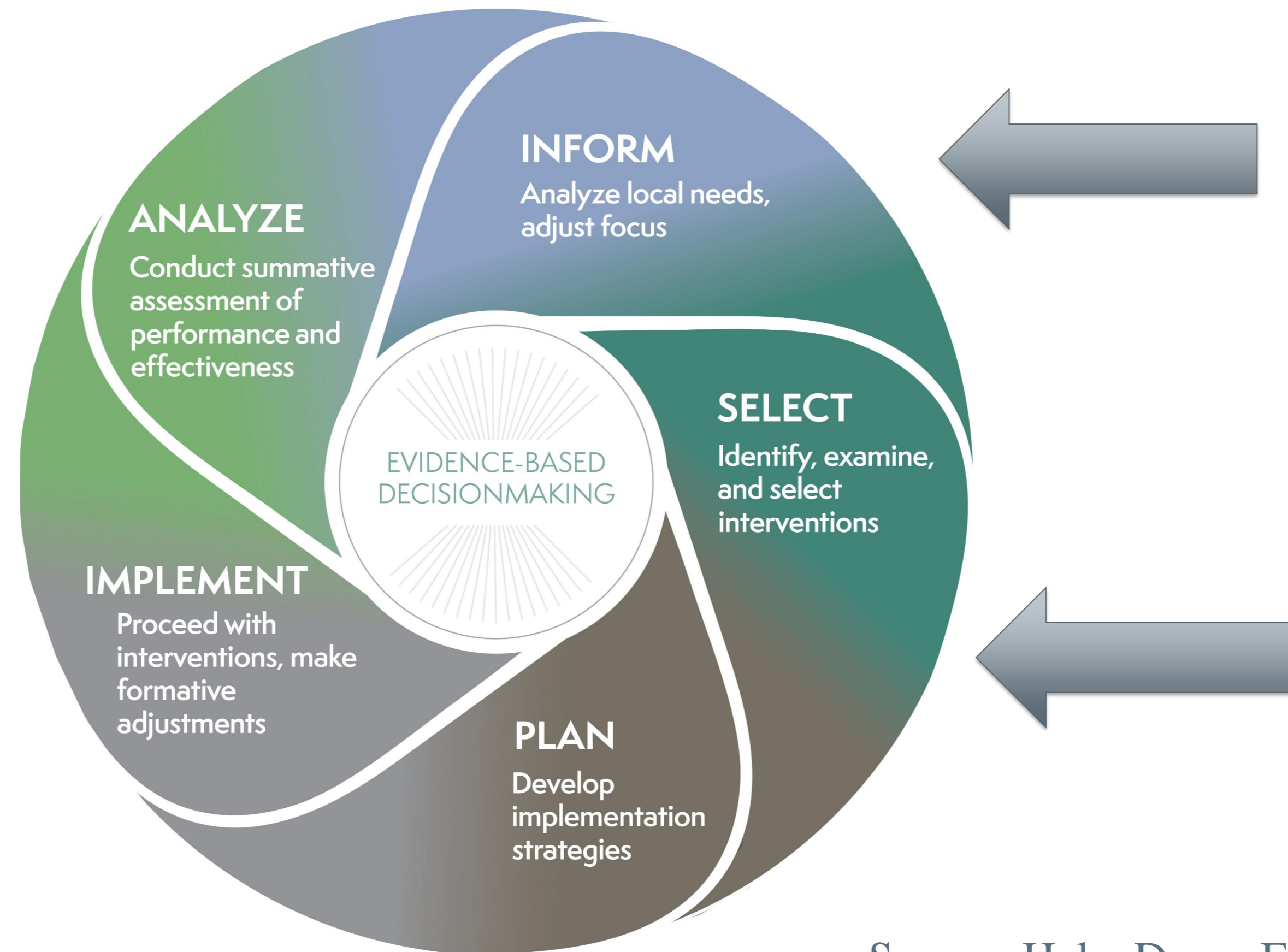


Source: Hale, Dunn, Filby, Rice, & Van Houten (2017)

<https://www.wested.org/resources/evidence-based-improvement-essa-guide-for-states/>

The Selection and Use of Evidence-Based Practices: Accelerating Learning & Socioemotional Learning

Framework: Evidence-Based Improvement



Source: Hale, Dunn, Filby, Rice, & Van Houten (2017)

<https://www.wested.org/resources/evidence-based-improvement-essa-guide-for-states/>

Grounding in Needs

What are the most pressing problems or issues to address?

Where can your efforts have the most impact?

What outcomes would you like to achieve, and what possible interventions to help achieve those outcomes?

ARP Emphasis on Evidence-Based Practice



Reserve funds to respond to learning loss using evidence-based interventions to **respond to students' academic, social, and emotional needs**



Address the **disproportionate impact of COVID-19** on underrepresented student groups



Unprecedented opportunity to **build capacity of staff**

Chat: Addressing Needs

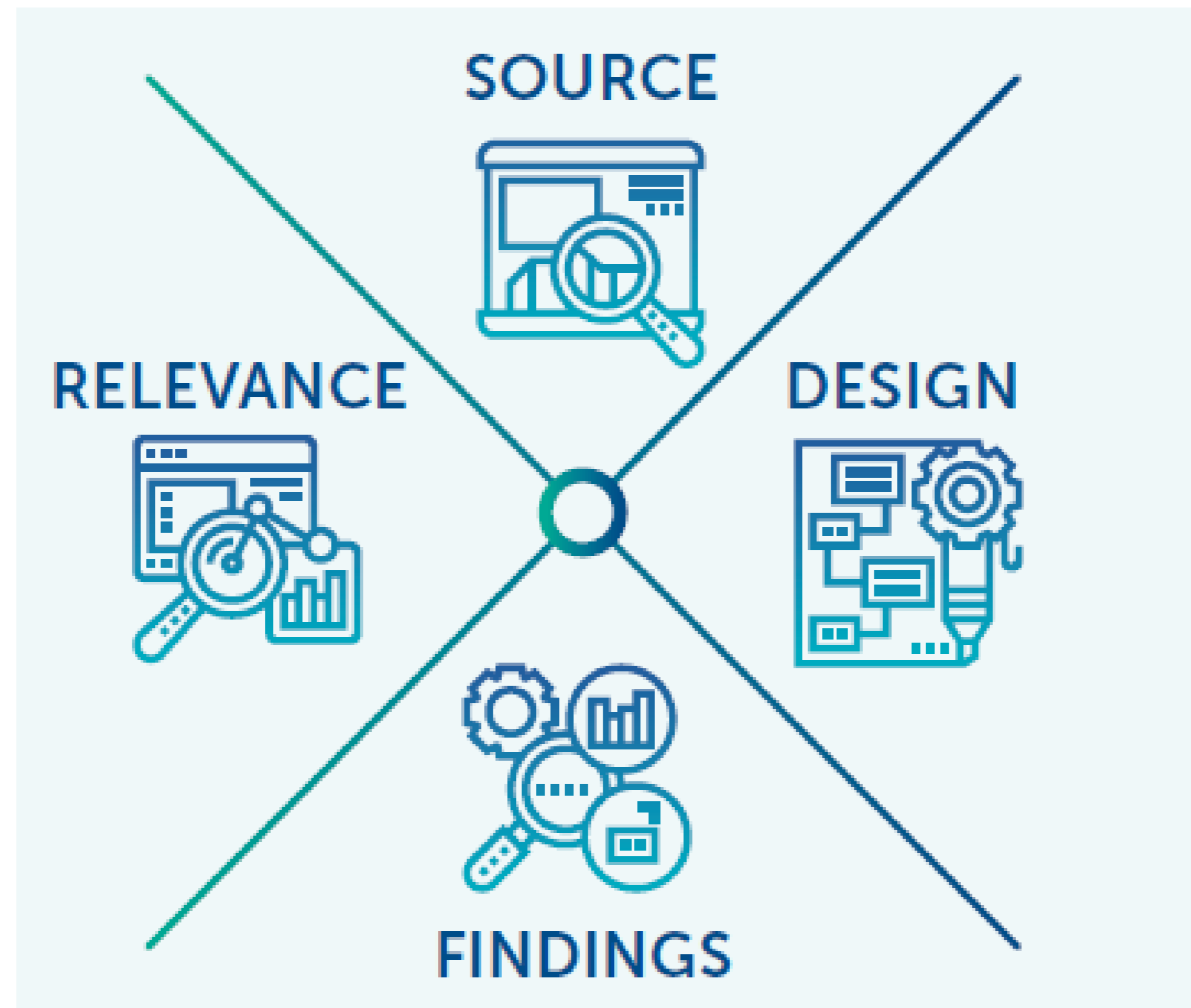
Type in the chat:



What information are schools using to select evidence-based practices related to ARP needs and priorities?

What questions are emerging from schools?

REL West Resource to Support Schools in Selecting EBPs: The Basics of Reviewing a Research Study

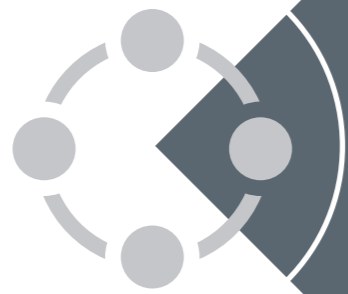


<https://ies.ed.gov/ncee/edLabs/regions/west/Publications/Details/300>

Key Questions to Ask



Who produced the study on the effectiveness of the intervention and where was it published?



How was the study designed and carried out? Was there a comparison group?

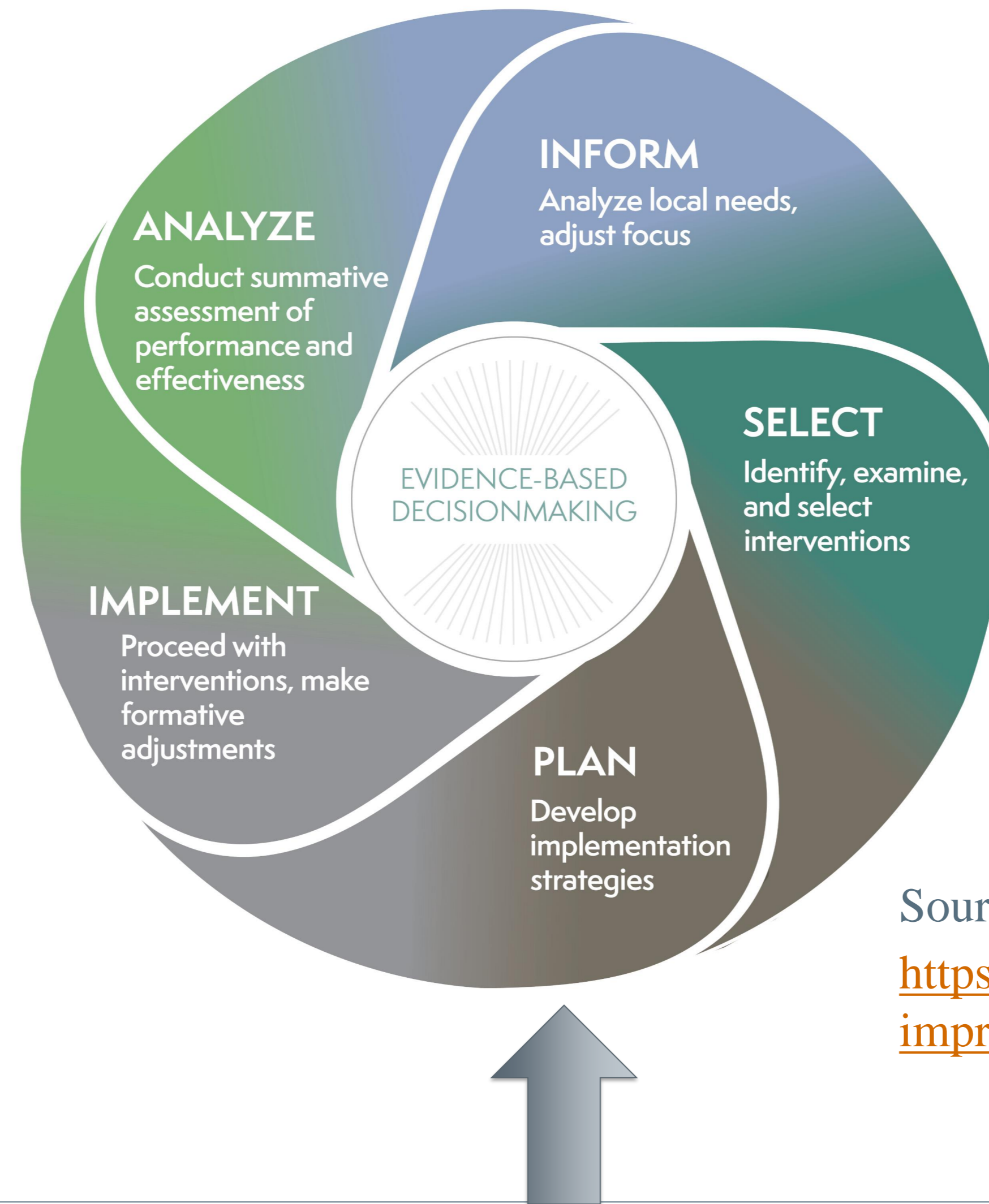


What outcomes were measured, and did they improve significantly?



How well does the study setting and population reflect our context? Are the outcomes relevant to what we are trying to improve? Does the intervention require supports that exceed our capacity?

Framework: Evidence-Based Improvement



Source: Hale, Dunn, Filby, Rice, & Van Houten (2017)

<https://www.wested.org/resources/evidence-based-improvement-essa-guide-for-states/>

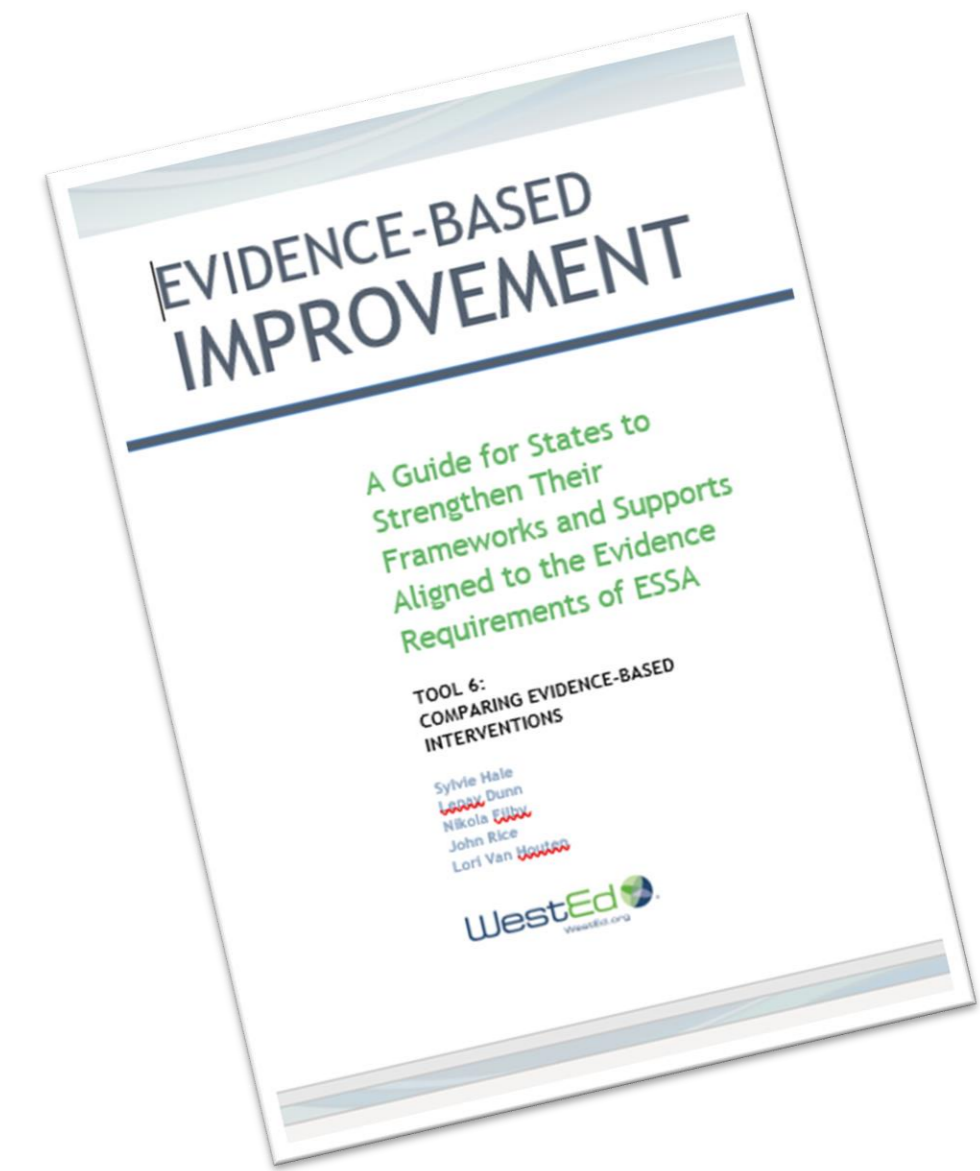
Moving from Selection to Implementation

What will it take to implement this strategy to produce effective outcomes?

How well does the strategy fit our context and constraints?

WestEd Resource to Assess Context and Fit: Evidence-Based Improvement Guide Tool 6

- Offers considerations for how well an evidence-based intervention would fit into the context of your educational setting.
- Facilitates discussions around the feasibility of selecting and implementing each intervention in your educational setting, and the advantages and disadvantages of each intervention as it pertains to your educational context.
- <https://www.wested.org/wp-content/uploads/2016/12/Evidence-Based-Improvement-Guide-FINAL-122116-TOOL-6.docx>



REL West Resource to Assess Context and Fit: Applicability of Evidence-Based Interventions Tool

- Contextual Factors
- Key Considerations
- Guiding Questions
- Additional Resources

The screenshot shows the title page and a table of contents for the document. The title is "APPLICABILITY OF EVIDENCE-BASED INTERVENTIONS". The document is dated MARCH 2020. The table of contents includes sections for Contextual Factors and Considerations and Questions.

APPLICABILITY OF EVIDENCE-BASED INTERVENTIONS

PURPOSE

You have identified an evidence-based intervention¹ that may meet your needs, but you are not sure if it will fit your context. When determining if an evidence-based intervention is worth further review, state and local education agencies can find it useful to think through how contextual factors may influence its fit. To help in that process, this document identifies seven contextual factors, each with related questions. Considering these factors helps decision-makers assess how a particular intervention might meet their needs, regardless of where the evidence of its effectiveness was generated and helps inform further investigation into the feasibility of its implementation in your context.

INTENDED USE

This document may be especially useful for districts and schools that tend not to see themselves represented in the research literature related to the effectiveness of interventions. This group of districts and schools includes, for example, those in rural communities and those serving indigenous populations.

This tool assumes that, prior to using it, you have engaged in a comprehensive analysis of needs, identified interventions to address those needs, and would like to further narrow the promising options for more intensive review (see the additional resources at the end of this document).

It is likely that as you examine interventions, there will be pluses and minuses to each one. This tool is designed to frame conversations about considerations of fit, but does not provide a formula to weigh those pluses and minuses. Instead, this tool helps you identify which interventions you would like to further examine for potential use in your setting.

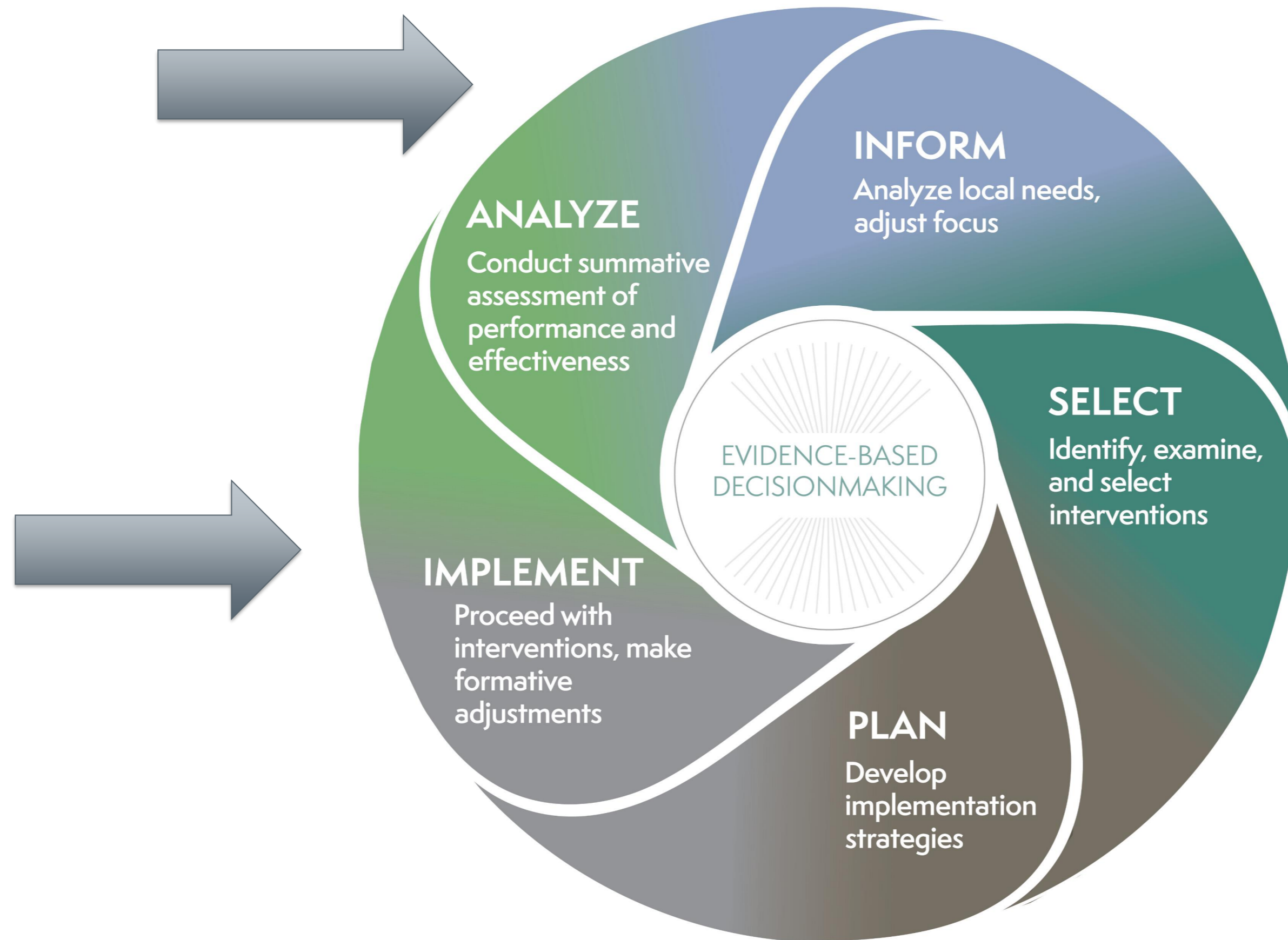
REL WEST
Regional Educational Laboratory
At WestEd
MARCH 2020

Contextual Factors	Considerations and Questions
Research alignment to outcome of interest and student population	KEY CONSIDERATION: In research studies of the intervention, was the intervention successful in schools that are similar to the schools you seek to assist? <ul style="list-style-type: none">» How closely aligned is the outcome that was studied with your outcome of interest?» Is the evidence supporting the effectiveness of the intervention based on research that was conducted with a student population similar to yours (e.g., grade level, family income level, race/ethnicity, English learner students, students with disabilities)?» If your student demographics are dissimilar from those in the study, how might that difference influence implementation of the intervention?

https://ies.ed.gov/ncee/edlabs/infographics/pdf/REL_WE_Applicability_of_Evidence_Based_Interventions.pdf

Measuring the Effectiveness of Evidence-Based Practices

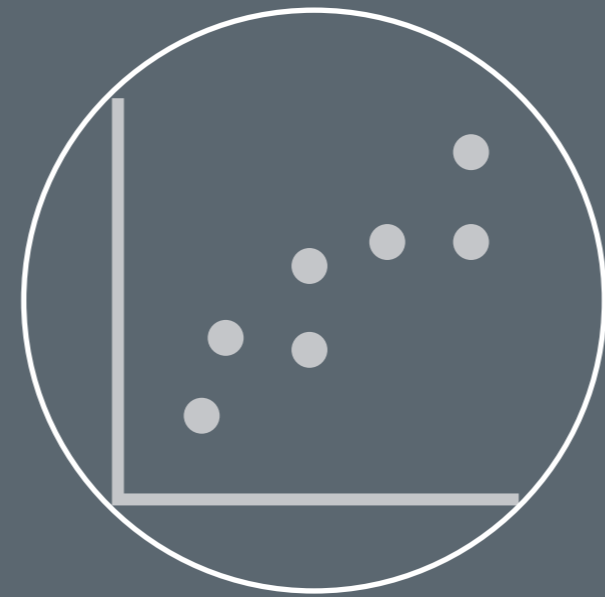
Framework: Evidence-Based Improvement



Implementing and Analyzing Interventions



How well is this program working in our context?



What factors are contributing to our results?



What data should we examine to assess this?



Process vs Outcome Measures

Process measures

- Assess the quality of implementation
- Focus on formative adjustments to implementation

Outcome measures

- Assess the progress on targeted changes in teacher and student outcomes
- Can inform formative adjustments and summative assessments of effectiveness
- Focus on results

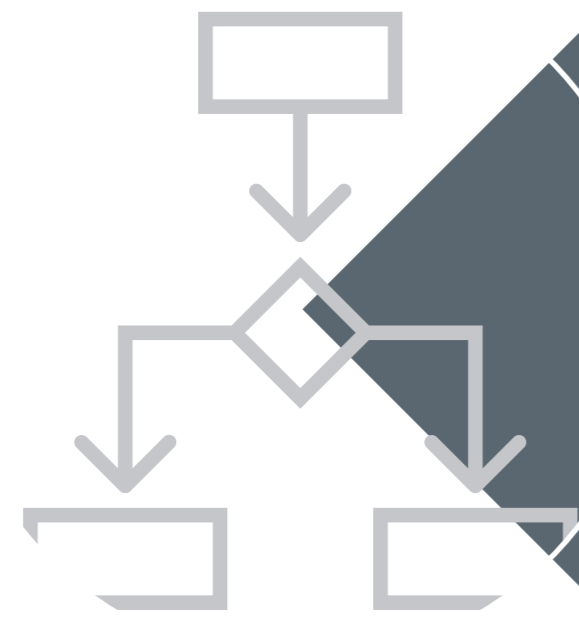
Share in Chat:



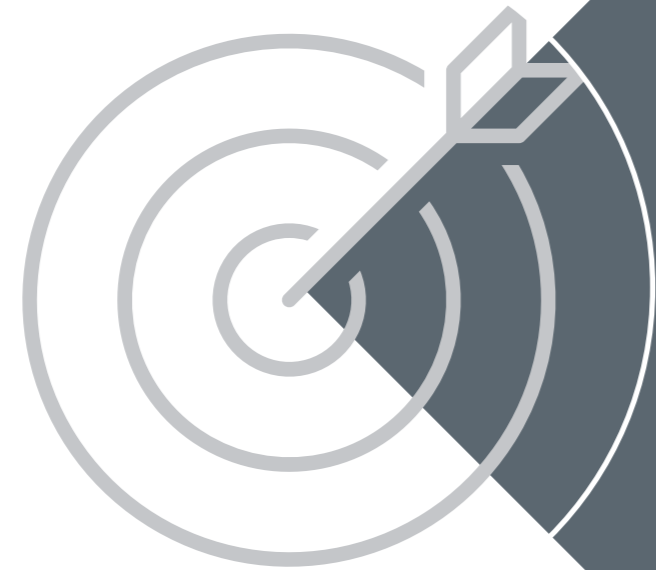
What are some examples of process measures you expect schools to report on?

What are some examples of outcome measures you expect schools to report on?

Outcome Measurement: Setting Targets



Identify short, medium, and long-term outcomes you aim to improve



Set targets and benchmarks to show progress along the way

Cost Analysis: The Why

Supports addressing related federal requirements

Helps to gather more complete and accurate information about cost to inform resource use

Provides information on aspects of cost that official accounting may miss

Cost Questions from the WestEd Evidence-Based Improvement Guide

Tool 6

Start-Up Costs

- How much time would be required for staff training, in terms of hours or days?
- What is the cost (in dollars) of start-up materials?
- What is the cost (in dollars) of start-up equipment?
- What is the cost (in dollars) of start-up (initial) training?
- What are other start-up (initial) implementation costs (in dollars)?

Ongoing Costs

Question	In each column, address the question for each intervention, make notes in the columns if needed.	Intervention 1	Intervention 2	Intervention 3
18	How much time would be required for staff training, in terms of hours or days?			
19	What is the cost (in dollars) of start-up materials?			
20	What is the cost (in dollars) of start-up equipment?			
21	What is the cost (in dollars) of start-up (initial) training?			
22	What are other start-up (initial) implementation costs (in dollars)?			
23	Add values in rows 19 through 22. These are the total start-up implementation costs.			
24	What are the estimated annual costs of the intervention after start-up?			

Source: Hale et al., 2017

Increasing the Use of Results



How can you embed stakeholders throughout the process?



How can you build in opportunities to reflect on results at regular intervals?



How will you share results with (and between) different stakeholders?



How can you use data as a continuous improvement and learning opportunity?



Virtual Workshop

The Arizona Department of Education (ADE) with the Regional Educational Laboratory West (REL West) and the Region 15 Comprehensive Center at WestEd, invite you to this virtual workshop:

Strategic Use of The American Rescue Plan (ARP) Funds: Selecting and Measuring the Effectiveness of Evidence-Based Practices

October 27, 2021 2-3:30 pm

Registration: <https://bit.ly/Evidence-Based-ADE-10-27-21>



Key Resources

- Continuous Improvement Approach to Evidence:
 - Hale, S., Dunn, L., Filby, N., Rice, J., & Van Houten, L. (2017). *Evidence-based improvement: A guide for states to strengthen their frameworks and supports aligned to the evidence requirements of ESSA*. San Francisco: WestEd. Retrieved from <https://www.wested.org/wp-content/uploads/2016/12/Evidence-Based-Improvement-Guide-FINAL-122116.pdf>
- ESSA Evidence Tiers:
 - REL Midwest <https://ies.ed.gov/ncee/edlabs/regions/midwest/pdf/blogs/RELMW-ESSA-Tiers-Video-Handout-508.pdf>
- Program Evaluation:
 - Regional Educational Laboratory (REL) Central & Colorado Department of Education ESEA Office. (2019, December). *Program evaluation training modules* (Presentation materials). Retrieved from <https://www.cde.state.co.us/fedprograms/progevaltrainings>
- Cost Analysis
 - Institute of Education Sciences. (2020). *Cost analysis: A starter kit* (IES 2020-001). U.S. Department of Education. Washington, DC: Institute of Education Sciences. Retrieved from <https://ies.ed.gov/pubsearch/pubsinfo.asp?pubid=IES2020001rev>.

Thank you!

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