

RAPID EVALUATION, ASSESSMENT, and LEARNING METHODS (REALM)







About us

Creating pathways out of adversity...

The Global Center for the Development of the Whole Child,

based at the University of Notre Dame, collaborates with researchers and practitioners to ensure the social, emotional, cognitive, physical, and spiritual well-being of children and adolescents in low-resource and fragile settings around the world. Using an innovative whole child development framework tailored to local needs, we translate research into timely and thoughtful action, adapt assessment tools to improve programs and policies, and activate systems (families, schools, communities) to create pathways out of adversity.

What We Do:

Translate: In collaboration with our partners, we translate research into concrete SEL, ECD and resilience programs and policies in low-resource and fragile contexts.

Evaluate: We adapt assessment tools to local needs, building capacity to measure, evaluate and improve education programs in development or emergency contexts.

Activate: We activate and align the diverse support systems (home, community, school) that champion children's development and learning in adversity.

Communicate: We gather and exchange best practices from around the world in whole child development and learning in fragile, low-resource contexts.

Neil Boothby, Professor and Founding Director

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Introduction

Rapid evaluation, assessment, and learning methods (REALM)

are systematic monitoring and evaluation strategies that employ an expeditious approach to program improvement and design by using timely, yet data-driven, actionable evidence that supports well-informed decision-making (USAID, 2015). Utilized and developed from a number of contexts and backgrounds, REALM strategies share a set of core characteristics but differ with respect to their context and purpose. This brief outlines the broad purpose of REALM, discusses common approaches, highlights their advantages and disadvantages, and comments on REALM's existing and potential applicability in education and whole child development projects in low-resource and fragile contexts.

With origins in the humanitarian global health sector, REALM were originally intended for time-and resource-sensitive contexts that demand evidence of multi-sectoral impact in a short period of time. Unlike summative evaluations which assess the impact of a program overall, REALM assesses the impact of individual program components, changes, or alternatives by gathering data, analyzing findings, and taking action over a cycle of anywhere between a few weeks to a few months (Cody & Asher, 2014). While evaluation's "gold standard", the randomized control trial (RCT), provides precise causal evidence about a specific research question, RCTs often require a long timeframe and promote a "one and done" attitude. REALM, however, emphasizes continuous, evidence-based learning and iteration.



Variations of REALM

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Real-time evaluations–feedback loops whereby preliminary evaluation results are shared during the fieldwork rather than several months after data collection–were developed in the 1990s by UNHCR in response to an increase in humanitarian crises and the need for quick, evidence-based evaluations (McNall & Foster-Fishman, 2007). Since then, similar methods have developed across a variety of sectors.

While these methodologies differ in their approach, context, and practice, they share common techniques and principles for obtaining quick yet reliable information to foster improvement (McNall & Foster-Fishman, 2007). Below are a few variations of REALM that we identified as part of our landscape review.

Rapid Assessment, Rapid Appraisal

These types of REALM originated from ethnographic practices and the global health sector. Most uses of Rapid Assessment and Rapid Appraisal have prioritized their use when attempting to understand the conditions preceding an intervention rather than to gather data about an ongoing activity, and often assess a situation or context within a defined geographic area (McNall & Foster-Fishman, 2007). Derived from ethnography, the methods used in Rapid Assessment and Rapid Appraisals typically include local surveys, semi-structured interviews, focus groups, transect walks, and community mappings. While similar to other REALM varieties in that the purpose is to generate information in a timely manner to help programmatic decision-making, their primary aim is to "aid in the design of culturally appropriate interventions for health and social problems" rather than "to evaluate existing programs" (McNall & Foster-Fishman, 2007, p.151).

Rapid Feedback Evaluation, Real-Time Evaluation, Rapid Cycle Evaluation

These types of evaluations aid in the design and improvement of projects, programs, and interventions. A central aim is to provide immediate (real-time) feedback to help with the planning or implementing of a project or program (INTRAC, 2017; Polastro, 2014). Depending on the organization or project, feedback cycles can be as short as two weeks or as long as a few months. These variations of REALM also tend to use existing implementation and performance data to make programming decisions and assess performance. This makes them less focused on culture, influences, or the situation outside of the project or program of interest than Rapid Assessment and Rapid Appraisal methods.

In 2015, USAID established a consortium for Rapid Feedback Monitoring Evaluation Research and Learning to employ rapid feedback techniques in projects in collaboration with the U.S. Global Development Lab, Results for Development, Mathematica Policy Research, ABT Associates, and the Notre Dame Institute for Global Development. The consortium's process consists of three phases: 1) Screening, during which researchers decide which programs/interventions are best suited for rapid feedback, 2) Development, during which the rapid feedback plan is designed and carried out, and 3) Implementation, during which the data and feedback is analyzed and used to make program improvements. This framework is currently being applied to various projects in developing country contexts (USAID, n.d.).

Lean Testing, Lean Data, Predictive Analytics

This type of testing, data, and analytics is a critical part of a full REALM strategy. Typically these strategies are focused on a specific activity or intervention and used to clarify uncertainty about whether or not it will have the intended impact as the project is scaled (R4D, 2017). These methods have developed primarily from the technology and software development sector where the availability of user and log data allows for quickly assessing the trends in outcomes; additionally, the availability of big data in these sectors has also made Predictive Analytics possible through machine learning and looped algorithms. This is not always the case in international development, where data collection is often a more involved and messy qualitative process (Murray & Ma, 2015). Given these origins in the for-profit sector, Lean Testing and experimentation remains relatively new in the nonprofit world, and particularly the education sector (Murray & Ma, 2015). For example, the Stanford Social Innovation Review has adapted the lean experimentation process to operate in the social sector. The phases include the following: 1) Ideation and analysis, 2) Constituent discovery, 3) Building, 4) Testing, 5) Responding to data, and 5) Scaling up. Results for Development has used lean testing in Senegal to test the usefulness of a component of an early grade reading program. Their project revealed that lean testing can be extremely valuable if done in collaboration with partners, the flexibility and iteration are truly embraced, and emerging findings are regularly shared (Upadhyay, 2019).

Improvement Science, Implementation Science, and Design-Based Implementation Research

REALM strategies are new in the context of education and whole child development programs in low-resource and fragile contexts. However, Improvement Science, Implementation Science, and Design-Based Implementation Research (DBIR) have been gradually taken up in traditional school settings in high-resource countries, like the United States, over the last two decades (Bryk, 2011). Like REALM, these strategies emphasize using frequent and mixed methods data collection to make evidence-based changes that improve the student experience. Their field of work is largely based in traditional primary and secondary school settings at the school and district levels (Senge, 2012; Bryk, 2015). However, improvement cycles are led by school personnel rather than field researchers and NGOs and these models are not designed for fragile or high poverty contexts.



Photo: Patricia Cabrerizo, Piura, Peru

The purpose of Improvement Science (Carnegie Foundation for the Advancement of Teaching, 2019) is to use the implementation process as an opportunity to learn and "redesign both the interventions and system" (Lewsi, 201, p.55) in a way that is locally driven, building upon what may already be a tested model. Similarly, Implementation Science and DBIR aim to understand how a proven intervention can be adopted, implemented, and scaled, with the researchers being the teachers or administrators from within the system being explored (McKay,

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2017). These strategies have been applied in various educational settings in western contexts, ranging from improvement in science education instruction, to bolstering diversity and civic engagement, and districtwide school reform (Design Based Implementation Research, n.d.).

Strengths of REALM

Based on the review of variations of REALM, there are common strengths across these methods that need to be highlighted. These strengths articulate the core assumptions and strategies that are adopted when undertaking a REALM process.

Keeps the program users/recipients at the center of the design

Perhaps the greatest benefit of REALM, and one that is highlighted by all the strategies articulated above, is its ability to amplify the voices of those involved in or being served by the program or project. Improvement Science, Implementation Science, and Design-Based Implementation Research can even provide a significant degree of ownership in not only the research process but also the implementation of new and amended intervention approaches. For example, seeking regular feedback (in the form of surveys or interviews) from workshop participants and addressing it for the next session allows participants to be a part of the program design process. As a result of this collaborative, iterative method, not only will the workshops reflect a more user-centered design, but participants will have more ownership in its creation. End user data is also critical for understanding whether the program is making the intended impact and can reveal insights that might otherwise be missed.

Ensures that regular feedback loops are built into data collection cycles

Because of the rapid, iterative nature of these methodologies, REALM are particularly beneficial in time sensitive and resource-scarce contexts where efficiency is key. By obtaining frequent information and quickly producing findings, decisions can be made more rapidly than in a summative evaluation, therefore saving both time and resources by identifying effective approaches and avoiding ineffective investments. However, the rapid action that is taken based on REALM-generated data requires that feedback loops with partners and implementation staff are set up prior to data collection so that there are established ways-of-working and methods of addressing changes to the program.

Focused on specific program components and mechanisms

REALM allows implementers and researchers to evaluate the performance of specific program components. For example, a researcher may want to test whether weekly workshops, a component of a larger program, are having a positive impact on the participants. Researchers can use REALM to survey participants about their knowledge and experience at the end of each workshop, use observation to gauge interest and participation, and give short quizzes to triangulate various forms of data to assess the effectiveness of the workshops in real time. Later, when assessing the program in full, this information can help paint a more detailed picture about the reasons for the outcomes of the program overall, helping pinpoint particular strengths and weaknesses. But in order to leverage this strength of REALM, it is critical that prior to embarking on the study-feedback loop, the right mechanisms and drivers behind the activity are articulated and understood.

Appropriate for use when scaling projects

The use of REALM during a pilot phase gives a program or intervention a chance to become well developed before it is scaled. When it is scaled, therefore, the program will be more likely to succeed and require minimal alteration (USAID, n.d.). Teams can then also focus efforts on application in new contexts, rather than altering the core of the program. Of course, this means that implementers and researchers must anticipate potential challenges of scaling when making decisions during the pilot phase.

Appropriate for testing alternative strategies

An innovative aspect of REALM is the ability to study two or more alternative intervention approaches in a short amount of time by either trying one and then the other, or testing both simultaneously in separate groups (McNall & Foster-Fishman, 2007). The level of statisti-



Photo: Sonia Urquidi, Cap-Haïtian, Haiti

cal rigor can be varied based on needs and feasibility. In Partnership Schools for Liberia, for example, R4D completed multiple iterations of two evidence-based strategies (teacher coaching and differentiated instruction) and conducted a rapid RCT to understand how to best help teachers reach students of varying ages and abilities in the same classroom. From this research, R4D is able to create and test more context-specific solutions with a greater probability of success (R4D, 2018).

Useful when tailoring programs to a new setting

By testing and iterating from the start, REALM helps calibrate an intervention, program, or activity to a new setting. What functions well in one country, community, school, or classroom may not in another despite a thoughtful design. However, intentionally seeking and acting upon feedback about its application in the new setting can smooth the transition. In the Partnership Schools for Liberia project, for instance, two evidence-based interventions (teacher coaching and differentiated instruction) were introduced in Liberian schools; however, implementing and testing them revealed critical contextual factors that inspired critical revisions to the interventions to make them more effective (R4D, 2018).

Challenges of REALM

Highly involved data collection process

The rapid, cyclical nature of REALM requires frequent data collection, a process that can be resource intensive and difficult to coordinate (e.g., hiring multiple enumerators, placing researchers on the ground, substantial training of local personnel, etc.). Implementing organizations should do as much as possible to embed data collection into the program itself (e.g., a short survey administered by the facilitator at the end of each workshop and recorded on a spreadsheet, data fed back to researchers each time parents login to the application being tested on their cell phone, a simple observation checklist filled out by teachers after each class).

Although they take significant time to conduct and analyze, interviews, focus groups, and other qualitative methods of data collection are essential for developing a depth of understanding, especially in REALM where quantitative data represents a small sample and short timeframe. Modern data collection tools such as cell phones, tablets, SMS, and geospatial imagery are particularly useful for REALM because



Photo: Wilfred Wachira, Nairutia, Kenya

they can provide timely data (USAID, n.d.). The upfront cost and training to use these devices and techniques may be a deterrent but will save time and money later on.

Not ideal for system-level changes

REALM is not a stand alone solution for creating systems-level or long-term change. This is especially true in education because the impacts of an intervention on child development, behavior, or learning may take a long time to emerge. For example, while REALM can record participant attendance at a parenting program, it cannot determine if the program causes parents to make changes to their parenting, and whether those changes have a lasting impact on child development because these results would require a much longer time horizon than REALM allows.

Data analysis cannot show long term outcomes

A related challenge is selecting good proxy indicators that provide relevant information for the long-term outcomes of interest (Murray & Ma, 2015) (e.g., attendance at a parenting program and learning assessments of participants can be early indicators that the children of participants will receive the intended benefits of the program). Unfortunately, choosing these indicators can be difficult and does not guarantee an accurate prediction of the eventual outcomes of interest. However, these measures are critical for making well-informed decisions during the rapid feedback cycles. Often the use of one or two key metrics with close linkages to the outcome of interest is recommended (Faustino & David, 2014).

REALM in education programs in low-resource and fragile contexts

In low-resource contexts, REALM have been applied in a handful of nontraditional educational projects through USAID's consortium on Rapid Feedback (RF), Monitoring, Evaluation, Research, and Learning (MERL). Projects include increasing parent and community engagement in learning in Tanzania (RTI) and reading in Senegal (Chemonics). In both community-based projects, data is collected using a mixed method approach and learning checks, during which partners come together to reflect and brainstorm how to improve. These projects are still in progress, and this work is slated to continue through the end of 2024 (R4D, 2019).

Another initiative that has demonstrated a conscious crossover between the strategies used in the western, traditional education settings and the international development world of REALM is the Millions Learning Real-Time Scaling Labs at the Center for Universal Education at Brookings. The Real-Time Scaling Labs aim to generate more evidence and provide practical recommendations around the process of scaling in global education (Robinson & Curtiss, 2018). They partner with a number of countries and U.S. cities to share evidence about effective interventions and the scaling process in real-time. The lab utilizes a range of REALM, including improvement and implementation science as well as rapid iterative testing cycles (Robinson & Curtiss, 2018).

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Conclusion

REALM has much to offer program design and research in education, be it in traditional school settings, community-based programs, or other child development interventions in low-resource and fragile contexts. Depending on the program and the context, practitioners who want to employ REALM must find a balance between a high level of rigor and a "good enough" standard and framework that is reliable yet practical, as well as the most appropriate type of REALM. Organizations should be encouraged to share how they use REALM in practice. Techniques, timelines, and rigor can vary widely from case to case and practical research experiences can provide guidance to others looking to do the same. Increased knowledge sharing between REALM typically applied in western traditional education contexts and developing country contexts would also help expand the range of tools, methodologies, and techniques available to researchers and practitioners in diverse geographic contexts and educational settings.

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