SOUTH AFRICA | EDUCATION

FUEL: Feed, Uplift, Educate, Love

By creating a culture of accountability and evidence-based decision-making, FUEL is tackling how meals are distributed to students in schools across the country.

By Emilie Leforestier
FUEL Table of Contents

Evidence in Practice Introduction

Part I: The FUEL Story
School nutrition in South Africa
Background on FUEL and the Project
Formulating FUEL’s Theory of Change
A Well-Connected Team
Iterations on the Theory of Change
Creating a Sense of Ownership
Conceptualizing the MRR approach
Testing the Approach, and Starting from Scratch Once Again
Embedding MRR in the system
Current Activities and Next Steps

Part II: Evidence in Practice: Key Themes + Insights
Definition of Evidence
Incentives
Capacity, Resources, and Time
Timing
Learning from Failure
Trust, Respect, and Buy-in Among Stakeholders
Conclusion

Part III: Resources
Stakeholder Map
Timeline
Process Diagram
Appendices

Image Credits
Cover: Megan Trace
Page 5: Trevor Samson / World Bank
Page 9: Trevor Samson / World Bank
Page 16: Steve Evans
Page 16: Randy OHC
Page 16: Steve Evans

evidenceinpractice.yale.edu
The Evidence In Practice research project at the Yale School of Management, funded by the William and Flora Hewlett Foundation, was conducted from January 2016 to January 2018 in order to better understand the conditions under which rigorous evidence can be effectively integrated into public policies and non-governmental organization (NGO) practices in the field of international development.

The Evidence in Practice project followed a rigorous methodology comprised of three broad elements: First we conducted an initial round of expert interviews with individuals who have spent a significant portion of their professional lives attempting, researching, or promoting the integration of evidence into development practice, including academics, government officials, foundation program officers, NGO practitioners, and think-tank directors. Second, we conducted a matched comparison of eight cases of development programs or interventions where rigorous evidence was integrated with varying degrees of effectiveness. This case study is one of the eight produced by the project. The third component, conducted in parallel to the eight case studies, consisted of interviews with prototypical representatives of each of the stakeholder groups, or individuals who could clearly describe the typical experience of enacting a particular stakeholder role. Our synthesis analysis is presented in the accompanying report.1

**Stakeholder Characterization**

Based on our research, we have found it useful to think of the flow of evidence into policy and practice as an “ecosystem” in which a set of archetypical stakeholder groups interact. This set of stakeholder categories was described and reinforced by our interviewees throughout the project. While this is not a perfect description (e.g., some organizations fall within more than one stakeholder group and individuals often shift across stakeholder groups or play roles that effectively span categories), it can help frame the conversation to identify the critical roles, incentives, and relationships that animate the complex relationship between “evidence” and “practice.” These representative stakeholder groups are: Researchers, Funders, Influencers 2, Intermediaries, Policymakers, Implementers, and Beneficiaries3.

Each of the cases thus contains a map of the specific organizations (and individuals) that defined its evolution, their structural affiliation to a stakeholder category (in some cases, organizations played more than one formal, structural role), the informal roles that certain individual actors played, as well as the key relationships between these individuals and organizations.

---

1 Please see the appendix for a detailed description on Data and Methods.

2 While some of our interviewees identified “Influencers” (such as the media, the general public, lobbyists, and influential individuals) as playing an important role in the evidence-to-practice eco-system, this group did not play an explicit role in the narrative of any of the case studies. So we have included the category here, though it does not appear in the stakeholder maps of the individual case studies.

3 We use the term “beneficiaries” to indicate those whom a specific policy or program is intended to help. Different analytic frameworks use various terms to describe this group, including clients, users, recipients, etc.
Part I: The FUEL Story

School Nutrition in South Africa

Upon coming to power in 1994, Nelson Mandela launched a set of “Presidential Lead Projects” under the Reconstruction and Development Program. One of these projects was the Primary School Nutrition Program, which targeted the following objectives:

- improve education by enhancing active learning capacity, school attendance and punctuality by providing a nutritious meal early in the morning;
- improve health through micro-nutrient supplementation;
- improve health through parasite control/eradication;
- improve health through providing education on health and nutrition; and
- enhance broader development initiatives, especially in the area of combating poverty.4

The Department of Health (DoH) designed the Program, which explains its initial focus on students’ health, nutrition and ability to focus. As a result, school officials had to report to both the Department of Education (DoE) on teaching-related objectives and to the DoH on nutrition-related objectives. For purposes of reporting and governance, the management of the program eventually shifted solely to the DoE in 2004. It was also renamed the National School Nutrition Program (NSNP) and phased into secondary schools from 2009 to 2011.

As of 2017, the program prioritizes 60% of all South African schools based on the socio-economic makeup of the areas they are situated in. It aims to provide a nutritious daily meal to every child in these schools.

Background on FUEL and the Project

This case study centers on a South African nongovernmental organization called Feed, Uplift, Educate, Love (FUEL). Its co-founders, Charles Luyckx and Gary Campbell, are fellows of the Africa Leadership Initiative (also known as ALI)5. Luyckx was attending an ALI-related conference in South Africa in 2006 when he met with a woman working in the South African President’s Office. She explained that she had just come back from the South African province of KwaZulu-Natal and had observed that many of the students in poorer areas did not have access to a nutritional meal at school. Far from Nelson Mandela’s ambition of providing a full and balanced meal, some of the students she encountered were only receiving “old stale bread.”

Luyckx did not hear this story by accident. He was one of the founding directors of the restaurant chain Nando’s in the United


Kingdom and had a solid background in food distribution. His fellowship with ALI included a pledge to undertake a significant project to contribute to his community. Luyckx was a self-described “starter”—he enjoyed taking on new initiatives, being confronted with new challenges, and formulating and testing hypotheses to resolve these challenges. He was therefore on the lookout for an opportunity to give back to society, preferably in South Africa, focused on a compelling topic where he could add value. The problem of school nutrition sparked his interest and he resolved to learn more about the challenge of food distribution in South African schools.

**Formulating FUEL’s Theory of Change**

Luyckx’s initial hypothesis, heavily informed by his skillset and experience running Nando’s, framed the challenge as one of procurement and logistics. He thought that the procurement element could be solved by a large, centralized food purchasing hub that would aggregate the buying power of the schools’ entire food system and therefore realize large cost savings. Logistics had to do with delivery efficiency, which Luyckx suspected could be drastically improved.

Framing the problem as one of procurement and logistics was well-suited to the expertise of one of Luyckx’s trusted colleagues at Nando’s, Gary Campbell, Commercial Director of Nando’s in the UK, who had recently decided to return to his native South Africa. Together, Luyckx and Campbell set out to investigate how they could improve the NSNP program by leveraging their expertise in food management systems. The first few months were dedicated to building a diagnostic of the NSNP system, which they knew was complex: its governance, the links between national and provincial officials, and the connections between the latter and individual schools.

Based on these early interactions, the team started mapping out the processes, and identifying the topics he was interested in exploring further. They came to understand that the NSNP’s implementation varied significantly across South Africa’s nine provinces. Some of the provinces had adopted centralized procurement models—which the team initially favored—while others had decentralized models in which the schools themselves bought the food they needed for their students, with funds provided through the program. This phase of the project, while not explicitly labelled as “evidence-gathering,”
was aimed at building a fact base to inform. Its purpose was to build a fact base to inform the design of a potential intervention. However, the hypothesis being tested was not whether procurement or logistics were areas to invest in and try to improve, but rather where the bottlenecks within these areas were, based on the assumption that the system could be more efficient under centralized procurement and logistics. The more the team researched the issue, however, the more often they were confronted with evidence that, in fact, some schools frequently had sufficient food delivered efficiently and effectively but they nonetheless failed to serve students nutritious meals on time. The problem, then, seemed to be less about logistics and more about accountability, reporting, and communication between stakeholders.

**A Well-Connected Team**

FUEL was funded by Luyckx and by the Yellowwoods Trust, an organization with strong social and economic ties to the business fabric of the country. These ties enabled FUEL to gain access to influencers within the education system that an organization with a different governance structure might not have been able to access, particularly so early in its history.

Some of these introductions turned out to be more closely aligned with FUEL’s trajectory. In August 2007, after Campbell had gathered a first evidence base, Robert Brozin, Nando’s CEO in South Africa, sent a letter to the South African Minister of Education, indicating Nando’s desire to help with challenges related to the NSNP. Nando’s brand name was a powerful way to gain access to the Department of Education. The letter enabled Brozin and Campbell to meet with the Director General of Education (head of the National Department of Education) and the Deputy Director General of Education. Their presentation of what Campbell had uncovered to date triggered enough interest for them to be introduced to Neo Rakwena, Director of the NSNP at the DoE.

This top-down approach soon showed its limits. On the one hand, it had been very helpful for the team to be introduced to the NSNP team by high-ranking officials at DoE. On the other hand, there was no buy-in from the NSNP top team itself for FUEL’s engagement, and doubts surfaced about its agenda and goals. As 2007 came to a close, they realized that the national DoE “wasn’t the place to really start the detailed work” and instead they resolved to understand the system better at the provincial level. This dynamic would repeat itself a few more times over the following years, and lead FUEL each time to focus on actors ranking lower in the official NSNP hierarchy but ones who had more discretion and influence on the ground. Each occurrence was a lesson on the importance of engagement and buy-in at all levels, albeit a costly one in terms of time, resources, and organizational stamina.

---

Iterations on the Theory of Change

Following conversations with the NSNP at the national level, FUEL got the blessing of NSNP officials to visit all nine provinces and create a more advanced version of the system map. The team therefore set out to meet “as many people in the system” as they could.

The bulk of 2008 was dedicated to creating system descriptions, and, equally important, to building relationships with NSNP officials in key provinces. The team learned that the school system in the North West Province had recently decided to change its food delivery model from a centralized co-operative system to a decentralized one, and the FUEL team offered to lend its expertise to the effort, allowing it to test the hypothesis that influencing procurement processes could help leverage improvements in meals served to students.

In early 2009, FUEL started working with the Chief Financial Officer of the North West Province’s Department of Education, who managed financial affairs for all matters related to education (including school nutrition issues) and to whom they had been introduced by the head of the Department of Education. At the time, the NSNP was being phased into secondary schools in areas with the least privileged socio-economic makeup, which represented an opportunity for the CFO to test a different delivery model. With FUEL’s support, the CFO decided to pilot a centralized procurement model for the supply of food in secondary schools, while leaving food procurement in primary schools decentralized. There was an effort to update the provincial department’s policies and practices, with the hope that changes to policies at the top would “trickle down” into the schools’ hierarchy and compliance structures.

This top-down approach, even though focused at the provincial level, showed two weaknesses. First, working with high-ranking provincial officials did not guarantee the adoption of the updated policies at the school level because principals have much discretion over how policies are implemented. Second, when high ranking officials, like the CFO or the department head, transitioned from their positions—a common occurrence in public service—the carefully-crafted strategy and procurement processes that FUEL had spent months helping develop fell apart, leaving few allies or contacts within the North West’s NSNP team. In other words, while moving from the national NSNP level to the provincial level originally seemed like the right approach to build on-the-ground support, it became apparent that the provincial level was still too far removed from what happened in the schools and how the NSNP was getting implemented on a day-to-day basis.

This led FUEL to rethink its approach and to focus more on the program implementers on the ground. Not only did procurement and logistics require top-down approval,
In FUEL’s words, the field workers could become “levers [they] could use in the system to influence performance at all schools.”

which could be politically fragile, but more importantly two years into FUEL’s work the team had no evidence that altering procurement systems would translate into large improvements in the share of students receiving a nutritious meal on time.

Everyone at FUEL refers to this period as a particularly difficult one for the team. At that point, the team had been active in South Africa for close to three years, but the only signs of progress he could point to were a system description and some growing relationships—reinforcing FUEL’s sense of the urgency of the problem, but not yet providing sufficient insight into how best to address it. However, aided in part by strong team relationships and unwavering financial support, the team decided to carry on, building on what they had learned from the failure of its province-level approach.

Creating a Sense of Ownership
In Luyckx’s own words, it was clear from the start that government, at all levels, was the “ten-ton gorilla in the room.” Campbell believed that making the government more efficient could unlock massive resources. The initial setback in the North West not only strengthened this belief, but convinced the team that nothing could be achieved without providing stakeholders at every level with a sense of ownership.

FUEL’s initial experience in the North West specifically highlighted the risk of working with high-ranking officials without creating buy-in from the schools, where the NSNP actually was implemented. Given that the program covered about twenty thousand schools, FUEL needed to identify intermediaries it could engage with at the local level. They turned to the field workers, NSNP employees in charge of monitoring and implementing the program at a school level. There were 400 to 500 field workers across the country, which represented an accessible scale for FUEL. Field workers also presented the advantage of staying in their positions longer than politicians or political appointees, and working in teams within established governance structures that make them less disrupted by the departure of senior managers. In FUEL’s words, the field workers could become “levers [they] could use in the system to influence performance at all schools.”

FUEL decided to keep its focus on the North West province as they did not have a track record or strong relationships in other parts of the country, unlike the trust built in the North West. The team met with field workers in different districts of the province to better understand their experience and needs. Their plan was to accompany a small set of field workers on their visits to the schools, identify issues and bottlenecks standing in the way of meal delivery, and co-create solutions with them through workshops and brainstorming exercises. Once success had been achieved in the North West province, workshops could be conducted in other districts and provinces to train field workers and scale the approach, all while providing a sense of ownership to field workers.
Conceptualizing the MRR Approach

The team realized during its observations of the field workers’ routines that there was a disconnect between the NSNP’s mission to serve students a nutritious morning meal and what the field workers were actually measuring. They spent most of their time looking through the school’s records to investigate how many students had been fed, but they were not collecting reliable evidence on the quality, size, or timeliness of the meal. An alternative hypothesis started to form, one which revolved around accountability and measurement mechanisms. This fit well with FUEL’s own focus on measurement. From the start, the team had been focused on the way FUEL’s impact could be measured, which, in August 2009, had led them to commission a baseline study to observe the rates at which students were actually being fed. It also fit well with one of FUEL’s recruits, Laura Poswell. Poswell had been working as a researcher for the Development Policy Research Unit at the University of Cape Town, and became a part of the team in 2007. She was instrumental in helping to design and codify what would later be known as the MRR approach.

The team came up with the concept of “non-threatening accountability,” which consisted of “[pushing] people towards the right behavior, but without the punitive side.” Embedded in this concept was a strong intuition that field workers needed to see value in the changes that FUEL would promote, and that there should be no negative incentives to reporting deficiencies. This meant helping schools address their challenges and promoting improvements, rather than highlighting or much less punishing their deficiencies.

This approach led to a concept called “Monitoring, Reporting, and Responding” (MRR), which became the foundation for FUEL’s engagement in the provinces. Some structural features of MRR were already in place: field workers were monitoring aspects of program implementation, but reports were mostly narrative, so they could not provide a standardized, objective measure of program implementation. Observations were difficult to compare across schools or districts, as they were not documented against consistent standards. For example, NSNP field workers would evaluate the cleanliness of schools without having a standard baseline of kitchen cleanliness; they monitored food quantity guidelines, but recommended food quantities were often expressed in kilogram or liter units, which were hard to assess without the reliable presence of scales and measuring cups in schools.
Lastly, because current monitoring systems lacked mechanisms for field workers to provide recommendations or action steps, reports could only be used as static snapshots, rather than as dynamic working tools. If field workers were not able to identify precise issues that could make a school’s NSNP performance improve, or if the metrics for a school’s performance were not well defined, schools did not have the ability or incentives to rectify issues. In other words, there was no clear way to define “success” and no road map to improve performance.

**Testing the Approach, and Starting from Scratch Once Again**

After building relationships with field workers and rebuilding relationships with the NSNP officials at the district and provincial levels, FUEL organized a series of workshops with 48 field workers. This resulted in a co-created MRR tool, with performance indicators crafted by the field workers themselves based on their experience of school visits. This newly designed MRR tool would allow field workers to assess whether schools were serving nutritious meals on time and meeting NSNP guidelines related to food groups and quantities. The indicators were also aligned with the expected outputs and outcomes as articulated in the NSNP framework.7 The tool was designed as a physical document and manifested as printed copies of a checklist used by field workers to evaluate the schools’ food preparation serving processes. Most important, it was designed to provide a framework for collaboration towards improvement, primarily at the school level, between field workers and principals. It was also designed to allow for simple aggregation of performance scores to facilitate analysis embedded in this concept was a strong intuition that field workers needed to see value in the changes that FUEL would promote, and that there should be no negative incentives to reporting deficiencies.
for impact measurement turned out to be a pivotal element for the organization. As mentioned previously, a baseline study had been conducted early on in the project to assess what share of the schools in each province managed to serve a nutritious meal on time. Six months had passed since the field workers had started using the MRR approach. FUEL commissioned an assessment of about 150 schools to evaluate to what extent schools were consistently serving a nutritious meal to their students on time. The study showed that the average score of the schools had jumped by 16% in less than a year (from 55% to 65% of students). There was now hard evidence that the approach co-created with the field workers actually worked. As one team member put it: “A new tool, newly trained field workers with a slightly different approach going to the schools, is actually shifting the performance.”

Based on the results, the FUEL team went back to work. They shared the evidence with provincial officials and lobbied for the appointment of new field workers to replace the promoted group. They were very hands-on, even contributing to the writing of job specifications, which enabled them to incorporate the MRR process into each job description. The departed field workers were replaced within three months, and new appointees trained shortly thereafter. Six months after these new field workers started using the MRR approach, FUEL commissioned a third field study, and the average performance score of schools in the province had gone up by another 17%: from the baseline of 55% in 2008, it had increased to 64% after the first intervention, and 75% after the second intervention. Figure 1 tracks the improvement from 2009 through 2015.

**Embedding MRR in the System**

The progress demonstrated by the consecutive field studies in the North West Province prompted FUEL to expand the approach to other provinces. Since co-creation of the MRR tool had been successful in both bringing about change and bringing people on board the project, FUEL wanted to continue experimenting with the methodology.

In parallel with its efforts in the North West, FUEL had been building relationships in all other provinces and creating system descriptions for each one. Based on these relationships, they approached the DoE leadership in each province to advocate for adoption of the MRR methodology. The first practical step towards adoption in each province was an MRR workshop, where the methodology was laid out, and a new monitoring tool co-designed. FUEL worked with attendees to co-create a local version of the MRR system, adapted to the constraints...
and needs of each province. Additionally, workshops helped address difficulties faced by field workers in the assessment of school performance—problems like translating quantities observed at school from volume to weight (buckets or glasses to kilograms)—as well as designing simpler grading systems that allowed field workers to label schools as green, yellow or red based on overall scores. By co-creating the guidelines with the local field workers, FUEL aimed to create a sense of ownership so the criteria would be viewed as legitimate, increasing the likelihood that the field workers would follow and enforce them. Funding wasn’t likely to be withheld based on a school’s NSNP performance, so it was all the more important to tap into these stakeholders’ intrinsic desire to see progress and be part of a movement that was gaining visibility.

The MRR approach was rolled out to all of the remaining provinces between 2011 and 2017; the results through 2016 are illustrated in Figure 2.

**Current Activities and Next Steps**

To date, progress has been made in all provinces. In provinces where the approach has now been running for a few years, the team is shifting focus from facilitating adoption of MRR practices toward encouraging institutionalization by transferring as much of the process ownership and change management expertise to stakeholders within the NSNP system. FUEL is also lending its expertise to organizations in other sectors, beyond school food programs. For instance, some team members have been involved in an advisory capacity in the Program to Improve Learning Outcomes (PILO), an “education transformation initiative and teacher development strategy focusing on developing strong curriculum management skills to strengthen district support to teaching and learning.” FUEL staff have supported the PILO team to develop and run workshops centered on curriculum changes while incorporating many aspects of MRR. FUEL has thus been able to extend its work beyond school nutrition programs.

**Figure 2. Progress in Primary Schools serving nutritious meals on time (%)**

![Figure 2: Progress in Primary Schools serving nutritious meals on time (%)](image-url)
Part II: **Key Themes + Insights**

This section discusses the Evidence in Practice themes as they pertain to FUEL and summarizes key insights and implications for thinking about the translation of evidence to policy and practice more generally.

**Definition of Evidence**

There are varying definitions and understandings of what constitutes “evidence,” dependent especially on the perspectives of each stakeholder group. For example, the framing, language, and limited accessibility of academic evidence can render it less useful to other stakeholders. These diverging views of evidence create barriers across stakeholder groups, as what constitutes valid evidence for each exists in different realms and in different forms that are challenging to reconcile.

In FUEL’s case, the evidence used did not stem from academic research or externally-produced data. Rather, the evidence was collected by NSNP field workers through the MRR indicators and associated scores from the schools. The MRR system was the result of an iterative process of learning what was most (and least) salient when considering the most effective improvements to the quality of the NSNP program—reflecting the team’s openness to modifying theories based on evidence. The MRR methodology was designed to capture the key performance metrics that FUEL identified as being crucial to gauge the success of the NSNP program. FUEL therefore supports the creation of accurate evidence and its use throughout the NSNP hierarchy to ensure that the evidence is reliable, and to make it as transparent as possible: each province’s indicators and scores are shared at quarterly progress meetings with other provinces.

Through its own efforts, FUEL learned that there are key decision makers in the school system that have enormous importance and discretion, most notably principals. Yet this has been a consistent and robust finding across many interventions in education across a diversity of settings. It is an example of how existing evidence potentially could have saved the organization both effort and resources, but did not reach decision makers in a timely and useful form.

**Incentives**

Throughout the ecosystem, within and across stakeholder groups, formal and informal incentive structures are frequently not conducive—and are often in contradiction—to the integration of evidence into practice. Typically, organizational incentives are defined around an insular view of the organization (e.g., academics publish in academic journals, policymakers must exercise their budgets according to program and budgetary rules, NGOs must operationalize their programs as stated in their budgets and proposals to funders). Usually, these organizational incentives have no mandate or room for the explicit search of external evidence, much less for the generation of internal evidence that would then lead to continuous adaptation of programs and policies as new learning emerges.

The MRR tool was designed to fit within existing DoE incentive frameworks. Specifically, it enabled school officials to measure and achieve their job performance goals more effectively. For example, field workers were required to accurately assess a certain number of schools each month. The MRR approach allowed them to achieve their
quantitative goals through reliable metrics, and enhanced the value they added by encouraging them to tie their observations to recommendations. Additionally, school principals now have a more accurate gauge of how well they are feeding their students, and they have clearly articulated ways to improve their score (e.g., rather than simply “increase the number of students fed,” school principals can ensure “students are fed before 10AM” and ensure “X grams of rice per student are cooked each day”). National-level officials can ensure "students are fed before 10AM" and ensure “X grams of rice per student are cooked each day”). National-level officials can also monitor the progress of the NSNP program in more detail and can easily back up their progress with detailed quantitative data for each school.

One key element of FUEL’s strategy has been that the MRR tool be customized for each province through a co-design process involving the relevant stakeholders, including field workers, district and provincial officials, and principals. The FUEL team carefully managed perceptions and intentionally gave ownership of the customized tool to those stakeholders. This not only facilitated broader adoption due to the customized design, but also created personal and reputational incentives for workshop participants to ensure that the rollout of the MRR methodology happened as smoothly and as effectively as possible.

The FUEL team also made sure that the MRR logic resonated with NSNP stakeholders at every level. This all contributed to a culture of compliance and performance, driven by an alignment between the MRR methodology and NSNP actors’ eagerness to do well. In this context, the MRR tool tapped directly into a desire to improve performance.

At the provincial level, an informal accountability mechanism was built in over the years, ensuring that schools have an incentive for their nutrition efforts to be well-ranked. While there are no direct or official consequences to a poor score, progress is monitored both by district and provincial officials, with support from FUEL. If issues or lower-than-expected performance arise, a discussion takes place between the field worker and the school about ways to improve. Further discussions take place on a quarterly basis at the district and province levels, i.e., between field workers and their supervisors, or between NSNP officials from different districts in the same province. Thus, though there are no formal sanctions for poor scores, incentives to improve are strong and aligned to motivate performance at all levels.

The FUEL team carefully managed perceptions and intentionally gave ownership of the customized tool to those stakeholders, which facilitated broader adoption.
Capacity, Resources, and Time

Few organizations provide incentives or carve out explicit time for managers to explore emerging evidence in their field. Even fewer assign staff to find relevant evidence and translate it into accessible formats for the organization. As a result, the role of preparing and sharing evidence that is timely, useful, and relevant for practitioners is sometimes explicitly played by formal intermediaries (e.g., certain think-tanks). More frequently, an actor who holds a formal role within another stakeholder group spontaneously takes on the (additional) responsibility for trying to integrate evidence, with no actor formally responsible for the process. Discovering and integrating evidence requires time, energy and funding.

FUEL benefits from steady, flexible, and reliable funding. The deeply-rooted personal and professional relationship between Charles Luyckx and Gary Campbell was also an important element, as it led Luyckx to trust FUEL’s methods and ability to have an impact. While this constellation of favorable factors is unique to FUEL, a core lesson is that sustained and flexible funding is often essential for a new, evidence-informed approach to bear fruit.

Several benefits stem from FUEL’s reliable, flexible, and durable sources of funding. First, it impacts the competitiveness of FUEL’s employment conditions. The organization is able to attract diverse talent and experience, and team members have a mix of private sector and community or nonprofit backgrounds. Second, it enables FUEL to have a longer time horizon than if the organization were bound to short- or medium-term timelines, ones typically associated with philanthropic or government grants. This longer timeline, combined with the deep trust existing between Luyckx and the FUEL team, has created an environment where the periodic failures associated with trial-and-error experimentation have been treated as temporary setbacks on a longer path to success. It played a particularly important role when FUEL encountered setbacks early in its history. An organization with less stable and trusting funding could not have taken three years to build relationships, refine its theory of change, and demonstrate its impact. The flexibility also allows FUEL to cultivate long-lasting relationships within the education system, and to build trust by demonstrating a continued commitment to the NSNP throughout the years. Third, the reliable source of funding have liberated FUEL from having to dedicate a significant share of its resources to fundraising or mandatory reporting, and so enabled the team to focus on programmatic activities including stakeholder engagement, workshops and trainings, and progress monitoring.

Other, albeit less tangible, benefits have stemmed from Charles Luyckx’s heavy involvement since FUEL’s early days. Luyckx has said that he, and by extension FUEL, operates under an unofficial mantra borrowed from U.S. President Truman: “there’s no limit to what you can achieve if you don’t care who gets the credit.” This enables FUEL to give the credit to its partners at all levels of the NSNP for the progress accomplished, which propels the collaborative approach vital to success. Of course, should Charles Luyckx or the Yellowwoods Trust choose to withdraw their support to FUEL, the organization’s dependence on so few sources of funding could make it vulnerable.

The team has also prioritized flexibility and adaptability by choosing to remain small, spend its resources cautiously, and leverage

---

8 Note that the team has given thought to seeking compensation from the NSNP or public stakeholders in exchange for the services provided, mostly as a commitment device. This has not been implemented.
On the NSNP side, the MRR methodology has required virtually no additional investment of government resources, while enabling district, provincial and national-level officials to demonstrate higher performance, and get credit for the efforts made. In other words, the approach was designed, explicitly, to insert itself into existing processes and structures to better leverage and multiply the effectiveness of those resources and processes. Policy-makers were engaged in developing the intervention based on their needs and those of the stakeholders closest to the issues, while not being asked to devote any additional funding. In addition, the risk associated with implementing the MRR tool was perceived to be low: FUEL took on the risk of achieving positive results through its initial pilots, and thereby offered a way for stakeholders to demonstrate improvements in the performance of their areas of responsibility with little reputational or financial risk.

External resources when possible. For instance, FUEL has developed a partnership with Eric Schollar and Associates, a research agency, to run surveys in order to gauge the fidelity with which field workers use the MRR tool. While Schollar originally only conducted surveys, FUEL came to contract the service provider to train field workers, give them regular feedback, and monitor their implementation capacity. This has allowed FUEL to maintain a minimal in-house staffing level while having the flexibility to respond to fluctuating external demands.
Timing

The different and often discordant timeframes within which researchers, policymakers, and implementers operate often hobble efforts to coordinate, let alone collaborate, on evidence-informed approaches. Electoral cycles and political windows differ from NGO funding cycles and from academic publishing rhythms. Yet each actor is bound by the timeframes of her formal stakeholder group.

A particularity of the FUEL case is the long-term approach that the team was able to take from the onset. This has been tied to its sources of funding. It was also tied to the team’s patience and commitment, which stemmed from the personalities at play and was embedded into the organization’s culture.

The organization’s timing was not, however, always aligned with that of its stakeholders, and in particular with political actors. With so many key government players rotating so frequently, FUEL learned the hard way that it was crucial to engage with actors operating on longer timelines and less tied to political objectives and calendars.

With so many key government players rotating so frequently, FUEL learned the hard way that it was crucial to engage with actors operating on longer timelines and less tied to political objectives and calendars.

Learning from Failure

Potential consequences for risk-taking and experimentation with innovative approaches are generally seen as negative and dissuade the exploration of novel, evidence-informed interventions. Fear of failure can further hinder the incorporation of novel evidence into practice, even when stakeholders recognize the value and applicability of the evidence.

FUEL encountered several setbacks in developing and rolling out its approach. As discussed above, when the organization was created, it started building relationships with high-ranking officials within the DoE and NSNP. While this approach initially enabled FUEL to get traction and buy-in from top levels, the team found itself having to “start from scratch” when a reorganization changed the structure of top echelons in the education system. FUEL then lost the buy-in and momentum it had developed, and no longer had support for or interest in its activities. Both challenges sparked reflection among the team and were used as learning experiences.
FUEL is not as “afraid of failure” as other organizations since it has stable funding that allows for some trial-and-error, and a commitment to learn from “failures” in order to develop its methodology.

**Trust, Respect, and Buy-in Among Stakeholders**

The cross-stakeholder collaborations required for evidence-informed policies and practices are often difficult to initiate, develop, and sustain. Particularly when institutional incentives are lacking, personal trust, respect, and buy-in between individuals across stakeholder groups become critical to fostering the effective flow of evidence into practice.

From its start, the FUEL team focused on establishing and cultivating relationships even with people who may have initially been skeptical of their intentions. For instance, one of our interviewees at the NSNP national level told us that upon assuming her current position in 2009, she initially didn’t trust Gary Campbell or believe that his agenda was aligned with the NSNP’s best interests. However, she slowly warmed up to FUEL when hearing about the team’s track record and long-standing engagement with the education system in South Africa.

Another factor that helped build trust has been FUEL’s insistence that the MRR tool be tailored and co-designed with province and district officials as well as field workers. As a result, the MRR tool looks slightly different in each province.

**Conclusion**

This case study illustrates how evidence informed the design and development of South Africa’s National School Nutrition Program. FUEL established deeply collaborative relationships with national, provincial and local government leaders in order to improve the country’s flagship in-school nutrition program. By making use of the evidence that emerged from each successive stage of its pilots, FUEL re-shaped its approach, seeking to align the incentives and timeframes of the various stakeholders. Even though FUEL took an evidence-based approach, it took them several program iterations before they were able to move beyond their initial hypothesis (about how logistical challenges lay at the heart of the problem). As we have learned from other case studies in this series, integrating other stakeholders and evidence from the beginning in a truly open and flexible manner—not just to evaluate the effectiveness of a hypothesized solution but also to reframe how the question is actually asked—might have saved FUEL time and other valuable resources.

Through flexible, committed funding, FUEL was able to weather the periodic setbacks it encountered. The school nutrition program ultimately reached significant national scale, and FUEL has expanded its collaboration with the South African government into grappling with other key challenges in the education system.
Stakeholder Map

This stakeholder map is a visual representation of the major stakeholders involved with this project. The importance of each of the actors is defined by their relative size, and their proximity to the center of the project. Their role is defined by the color; multiple colors indicate multiple roles. Primary relationships, denoted by solid lines, indicate the most directly significant relationships while secondary relationships, denoted by dashed lines, indicate indirect, but influential relationships. Actors not connected by lines are still involved with the project, but less directly.

NSNP stands for National School Nutrition Programme.
Timeline

- 2002: FUEL founded
- 2003: NSNP focused on primary schools
- 2006: FUEL begins meetings with DOE, NSNP
- 2007: National system mapping
- 2008: Provincial system mapping
- 2009: Baseline field study
- 2010: Pilot study results shared
- 2011: MRR in all provinces
- 2012: FUEL has national workshops
- 2013: FUEL formulates exit strategy
- 2014: MRR PILOT
- 2015: ADOPTION
- 2016: Evidence generated by the project
- 2017: Evidence from outside the project is being incorporated
- 2018: A change in policy or significant policy decision influenced the project
South Africa is in the process of scaling MMR nationally.

**Adoption of adapted MRR in all districts**

**ADOPTION (SCALE)**

Failure of top down approach

**EVALUATION**

**Top down logistics**

**PILOT**

**Focus on logistics**

**SOLUTION FRAMING**

**EVALUATION**

**Northwest Monitoring, Reporting, + Responding (MRR)**

**PILOT**

**Northwest Integration of MMR and hiring**

**PILOT**

**MRR field study**

**EVALUATION**

**Focus on participant accountability**

**SOLUTION RE-FRAMING**

**EVALUATION**

**Food distribution problem**

**PROBLEM FRAMING**

**Northwest Monitoring, Reporting, + Responding (MRR)**

**PILOT**

**MRR field study**

**EVALUATION**

**Focus on logistics**

**SOLUTION FRAMING**

**EVALUATION**

**Adoption of adapted MRR in all districts**

**ADOPTION (SCALE)**

Failure of top down approach

**EVALUATION**
The research design for the Evidence in Practice project consisted of three broad components. First, we conducted expert interviews (31) with individuals who had spent a significant portion of their professional lives attempting, researching, or promoting the integration of evidence into development practice.\(^A_1\) This included academics, government officials, foundation program officers, NGO practitioners, and think-tank directors. To identify these experts, we first contacted individuals who had either published extensively and prominently on the topic or who had actively funded research or programs with the explicit goal of integrating evidence into practice. From this first set of experts we conducted snowball sampling until we reached a saturation point.\(^A_2\) This initial set of interviews informed and directed the next two components, as they resulted in an initial map of the relevant stakeholders in the “evidence-to-practice ecosystem” and the hypothesized and actual paths that seemed to link them together.

Second, we conducted a matched comparison of eight cases of development programs or interventions where rigorous evidence was integrated with varying degrees of effectiveness. These cases were matched on structural, geographic, and programmatic characteristics—as well as on the extent to which evidence had informed practices—to better identify the critical factors that allowed actors in certain cases, and not others, to integrate rigorous evidence into practice.\(^A_3\) This matching process led us to identify pairs of cases across four different countries, leveraging temporal and cross-sectional variation between them as seen in table A2.

\(^A_1\) By development practice, we mean the work of government actors, NGOs, and others who are responsible for designing and executing development projects and programs.

\(^A_2\) Data saturation is difficult to define and is dependent on the field of study. In this case, we defined saturation as the moment when, in a sequence of several expert interviews, no interviewee gave us information that we had not encountered before.

For each case, we first identified, through existing literature and interviews with subject experts, a series of key informants who had detailed knowledge of the case’s history and protagonists. These initial interviews with case experts led to the creation of a detailed actor/stakeholder map for each case, where we identified the key stakeholder groups that either participated in or were affected by the program, as well as the specific individuals who played an active role in the program’s evolution. These stakeholder maps were validated with several informants for each of the cases. We then conducted interviews with each of the key individuals across stakeholder groups. Interviewees were asked to relate chronologies of objective events, behaviors, choices at critical junctures, and facts of the processes described. In every instance, the goal was to identify the individuals responsible for the particular evolution of a case, as well as the specific tactics they employed throughout the process, to better understand the rationale behind their decisions as well as the factors that led them to succeed or fail. In total, we conducted 161 interviews across the eight cases. Interviews were complemented with a wealth of archival information including media articles, private documents (donor reports, internal presentations and communications, etc.), and public documents (announcements, academic articles, editorial pieces). These data were used to trace the chronological list of events for the overall development of each case. Each storyline was developed in an extensive document that established the causal links described by the subjects and ensuring a balanced consideration of different stakeholders.

The third component, conducted in parallel to the eight case studies, consisted of interviews with prototypical representatives of each of the stakeholder groups, or individuals who would clearly describe the typical experience of enacting a particular stakeholder role. Using the stakeholder map and initial hypotheses as starting points, this stage focused on the dynamics that shape the interactions between stakeholder categories. The work consisted of 34 in-depth interviews with representative actors from each stakeholder group. The interviews focused on each individual’s needs, assumptions, operational constraints, main concerns, professional and ideological backgrounds, timelines, and aspirations—especially concerning the development, dissemination, and use of novel evidence in development practice. This in-depth analysis resulted in a more nuanced and detailed stakeholder and system map that more clearly identified both breakdown points and paths of connection that hinder and facilitate the exchange of knowledge and information across stakeholder groups, as well as a refined system map that more clearly identified both breakdown points and paths of connection that hinder and facilitate the exchange of knowledge and information across stakeholder groups, as well as a refined system map that more clearly identified both breakdown points and paths of connection that hinder and facilitate the exchange of knowledge and information across stakeholder groups, as well as a refined system map that more clearly identified both breakdown points and paths of connection that hinder and facilitate the exchange of knowledge and information across stakeholder groups, as well as a refined

---

**Table A1. Expert Interviews**

<table>
<thead>
<tr>
<th>Phase 1: February 2015 – May 2016</th>
<th>Researchers</th>
<th>Funders</th>
<th>Intermediaries</th>
<th>Policymakers</th>
<th>Implementers</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>10</td>
<td>8</td>
<td>6</td>
<td>2</td>
<td>5</td>
<td>31</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Phase 2: September 2016 – June 2017</th>
<th>Researchers</th>
<th>Funders</th>
<th>Intermediaries</th>
<th>Policymakers</th>
<th>Implementers</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>10</td>
<td>7</td>
<td>6</td>
<td>3</td>
<td>8</td>
<td>34</td>
</tr>
</tbody>
</table>

---


A6 Ibid.
### Table A2: Case Studies

<table>
<thead>
<tr>
<th>Country/Program</th>
<th>Description</th>
<th>Dates of Intervention</th>
<th>Number of Interviews</th>
<th>Primary Stakeholders</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>South Africa</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Collaborative Analysis of Labor Intervention Effectiveness</td>
<td>Employment program introducing new elements to vocational training</td>
<td>2011 – 2016</td>
<td>42</td>
<td>Government, Researchers</td>
</tr>
<tr>
<td>FUEL: Feed, Uplift, Educate, Love</td>
<td>School nutrition program</td>
<td>2007 – present</td>
<td></td>
<td>NGO</td>
</tr>
<tr>
<td><strong>Ghana</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Teacher Community Assistant Initiative</td>
<td>Remedial education program for primary school children in reading and math</td>
<td>2010 – 2013</td>
<td>30</td>
<td>Researchers, Government</td>
</tr>
<tr>
<td>Graduating the Ultra Poor</td>
<td>Poverty alleviation program integrating elements of social protection,</td>
<td>2010 – 2013</td>
<td></td>
<td>Researchers, NGO</td>
</tr>
<tr>
<td></td>
<td>livelihoods development, and financial services</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>India</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Teaching at the Right Level</td>
<td>Remedial education program for primary school children in reading and math</td>
<td>2001 – present</td>
<td>51</td>
<td>NGO, Researchers, Government</td>
</tr>
<tr>
<td>AQUA+</td>
<td>Water purification drops for retail sale</td>
<td>2010 – present</td>
<td></td>
<td>NGO</td>
</tr>
<tr>
<td><strong>Mexico</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Progresa</td>
<td>Oportunidades</td>
<td>Poverty alleviation program using conditional cash transfers</td>
<td>1997 – present</td>
<td>38</td>
</tr>
<tr>
<td>Programa Primer Empleo</td>
<td>Employment program using government incentives for the private sector</td>
<td>2007 – 2012</td>
<td></td>
<td>Government</td>
</tr>
</tbody>
</table>
set of hypotheses about the breakdown of communication and about possible interventions to solve it.

Across the three components, we conducted a total of 226 interviews. All interviews were in-depth and semi-structured, with an average length of around 90 minutes (minimum of 60, maximum of over 120). Around two-thirds of them were done in person and the rest were conducted remotely. All interviews were recorded and transcribed verbatim.

Data analysis was conducted in several stages. Each of the 226 interview transcripts was coded extensively to identify first-order concepts related to the integration of evidence into development practice. First-order concepts include “concerns about reputation” or “short-term decision-making”. This required multiple readings of interview transcripts, field notes, and archival data to associate nearly every passage of text with one or more codes. These codes were then grouped into second-order themes, always contrasting them with current research on the integration of evidence into practice. Second order themes included “incentive structures” or “timing misalignments”, each of which was developed extensively in a memo that explored the characteristics, tensions, and contradictions of each theme. In stage three, we mapped the codes to each of our case narratives to detect patterns of activities, constraints, and decisions that defined the evolution of each case at critical junctures. This allowed us to identify similarities and discrepancies across cases, as well as to create comparable counterfactuals that could account for differing outcomes.

In stage four, we created process maps, concept maps, data tables, and detailed case synopses that linked key challenges, events, and decisions to the specific alternative tactics employed by actors and then to their subsequent consequences for the development program or intervention in question. This final set of analyses revealed a somewhat consistent set of factors faced at comparable stages by actors across our different settings. Throughout our analysis, we iterated between emerging insights, existing theory, and matched comparisons across cases to identify the mechanisms that operated at critical junctures.

It is worth mentioning that, at two moments of the project (the first after our first set of expert interviews was over and the second after the completion of our initial case narratives) we hosted a workshop with two different groups of highly experienced representatives from each of the stakeholder groups. During these workshops, we discussed our emerging findings and we gathered additional, essential insights from participants. The workshops served to validate and deepen our understanding of emerging insights.

---


A8 We ensured consistency in coding across the different cases and authors through several mechanisms, including: a) a selection of interviews was coded by two or more coders, after which they reviewed discrepancies and agreed on their resolution, b) a common project book where all the codes were collectively kept, aggregated, and analyzed, c) a weekly meeting to review coding process and to develop a joint coding standard, d) memos were developed jointly, with contribution from and verification by the different team members, among others. Access here.