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Positive Deviance: A Non-Normative Approach to Health and Risk Messaging

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Summary and Keywords

The Positive Deviance (PD) approach is based on the premise that every community has individuals or groups whose uncommon behaviors and strategies enable them to find better solutions to problems than their peers although everyone has access to the same resources and challenges. In contrast to traditional problem-solving approaches that begin with an expert-driven analysis of “what is not working” with people—their explicit needs, deficits, problems, and risks—followed by attempts to plug those gaps, the PD approach focuses on identifying “what is working.” PD offers a systematic framework to identify assets, indigenous knowledge, and home-grown solutions, and to amplify them for wider adoption.

The PD approach was operationalized and systematized in the early 1990s in Vietnam to address malnutrition. At the time, 65% of children under five were malnourished. Instead of looking for the causes and applying best practices, PD pioneers looked for children from very poor families who were well-nourished. Through community-led efforts, they determined the existence of positive deviants, identified their behaviors and strategies, and amplified them. The process was replicated across 14 villages—each identifying its own batch of local practices—and malnutrition decreased by 85%. These actions led to PD as we know it today in the form of the “6 Ds”: Define, Determine, Discover, Design, Discern, and Disseminate.

PD has been used widely to address a large number of intractable social problems—many of them dealing with health and risk: reducing endemic malnutrition, decreasing neonatal and maternal mortality, reducing goiter and diseases of micronutrient deficiency, boosting organ transplantation rates and cancer screenings, increasing mental well-being and psychological resilience, preventing and controlling malaria and Chagas, and reducing hospital-acquired infections in healthcare.

From 2004 to 2008, six U.S. hospitals pioneered the use of PD to address the growing incidence of infections caused by the antibiotic resistant bacteria Methicillin-resistant *Staphylococcus aureus* (MRSA). PD was used to identify and amplify evidence-based infection prevention practices. Pilot outcomes included a 73% average reduction in healthcare-associated MRSA infections units and a subsequent decrease of between 33 and 84% at the different hospitals.

The PD approach to problem-solving holds important implications for public health scholars and practitioners, risk communicators, and message designers. The cases of Vietnam and one of the pilot hospitals are used to illustrate the ways that through language- and action-based strategies PD challenges traditional risk and health messaging, proposing instead an asset-based, participatory, and sustainable framework.

Keywords: Positive Deviance, strengths and assets, indigenous solutions, healthcare-associated infections, participatory design, health and risk message design and processing

The Positive Deviance (PD) approach to problem-solving, which holds important implications for public health scholars and practitioners, risk communicators, and message designers, is described and analyzed. In contrast to traditional problem-solving approaches that begin with an expert-driven analysis of “what is not working” with people, or their explicit needs, deficits, problems, and risks, followed by attempts to plug those gaps, the PD approach focuses on identifying “what is working,” or assets, indigenous knowledge, and homegrown solutions, and on amplifying these solutions for wider adoption. PD is part of a larger movement in the social sciences toward a much needed positive, asset-based, or social turn (see REVIEW OF THE LITERATURE).

A Sufi tale about the pitfalls of expert-driven problem-solving is invoked to illustrate the tenets of the PD approach. The successful application of the PD approach in Vietnam in the 1990s to combat malnutrition and the key PD intervention steps are examined. The application of PD in the reduction of healthcare-associated infections (HAI) in the United States is discussed, focusing on Methicillin-resistant *Staphylococcus aureus* (MRSA)—a devious, invisible killer of thousands of unsuspecting patients. Implications that the PD approach holds for health and risk communicators and message designers are explored.

Tenets of the Positive Deviance Approach

A Sufi tale is invoked to depict narrative understanding of the PD approach. In one of his hundreds of guises, the mystical Sufi character Nasruddin appears on earth as a smuggler. He would arrive at the customs checkpoint each day leading a herd of donkeys. The customs inspector would feverishly turn the baskets hanging on the donkeys upside down to check the contents, hoping to nail Nasruddin in an act of wrongdoing. He,

however, never found anything of interest and hence had little choice but to let the smuggler pass through.

Years went by, and Nasruddin's legend as a smuggler spread while the inspector grew ever more frustrated. One day, after Nasruddin and the inspector had retired from their respective occupations, their paths crossed.

The former inspector pleaded, "Tell me, Nasruddin. What were you smuggling?"

"Donkeys," Nasruddin said.

Nasruddin's donkey story holds the proverbial key to grasping the underpinnings of the PD approach. Often the solutions to highly intractable problems stare us in the face but remain invisible in plain sight—out of an expert's frame, radar, and range.

What prevented the customs officer from seeing Nasruddin's donkeys? Part of the answer lies in the bounded rationality of an expert's mind that selectively processes what is meaningful and relevant, that is, inattentional blindness (March & Simon, 1958; Czarniawska, 2004; Mack & Rock, 1998). Burke (1984) called this "trained incapacity," a state where one's expertise and abilities function as constraints. Bateson (1972) and Goffman (1974) would argue that the custom officer's frame, guided by selective representations, perceptions, and interpretations of what constitutes contraband, specified the boundaries of what was visible or invisible. The baskets were visible; the donkeys were not (Singhal & Bjurstrom, 2015)!

So, how can one purposely, systematically discover Nasruddin's donkeys? The PD approach shows the way.

The PD approach is based on the premise that every community has individuals or groups whose uncommon behaviors and strategies enable them to find better solutions to problems than their peers although everyone has access to the same resources and challenges (Pascale & Sternin, 2005; Pascale, Sternin, & Sternin, 2010; Singhal & Dura, 2009). However, these individuals, akin to Nasruddin's donkeys, are hidden from plain view. Consider a nurse who uses her "knuckle" (not her fingertip) to press the hospital elevator button, and a patient who has figured out a way (using winks and nods) to let medical personnel know that they need to wash their hands before touching him. In both cases, these small, non-normative behaviors reduce the risk of spreading deadly infections, saving patients' lives (Singhal, Buscell, & Lindberg, 2010, 2014). However, such micro-behaviors are ordinarily invisible to others, especially to expert change agents, and thus rarely inform health and risk message design.

In the hospital scenario, the nurse and the patient represent "deviants" because their uncommon behaviors are not the norm; they are "positive" deviants because they have found ways to address the problem effectively, while most others have not (Singhal, 2013). By focusing on "what is working," the PD approach relies on unearthing the wisdom that lies hidden with ordinary people (or "unusual suspects") and amplifying it in a process

that leads to sustainable organizational and community transformation (Singhal & Bjurstrom, 2015). The various steps in the PD process are illustrated by discussing its success in combating malnutrition in Vietnam.

Solving Malnutrition in Vietnam¹

In 1990, Save the Children U.S. sent Jerry and Monique Sternin to Vietnam to implement a large-scale program to combat childhood malnutrition. With 65% of all Vietnamese children under the age of five malnourished, Vietnamese officials challenged the Sternins to come up with a sustainable solution, and to show positive results within six months.

Tasked with the impossible, the Sternins wondered if the concept of positive deviance, codified by Tufts University nutrition professor Marian Zeitlin, might hold promise. Zeitlin was investigating why some children in poor households were better nourished than others (Zeitlin, Ghassemi, & Mansour, 1990). What were they doing that others were not?

Because childhood malnutrition rates were high in Quong Xuong District south of Hanoi, four of its village communities were selected for a nutrition survey. Some 2,000 children under the age of three were weighed and their locations mapped.

The Sternins posed the quintessential “what is working” PD question: *Are there any well-nourished children who come from very, very poor families* (Singhal, Sternin, & Dura, 2009)?

The response: Yes.

Indeed, there were some children from very poor families who were well-nourished.

Those who had managed to avoid malnutrition without access to any special resources represented the positive deviants.

Through a process of community-led self-discovery, it became apparent that the PD families were practicing a few simple behaviors that others were not:

- Family members collected tiny shrimps and crabs from paddy fields and added them to their children’s meals. These foods are rich in protein and minerals.
- Family members added greens of sweet potato plants to their children’s meals. These greens are loaded with micronutrients. While these foods were accessible to everyone, most community members believed they were inappropriate for young children.
- PD mothers and caregivers were feeding their children smaller meals three to four times a day, rather than the customary two big meals twice a day.

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- PD mothers and caregivers were actively feeding their children, rather than placing food in front of them, making sure no food was wasted.

After some trial and error, a two-week nutrition program was designed in each of the four intervention villages. Caregivers whose children were malnourished were asked to forage for shrimps, crabs, and sweet potato greens. The focus was not on information-transfer, but rather on action, practice, and embodied experience.

In the company of positive deviants, non-PD caregivers of malnourished children learned how to cook new recipes using the foraged ingredients. These caregivers practiced the behaviors that the PD families had discovered on their own.

Before feeding their children, mothers weighed them. No food was wasted as the children were actively fed. Upon returning home, the non-PD caregivers were encouraged to feed their children three or four small meals a day instead of the traditional two meals.

Such feeding and monitoring continued throughout the two-week program. Caregivers could actually see their children becoming noticeably healthier. The scales were tipping!

Then the project expanded to another 10 adjacent communities. Community members engaged in a process of self-discovering the PD behaviors, as opposed to importing them from neighboring communities. The process of self-discovery was found to be as important as the actual behaviors that were uncovered.

Research showed that malnutrition decreased by an amazing 85% in the first 14 PD communities. The program was scaled up by building a “living university” around these 14 PD communities. Teams from other communities with high rates of malnutrition spent up to two weeks directly experiencing the essential elements of the PD process. When they returned home, they would implement the PD nutrition program in at least two local communities.

Through this lateral expansion, the PD intervention spread nationally, helping over 2.2 million people improve their nutritional status, including over 500,000 children (Pascale, Sternin, & Sternin, 2010). A later study, conducted four years after the program ended, showed that older children and their younger siblings in PD communities continued to be better nourished, demonstrating the acceptability, affordability, and sustainability of the PD intervention (Mackintosh, Marsh, & Schroeder, 2002).

The Vietnam case illustrates the six-step process that characterizes a PD intervention. These steps, in whole or part, continue to guide the design and implementation of the PD approach to address social problems.

Table 1. The PD process: “The 6 Ds”	
6 “Ds” of PD	Illustrations from Vietnam Case
1. Define the Problem	<ul style="list-style-type: none"> - Baseline data provided by Vietnamese officials: 65% of children under the age of 5 were malnourished
2. Determine Existence of Statistical Outliers	<ul style="list-style-type: none"> - 2,000 children were weighed by a community-led group - Identified some children from very poor families who were well-nourished and plotted their locations on a map
3. Discover Uncommon but Replicable Behaviors and Practices	<ul style="list-style-type: none"> - Community-led self-discovery involved interviews and observations to discover PD behaviors and strategies: What were PD families doing that other families were not?
4. Design Intervention	<ul style="list-style-type: none"> - A two-week action-based nutrition program was designed: PD caregivers taught non-PD caregivers their strategies - Non-PD caregivers practiced the behaviors
5. Discern Effectiveness	<ul style="list-style-type: none"> - Feeding and monitoring continued—families could see progressive weight gain during the intervention
6. Disseminate	<ul style="list-style-type: none"> - The project expanded to 10 adjacent communities - Malnutrition decreased by 85% in 14 PD communities - The PD intervention spread nationally, helping 2.2 million people (500,000 children) - Four years later, a study confirmed sustained nutrition status

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The systematization of the PD steps by Jerry and Monique Sternin in the rice fields of Vietnam (see Table 1) greatly aided the dissemination of the PD approach to many geographies (over 50 countries) to solve a large number of intractable social problems: reducing endemic malnutrition, combating child marriage, decreasing neonatal and maternal mortality, reducing goiter and diseases of micronutrient deficiency, reducing hospital-acquired infections in healthcare, increasing educational success, reducing sex trafficking and reintegrating returned child soldiers, boosting organ transplantation rates and cancer screenings, increasing mental well-being and psychological resilience, preventing and controlling malaria and Chagas, and reducing corruption and extortion (Singhal, FORTHCOMING). Jerry and Monique Sternin, championed by Save the Children and other global NGOs, led the charge on the dissemination of the PD approach.

Positive Deviance for MRSA Prevention and Control

In 2004, Jerry Sternin spoke about the PD approach in a complexity science and healthcare systems improvement workshop in Durham, New Hampshire. His talk on Nasruddin's hidden donkeys and the Vietnamese shrimps and crabs piqued the curiosity of several hospital CEOs interested in solving complex adaptive problems such as non-reconciliation of medications by patients after hospitalization, non-compliance of hand hygiene protocols by hospital staff, and the growing incidence of infections caused by the antibiotic resistant bacteria Methicillin-resistant *Staphylococcus aureus* (MRSA). These problems are referred to as "complex adaptive" as (1) they do not have simple technical fixes, and (2) their trajectories are often shaped by the dynamic and hierarchical patterns of interactions among participants, where individual and collective behavior emerges and self-organizes in unpredictable ways (Zimmerman, Lindberg, & Plsek, 2001; Singhal, Buscell, & Lindberg, 2014). In complex adaptive systems, problems that can be addressed through a seemingly simple technical fix, such as hand hygiene in the case of healthcare-associated infections (HAI) prevention, are woven into an intricate milieu. For instance, in hospitals where hand hygiene is crucial and presumably within everyone's reach, certain complex situations prevent proper protocol: it can be very hard for a nurse or a junior surgical resident to tell the chief surgeon to do a glove change after silencing his or her beeper in the operating room. Because of the complexity associated with initiating such conversations, for example, across hierarchical lines, and the dynamic unpredictability of their outcomes, millions of patients in U.S. hospitals contract infections annually and tens of thousands die.

With guidance and coaching from Jerry and Monique Sternin, Waterbury Hospital in Connecticut and the VA Pittsburgh Healthcare Systems (VAPHS) pioneered the PD approach in U.S. healthcare in late 2004. Early success at Waterbury with increased rates of medication reconciliation (Singhal, Buscell, & Lindberg, 2010) and at the VAPHS in reduction of MRSA infections led to a collaborative effort involving six pilot hospitals (including the VAPHS), Jerry and Monique Sternin, Plexus Institute (an institutional leader in the science of complexity), and the Centers for Disease Control and Prevention (CDC).

In this project (from 2005 to 2008), the six pilot hospitals tackled MRSA as a behavioral and social problem, implementing the various PD steps (see Table 1), improvising as needed to suit the peculiarities of local healthcare contexts. Individual practices of doctors, nurses, patients, chaplains, transporters, and other hospital staff that contributed to MRSA prevention and reduction were discovered, and enabling conditions were created for them to be amplified within and across hospital units. The focus was on identifying and amplifying evidence-based infection prevention practices, including hand hygiene before and after every patient encounter, gowning and gloving, and adherence to

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isolation protocols for patients who tested positively for MRSA (Lindberg, Downham, Buscell, Jones, Peterson, & Krebs, 2013). To understand how the PD process was implemented for MRSA prevention and control in one of the pilot hospitals, and how it was subsequently scaled, it would be instructive to visit the experience of the VA Pittsburgh Healthcare Systems (VAPHS).

The VAPHS Experience with Positive Deviance²

For several years prior to the arrival of the PD approach at the VAPHS in 2004, the leadership at VAPHS was deeply concerned about the rapidly increasing risk posed by HAI, specifically MRSA, for patients, family members, and hospital staff. Although from a risk communication perspective, HAI facts are chilling, surprisingly most patients and family members had not heard of HAI or their debilitating outcomes, and even if they had a vague idea, they perceived the risk of acquiring an infection as being small. The aura of white sheets, pervasive sanitizers, gloves, and gowns masked the risks of a devious and invisible super bug at VAPHS (Singhal & Greiner, 2007). This perception is fairly common nationwide. Few patients know that MRSA infections are resistant to common antibiotics but most physicians in the United States do not check for MRSA before prescribing antibiotics. Among HAI, MRSA infections increased 32-fold between 1976 and 2004. Hand hygiene studies in U.S. hospitals, conducted between 1994 and 2000, showed adherence rates ranging from 29% to 48%. So, most encounters between healthcare providers and patients in U.S. hospitals carry a high risk of transmission. MRSA is transmitted through skin-to-skin contact or shared personal items. A physician's tie, white coat, or stethoscope can pick up MRSA and serve as a potent transmission vector. Equipment shared by patients in physical therapy, newspapers in a hospital library, or the chaplain's Bible are all vectors. The saving grace: MRSA is a preventable infection and adherence to simple hand hygiene, gloving, and gowning protocols can drastically reduce the incidence MRSA transmission.

A variety of PD processes were implemented at the VAPHS with the belief that wisdom and solutions to prevent MRSA existed with front-line staff, albeit hidden from plain view. Specific PD experiences at the VAPHS with a diverse set of front-line actors—MRSA staff, patients, nurses, doctors, and housekeepers—that helped make the invisible more visible are detailed.

When PD was introduced at the VAPHS, MRSA Coordinator Heidi Walker conceived of the "macaroni MRSA routine" at the VAPHS' Heinz healthcare facility. Heidi purchased a large bag of uncooked macaroni and had neighbor kids count the number of individual pieces it contained. Estimating that 21 bags would contain about 100,000 pieces, she purchased that many bags and loaded them on to a gurney. Gathering a curious audience of patients, nurses, doctors, and other staff persons, Heidi would first provide basic information about MRSA and hospital-acquired infections (HAIs), and then tear open a bag, scoop up a handful of macaroni, and drop the uncooked pieces into an empty plastic bowl one-by-one. While so doing, she would tell the group that each piece represented a human life lost as a result of HAI. As the pieces clattered in to the bowl, Heidi would point to the 21 macaroni bags on the gurney, emphasizing that they contained a total of 100,000 pieces—the total number of lives lost each year to HAI at that time in U.S. hospitals. In 2004, about 19,000 of these were deaths due to MRSA—four full bags of macaroni.

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The PD process helped the VAPHS team discover the wisdom of Darryl, a 30-something MRSA-infected patient, who had come up with an ingenious strategy to ensure that attending nurses and doctors washed their hands before touching him. When doctors or nurses entered his room and did not wash their hands, Darryl refused to make eye contact with them. Instead he just kept looking at the sink. If they did not get the message, Darryl would playfully—with a wink and a nod—look back at them, and then back at the sink, until they got the message. While in most U.S. hospitals such a patient-instigated routine may be construed as rude and invite reprisals, Darryl employed a set of simple positively deviant nonverbal cues to politely convey his point. Further, Darryl shared his strategy to elicit hand hygiene compliance with dozens of fellow veterans. The trick Darryl noted was to sport a warm smile when looking at the sink. A smirk could backfire. If one did not wish to look at the sink, Darryl suggested that a simple poster be designed with the words “Patients, you have the right to clean hands” and that poster could hang in every patient room. In essence, the PD process not only helped the VAPHS discover Darryl’s hidden wisdom—that each patient embodied the potentiality and agency for self-protection—but also offered a simple process to amplify it hospital-wide.

Through the PD process, the VAPHS team also came across nurse Kathleen Risa’s positively deviant anti-MRSA PD act: “the knuckle.” Nurse Risa pushed the elevator button at VAPHS with her knuckle, not a fingertip, which is likely a more potent vector of MRSA transfer. Nurse Risa knew that a computer keyboard (for instance, at a nurses’ station) represents a dangerous vector of MRSA transmission. Imagine one keyboard with a dozen people, each with ten fingertips, 105 computer keys, and hundreds of daily entries—a MRSA minefield! Similarly, one can do the math for the MRSA transmission potential of a panel of buttons on multiple elevator cars—each used by hundreds of people, around-the-clock, day after day. Once identified, Nurse Risa’s PD practice of “knuckling” was amplified through conversations and demonstrations. Interestingly, at the time of these demonstrations, other homegrown anti-pathogen strategies surfaced: For instance, the “inside jacket gloving” technique in which the inside of a jacket is used to (un)lock doors of toilet stalls; the “foot pedal flushing” maneuver in which the foot is used as a pedal to flush the toilet; and the “elbow side-arm swivel” to shut off the water faucet. These “homegrown” strategies for combating MRSA and other pathogens are just a few among hundreds of staff-developed innovations being implemented at the VAPHS.

The PD process also helped illuminate the novel infection-control practice of Dr. Bonita Hubicz during a “code red” alert. A MRSA-infected patient was sinking rapidly, and while doctors, nurses, respiratory therapists, and others were dashing in from all floors, Dr. Hubicz stood calmly as a sentry outside the patient’s room, dispensing gowns and gloves. Earlier that day, as was her customary practice, Dr. Hubicz picked up 10–12 extra pairs of gloves and saved them in her sanitized pocket. Her experience suggested that it was better to stockpile gloves in her pocket than to scramble for them during a code red. Dr. Hubicz’s practice was non-normative, that is, positively deviant. Similarly, the PD process at the VAPHS helped discover nurses who carried their hand-sanitizers in a

“holster” (clipped to their belt) or as pendants strung around a neck strap. Once such uncommon practices were discovered at the VAPHS, they were vetted internally by frontline staff for ease of replicability and then accordingly amplified.

The PD process led to the growing recognition at VAPHS that MRSA prevention was not just the exclusive domain of experts and infectious disease specialists, but such wisdom was distributed among “unusual suspects,” including housekeeping staff. As novel ideas and practices for MRSA prevention were welcomed, those who previously would have been silent began to voice their ideas. One day, when some staff members (including a doctor and nurses) were talking about cleaning the room of a patient with the C-Diff (*Clostridium Difficile*) bug, Eddie Yates, a housekeeper, stepped forward and said “alcohol won’t work on spores of C-Diff. We have to use Clorox.”

Perhaps one of the most telling outcomes of the PD process at the VAPHS was the patients’ decision to create their own anti-MRSA brochure. The hospital-produced brochure designed by experts was titled “Resistant Bacteria: Methicillin Resistant *Staphylococcus Aureus* and Vancomycin Resistant *Enterococcus*.” The patient-produced brochure was titled “Keeping America’s Veterans Healthy—A guide to MRSA—A simple way to shorten your stay.” Interestingly, both brochures had a section on risk. The patient-produced brochure emphasized that everyone who enters a hospital is at risk of *becoming a MRSA carrier* whereas the hospital-produced brochure noted that healthy people are at very little risk of *getting* an infection with resistant bacteria. Both risk statements are true but each is framed very differently. The patient-produced brochure exhorted veterans to become pro-active in MRSA prevention and was highly credible among other patients because the messages came from fellow veterans. Trusting a fellow soldier, and covering each other’s back, is key to survival in a battlefield, and veterans at the VAPHS applied the same sensibilities to help combat a lurking, invisible, and dangerous enemy.

Outcomes of the PD Pilot

The outcomes of this PD implementation in six hospitals, including the VAPHS, were remarkable: a 73% average reduction in healthcare-associated MRSA infections in pilot units and a subsequent decrease of between 33% and 84% hospital-wide (Lindberg, Norstrand, Munger, DeMarsico, & Buscell, 2009; Singhal, Buscell, & Lindberg, 2010). These early PD ripples spread from the six pilot hospitals to dozens of other hospitals, spurring PD initiatives for hypertension and pain management, palliative care, and falls prevention (Singhal, Buscell, & Lindberg, 2014). Inspired by the impressive results at the VAPHS, the VA implemented a system-wide MRSA prevention program in all of its hospitals and long-term care facilities, utilizing PD as one of its core intervention strategies. The results: VA hospitals showed a 62% decline in MRSA infections in ICUs and a 45% drop in non-ICUs, and in the system’s 122 long-term care facilities, a 36% decrease in MRSA infections was achieved (Jain et al., 2011; Evans et al., 2014).

Implications

What implications does the PD approach hold for health and risk communicators and message designers?

Despite greater emphasis on public inclusion and participation in risk and health communication since the 1980s, information flow in risk situations tends to focus on deficits, remain unilateral, and privilege the role of outside experts, and attend primarily to technical solutions. PD is not a “magic bullet,” but it has the potential to shift or “flip” risk and health communication paradigms. Table 2 offers a side-by-side comparison of salient differences between PD and traditional approaches to health and risk message communication.

Table 2. Differences between traditional and PD risk message design	
Traditional Health and Risk Message Design	PD-Informed Risk Message Design
Deficit Focus: Asks what’s not working and why?	Asset Focus: Asks what’s working, particularly when it shouldn’t be working?
Unilateral Communication: Experts define risk → Experts communicate risk to public stakeholders → Experts design mobilization strategies, sometimes in consultation with stakeholders	Dialogic Communication: Experts and stakeholders co-define risk ← → Experts and stakeholders co-design mobilization strategies
Outside-In Mobilization: External solutions and consultants; risk of “outsider” bias	Inside-Out Mobilization: Leverage existing local resources; built-in local cultural and geographic nuances; emphasis on local ownership
Technical: Privileges the technical aspects of risk, and thus advocates expert-derived technical solutions; only considers evidence-based practices (vetted by scientific, medical, and government authorities)	Complex Adaptive: Sees risk as a behavioral and social problem; facilitates culture change by emphasizing relationships; enables risk-taking, innovation, and peer to peer learning—small things that make a big difference; encourages self-organization

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Perhaps PD's most notable advantage then is that it helps us flip the deficit paradigm by drawing attention to what is working. While deficit-based message construction is necessary insofar as it signifies impending threats, this framing of risk leaves little room for human agency and efficacy; it also obscures the possibilities for change and learning (Ulmer, 2012). By focusing on the "donkeys," assets or strengths in the midst of intractable problems, PD challenges traditional social constructions of risk.

Although risk to one's health may be a material, physical, or psychological threat, language and social mores play an important role in how we understand and perceive it (Beck, 2009; Scott, 2012). In other words, our perception of risk is socially constructed. Social constructions are inevitable, but it is important to recognize that they function in similar ways to the "trained incapacities" discussed earlier. Seeing risk as a social construction allows us to pay greater attention to framing. In other words, "words do matter" in risk and health communication design (Parrott, 1995, 2009). PD gives communicators a toolbox to create greater agency in such situations.

PD also flips the unilateral risk communication model, which is highly expert-centric. That is, experts are the knowledge producers, and members of the public are knowledge consumers. Even when experts attempt to involve public opinion, for example, by using psychometric scales to predict public reactions to risk or by calling town hall meetings, these processes focus on the risk itself—not on a range of other issues such as local or cultural contexts. PD relies on public participation in the process of risk definition through public agreement and understanding of the problem, identification of outliers, and creation and execution of a community mobilization action plan (Arduser, Dura, & Malkowski, 2015; Dura, 2016). The VA Pittsburgh Healthcare Systems (VAPHS) case depicted that MRSA Coordinator Heidi Walker played a crucial role in the hospital community's understanding of the healthcare-associated infections (HAI) problem by using thousands of pieces of macaroni to represent infection cases. The case also showed that solutions to HAI prevention came from nurses, doctors, and even patients.

PD's commitment to dialogic communication, for example, in the co-definition of risk and co-design of mobilization strategies, is directly related to another difference from traditional models: inside-out mobilization. The PD approach, through its 6 Ds, works as a culture-building process that enables local ownership of the problem, the solutions, and project sustainability. In the case of Vietnam, peer-to-peer learning was crucial to fostering credibility about the proposed nutritional solutions. That is, by unearthing locally viable and relevant solutions, PD helped project facilitators avoid the typical "outsider" bias and rejection of foreign best practices. This also happened at the institutional level at VAPHS: community discovery of local PD practices created motivation for grassroots mobilization and change. Looking at outliers offers low-cost innovative solutions that already exist, such as Nurse Risa and her "knuckle" and finding them in local contexts promises greater relevance to local populations by accounting for nuances relative to geographical and cultural practices (Shafique, Edwards, Zegers De Bey, Thavrin, Min, & Roca-Feltrer, 2016).

These small but powerful actions are a testament to the principles of complexity and emergence at work. They speak to communication across hierarchies, self-organization, and trust. Often, because risk plays out in scientific, medical, or environmental issues, solutions tend to be perceived as purely technical. Or they try to separate social factors from technical factors. In attending to the social aspects of risk, PD leverages the implementation of technical solutions. PD created the conditions at the VAPHS for patients to feel they had the agency to say something to staff about hand hygiene and to create their own patient brochure. Thus, it achieved something that an expert-driven, technically focused approach to risk and health message design would never have achieved.

Despite its potential benefits, it is important to note that PD is not a one-size-fits-all approach. PD is best used when other approaches have been exhausted or as a complement to traditional approaches to behavior change—those focused on the “norm” or non-outlier population. Because of its focus on outliers, which is one of its main strengths, PD can be perceived as utopic for ignoring root or systemic causes. While this is not the intention with PD, it can be a pitfall. Thus, it is useful for PD practitioners to keep in mind PD’s specific purpose: PD unearths overlooked behaviors and resources. It can be combined with policy-development and other social change approaches (e.g., social norms, entertainment-education) to maximize impact. Ultimately, these decisions need to be made on a case-by-case basis.

In summary, PD attends to important aspects of problem-solving that other approaches ignore, aspects that are low-cost, immediately actionable, and empowering. The PD cases presented here can help us see the impact that shifts in language and framing can have on risk and health communication. Through its focus on language and action, PD offers risk and health communicators a framework for message design that is more inclusive, dialogic, and also socially just (Dura, 2016)—one that helps us transcend occupational blind spots.

The discussion of the Positive Deviance approach began with an invocation of a Sufi tale. It ends with words of the Chinese philosopher Lao-Tzu, who grasped the essence of the PD approach 2,500 years ago:

Go to the people. Live with them. Learn from them. Love them. Start with what they know. Build with what they have. But with the best leaders, when the work is done, the task accomplished, the people will say “We have done this ourselves.”

Review of the Literature

How do the scholarly threads of the Positive Deviance (PD) approach connect with past and present scholarship in the social and humanistic aspects of health?

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The PD approach is part of a broader, much needed, alternative movement that is emerging in many social science disciplines—psychology, organizational behavior, change management, social work, public health, community organizing, and others—that focuses on identification and amplification of strengths and assets, transcending what hitherto has been past scholarship’s obsession with deficits, needs, risks, and gaps. While still not mainstream, scholarship in the areas of positive leadership (Cameron, 2012), positive psychology (Lopez, Pedrotti, & Snyder, 2015), appreciative inquiry (Cooperrider & Srivastva, 1987), resilience (Ungar, 2012), salutogenesis (Antonovsky, 1996), bright spots (Heath & Heath, 2010), and asset-based community development (Kretzmann & McKnight, 1993) is on the rise.

The PD approach signifies what is being commonly referred to as the “practice turn” in social science scholarship. While scholars often employ an expert frame to focus on decontextualized problems and then communicate decontextualized solutions to practitioners, the PD approach—with its focus on practical problem-solving—exemplifies what represents a welcome practice turn (Knorr Cetina, Schatzki, & von Savigny, 2000). This practice turn seeks to reconcile conventional and universal practices of science with empirical evidence of human agency, distributed wisdom, and situated innovativeness. Simply put, this practice turn represents a move away from being obsessed with *scientific proof*, that is, evidenced-based practice, and valuing *social proof*, that is, practice-based evidence (Singhal & Bjurstrom, 2015).

PD also raises important questions about our cherished understanding and usage of the normal bell curve—the most important distribution in the social sciences. Nassim Taleb, author of *The Black Swan*, has written extensively about the pitfalls of overly relying on the bell curve, especially in complex social arenas. He noted that the bell curve fundamentally glorifies mediocrity, disregarding the promise lurking in large deviations and outliers (Taleb, 2007). By focusing attention on what is most probable, the unusual, the implausible, and the exceptional are routinely ignored. In contrast, in the PD approach, the identification of the “exceptional” represents a starting point, and the normal and normative are of secondary interest.

The PD approach is also part of a growing humanistic movement in scholarship that emphasizes and valorizes the indigenous wisdom and tacit knowledge residing with ordinary people (the “unusual suspects”) and questions the dependence on outside experts.

Primary Sources

The References section lists primary sources. In addition, an excellent source of primary materials—articles, reports, video, and photographs—is the www.positivedeviance.org website.

Links to Digital Materials

An excellent digital source of primary materials—articles, reports, video, and photographs—is the **www.positivedeviance.org** website.

In addition, here are some digital links to video presentations on Positive Deviance available online:

Monique Sternin, TEDx talk—2013.

Arvind Singhal, TEDx talk—2015.

Rare video footage of Jerry Sternin, pioneer of Positive Deviance approach, talking about PD.

A. Singhal on Positive Deviance & Healthcare, Clinton School Distinguished Speaker Series 2011.

Reflections on Positive Deviance by Monique Sternin.

Let Go of the Tiger’s Head, But Hold on to the Tail (PD and Sex Trafficking in Indonesia).

The Music Catches Me and We Rise Again (PD and Reintegration of Returned Abductees in Uganda).

Arvind Singhal on What Is Positive Deviance.

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Notes:

(1.) The Vietnam Positive Deviance case is well documented in Singhal, Sternin, and Dura (2009) and Pascale, Sternin, and Sternin (2010).

(2.) The VAPHS case draws upon Singhal and Greiner (2007, 2011) and Singhal, Buscell, and Lindberg (2010).

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