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ECONOMICS & SOCIETY

An Effective Way to Tackle the Social Causes of Poor Health

by Shreya Kangovi
The new business model for health requires healthcare organizations to address not only medical problems, but social problems like hunger, loneliness, and trauma. That’s because these types of issues — known as the social determinants of health (SDOH) — are key impediments to achieving the outcomes healthcare organizations are now given incentives to deliver.
These social determinants are foreign terrain for many healthcare organizations, but that hasn’t stopped them from entering the space. The number of reported health system-based SDOH programs has grown more than ten-fold in the past decade. This response would signify the kind of change long awaited by social advocates except for one thing: many such programs run a high risk of failure because they lack disciplined planning.

The typical story is that a well-meaning clinician or healthcare executive secures funding to experiment with a SDOH program. Burdened with tight timelines and competing responsibilities, these champions often quickly assemble limited pilot programs around high-level concepts such as leveraging community health workers or building referral platforms. Planning is sacrificed for expediency. And so, healthcare leaders who would never tolerate an amateur approach to drug development are willing to shotgun the development of complex social interventions. Why are we respectful of biomedical discovery and cavalier about social innovation?

Much of the haste around these programs seems enabled by the ubiquitous word “pilot,” which implies that it is acceptable to lower standards or defer planning because future iteration is expected. This overconfident approach has also been enabled by news headlines announcing outsized returns on investment; many exaggerated results are supported by flawed before-after studies measuring nothing more than regression to the mean. (The reality, according to a recent meta-analysis, is that very few SDOH interventions reduce healthcare utilization or costs — but probably because of poor design, not because these programs can’t be effective.)

Taken together, these factors have created hype around SDOH programs that is destructive in the long term; inevitably many programs won’t deliver as promised, and disappointed health care leaders may conclude that none of these programs work.

At the University of Pennsylvania, my team and I have spent the past decade developing IMPaCT, a standardized community health worker program that effectively addresses social determinants of health. We’ve tested IMPaCT in several randomized clinical trials (here’s one) which demonstrate consistent improvements in quality while reducing hospital days by 65%. These outcomes translate into two dollars in return for every dollar invested annually in the program. We believe that the high performance of the IMPaCT model are a direct result of the planning and design thinking we used in its development. Here, we share insights from building IMPaCT and from technical assistance that we’ve offered to help organizations arrive at their own SDOH solutions.

**Start with a small team**

We often see healthcare leaders cede the design of social determinants programs to a clinical committee or community advisory board. While inclusion is essential and refreshing, the pitfalls of design by committee are well known. Organizational dynamics between complex healthcare organizations and social service agencies can be especially fraught. We’ve found that it’s crucial to engage diverse perspectives while investing authority in those with dedicated time and expertise. I
led a five-person working group that included experienced social determinants researchers, a health system leader and a community member.

Define problems crisply

Many leaders — believing SDOH programs are cure-alls — skip the step of problem definition or list dozens of outcomes they expect their program to improve. We listed three to four socially and financially important problems and meaningful outcomes a priori. For example, we focused on improving access to post-hospital primary care because this mattered to low-income patients, and was tied to enhanced provider reimbursement. We also focused on quality and days spent out of the hospital — important for all stakeholders.

Identifying problems and desired outcomes in advance allowed us to “solve for them” in our program design, measure them in clinical trials and then translating improvements into a return on investment.

Understand end-users

While it’s always a good idea to engage end-users in planning, it’s all the more important for SDOH programs. That is because the end-users of these programs — low-income people — often lack voices in healthcare. Some enlightened healthcare leaders engage patients through advisory boards, which is a step in the right direction. However, these boards may be self-selected (the homeless woman with diabetes is unlikely to be on the board) and representation risks may be token.

We interviewed 1,500 low-income patients on porches, hospital bedsides, jails and shelters. We asked them what made it hard to stay healthy and what we should be doing to help. These interviews were audio-taped, transcribed, and analyzed. We used the resulting insights to design IMPaCT. While it is certainly not necessary or feasible for every healthcare organization to interview thousands of patients, a dozen or so conversations can substantially inform program design.

Study past successes and dwell on past failures

Although social determinants programs are fairly new to healthcare, they are not a new concept. Disparities researchers and social scientists have deep expertise in their design, implementation and evaluation. Developing countries are also often far ahead of in the U.S. because of the greater imperatives to provide preventive care and to efficiently spend limited health care dollars.

While planning IMPaCT, we immersed ourselves in the experiences of community health worker programs both in the US and abroad through reading and discussion with experts. We paid particular attention to past failures, which is necessary to help overcome the overconfidence of “believers” who have a blind faith in these programs. Based on the lessons of past community health worker
programs, we built hiring algorithms to minimize staff turnover and created robust supervision to ensure quality.

**Embrace program manuals and “design jams”**

Rapid-cycle innovation is even more of a buzzword than SDOH, yet speedy and iterative evaluations of programs can be hard to do in practice. Often, program designers have conflicting and subjective assessments of what is or is not working in their program. Many programs lack the explicitly written, ex ante, testable goals and hypotheses scientists have used for years to lend discipline to their processes, and often there are no written program protocols. It’s hard to revise what isn’t described or standardized in the first place.

While planning, I drafted program manuals: easy-to-read guides describing how to run a community health worker program like ours. We began our implementation at a very small scale, with just two part-time community health workers. I followed them around for weeks with the manuals in one hand and a red pen in another. When they departed from our protocol, I asked them why and, if their rationale was sound, considered revisions. This process of “designing in-situ” hasn’t ended with the planning stage. We still do periodic manual-guided observation of community health workers in the field. We also have quarterly “design jams,” or meetings that include all 60 team members during which we review and revise manuals.

Treating poverty is probably as hard as — if not harder than — treating cancer or heart disease. We have at least a rudimentary understanding that cancer is fundamentally a genetic disease and that patients with heart failure are sensitive to salt intake. But we have little understanding of how exactly poverty causes poor health or why people die of loneliness. While it is heartening that health systems are now devoting attention to health’s social determinants, they will need the same kind of discipline that has helped them develop biomedical therapies.

These programs don’t have to be perfect when they launch — but if they’re set up to fail, they probably will. That’s why it’s so important to try to get it mostly right from the outset, and to build in programmatic ways to course correct as needed. In addition, the challenges of change management make it harder to fix a broken program than getting it right the first time. Careful planning doesn’t have to be prohibitively time or resource intensive. Our initial planning stage took about six months. As in the biomedical world, timelines can be shortened and outcomes strengthened by using an evidence-based intervention instead of reinventing the wheel.

The stakes of SDOH programs are quickly rising: state Medicaid programs, large insurers and even venture capitalists are investing millions in this space. This money alone won’t solve complex social problems. Years from now, whether we have a hodge-podge of unevenly performing initiatives or a robust system of effective SDOH programs will depend on the careful thought and effort we put in today.
Shreya Kangovi, MD, is the founding executive director of the Penn Center for Community Health Workers and is an assistant professor of medicine at the University of Pennsylvania Perelman School of Medicine. Follow her on Twitter @ShreyaKangovi