Few business meetings are memorable, but there’s one I will never forget. It was in 2010 at the Bill & Melinda Gates Foundation, where I was a relatively new financial manager supporting the global health team. Bill Gates was present. The topic was Gavi, the global alliance that raises funds from international donors to provide vaccines to children in the world’s poorest countries. While that may not sound memorable, something Bill Gates said was.

Fundraising for Gavi was especially tough that year. If its goals weren’t met, millions of children would go unvaccinated. Missing out on the pentavalent vaccine, for example, would leave them vulnerable to five deadly diseases — tetanus, hepatitis B, diphtheria, whooping cough, and Haemophilus influenzae b.

As my colleagues and I discussed the fundraising challenge, no brilliant solutions emerged. Finally, Bill looked around the room and reminded us of the stakes with a single question: “Which kid is going to die?”
I recalled that moment when UNICEF recently announced plans\(^4\) to buy 450 million doses of pentavalent vaccine for distribution to 80 countries, including many where Gavi funds support vaccination programs. The announcement was noteworthy because of the record-low price that UNICEF had negotiated with suppliers — an average of 84 cents per dose, half what the agency currently pays.

This will let vaccination programs continue full bore and free up more than $366 million for other health needs. That’s truly good news.

How it came about can teach us a lesson about reducing inequities in global health. The lesson is that smart, coordinated efforts by governments, international organizations, and impact investors can engage the private sector to better serve the poorest populations.

In 2010, Gavi ultimately hit its fundraising targets. But Bill’s question helped us realize that we needed alternatives to raising more money (which would be difficult) or to vaccinating fewer kids (which would be unacceptable). To buy more lifesaving vaccines with limited donor dollars, we needed prices to come down.

At the time, the Gates Foundation was collaborating with UNICEF and Gavi to improve access to the rotavirus vaccine, which prevents diarrheal disease, the second largest killer of children under the age of 5. We were working on an arrangement to guarantee a vaccine supplier a certain volume of sales for several years in exchange for the supplier’s commitment to produce that much vaccine and to reduce prices for developing countries.

Guarantees like this give suppliers the certainty they need to invest in innovation and expanded production, which lowers per-unit costs. That, in turn, helps expand public health interventions around the world. As the demand for the vaccine rises, more suppliers may enter the market, stimulating further innovation, ensuring a reliable supply, and strengthening price competition. The end result is a healthier and more sustainable market.

Our experiment with the rotavirus vaccine was having its intended effects. So we decided to try a similar strategy with the pentavalent vaccine.

Working again with UNICEF and Gavi, we made a deal with Biological E\(^5\), a vaccine company in Hyderabad, India. We guaranteed that we would compensate the company if it could not sell a certain volume of pentavalent vaccine over a five-year period. This led the company to expand production of the vaccine and sell it significantly below the market price at the time. With these moves by Biological E., Gavi introduced pentavalent in developing countries more widely than any other vaccine.

That attracted new suppliers and set the stage for UNICEF’s recent ingeniously crafted vaccine purchase program. For the first time, UNICEF held a multiround auction instead of making all of its purchases from an initial set of bids. After the first round, the organization published the winning bid prices so all sellers could better understand the competition and sharpen their offers for round two. In that round, the average price for the pentavalent vaccine fell to a historic low.
There’s a small irony in all of this for the Gates Foundation. With more suppliers to choose from, Biological E. was not among the companies UNICEF chose for its 2017 pentavalent vaccine purchases. That means the foundation will likely pay the company for the last year of its volume guarantee, which could be as much as $35 million.

We’re fine with that, and would be happy to pay out much more, if needed, on other guarantees that similarly stimulate innovation in global health, widen access to effective interventions, and benefit important global health programs by freeing up more money through guarantees. Because we believe that volume guarantees are an important tool for stimulating markets to better serve the poor, the Gates Foundation now has $600 million in guarantees in its program-related investments portfolio.

Markets can’t do everything and, when guided only by Adam Smith’s invisible hand, they don’t do nearly enough to reduce the world’s terrible inequities in health and quality of life. But concerted efforts and smart strategies, based on an understanding of economics, can sometimes catalyze sustainable solutions to market failures in global health and beyond.

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**Links**


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