

Behavioral Economics and Shifting Behavior of Patients Towards Better Health

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KEY POINTS . . .

Individual behavior is a key driver of poor health and high health costs

Eighty percent of large employers use incentives to influence health behavior

By taking advantage of typical “decision errors” we can steer people toward healthier behaviors



This is the first of two articles in this issue on the topic of human behavior in making medical decisions. Dr. Volpp discusses several case studies in which behavioral economists and corporate leaders have together tried to maximize employee participation in health behavior improvement programs through incentives. Volpp provides study details on strategies that appear to work best.

Individual behavior is a key driver of poor health and high health costs and it is clear that health behaviors have an impact. Fortunately, motivation science has evolved and we know that people are predictably irrational, that their decisions are affected by present bias, and that emotions and social context play a big role in decision making. By taking advantage of typical ‘decision errors, we can steer people to healthier behaviors.

As behavioral economists we try to figure out what to do to help people improve their unhealthy behaviors, (i.e., smoking and eating disorders) that lead to obesity and cardiovascular disease, we know that providing people with information is necessary, but information alone is usually not sufficient to change behaviors. More proactive measures are required (e.g., incentives). While people may be irrational, they are irrational in predictable ways.

Incentives

Eighty percent of large employers use incentives to influence the health behavior of their employees. This ability has been “turbo charged” by Section 2705 of the 2012 Affordable Care Act that says employers may use 30-50 percent of premiums as penalties or rewards for outcome-based incentives.

Making healthy behaviors easier, less expensive, or even free, does not always provide optimum results. For example, a recent study revealed that adherence to medications in the year following a heart attack is disappointingly low—even when the medications are free.

How to design incentive programs that work to improve healthy behaviors is a work in progress, but we are learning important information from several initiatives.

For example, a recent program demonstrated that shared MD/patient incentives were most effective in reducing LDL cholesterol when patients on one arm of a study took their medications at a higher rate when their doctors were engaged with them. In contrast, patients on the other arm of the study were not so engaged and did not share incentives with their doctors or had no incentives.

Also, a study that offered the incentive of financial rewards if employees gave up smoking found that long-term smoking cessation rates tripled when a group in one study arm was offered a financial incentive.

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Enhanced Active Choice

Defaults sometimes work to put people in a position to behave in healthier ways, but defaults are not always the answer.

For example, a CVS company program turned to “enhanced active choice” to avoid procrastination by customers when it came time to refill their medications. Putting customers on a default medication refill program was not an option because CVS needed a customer’s permission to do this. “Enhanced active choice” was a better solution offered by a “press 1 or 2” option used during customer phone calls made to CVS. If a customer wanted to “opt in” they were asked to press 1: If you would like to be transferred to a Customer Care Representative now. If the customer wanted to “opt out”, they were asked to press 2: If you are not interested. The “Enhanced Active Choice” asked them to Press 1: If you prefer to refill your prescriptions by yourself each time, or to Press 2: If you would prefer us to do it for you automatically.” Enrollments in automatic medication refills doubled using this method.

Wearable and Wireless Devices: Combining Technology with Behavioral Economics to Increase Physical Activity

To aid in healthy behaviors, the number of wearables and wireless devices are proliferating, but this proliferation does not guarantee health improvement. Although technology can offer the opportunity to create healthier habits, people who are high risk are not likely to change behaviors on their own. Those who buy the devices on their own are typically highly motivated and engaged in healthier activities. Combining technology with behavioral economics intervention approaches, such as incentives, may be one way to increase physical activity for those who are not physically active.

For example, in a 13-week intervention, participants in a study (Incentives to Increase Physical Activity Among Overweight and Obese Adults) had a goal of 7000 steps per day and were randomly

assigned to a control group with daily feedback or 1 of 3 financial incentive programs with daily feedback: a gain incentive (\$1.40 given each day the goal was achieved), lottery incentive (daily eligibility [expected value approximately \$1.40] if goal was achieved), or loss incentive (\$42 allocated monthly upfront and \$1.40 removed each day the goal was not achieved). Participants were followed for another 13 weeks with daily performance feedback, but no incentives. The “loss framed incentive” increased by about 50 percent the rate at which people achieved the daily-step goal relative to no incentive.

Conclusion

Behavioral economics suggests that people are predictably irrational. Decisions affected by present bias, loss framing, emotions, social context, inertia, incentive delivery and design, and choice environment are critical in the effort to help people improve their health. ■

Additional information:

The preceding article is based on an address given at the ISPOR 21st International Meeting, 2016, Washington, DC, Second Plenary Session.

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