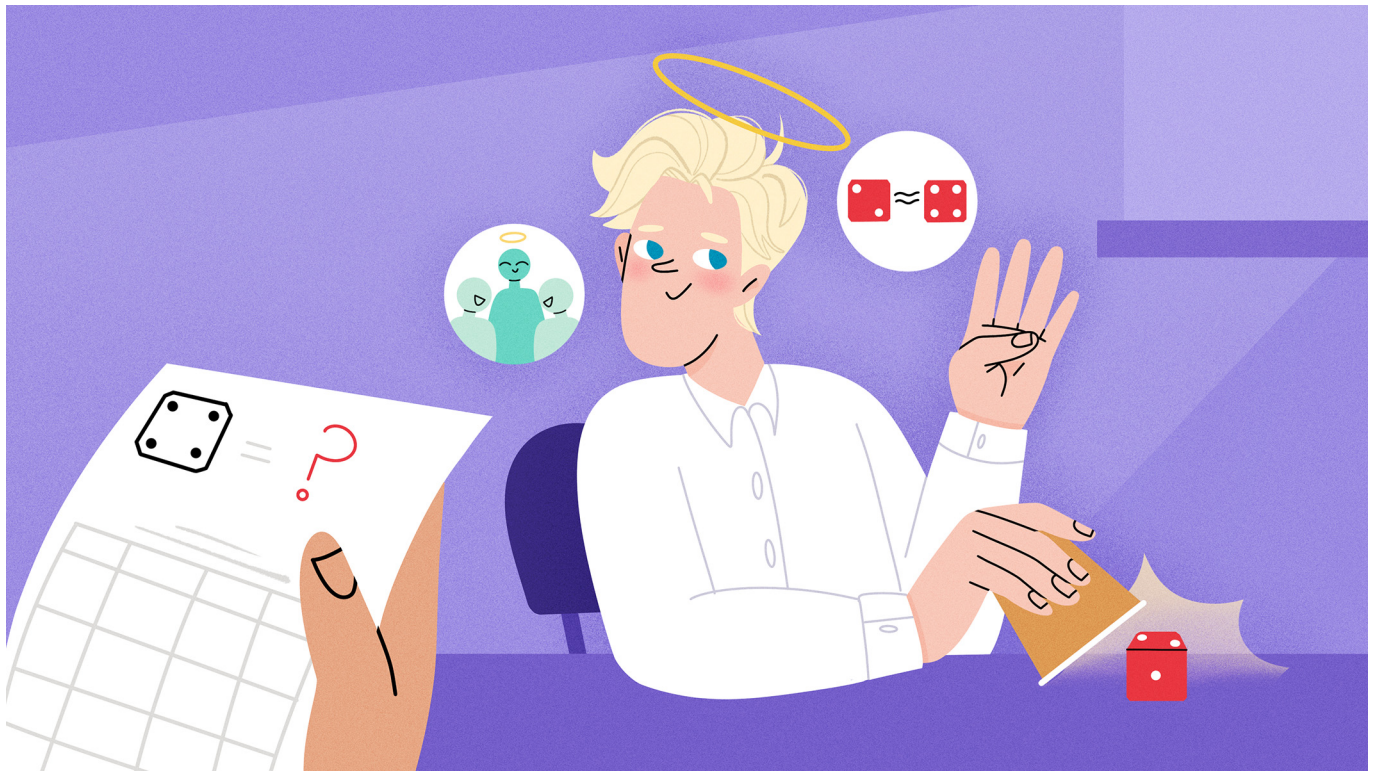




THE TRUTH ABOUT THE LIES WE TELL: A SCIENTIFIC VIEW OF EVERYDAY DECEPTION

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YOUNG REVIEWERS:



ROTEM

AGE: 11

We all know that children and adults sometimes lie—but when do they tend to lie, and to what extent? And how can we even study lies scientifically when people try so hard to hide them? In this article, we present research on lying from both the science lab and the real world. The main findings from psychology and economics show that many people are willing to lie to gain something, like money, but they usually settle for relatively small lies. We explain how people's need to feel like good people in their own eyes and in the eyes of others limits the lies they tell. Finally, we explain how insights from this research can be used to lessen dishonest behavior in the world.

DO PEOPLE LIE?

From a young age, we are taught to tell the truth and not to lie. In the famous children's story Pinocchio, for example, Pinocchio is punished

BEHAVIORAL ECONOMICS

A field that studies how people behave and make decisions in economic contexts, by examining their behavior and relying on insights from experimental work.

PROSOCIAL LIE

A lie intended to help another person. For example, telling a friend that the cookies she made are delicious, even if they are not to your taste, so as not to hurt her feelings.

UNETHICAL BEHAVIOR

Behavior that is considered immoral or forbidden in society, such as lying or stealing, and that may harm other people or society.

time and again for telling lies, until he finally stops lying and becomes a real boy. But do adults and children always tell the truth, or do they sometimes lie when it is to their advantage? And if they do lie, how often do they do so? What kinds of lies do people tend to tell, and under which circumstances do they lie the most? In this article, we review key findings from research in psychology and **behavioral economics** on the tendencies of adults and children to lie.

The first question researchers of dishonesty wish to address is, “do people lie?”. But how can researchers tell? In the story of Pinocchio, each time he tells a lie his nose grows longer. But in real life, liars’ noses do not grow longer, and they try to hide their lies. One way researchers can tell if someone is lying is to simply ask them. For example, in one study, participants were asked to keep a diary listing all the lies they told over several days. It turned out that the participants documented numerous lies, admitting that they lie a few times every day. But the lies they recorded were usually found to be small, harmless ones [1]. For example, people said that they had washed their hands when they had not done so, or complimented a friend’s new shirt even though they did not like it. This last kind of lie is called a **prosocial lie**, which is a lie told with the aim of helping another person (in this case, the friend whose feelings they did not want to hurt).

But can we trust participants’ reports about their own dishonesty? Probably not, because some of them may be hiding information about the kinds of lies they tell. Therefore, it is important for researchers to examine not only what people choose to tell about themselves but also their actual behavior.

HOW CAN LIES BE MEASURED?

To measure lying and **unethical behavior** without affecting the behavior of a liar, researchers have developed some creative experiments. One experiment is known as the die-under-the-cup experiment [2]. Each participant sits alone in a closed room. In front of the participant is a disposable cup with a small hole in the bottom and a regular die. Each participant is asked to cover the die with the cup, shake the die under the cup, peek through the hole, and report the number on the die (Figure 1). Participants are told that the higher the number they report, the higher the bonus they will receive. If they report that they rolled a 1, they will receive 1 dollar. If they report 2, they will receive 2 dollars, and so forth, up to a maximum of 6 dollars. This means that in this experiment, it is worthwhile for participants to report a high number, so they can receive more money. In other words, it is in their interest to lie. Since the participants shake the dice in a closed room with no one else present, they know that only they can see the true result and that no one would know that they had lied.

Figure 1

In the “die-under-the-cup” experiment, participants are asked to roll a die under a cup, peek through the hole in the cup, and report the result. Only the participant can see the true result, which remains completely private. The higher the number the participants report, the more they get paid. The participants’ reports are then compared to the random distribution of numbers obtained when rolling a die. Figure contains images of the author(s) only.

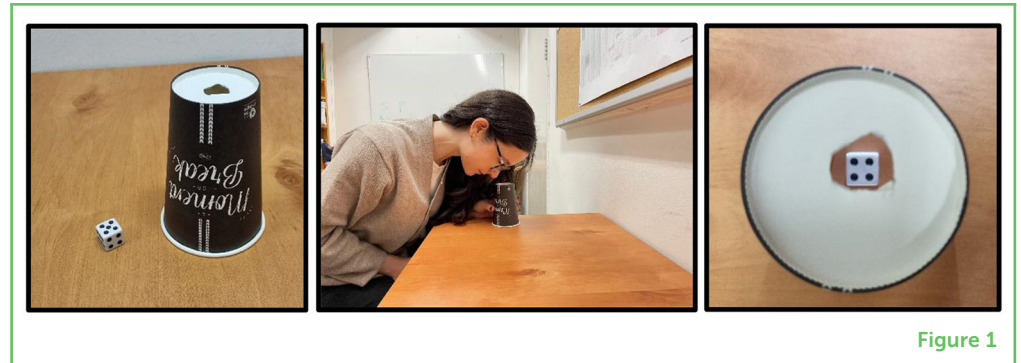


Figure 1

If no one could see the participants’ results, how could the researchers know how many had lied? They relied on simple statistics. With a regular die, the chance of rolling any number from 1 to 6 is the same—exactly one-sixth. Therefore, if a large number of participants throw a die and report the number they really saw, then approximately one-sixth would report the number 1, one-sixth would report 2, and so forth. However, if the participants lied and reported higher numbers (such as 1 or 2). More would report higher numbers (such as 4 or 5). This is what the researchers found. For example, fewer than one-sixth of the participants reported the number 2, but more than one-sixth reported the number 5. This shows that, to earn more money, some participants lied and reported a higher number than they actually rolled (Figure 2).

Figure 2

In the “die-under-the-cup” experiment, 62 participants rolled dice and reported the number they got. The graph shows the percentage of participants who reported each number. The dotted line represents the results we would expect if participants had not lied and had reported the actual numbers they rolled. The results show that participants tended to report more high numbers (which were worth more money) and fewer low numbers. However, the participants did not lie to the maximum extent (many did not report 6).

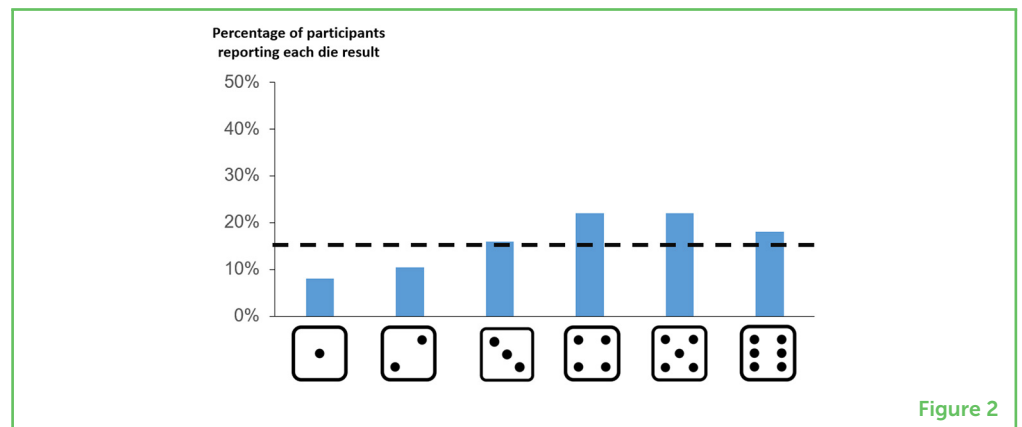


Figure 2

DO CHILDREN ALSO LIE?

Unsurprisingly, children also sometimes lie—especially when it is beneficial for them and when they are not scared of being caught. For example, in the die-under-the-cup experiment, children between the ages of 7 and 10 sometimes reported higher numbers than expected, to get more money. Dishonesty begins at an even younger age. In another study, children between the ages of 2 and 3 were told not to peek at a toy that was placed behind them while the researchers “were

not looking". When the researchers watched the children through a hidden camera, most of the children could not control themselves and peeked at the toy. Additionally, the older the children were, the more likely they were to try to lie and pretend they were not peeking [3].

PEOPLE LIE, BUT NOT TO THE FULL EXTENT

As we saw in the "die-under-the-cup" experiment, participants lied to earn more money by reporting higher numbers than they really rolled. Another finding that stood out in this experiment was that the participants lied to a limited extent. That is, it would be most beneficial for each participant to report that they got a 6 and receive the maximum bonus. Suppose people were only trying to achieve the highest possible profit. In that case, everyone should have reported a 6. However, the experiments showed that only about 20% of the participants reported that they got a 6 (Figure 2). In other words, people limit their lies and do not act only according to what is most economically profitable for them. The researchers concluded that instead of always reporting the highest number, participants usually reported slightly higher numbers than what they rolled. For example, if a participant got a 2, they reported that they got a 3 or 4, but typically not a 6, even though a 6 was more worthwhile. Similar conclusions about people overreporting their outcomes—but to a limited extent—were found in other types of studies, too. Employees who report the number of hours they worked from home add a few hours, but not as many as they could have. Student report that they did slightly better in their assignments than they actually did, but not much more. Why do people limit their dishonesty even when there is no chance of getting caught or punished?

THE ROLE OF SELF-IMAGE IN DISHONESTY

Participants in the dice experiment could have lied, and no one would have known—but that is not entirely true. Someone did know: the participants themselves. According to studies in psychology, it is important for people to keep a positive **self-image**. This means that they want to think of themselves as moral, honest, and good people and not as liars. That is why, when they have the opportunity to lie, people balance the desire to profit from the lie with the desire to maintain a positive self-image. This is expressed in them lying only a little. For example, a participant who rolled a 2 might report that they rolled a 3, but not a 6. Reporting a 6 will threaten their self-image and make them feel like a liar, while by reporting a 3, they can more easily justify to themselves: "Maybe I rolled a 2, but a 2 is only a little different from a 3". The small lie allows the participant to profit more while still feeling good about himself.

SELF-IMAGE

The way each person sees themselves. Am I a good person? Am I honest? We want to think that we are good people, and this influences our behavior.

SOCIAL IMAGE

The way other people see us. Do they think we are good and honest people? We want them to view us in a positive way, and this affects our behavior.

THE ROLE OF SOCIAL IMAGE IN DISHONESTY

In recent years, studies have examined another reason why people lie only a little, even when it pays to lie more: the desire to maintain a positive **social image**. In other words, people want *others* to think they are moral and good [4]. Going back to the die experiment, a participant who rolled a 2 may have reported a 3 rather than a 6 because they were worried that if they reported a 6, the researcher would think they were lying to get the highest bonus. But if they reported a 3, the experimenter would not suspect the lie. Indeed, recent studies in the field of behavioral economics have shown that when others can observe participants in an experiment and see whether they have lied, even if there is no punishment for being caught, participants lie less. In other words, the fear of being seen as a liar often reduces the tendency to lie.

How is it possible to use these insights to reduce dishonesty? In a study in England aimed at reducing bicycle thefts on a university campus, researchers placed signs near the bicycle parking area with a photograph of eyes “watching” and the words “cycle thieves, we are watching you” to increase social image concerns [5]. The signs were put up in areas where bicycle theft was particularly common. After the signs were put up, fewer bicycles were stolen in those areas. The image of the watching eyes and the discouraging message highlighted people’s desire to maintain a positive social image, showing that it is possible to encourage people to be honest without making their noses grow longer every time they lie.

THE TAKE-HOME MESSAGE

Studies in psychology and behavioral economics show that many adults and children lie to make a profit. However, they tend to limit their dishonest behavior and avoid lying to the maximum extent. For most people, it is important to feel honest, and it is also important to be perceived as truthful by others. This seems to reduce their willingness to lie for personal gain. If we want to reduce lying, we need to think about these factors. Future experiments should test how this knowledge might help people be more honest in various real-life situations.

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YOUNG REVIEWERS



ROTEM, AGE: 11

I enjoy playing tennis and the piano, and I love reading. I have a dog named Luca.



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