

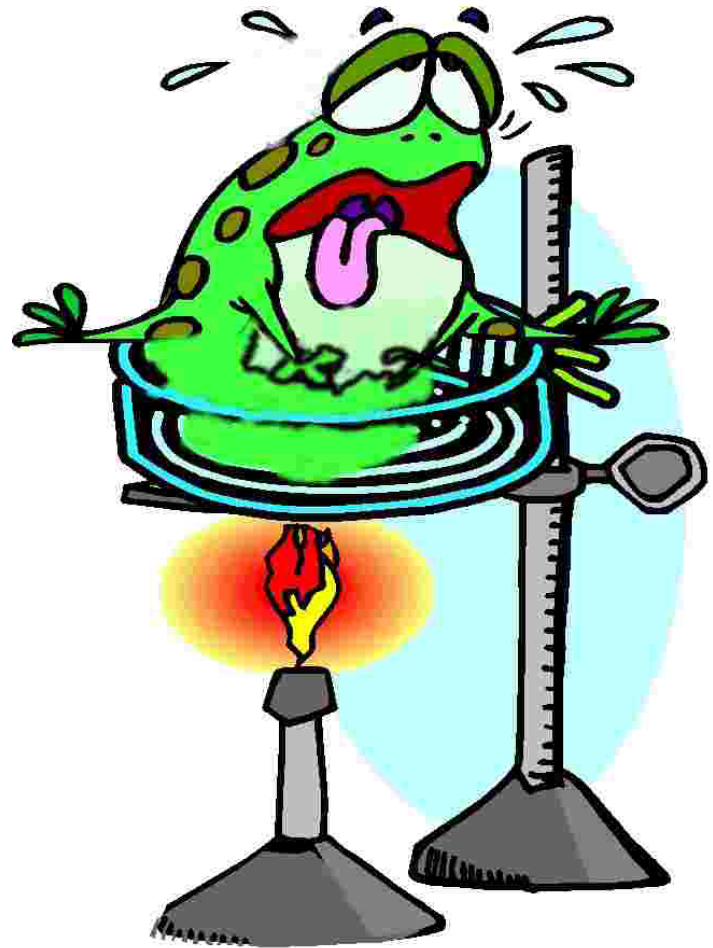
# The Boiled Frog Syndrome: or How You Can Behave Unethically Without Realizing It

by Diana Dill

Do you think that you or your company is immune to an Enron or WorldCom type scandal? As you look through the company's financial records and analyze the data from the various departments, are you identifying all erroneous estimations? Although you may think that your company behaves in an ethical manner, it is very easy for individuals and organizations to have ethical lapses, especially when the lapse is small. When lapses are made gradually and in small increments, you and your company won't even notice until it is too late. According to Dr. Francesca Gino of Carnegie Mellon University and Dr. Max Bazerman of Harvard University, you may be like the frog from the old wives' tale that is slowly boiled to death because it does not notice the gradual increase in water temperature in time to escape. Their research shows that when gradual changes are made, for example a slight overestimation of the amount of pennies in a jar, it goes unnoticed by those who are in a position to approve the estimations.

Max Bazerman has been conducting research on various aspects of awareness and ethical behavior for several years. When the Enron fiasco became public knowledge, he wondered if the cause could be attributed to several small unethical acts that went unnoticed as they were committed over an extended period. To determine if that explanation was plausible, Bazerman joined forces with Dr. Gino and came up with a series of studies that would put an individual in a situation where gradual and abrupt changes occurred. What would the individuals notice and how would they react?

The experiments that Gino and Bazerman conducted were split into four separate studies with four phases in each study. The basic premise of all of the experiments was the same. Show the participants a jar full of pennies. First have them estimate the number of pennies in the jar. Then provide them with estimates from other participants, and see if they will approve or deny the estimate. The participants were split into two different groups. One group would see a gradual increase in the estimation to be approved while the other would see an abrupt increase in the estimation. Gino and Bazerman wanted to see if



people would notice the estimation that was a gradual increase over the actual amount of pennies in the jar.

The studies were conducted with participants that were selected at random from volunteers. The first three studies of the research project were done in a lab with computer-generated images of jars partially filled with pennies. The participants were told in the first picture that the dollar amount of pennies in the jar was \$10. Although the amount of actual pennies in the jar did not change, the jar would appear to be shaken to give the perception that a change had occurred. The most important part of the study was the second phase in which participants were asked to approve estimations. The question was if participants would be more likely to approve amounts that were slightly or grossly higher than the visual amount in the jar. To give the participants a reference point to visualize the amount of money in the jar, they were first shown a picture of a jar containing pennies and were told the correct dollar value of the jar,

which was \$10. Participants were placed in one of two groups. The first group would be exposed to a gradual increase in the estimation. For example, the dollar value would increase by 40 cents until the amount neared \$14. The second group would be exposed to an abrupt change. The estimations would remain around \$10 and then suddenly jump to \$14. In the first phase of three of the studies, participants played the role of estimators for 16 rounds. Participants switched roles in the second phase and played approvers for 16 rounds. Finally in the last phase, participants again played the role of approver for 16 rounds with estimates provided from other subjects.

*“When people do not perceive small changes, they don’t realize the consequences of things accumulating over time and the consequences of their unethical behavior.”*

The second study had a slight twist that Gino and Bazerman felt would capture whether participants were noticing gradual estimation changes. In the second phase of the study, the participants were either assigned to the gradual or abrupt change test group. In a change from the first study, the participants played the role of approver for the first 12 rounds. They were then asked to perform the role of estimator for the remaining four rounds. Gino and Bazerman thought that they would find that individuals in the gradual change test group would on average provide a higher estimation in the last rounds than the abrupt change test group.

An incentive existed in two of the four studies. In those studies, individuals were paid \$10 for participating in the study and had an opportunity to earn an additional \$25 with estimations and approvals. Extra money was earned in the following ways: in the first phase, participants whose estimates were approved would receive 8% of the estimate. In the second phase when the participants were approvers, they could get up to 4% of approved estimates. However, if a third party randomly checked the approved estimate and did not find it to be within 10% of the actual amount, the participant was assessed

a substantial penalty of \$5. Since the payment process added a possibility that participants might intentionally approve slight overestimates for financial benefit, the monetary incentive was removed in the third study.

An additional element was added to the third study to determine if the approver was conscious of an unethical act. At the end of the approver phase (phase 2), participants were asked to perform a word completion questionnaire. The participants were given two letters in a five letter word, and were told to complete the word. Gino and Bazerman selected letters and blanks that could form a word with possible negative ethical connotation. For example, C H \_ \_ \_ could bring the word “cheat” to the mind of someone who had recently observed unethical behavior. This part of the study was the most difficult to validate because even when observing fraud, people might still select words without ethical connotations. For example in the C H \_ \_ \_ example, the participant could easily fill in the blanks to produce the word “chair” even while observing unethical acts. The results that Gino and Bazerman obtained in this phase could still have an element of chance or luck.

The objective of the fourth study was to determine the ethicality of approvers. In this study, participants were shown printouts of the jar of pennies. They were given estimations that they were told came from other study participants, and then they were given the actual dollar value in the jar. The participants were asked to indicate how appropriate or ethical the other participant’s estimation was. The table in the sidebar clearly illustrates the phases, roles, and incentives for each study and phase.

After reviewing the results of the study, Gino and Bazerman determined that those in the gradual change or slippery slope group consistently approved estimates when they were increased in 40-cent increments regardless of financial incentive. Those in the abrupt change group would immediately notice that the estimation given was not appropriate for the picture, and they would not approve the estimation. From the second phase of the second study, Gino and Bazerman confirmed that those who played approvers in the gradual change test group did provide higher estimations when their role switched to estimator in the later rounds than the abrupt change group. The fourth study gave Gino and Bazerman additional ammunition for their thesis when participants noted that the abrupt overestimations were inappropriate or unethical. In contrast, they did not view the gradual increase as unethical. Gino and Bazerman

# Slippery-Slope versus Abrupt-Change Studies

	Study 1	Study 2	Study 3	Study 4
<b>Pre-Phase</b>	Participant sees jars and is given correct monetary value	Same as Study 1	Same as Study 1	N/A
<b>Phase 1</b>	Participants play the role of estimator	Same as Study 1	Same as Study 1	Participants were randomly assigned to slippery-slope or abrupt-change condition. They were shown a picture with true amount of money in the jar. They were then shown estimations that participants made in the first phase of the previous three studies, and were asked to indicate how appropriate or ethical the assessments were.
<b>Phase 2</b>	Participants play the role of approver. Participants were either given slippery-slope condition or abrupt-change condition.	Participants play role of approver for first 12 rounds and estimator in rounds 13, 14, 15, and 16	Participants play the role of approver (as in Study 1) At the end of the rounds, participants had a word completion task	N/A
<b>Phase 3</b>	Participants play role of approver and are given estimates provided by another subject in Phase 1	Same as Study 1	Same as Study 1	N/A
<b>Incentives or payment</b>	\$10 for showing up. When Estimator 8% of approved estimates. When Approver 4% of approved estimates. \$5 penalty for approver if the estimate is not within 10% of the actual amount	Same as Study 1	Participants could be in one of two groups. Those who received incentives (same payout as Study 1) or those who did not receive incentives. The last group was paid \$10 for showing up, and \$10 for completing the study.	All participants paid \$20

interpret this result as proof that gradual increases in unethical acts go unnoticed by observers. This result goes against the preconceived notion that people intentionally make unethical decisions, especially in regards to minor deviations in ethical behavior. As Gino says, “When people do not perceive small changes, they don’t realize the consequences of things accumulating over time and the consequences of their unethical behavior.” Gino and Bazerman gave the example of an accounting firm that would evaluate financial records from a company over several years. At first the bookkeeping would be flawless and totally aboveboard. However, after a few years, there would be a small accounting deviation. It was unlikely that the accountant responsible for approving the records would notice the deviation. The next year, the deviation might again increase in a small amount. The accountant again would be unlikely to notice the unethical behavior and would continue to approve the financial statements. After a few years, the unethical behavior would have grown to a point that the accountant would notice, and the company would be embroiled in scandal.

Future research can be broadened in many different ways. One possibility would be to further validate that the acts are indeed unnoticed. A possibility still exists for the slight increases to be noticed but not considered unethical. An individual might consider it acceptable to steal pennies, but not to steal hundreds of dollars. For example, a business man might not notice if a few sheets of paper was taken from his printer. However, he would notice if his printer was missing. Also, group behavior in unethical acts should be observed. For example, if more than one person is responsible for the accounting records, are the individuals less likely to take responsibility for the groups’ unethical acts? Will this lead to an increase in unethical behavior in the company? Researchers may also want to look at the “institutionalization of corruption” that can occur in companies. If the company as a whole is unethical, will the individual members increase their unethical behavior? Where does the line exist between something that is unnoticed or noticed?

Max Bazerman has focused most of his research on the topics of awareness and ethical behavior. One topic that Bazerman has investigated with Dolly Chugh is the concept of “bounded awareness.” This concept has also been of interest to companies because of ethical implications. With bounded awareness, someone who focuses his or her attention on one item may not notice another item of equal importance or one that is in the background.

As Bazerman says, “It’s the tendency to fail to see critical information in our environment because we’re overly focused on some sub-segment of what’s out there.” The similarities between bounded awareness and gradual change lie in the concept of awareness and its limitations.

At this point you may be thinking to yourself that you or your company is doomed to commit ethical violations of which you will not even be aware. As your accounting department reviews the financial records, will the accountants notice that an estimation of costs is slightly higher than the actual cost? Will your company slide down the slippery slope by not noticing gradual lapses in ethics until it reaches Enron proportions? According to Gino and Bazerman, that does not have to be the case. Gino speculates that companies can avoid the slippery slope by just being aware that small, gradual, unethical acts can go unnoticed. Encourage your Human Resources department to present seminars on unconscious ethical behavior. Help your company develop and enforce a set of ethical guidelines. The more aware we become of the fact that people do not notice gradual ethically questionable acts, the less likely we are to make such lapses in behavior.

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