

flourish

the quarterly newsletter of the
center *for* neuroeconomics studies

SPRING 2009



Anatomy of a

SCAM

The Neuroscience of Deceit

What you can do to protect yourself, fight back, and help others from being conned

Also in this issue



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the Director pg. 1



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Letter from the Director

Dear Friends,

Spring has California blooming with flowers and reminding us of the joy of birth and growth. At the same time, the United States is suffering through the deepest recession we've had in a generation. Along with the loss of jobs and business closures, declining incomes have disclosed scandals that were sustained during the economic boom. The most egregious of these was the Ponzi scheme run by New York money manager Bernie Madoff. The SEC estimates that he defrauded investors of \$65 billion dollars. He recently pled guilty and will likely spend the rest of his life in jail.

In this issue of *Flourish* we use findings from our neuroeconomics research to analyze how conmen ply their trade.

we use findings from our neuroeconomics research to analyze how conmen ply their trade. We reveal why smart humans get suckered. I was conned out of \$100 when

I was a high school student so I have a personal interest in this topic. This article also describes “red flags” you can look for to protect yourself from cons.



Interestingly, Bernie Madoff confessed his con to his sons in late 2008 when they discovered the books were being cooked. I think Madoff wanted to be caught. In my book *Moral Markets*, I discuss some of the senior Enron management who disagreed with the illegal and unethical decisions of Jeffrey Skilling and Kenneth Lay and the risks they took to fight against their bosses. My colleagues and I at CNS are currently examining the human need for confession and how this allows us to fully rejoin those around who are honest and fair. I wish all of you the blessings of the rebirth of spring.

Paul

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Recent Media



MSN Money February 25, 2009



Little Things that Make You Feel Richer

Dr. Zak discusses how the brain is sensitive to relative differences and adapts to changing conditions such as those occurring during economic downturns.



WHYY Radio February 23, 2009



Why does Behavior Effect the Economy?

In this interview, Dr. Zak offers advice for what to do and not to do during this recession.



WAOR Radio February 12, 2009



Valentine's Day Advice from the Oxytocin Doctor

In this Valentine's Day feature, Dr. Love (er, Zak) discusses why and how people get close to each other, and actions that can increase oxytocin levels.



NeuroScene Podcast February 11, 2009

neuroscene.com

Psychology of the Con

Dr. Zak discusses how conmen manipulate the brain's trust circuit to relieve us of our money and how to protect oneself from this.



New York Times January 19, 2009

The New York Times

Born to be Good by Daniel Keltner

Dr. Zak was mentioned throughout this excerpt of chapter 1 of this book that examines how individual goodness translates to healthy societies.



Monitor on Psychology January 1, 2009



Mind over Money

Dr. Zak identifies the factors that have contributed to the ailing economy and provides strategies for riding out the recession.



Alternate Universe December 22, 2008



The Year of the Fraud: What's Behind the Conman's Con?

Dr. Zak and other leading neuroeconomists and behavioral economists discuss the biological mechanisms and social factors that contributed to the ascent and downfall of Bernie Madoff.

Please visit our website for full text versions of all publications plus archives of media and publications: www.neuroeconomicstudies.org





Anatomy of a SCAM

The Neuroscience of Deceit

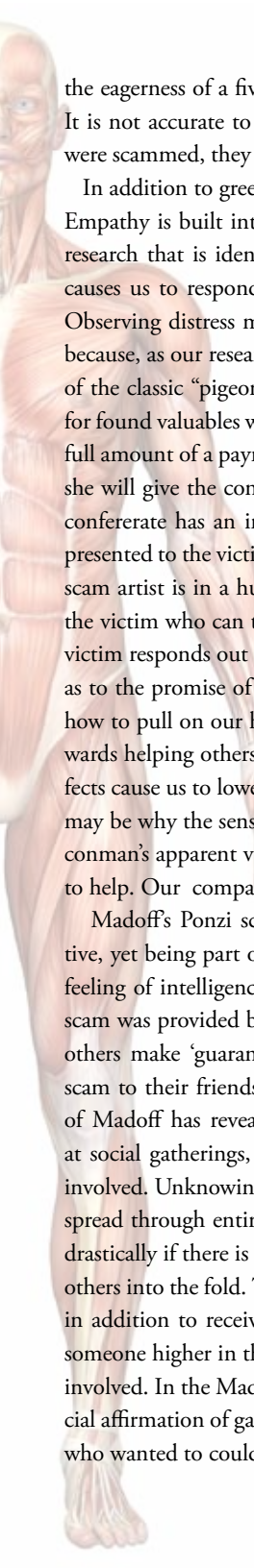
What you can do to protect yourself, fight back,
and help others from being conned

Only in hindsight do most people recognize the cues and details they missed. Only with sober review do they see the “tells” they did not see or did not *want* to see; although these were always there, hiding in plain sight. Bernie Madoff’s uncovered Ponzi scheme epitomized how to run a con, leaving us with a body of evidence to autopsy that reveal the gross anatomy of a scam. We will review how a once-reputable money manager succeeded in earning the trust of shrewd investors from various echelons of society, why people fall prey to deceit, and propose ways you can avoid becoming a casualty. Not all scams are the same. Indeed, there are many different species of scam. However, the common DNA of cons includes the drive to make “above market” returns.

As we stand at the coroner’s table we begin to uncover the mystery. At the head of the scam is the victim’s desire for personal gain. Sometimes this drive for personal gain is commingled with the desire to help someone else in need, as neatly depicted in Professor Zak’s *Psychology Today Blogs* article, “How to Run a Con.” Humans are hard-wired to respond to potential gains, a well-studied system that pumps the anticipating brain full of the neurotransmitter dopamine. Logic, reason, and sound probabilistic calculation are overwhelmed by dopamine-rich enthusiasm and risk-taking. This is the way scam artists expertly use the internal workings of others’ brains for their own gain. They don’t need to threaten with a weapon like a lowly mugger, they simply tap others’ automatic responses, using the brain’s own mechanisms to work against its best interests. They then stand by as their victim willingly hands over their money with

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the eagerness of a five-year-old showing their mother a finger-painting. It is not accurate to say someone “wasn’t using their brain” when they were scammed, they simply failed to employ the right parts of the brain.

In addition to greed, many scams also hijack parts of our social brain. Empathy is built into the chemistry of our brains and CNS is leading research that is identifying how and why we are empathic. Empathy causes us to respond to another’s circumstance as if it were our own. Observing distress motivates us to alleviate the other person’s suffering because, as our research has shown, this makes us feel good. In the case of the classic “pigeon drop” scam, a stranger proposes to split a reward for found valuables with the intended victim. The victim will receive the full amount of a payment when the reward arrives in 30 minutes if he or she will give the confederate half that amount now because the “poor” confederate has an important meeting and cannot stay. The scheme is presented to the victim as a trade-off between money and time. Since the scam artist is in a hurry, he will take a smaller amount of money from the victim who can then keep the larger payment when it arrives. The victim responds out of a genuine desire to help someone in need as well as to the promise of a windfall gain. In other words, scam artists know how to pull on our heartstrings and tap into the natural inclination towards helping others to reinforce our dopamine-driven greed. Both effects cause us to lower our defenses and become puppets in a scam. This may be why the sense of betrayal is so stinging and painful, because the conman’s apparent vulnerability plays upon our kindness and the desire to help. Our compassion is our undoing.

Madoff’s Ponzi scheme did not have a charitable or empathic motive, yet being part of the “exclusive club” provided its members with a feeling of intelligence and entitlement. Worse, the momentum of the scam was provided by the victims themselves who, in the effort to help others make ‘guaranteed’ returns on their investments, promoted the scam to their friends, family and associates. The criminal investigation of Madoff has revealed that people would simply walk up to friends at social gatherings, shake hands, and ignite in them the desire to be involved. Unknowing hosts to a virus, investment in the Madoff scheme spread through entire social networks. Proliferation of a scam increases drastically if there is a “referral bonus” or some other incentives to bring others into the fold. This is the engine behind pyramid schemes; because in addition to receiving a referral bonus, each additional dollar places someone higher in the structure and increases the gains to those already involved. In the Madoff scheme the emotional payoff came from the social affirmation of gaining access to an exclusive club, since not everyone who wanted to could invest.

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At the heart of a scam is an emotional instinct that has been duped.



share YOUR Story!

Do you have a con story? The best story will be featured on our website. Send to

info@

neuroeconomicstudies.

org

(don't worry, all email is confidential and we won't disclose authorship).

What you can do to protect yourself

Discuss the situation with others who are not involved; they will be able to see the situation more clearly and recognize the “shadiness” that you may be overlooking. Then, and this is the crucial part, listen to their objections.

Listen to your gut instinct (the nerves in your gut are sensitive to potential risks).

If you suspect that fraud is taking place, report it immediately to the police or FBI.

The old adage “If it’s too good to be true, it probably is” still holds merit. Markets balance so that returns on investment are commensurate with risk. As a rule of thumb, consider an “amazing opportunity” with a huge payoff to come with a huge risk. Even if the payoffs are possible, the probability of ever seeing payment is likely to be negligible.

Be aware of your own attachment to the outcome and recognize when you are “pulled” into participating by the brain’s greed and empathy circuits. The best thing you can do for protection is to slow down decisions and do as much research as possible on whatever is promised.

The body of knowledge gained from the Bernie Madoff scam peels back the skin of a too-good-to-be-true promise, revealing the inner workings of deceit. We have a capacity for empathy which automatically leads us to want to help others in need in spite of the potential for personal loss. Humans also respond strongly to the prospect of rewards, hijacking the brain’s “wanting” or motivation system. Mix potent emotional instincts with the opportunity to make large amounts of money and we get a stiff and intoxicating neurochemical cocktail that blinds us from the light of reality. The Madoff scandal has given us the opportunity to look closely at a scam of astounding magnitude, examine the intricacies of deceit, and draw lessons that will protect us from exploitation, large and small.



Researcher**Closeup**

George Sarraf



Coming back to make a difference.

Background

My undergraduate degree is in the liberal arts. This was a great way to start my education as I was exposed to most of the fields within the social sciences. This peaked my interest in social issues and problems such as corruption. I was not interested in public policy applications, but more in how the structure of society and the function of markets fed into and might offer solutions to social problems. The further I went with my studies, the more I came to believe that economics could provide answers to the social problems I found so puzzling. I also completed a master's degree at the University of Sydney in Australia.

With the tools from my studies I worked in industry in Australia and here in the United States, gaining experience in marketing and information technology consulting. I worked in small boutique firms as well as large multinationals. This gave me experience in the problems faced by businesses.

Why study neuroeconomics?

I returned to

school out of frustration. After working in marketing and IT I did not feel as if I was really contributing to improving people's quality of life or solving the problems that had fascinated me as a student. The desire to make a greater contribution renewed my interest in economics. However, traditional economics seemed to me to miss important variables. In thinking about consumer preferences I wanted to be able to look into the mind of the consumer to determine what factors influence preferences. Neuroeconomics has given me the tools to incorporate the psychology and neuroscience of behavior into how I think about economic decision making.

Current work

The focus of my work lies in applying behavioral and neuroeconomics to purchasing and investment decisions. From herding behavior in the stock market to purchasing decisions made by households, like many of the other CNS researchers, my work focuses on examining the mind of the market.

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Calendar of Events SPRING 2009

- APRIL** 2 Neuroscience and Law for Physicians
Loma Linda University, CA
- 6 The Moral Molecule
Claremont Graduate University, CA
- 17 The Biology of Trust and Global Health
Claremont Graduate University, CA
- MAY** 1-3 Collective Action Workshop
University of Indiana, Bloomington, IN
- 13-15 National Seminar for Appellate Staff Attorneys
San Diego, CA
- 17-22 Gruter Institute Conference on Neurobiology & the Law
Squaw Valley, CA
- 27 The Moral Molecule
7pm Humanities Bldg 204, Scripps College, CA
- JUNE** 13-19 Generosity Meeting
University of Notre Dame, IN



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