

How We Trust¹

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Thank you for inviting me to speak at your interdisciplinary conference. I was delighted to learn that the work I did long ago in the field of infancy turns out to be relevant to some of the things you have been studying. You are especially generous in welcoming someone who is an outsider to every one of your fields of inquiry, including the one field I did train in—human infant development—to which I haven't contributed anything in over 30 years.

Therefore I won't pretend to propose, support, or dispute any theories about how this unique “second person” feature of the human mind could have evolved, nor about how it develops anew in every little proto-human infant.

Instead, I'll tell you what I do know about, which is how *trusting* happens between people or between groups of people, also how *distrusting* happens, how people come to be *trustworthy* to others, and *untrustworthy* to others—in life as we know it. I'll try to shed light on three questions:

- What is unique about human trust?
- Why does so much human conflict revolve around problems of trust?
- Where does the second person come into trusting decisions?

Then I'll leave it to you to decide if any of that is relevant to the research and scholarly analysis you're doing, and whether you or your students might study these processes more systematically than I am in a position to do.

After I published *The Mental and Social Life of Babies*², I left academics for training as a clinical psychologist, then worked as an individual and family therapist for ten years. In 1987 I began to specialize in resolving conflicts within families that own businesses, and since 1993 I have practiced exclusively as a consultant to owners of family firms, large and small.

When I tell people that I'm particularly interested in processes of trust, they usually say “Trust would be important in family businesses.” However, people say that about every field of human life: They say “In my field, trust is especially important,” or “I'm a person who places a lot of value in trust” as though that makes them unique. On the negative side, they might say “We have a problem with trust.” In fact, we can't listen to talk radio or the news, or read two pages of a newspaper without the word *trust* appearing as the heart of a problem. (This refers to the *process* of trusting, not the legal instrument called “a trust.”) Surveys indicating that Americans distrust the press, our government, and business are reported as if this were a contemporary phenomenon, forgetting that our country was *founded* on distrust of government and institutions. Arguing about how to hold them accountable has been our way of life for 250 years. I don't need to tell this gathering of philosophers and psychologists that trusting

¹ Presented at the Max Planck Institute for Evolutionary Anthropology's Conference on the Second Person; Leipzig, Germany, 18 Oct. 2013.

² Kaye, K. (1982). *The Mental and Social Life of Babies*. University of Chicago Press.

decisions are involved in all human cooperation, and some degree of trustworthiness is essential to all human communication. Trusting—or more precisely, *prudent risk taking with regard to another's probable behavior*—is central to *every* human relationship, whether it's of five seconds' duration or fifty years.

So problems of trusting are in no way unique to family-owned businesses. But I like to point out that the earliest cooperative social interactions at the dawn of human history were almost certainly family enterprises—to hunt, to gather, to build shelters, eventually to farm ... and we wouldn't be here today if those enterprises had not functioned more effectively than individuals were able to do on their own to meet the needs of themselves and their young. I suspect they also functioned more cooperatively than many of the families that are my clientele today.

I assume that *all* human cooperation and conflict is a by-product of the evolutionary leap to voluntary helping.

By the way, it wasn't necessarily in hunting that the earliest family cooperation—and with it, cultural memory and cultural evolution—began. Biological anthropologist Robert Martin is an expert on two aspects of primate evolution: brain size and the evolution of reproduction, specifically the size of the pelvis through which a newborn's brain has to pass. For at least a million years, we have had huge newborn brains but relatively narrow female pelvises adapted for walking on two legs instead of four. He believes that midwifing therefore must go back a million years. Think about the risk, in terms of reproductive success, for a primate mother to rely on another female to be the first one to get her hands on her infant. *Only* Homo sapiens do that.

Mike Tomasello, writing about the limits of cooperation among even our closest primate cousins³, points out how chimpanzees' group hunting falls short in a number of ways, of what we humans mean by the word *cooperation*. Although there are demonstrations in the primate literature that under some circumstances and within certain pairs of individuals, helping behavior does occur, I agree with Tomasello that there's a huge gap between an individual intentionally performing a helpful act, and the kind of cooperation where individuals *rely* on another's trustworthiness, in other words actually take a **risk**. Midwifing, for example, involves helping by one female and trust by the mother who accepts the help.

Trusting entails risk. Why? Because there's *uncertainty* about the other's reliability for the matter at hand. And there is a *cost* if they turn out to be unreliable. Uncertainty and possible cost comprise the risk.

What's unique about human trust?

Beyond the fact that people talk about or hear about trust many times a day, another indication of how preoccupied human beings are with trusting is the enormous literature about it in the social sciences, particularly experimental social psychology. The paradigms of the Prisoner's Dilemma and the Tragedy of the Commons have spawned not hundreds, but thousands of research studies and a proportionate amount of attention from non-academic writers. For me, however, reducing the phenomena of trust and cheating to game theory oversimplifies the psychodynamics of human relationships. Other research paradigms, using surveys of college students, reify "trustful" versus "untrustful" as traits of individual difference

³ Tomasello, M. (2009) *Why We Cooperate*. MIT Press.

or categories of people; for example, are trustful people more or less trustworthy than distrustful people? Not only are those simplistic questions, but too often the scale—from self-report questions—has no face validity. What people say they do is not necessarily what they do.

Recently, neurophysiologists have used a number of similar tasks and questionnaire measures to assess the effects of hormones. They are learning more and more about how the brain makes decisions in a biochemical as well as social context. A result like “testosterone increases competitive behavior in risky situations but promotes prosocial behavior in the absence of risk” is definitely intriguing, but that science is in its infancy.

Developmental psychology and animal behavior. I find much richer and more applicable to my professional purposes, the literatures comparing human behavior and animal behavior in the field, supplemented by laboratory situations to control for some of the many variables that cloud our understanding of what we see in nature or in human enterprises.

FIG. 1: ZEBRA WITH OXPECKERS

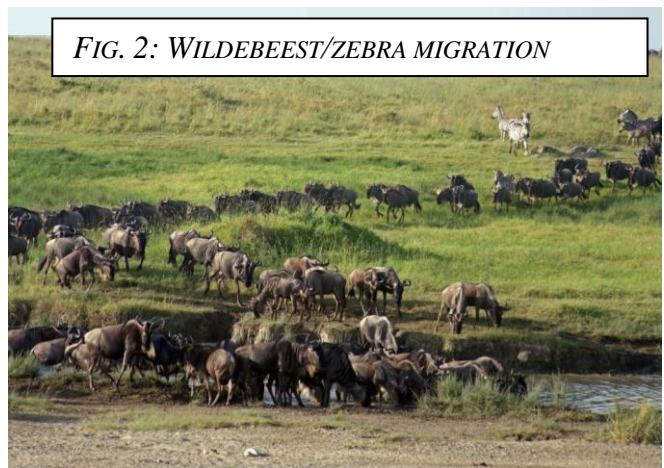


I'll begin with a personal observation in the Serengeti plain of Tanzania to demonstrate the amazing interdependencies that have co-evolved between species, and then let's compare them with the interdependency of cooperating, communicating *Homo sapiens*. Only when we are anthropomorphizing do we use the word *trust* to describe the behavior of a non-human animal, as in “zebras trust the oxpeckers not to peck them.” Why not? After all, they are taking a risk, however small. But we have no reason to suppose the members of those

species think about each other, much less imagine the other's point of view. Human beings are demonstrably aware of taking risk; and furthermore, we base our decision to take the risk on subjective attribution of motives to the other.

The line of animals along the horizon in Figure 1 are mostly wildebeests (gnus), nearly two million migrating about 200km across the plain and back again each year. A few hundred thousand zebras travel among them. The two species have been making the trip together for millions of years, not competing (indeed, not noticeably interacting at all), eating different grass, but benefiting symbiotically from their different sensory abilities. Zebras have extremely acute vision, not a very good sense of smell (according to the Serengeti guides). Wildebeests can smell water from far away, but their vision is poor.

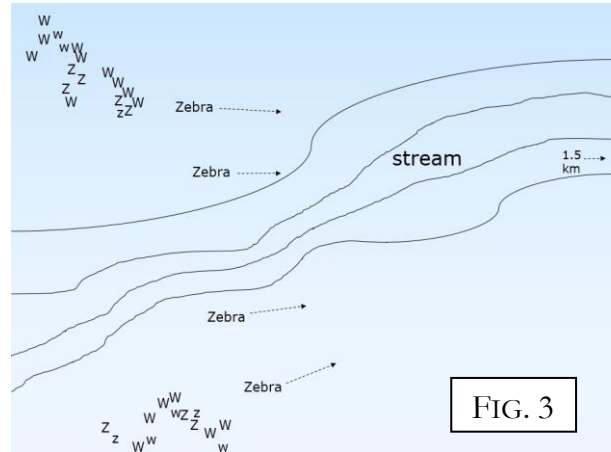
FIG. 2: WILDEBEEST/ZEBRA MIGRATION



A minute or so after I made this photograph of the migration crossing a stream (Figure 2), a remarkable change took place. Four zebras stopped and positioned themselves at (approximately) 30 meter intervals, facing a lone tree about 1.5km downstream, as indicated in Figure 3. Within seconds, the line of adult and young wildebeests (**W** and **w**) and adult and

young zebras (Z and z) separated from both sides of the muddy stream and stopped. As the four vigilant animals remained still, and the rest of both herds milled about quietly, our binoculars confirmed the guides' prediction that there was a lion in that tree. They judged her to be resting and digesting, not stalking. The four zebras kept their eyes on her for more than 30 minutes before proceeding. Only then did the two mingled herds of unrelated herbivores resume their slow migration.

Would we say that zebras *trust* the wildebeests to find water? Wildebeests *trust* the zebras to tell them when it is safe to move? No. Their interdependent behavior is instinctual, a genetic endowment created by natural selection over the course of this migration for millions of years. They aren't assessing the risk, nor do we suppose that the wildebeests distinguish the zebras individually. They do not knowingly *rely* on the other species, nor (as far as we can see) is anything like "cooperation" organized by either of them. No wildebeest learns a rule like "when zebras give the signal, get away from there and halt!" There is definitely risk assessment, but it has been provided by natural selection. We can see that zebra behavior affects wildebeest behavior with a high statistical likelihood. We don't believe that individual animals are assessing the uncertainties and making decisions in the way *Homo sapiens* does.



Decisions in the form of behavioral responses to physical signals that are built into species by evolution are no more certain to be reliable—no less risky—than human trusting decisions are. In both cases, they are “probably approximately correct”⁴. The signal detection mechanism is vulnerable to false positives (α errors) and false negatives (β errors), a terminology that also applies to trusting. And in nature, as in civilizations, those uncertainties create opportunities for other organisms to exploit the predictability, either by reacting to the signal themselves or by mimicking the signal and thus eliciting the response. Nature is full of examples, from cuckoos laying their eggs in other species' nests to butcher birds mimicking the warning call of a meerkat with the effect of sending the meerkats scurrying into burrows, dropping their food and stirring up insect prey for the bird.

Turning to humans now, my definition of trusting above was “prudent risk-taking with regard to another's probable behavior,” or to be precise, under conditions of uncertainty about the other's reliability. The risk—the cost to being wrong—is intrinsic to the word *trust*. So is our *awareness*, at some level, that we are making that kind of decision. Furthermore, we decide to take the risk based on *subjective attribution of motives* to the other.⁵

⁴ Valiant, L. (2013) *Probably Approximately Correct*. Basic Books.

⁵ I responded to a question at the conference as follows: Although this paper discusses the trusting of actual persons, we do use the word when relying on animals (“he trusts his horse to take him home”), supernatural beings (“trust in the gods”), and objects (“I trust my BMW”). The latter case actually means I trust the people who design and build BMWs. But the personification of animals and inchoate forces of nature must have begun far back in human history—perhaps even earlier than language. I can see no reason to assume that the “second person” we are positing as a fundamental distinguisher between *H. sapiens* and all other animals only came after the dawn of human language as we know it. Perhaps the mutations that occurred first were the ones that led our

Why do we trust without sufficient information? We are born that way. Basic trust is our default condition. So why, then, do we make the opposite mistake, failing to trust trustworthy people? Because caution is also in our repertoire, especially learned fears, wariness and categorical distrust (prejudice). But we *seek* others we can rely on to be honest, capable, and cooperative, because without such people we cannot survive.

We know from primate research⁶ that evolution provided behavioral tendencies for some adaptive cooperation in goal-directed activities among related individuals. Human intelligence generalizes those adaptive applications opportunistically and beyond kinship, to any group or inter-individual task. Human evolution has provided language and consciousness of self in the context of tribe and culture. Trust thus goes beyond mere cooperative behavior to conscious management of risks in relation to specific individuals.

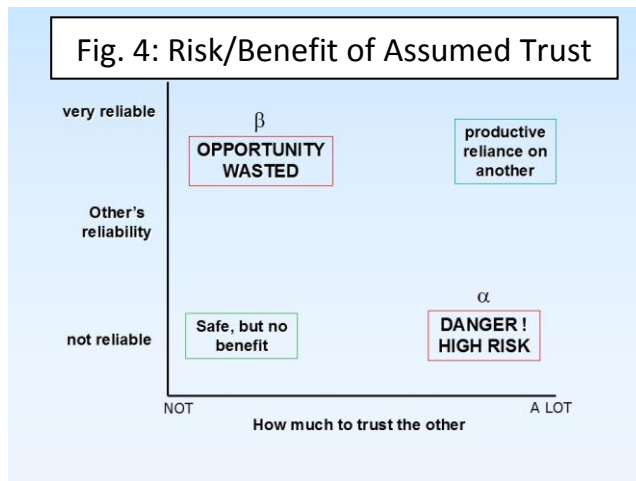
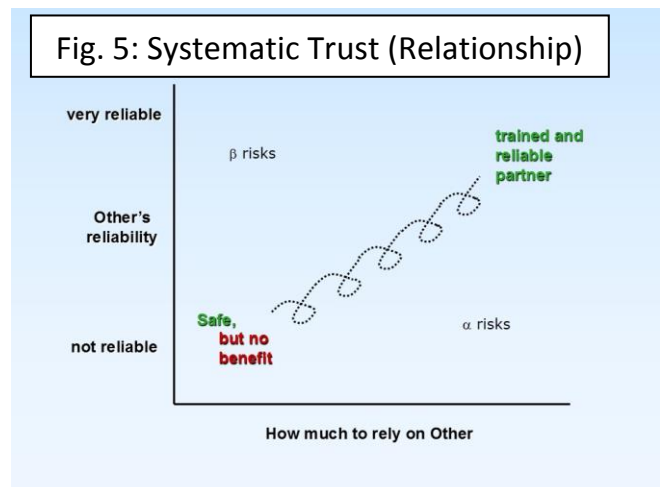


Figure 4. illustrates the risk/benefit aspects of decisions to trust. The x-axis is the false positive (α) dilemma. If one places much trust in another who turns out to be unreliable (for that type of responsibility at that time), one is in danger. But along the y-axis, failing to trust another runs the risk of losing the potential benefit of a reliable partner (β error). The productive outcome results only from relying on a reliable other: a partner. So how do we get there? Ideally, by starting cautiously and gradually building a relationship of *earned* trust.

That requires starting with a modicum of trust (Figure 5). Too much trust is dangerous, but the only way to secure reliable partners is by trying them in relatively low-risk situations and giving them more responsibility and discretionary control as they prove to be trustworthy—for *the matter at hand*. (No one is reliable in every way; a great financial manager may be a terrible driver, or spokesperson, or cook.) A problem is that initial risks must be taken with little or no direct experience of his or her performance in that role. We have to generalize from our experience with others and all kinds of culturally learned expectations. Motivated by optimism, humans make fast, risky trusting decisions. That unfortunately creates an incentive for others to take advantage by lying, cheating,



ancestors to imagine other minds inhabiting the significant objects around them, beings like themselves in control of regularities they themselves could predict but not control. This “second person” consciousness might have been one of the instigators for the invention of language.

⁶ Sussman, R.W. and Cloninger, C.R. (2011) *Origins of Altruism and Cooperation*. Springer.

and stealing.⁷ But without assumed trust as a starting point, cooperation and even the most basic relationships could not exist.

There is a direct connection between assumed trust and the “system 1” or fast thinking described by Daniel Kahneman⁸. He shows that we have two different cognitive systems, two modes of decision making. Much, perhaps most of our thinking shortcuts logic and uses intuition to guess at the apparently best response. The slower “system 2” mode weighs facts, uses logic, and chooses among alternative decisions. Both modes draw upon our learning and experience. They are just different ways of using our knowledge. Kahneman and Amos Tversky devoted their careers to analyzing intuitive errors and all kinds of biases, many of which are emotional biases, which lead us to use the fast system and to make judgment errors. There often isn’t enough information or not enough time for the cautious decisions.

So fast thinking has the advantage of saving time but the disadvantage of higher risk, compared with slow thinking’s expenditure of more time for lower risk of errors. Just so, assumed trust buys speed at the price of greater risk; while the systematic process of training and correction—increasing reliance but pulling back as needed for more training—invests time so as to minimize the risk.

Yet, disappointments (“betrayals”) there will be, and this is where emotion enters the picture. Decisions to trust are not simply cognitive matters (as if any thinking is really free of emotion). The more time, energy, and other resources that you invest in a long term relationship, the more intense are your feelings of betrayal if the other disappoints your expectations. I’ll return to that problem in the next section.

To summarize systematic trust, it is earned and granted over a series of trials. As reliance increases over time, the relationship grows in value to both parties. Incentives to maintain the partner’s trust are greater, the more it has been confirmed. At the same time, though, vulnerability to “cheating” or “breaking trust” also increases with the longevity of relationships and reliance on the trusted partner. Hurt and anger at “betrayal” increase commensurately.

Why do we have so much conflict about trust?

Reason 1 is that ***trusting creates incentives for cheating***. In the simplest example, I borrow money from you and promise to repay it tomorrow. This gives me an incentive to disappear from your life. Con artists begin with assumed trust and build it by a couple of steps until their victims feel they are in a relationship. As soon as the amount at stake is material, they disappear. Often, they get away with it. So why don’t most people cheat most of the time? Because real relationships are valuable. When I earn your trust, my *long-term* incentive for maintaining it outweighs my short-term incentive to take advantage of your trust by cheating you.

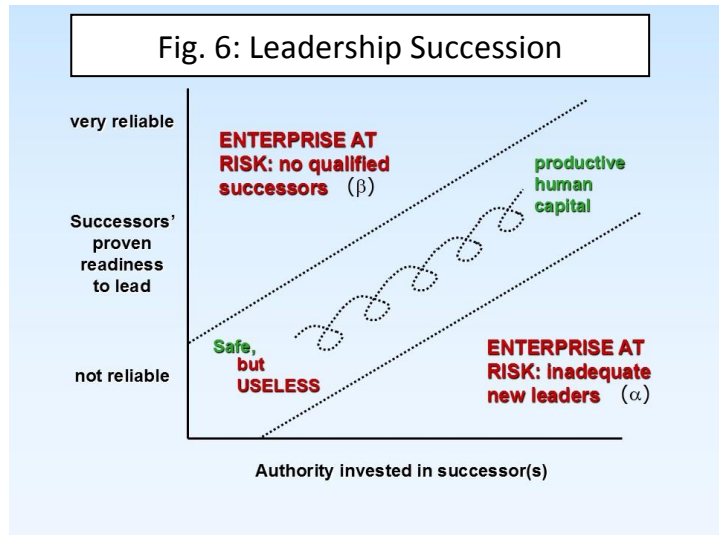
The more you find me trustworthy, the more you depend on me and therefore the better I can trust you to be trustworthy toward me. However, that brings me to reason number 2 for human conflict: ***Today’s shared goals do not guarantee the future***. Individual differentiation (growth and new attachments or priorities) may eventually outweigh incentives to continue meeting expectations (people do change). So the benefits of our being in a trusting relationship can unfortunately become *disincentives* to individual differentiation (growth). The paradox that

⁷ Tomasello (*Why We Cooperate*, p 22): “If human beings did not have a tendency to trust one another’s helpfulness, lying could never get off the ground.”

⁸ Kahneman, D. (2012). *Thinking, Fast and Slow*. Farrar Strauss Giroux.

long-term family business relationships can conflict with personal development is at the heart of the field in which I work.⁹ Early in relationships, the cause of conflict may be either misplaced assumed trust or resentment at not being trusted. But later on, it is often simply individuation being perceived as betrayal.^{10 11}

Let me use a family business illustration here. The generation in control often makes one or both of the mistakes I spoke about. Eagerness to endow their children with responsibility and authority makes them commit to the next generation's management authority prematurely (the α error), putting the enterprise at risk in that way. On the other hand, fear of the next generation's unreadiness to lead makes the elders slow to entrust them with any leadership participation at all (the β error), thus preventing their organization from developing qualified successors.



As individuals and as societies, we make both kinds of mistakes: too quick to assume the integrity and ability of others; and then, upset when they don't meet expectations, we fail to go back a step and keep training. Instead, we give up on the prospect of ever being able to trust the other with respect to the matter at hand. It is possible to see all of life as alternating between too much hope in other people and too much despair! Examples in government include school promotion policies, parole of convicted felons, immigration law, and international relations.¹²

The third and biggest reason for conflict is that ***disappointed expectations of trustworthiness are biologically charged with emotion.*** We are a species that evolved to seek trustworthiness and react aggressively when our expectation of it is thwarted. Emotion is as much a part of the evolved mutual trusting process as cognition is. This dilemma is built into us biologically—the drive to connect with a reliable other, and the emotion of grief and/or rage when that hope is betrayed.

A client of mine started a business with her husband fifteen years ago and has enjoyed incredible success. When the business began to take off, she granted a trust (the legal term, meaning a fund intended to grow, with defined tax and distribution restrictions) for her brothers, endowing it with a tenth of her stock in the company. The trust was violated by one of the brothers, who was also a trusted employee and was able to transfer earnings from those shares immediately to the three brothers, bypassing the prescribed trustee decisions and

⁹ Bowen, M. (1972). On the differentiation of self in the family. In Bowen, M., *Family Therapy in Clinical Practice* (pp. 467-528). Jason Aronson.

¹⁰ Kaye, K. (2005). *The Dynamics of Family Business: Building Trust and Resolving Conflict*. iUniverse.

¹¹ Kaye, K. (2012) Trusting fast or slow but not forever. <http://www.kaye.com/fambz/TFS.pdf>

¹² Recently the president of South Korea announced a new policy of “Trustpolitik” toward her northern neighbor, breaking the pattern of bouncing between proactive trust and the brink of war when promises were broken, in favor of modest commensurate responses to genuine positive actions.

without the grantor's knowledge. The discovery of that betrayal led naturally to a destructive legal battle, ending in termination of the trust and partial repayment by the brother who broke the law. But the damage cannot be undone. Although my client has formally forgiven the offense, she suffered a devastating blow to her self-esteem and to her belief in her family's respect and loyalty. Her depression and bouts of rage are not *choices* as in a laboratory or business school game. I believe they are biological responses that are fundamentally part of being human. Feeling her pain, it is easy to understand how, so often in history and literature, betrayal of trust leads to homicide.

Where does the second person come into trusting decisions?

It turns out that the learning process represented in Figure 5 is usually a *mutual* learning curve. The employee, for example, is gradually learning to trust the employer or supervisor at the same time she is demonstrating her trustworthiness to them. Courtship is another example of step-by-step tested reliability. The mutually interested parties form a personal relationship, not merely a pair of roles. Few if any examples of primate "cooperation" are cooperative in this sense. *Human* cooperation is relationship based. It includes unconscious as well as conscious elements, but both of those relate to selected partners, as opposed to side by side activities or interdependence that's determined by species evolution.

Whether the roles are similar (parents' care for their children), reciprocal (employer/employee), or different (manufacturing and sales), the second person is felt to be an individual, with motives and abilities that can be inferred and evaluated from their actions. The word we use for that is *attribution*. Attribution is very much guess work, can't possibly be correct all the time. We are forced to guess about trust (risk) because there never is certainty—so we are bound to make those errors of over-predicting others' consistency and under-predicting others' individuation as they develop.

From the point of view of trusting, I see two levels of 'second person': the other person in assumed trust and the other person in a systematic relationship. (In both cases, 'person' can also be a group, community, or institution.)

Summary

Instinctual interdependence is not trust. In fact, even learned cooperation can occur without conscious *decisions* to trust, when they are acquired by experience with the outcomes of other organisms' predictable actions.

What I have termed assumed trust is the first level of 'second person' consciousness: commitment to rely on another based on best guesses about another's intentions, capabilities, and potential benefits.

Systematically earned trust is the fully interpersonal relationship with accompanying emotional attachment and the risk of grief or rage at broken relations. This is the interpersonal nature of human existence, I think (though I would not presume to bring up Kant, Kierkegaard, or Buber in a room full of philosophers), where we see our species depart from all others.

