What in reality corresponds to our concept of probability? In his 1921 treatise on the topic, the economist John Maynard Keynes offered an answer: our concept of probability reflects objective probability relations in the world. These objective relations are something we can directly perceive, according to Keynes. They are strung between premises and conclusions like wires between poles. We may not always be able to put a number on them; but we can tell that the probability that "We shall reach home alive" given that "We are walking home under a clear sky" is objectively greater than its probability given that "We are walking home in a thunderstorm". Such objective probability relations could be discerned between any premises and conclusions, Keynes maintained.

But his young friend, the precocious genius Frank Ramsey, was sceptical. What probability relation, he challenged Keynes to tell him, leads from the premise that "Napoleon was a great general" to the conclusion that "My carpet is blue"? He, for one, did not perceive such relations, Ramsey declared, and he suspected that others did not perceive them either.

As Ramsey saw it, trying to match up the concept of probability with perceivable bits of the world was not the way to elucidate it. It was not like the concept of rainbow – something best understood by first studying the nature of rainbows and then explaining how we came by the concept of rainbow in terms of our repeated encounters with rainbows. The concept of probability was less like an impression left in our minds by something already out there, and more like a device we had built to navigate the world more successfully. Hence, Ramsey proposed to look at the function performed by the concept in our thought and talk. What work does the concept do for us? What does it allow us to achieve that we could not achieve without it? We can seek to demystify the concept of probability by relating it to human needs rather than to objective relations.

If we were all-knowing gods, we would fully believe what was true and entirely disbelieve what was false. But human minds are mired in uncertainty: there are many things that we only partially believe. I may be fairly confident that this is the path back to the campsite, but my confidence in that belief may wax and wane along the way, rendering me correspondingly
more or less disposed to take the time to go over the map again, or to consult the others.

One important function of the concept of probability, Ramsey surmised, is to serve as a measure of this practical confidence: it enables us to articulate the degrees of belief that underlie our actions. If our actions are to meet with success, we had better get our degrees of belief right; and this means that we have an interest in expressing and comparing our degrees of belief, calibrating them against each other. By enabling us to think and speak about practical confidence, the concept of probability fills precisely this need. This helps explain why we have the concept of probability and dispel its air of mystery. But instead of explaining the concept in terms of what in reality it refers to, we shall have explained it in terms of the human concerns to which it answers.

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There may be many other concepts that are best understood as outgrowths of practical needs rather than as after-images of antecedent objects. In fact, the lofty abstractions that are most prone to invite philosophical puzzlement – such as truth, knowledge, or justice – are all good candidates. But Ramsey’s example is hard to follow. Brilliant flashes of insight do not make a method.

To trace a concept back to the needs it has grown out of, one must reverse-engineer the problem to which the concept forms a solution. This requires reconstructing the kind of practical situation in which that problem would arise, and determining what might drive people lacking the concept to invent it. The task is similar to that facing archaeologists who unearth a perplexing artefact: they need to imaginatively reconstruct the human affairs that gave rise to and revolved around it in order to identify the point of the artefact.

There is a philosophical method designed to do just that: the method of telling pragmatic genealogies of concepts. It is a method that cuts across the analytic-continental divide, having been employed by David Hume as much as by Friedrich Nietzsche. More recently, it has been rediscovered notably by philosophers such as Edward Craig, Bernard Williams, Miranda Fricker, and Philip Pettit. These philosophers offer genealogies in the sense that they trace concepts to their origins, but they are pragmatic genealogies because they are primarily concerned with practical origins: with the function that the concept emerged to discharge – and perhaps continues to discharge if the needs to which it answers have endured.

Unlike intellectual historians, however, pragmatic genealogists are not primarily concerned to locate the actual historical emergence of a concept; they are primarily concerned to determine what makes some of our most venerable concepts so indispensable. Indeed, if the concept really is indispensable, its historical beginnings will anyway be shrouded in the mists of the undocumented past. Accordingly, pragmatic genealogists often have to imaginatively reconstruct the development of a concept.

Just because the most indispensable concepts are so old, however, they are likely to have been shaped by a dizzying variety of needs. Where to start? One way to bring order into that overwhelming complexity is to try and identify some of the most basic functions that a concept serves – and these are often far from being the most obvious. Much as we tend to be oblivious to the way in which the discrete assistance of gravity is indispensable to the success even of our most banal actions, the work done by our concepts is often concealed in that inconspicuous background of functionality we take for granted.

Since they want to begin by identifying the most fundamental functions performed by a concept, pragmatic genealogists initially try to keep local peculiarities out of their story. This requires reconstructing the kind of practical situation in which that problem would arise, and determining what might drive people lacking the concept to invent it. The task is similar to that facing archaeologists who unearth a perplexing artefact: they need to imaginatively reconstruct the human affairs that gave rise to and revolved around it in order to identify the point of the artefact.

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that are basic and structural enough to be at work nearly everywhere: the need to secure information about the risks and opportunities afforded by the environment, for example, would be shared even by human communities with radically different outlooks, though they might differ in what they concretely regard as a risk or an opportunity.

Given such a state-of-nature model, one can already catch a glimpse of the most generic practical pressures that might drive the emergence of the concept whose function one seeks to reverse-engineer. Just as some sculptures start life as a mere armature – a framework or formal structure in and around which the clay builds up before being moulded and honed into a fully fleshed-out form – state-of-nature genealogies can help us to identify functional armatures underlying concepts and their various historical elaborations. Of course, such state-of-nature theorising should be informed by and checked against the findings of anthropology, history, and the other human sciences, and even then there remains a risk of bending the model to one’s prejudices. But the state-of-nature model is not meant to embody historical claims about how concepts in fact originated, or indeed to yield any firm answers by itself. Its purpose is to prompt us to ask questions we did not know to ask, in particular by helping us to see possible connections between seemingly idle concepts and practical needs.

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Once upon a time, Nietzsche wrote, there was a star in some remote corner of the universe on which some shrewd creatures developed a passion for truth. They revered it as solemnly as if the world hinged on it. But then the creatures died out, and the star froze over, and it was as though nothing had happened.

Nietzsche’s fable is meant to bring out how transient, volatile, and insignificant the human passion for truth can seem in the grand scheme of things. But it is also meant to dramatise the question of why we came to value the truth as we do, as something worth seeking and telling even at great cost to ourselves, just because it is the truth. Why is that abstract concept so important to us? After all, it is not at all obvious why human intelligence would have evolved to do anything other than to dissimulate, deceive, cheat, and trick. Nor have the powerful incentives to be less than truthful gone away. That was the basis of Voltaire’s observation that “people employ language only to conceal their thoughts”. So why on earth did we come to think of truth as valuable for its own sake? And what is the value of valuing truth in this way?

**WHY IS TRUTH SO IMPORTANT TO US? AFTER ALL, IT IS NOT AT ALL OBVIOUS WHY HUMAN INTELLIGENCE WOULD HAVE EVOLVED TO DO ANYTHING OTHER THAN TO DISSIMULATE, DECEIVE, CHEAT, AND TRICK**

Nietzsche rejected the traditional responses to these questions – that the value of truth derived from the Platonic Form of Truth, or that human beings valued the truth because they valued the “True World” behind the apparent one. For Nietzsche, these responses missed the respects in which the value of truth was all too human. They treated the world as it was anyway, independently of human concerns, do all the explanatory work. They maintained, in effect, that human minds bore the impress of the value of truth because the truth was impressive. This was fundamentally the same explanatory strategy as Keynes employed, of elucidating a concept in terms of the anterior presence of some object that human beings gradually awakened to.

But Nietzsche preferred to seek the origins of mysterious concepts in worldly human affairs rather than in ethereal spheres. In this he was like Ramsey, who wrote that his picture of the world was “drawn in perspective, and not like a model to scale. The foreground is occupied by human beings and the stars are all as small as threepenny bits”. As if responding to Nietzsche’s fable, Ramsey added: “In time the world will cool and everything will die; but that is a long time off still, and its present value at compound discount is almost nothing. Nor is the present less valuable because the future will be blank. Humanity, which fills
the foreground of my picture, I find interesting and on the whole admirable”.

And rather as Ramsey had approached the concept of probability by tracing it to the need to measure and articulate practical confidence, Nietzsche thought that the value of truth originated in the exigencies of social life. In his 1873 essay “On Truth and Lies in an Extra-Moral Sense” and in his notes from that period, he sketched the outlines of a pragmatic genealogy of the value of truth. It presents the origins of that exalted ideal as thoroughly practical, and commends it for its enduring utility as long as it is not pushed too far.

Nietzsche’s genealogy of the value of truth starts out from a “State of Nature” from which the value of truth is as yet entirely absent: a Hobbesian war of all against all, in which the intellect is used mainly for dissimulation. But once human beings enter into society and language, Nietzsche writes, “the contrast between truth and lie first comes into being. The liar uses the valid designations, the words, in order to make the unreal appear as real: he says, for example, ‘I am rich’, when the correct designation of this condition would be ‘poor’”.

On Nietzsche’s view, it is the advent of liars – Voltaire’s people who employ language only to conceal their thoughts – that first instigates the development of the value of truth. In its most primitive form, the value of truth consists of two dispositions or character traits: the dispositions to seek the truth and the disposition to tell the truth. Each of these two dispositions emerges in answer to practical needs generated by the advent of liars. On the one hand, every individual needs to seek the truth in order to avoid the unpleasant consequences of being deceived; this encourages the emergence of what Nietzsche dubs the “will not to let oneself be deceived” – the primitive form of the disposition to seek the truth. On the other hand, there is a collective need to avoid the unpleasant consequences of rampant mendaciousness, which threatens to make it impossible for the community to cooperate and communicate effectively; this encourages society to impose a duty to tell the truth and threaten to ostracise those who breach that duty. Prudent members of the community therefore develop the “will not to deceive” – the primitive form of the disposition to tell the truth.

Together, the twin dispositions to seek and tell the truth make up the first intimations of the value of truth. But at this stage in Nietzsche’s genealogy, these are merely dispositions to value the truth instrumentally, as a means of avoiding the unpleasant consequences of being deceived or ostracised for breaching the socially imposed duty to tell the truth. Whatever value truth has is thus exhausted by the prudential value it derives from its consequences. Moreover, the dispositions to seek and tell the truth are limited in their application. There is no expectation that one should seek the truth beyond what is instrumentally useful to oneself, or tell the truth to people outside one’s community. But in this limited form, there is nonetheless value in valuing the truth. It answers to the need to avoid deception and secure the conditions of cooperation.

As those twin dispositions solidify through habit and are inculcated over generations, however, their original function is forgotten, and the sense of being socially bound to tell the truth awakens a moral impulse in connection to truth. The habits of seeking and telling
the truth are imbued with a moral feeling: “our habits become virtues”, Nietzsche suggests, because we come to think of the behavioural patterns we are in the habit of exhibiting as inviolable, and to regard the inviolability of those patterns as more important than our own welfare. For once imbued with the moral feeling of inviolability, the habits of seeking and telling the truth are generalised beyond their original domain of application: truth comes to be solemnly demanded everywhere and towards everyone. The shrewd creatures have developed a passion for truth.

Nietzsche’s genealogy of the value of truth began as an attempt to understand in what respects it was worth having. But he never published these remarks, and they were outshone by the fiery rhetoric he later directed at inflated conceptions of truth in the writings he did publish. This choice of emphasis is perhaps not surprising given the late nineteenth-century context in which he was writing. A witness to the heyday of hefty multi-volume scholarly tomes, he seems to have felt that his unhealthily truth-obsessed colleagues needed no further encouragement. Instead, he warned them against the readiness to sacrifice everything on the altar of truth, the attitude of “fiat veritas, pereat vita!” – “let there be truth, even should life perish!” Truth was a legitimate value, but it had to stand in the service of life.

**ON NIETZSCHE’S VIEW, IT IS THE ADVENT OF LIARS THAT FIRST INSTIGATES THE DEVELOPMENT OF THE VALUE OF TRUTH**

When the English philosopher Bernard Williams revived Nietzsche’s genealogical inquiry into the point of valuing the truth in his 2002 book *Truth and Truthfulness: An Essay in Genealogy*, he was writing at a very different juncture: between post-modern denials of the existence of truth and post-truth politics. Accordingly, his emphasis was the opposite of Nietzsche’s. Williams sought to highlight the benefits of valuing the truth, and alert readers to what would be lost if we gave up on it.

Where Williams’ genealogy casts a more flattering light than Nietzsche’s, in particular, is in showing that there is a point not just to valuing the truth, but to valuing it for its own sake. Nietzsche had put this down to the forces of habit and forgetfulness. But Williams shows that there is a powerful practical imperative to do so: it is only *insofar* as the truth is regarded as *intrinsically* valuable that valuing the truth can be *instrumentally* valuable. The value of truth, it turns out, needs to outrun its functionality in order to be functional.

Echoing Nietzsche, Williams begins his genealogy by showing how an imaginary community of language-using human beings in a simplified “State of Nature” would be driven to cultivate in its members the dispositions to seek and tell the truth. Each individual, in order to get by, needs some information about such things as whether the bear has come out of hibernation yet, or whether the cherries on the other side of the hill are ripe. To this end, one can rely on one’s own senses up to a point. But trying to find out everything for oneself is extremely inefficient, and since not everyone is at the same place at the same time, someone else might be able to see or hear something that one cannot possibly find out for oneself. Each individual therefore has a strong interest in pooling information with others in a kind of division of labour. But if the imaginary community is going to pool information, it needs to cultivate in its members whatever qualities make good contributors to the pool of information. And, according to Williams, those qualities are, first, the reliable disposition to get things right, and second, the reliable disposition to pass on that information to others in a way that is helpful and not misleading. Williams labels these dispositions “Accuracy” and “Sincerity”, capitalising the terms to signal that he is talking about simpler prototypes of what we now mean by these terms.

The trouble, however, is that as long as people are Accurate and Sincere only when it suits them anyway, any attempt to establish a practice of information pooling is doomed eventually to collapse under the weight of “free riders”: people who try to profit from the pool of information without themselves bothering to be Accurate or Sincere except when they immediately
stand to gain from it. Free riders do not just do little to enrich the pool with hard-to-get information; they vitiate it with misinformation whenever they can profit from misleading people. As long as the dispositions of Accuracy and Sincerity are valued only instrumentally, therefore, the practice of information pooling, however valuable, cannot get off the ground – and everyone is worse off as a result.

This is why people who pool information need to value the truth for its own sake – seeking it out and telling it to others just because it is the truth. Once considered intrinsically valuable, truth stakes a claim against self-interest, and the dispositions of Accuracy and Sincerity come to be regarded as qualities worthy of emulation and praise – as virtues. This may not suffice to override self-interest every time. But it enables the practice of information pooling to take off, and the occasional lie will not bring it down.

There is thus a good practical reason why we are more bloody-minded than benefit-minded about truth. The value of truth is an indispensable instrument for information-sharing creatures like us, but it is an instrument that can only do its work if its instrumental character effaces itself in favour of less instrumental considerations. Like the concept of probability, the value of truth is functional for us. But it is functional only insofar as we do not understand it merely in functional terms. Its functionality, we might say, is self-effacing.

Pragmatic genealogies like the genealogies of the value of truth told by Nietzsche and Williams can help us grasp why we think as we do. But instead of explaining concepts by tracing them to antecedent objects in reality, they trace them to practical needs and reverse-engineer the functions performed by the concepts. And instead of elucidating concepts with Ramseyan flashes of brilliant insight, they let the light dawn gradually, painstakingly reconstructing how certain basic needs give rise to further needs, and how these in turn generate problems which certain concepts are designed to solve.

In so doing, pragmatic genealogies also cast concepts in a certain evaluative light. To reveal the function of a concept in relation to certain needs is to tell us something about how the concept stands to our own concerns. It puts us in a position to ask: Do we share the needs of the creatures in the genealogical story, or has the concept outlived its usefulness? Who exactly profits from the work it performs? Should we continue to cultivate the concept, and can we adapt or extend it so that it can discharge its function even better or more widely?

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By enabling us to raise and pursue these questions, the backward-looking method of pragmatic genealogy feeds into the forward-looking enterprise of revising and ameliorating our conceptual repertoire. Especially when one lacks a clear sense of what a concept does and why one thinks in those terms to begin with, conceptual engineering should be guided by conceptual reverse-engineering. In Nietzsche’s image, one first needs to go backwards as everyone goes backwards who wants to take a big jump.

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