

Blank Slate

JOHN LOCKE (1632-1704)

Considered the greatest English philosopher of the modern period, John Locke was educated at Oxford University where he studied the classics, philosophy, and medicine. Locke wrote on a wide variety of subjects. His work *Two Treatises on Government* (1689) greatly influenced the founding fathers of the United States. His *Essay Concerning Human Understanding* (1689), where our reading comes from, is considered a classic in the theory of knowledge. It is the first systematic assault on Cartesian rationalism.

Locke argued that our knowledge must be derived from experience. He was an empiricist. Although he rejected Descartes' rationalism and his notion that we are born with innate ideas, Locke does believe that we have intuitive knowledge of our own existence and that God's existence can be demonstrated by reason.

According to Locke, our minds are a *tabula rasa*, or blank slate, at birth. It is like a blank computer screen, devoid of characters until it receives sense perceptions. All knowledge begins with sensory experience. The powers of the mind then operate upon this experience developing complex ideas from simpler ones. Contrary to the rationalist's claim of absolute knowledge, Locke held that, apart from the knowledge of the self, we know in degrees of certainty derived from inductive generalizations.

Vocabulary:

Innate:	to be born with
Koinai Ennoiai:	common thoughts
Speculative:	thoughtful

Maxims:	intentions
Apprehension:	mental understanding
Fancy:	imagination
Perpetually:	continuous
Solidity:	solid
Extension:	spread out, stretched out
Figure:	shape of an object
Corpuscles:	very small particles

Concepts:

Innate Principles:

Tabula Rasa:

Objects of Sensations:

Objects of Reflection:

Primary Qualities:

Secondary Qualities:

Abstraction:

Questions:

1. *What are Locke's arguments against Descartes' innate ideas?*
2. *According to Locke, where does our knowledge come from?*
3. *What are the differences between a sensation and a reflection?*
4. *How does Locke define "idea?"*
5. *What is the difference between primary and secondary qualities?*
6. *How does Locke define "abstraction?"*

BOOK I

Chapter I

1. It is an established opinion among some men, that there are in the understanding certain *innate principles*; some primary notions, *koinai ennoiai*, characters, as it were stamped upon the mind of man; which the soul receives in its very first being, and brings into the world with it. It would be sufficient to convince unprejudiced readers of the falseness of this supposition, if I should only show (as I hope I shall in the following parts of this Discourse) how men, barely by the use of their natural faculties, may attain to all the knowledge they have, without the help of any innate impressions; and may arrive at certainty, without any such original notions or principles. For I imagine anyone will easily grant that it would be impertinent to suppose the ideas of color innate in a creature to whom God hath given sight, and a power to receive them by the eyes from external objects: and no less unreasonable would it be to attribute several truths to the impressions of nature, and innate characters, when we may observe in ourselves faculties fit to attain as easy and certain knowledge of them as if they were originally imprinted on the mind.

But because a man is not permitted without censure to follow his own thoughts in the search of truth, when they lead him ever so little out of the common road, I shall set down the reasons that made me doubt of the truth of that opinion, as an excuse for my mistake, if I be in one; which I leave to be considered by those who, with me, dispose themselves to embrace truth wherever they find it.

2. There is nothing more commonly taken for granted than that there are certain *principles*, both *speculative* and *practical* (for they speak of both), universally agreed upon by all mankind: which, therefore, they argue, must needs be the constant impressions which the souls of men receive in their first beings, and which they bring into the world with them, as necessarily and really as they do any of their inherent faculties.

3. This argument, drawn from universal consent, has this misfortune in it, that if it were true in matter of fact, that there were certain truths wherein all mankind agreed, it would not prove them innate, if there can be any other way shown how men may come to that universal agreement, in the things they do consent in, which I presume may be done.

4. But, which is worse, this argument of universal consent, which is made use of to prove innate principles, seems to

me a demonstration that there are none such because there are none to which all mankind give an universal assent. I shall begin with the speculative, and instance in those magnified principles of demonstration, "Whatsoever, is, is," and "It is impossible for the same thing to be and not to be;" which, of all others, I think have the most allowed title to innate. These have so settled a reputation of maxims universally received, that it will no doubt be thought strange if any one should seem to question it. But yet I take liberty to say, that these propositions are so far from having an universal assent, that there are a great part of mankind to whom they are not so much as known.

5. For, first, it is evident, that all children and idiots have not the least apprehension or thought of them. And the want of that is enough to destroy that universal assent which must needs be the necessary concomitant of all innate truths: it seeming to me near a contradiction to say, that there are truths imprinted on the soul, which it perceives or understands not: imprinting, if it signify anything, being nothing else but the making of certain truths to be perceived. For to imprint anything on the mind without the mind's perceiving it, seems to me hardly intelligible. If, therefore, children and idiots have souls, have minds, with those

impressions upon them, *they* must unavoidably perceive them, and necessarily know and assent to these truths; which since they do not, it is evident that there are no such impressions. For if they are not notions naturally imprinted, how can they be innate? And if they are notions imprinted, how can they be unknown? To say a notion is imprinted on the mind, and yet at the same time to say that the mind is ignorant of it, and never yet took notice of it, is to make this impression nothing. No proposition can be said to be in the mind which it never yet knew, which it was never yet conscious of. For if any one may, then, by the same reason, all propositions that are true, and the mind is capable ever of assenting to, may be said to be in the mind, and to be imprinted: since, if any one can be said to be in the mind, which it never yet knew, it must be only because it is capable of knowing it; and so the mind is of all truths it ever shall know. No, thus truths may be imprinted on the mind which it never did, nor ever shall know; for a man may live long, and die at last in ignorance of many truths which his mind was capable of knowing, and that with certainty. So that if the capacity of knowing be the natural impression contended for, all the truths a man ever comes to know will, by this account, be every one of them innate; and this great point

will amount to no more, but only to a very improper way of speaking; which, whilst it pretends to assert the contrary, says nothing different from those who deny innate principles. For nobody, I think, ever denied that the mind was capable of knowing several truths. The capacity, they say, is innate; the knowledge acquired. But then to what end such contest for certain innate maxims? If truths can be imprinted on the understanding without being perceived, I can see no difference there can be between any truths the mind is *capable* of knowing in respect of their original: they must all be innate or all adventitious: in vain shall a man go about to distinguish them. He, therefore, that talks of innate notions in the understanding, cannot (if he intend thereby any distinct sort of truths) mean such truths to be in the understanding as it never perceived, and is yet wholly ignorant of. For if these words “to be in the understanding” have any propriety, they signify to be understood. So that to be in the understanding, and not to be understood; to be in the mind and never to be perceived, is all one as to say anything is and is not in the mind or understanding. If, therefore, these two propositions, “Whatsoever is, is,” and “It is impossible for the same thing to be and not to be,” are by nature imprinted, children cannot be ignorant of them: infants,

and all that have souls, must necessarily have them in their understandings, know the truth of them, and assent to it...

BOOK II

Chapter I

1. Every man being conscious to himself that he thinks and that which his mind is applied about while thinking being the *ideas* that are there, it is past doubt that men have in their minds several ideas, — such as are those expressed by the words *whiteness, hardness, sweetness, thinking, motion, man, elephant, army, drunkenness*, and others: it is in the first place then to be inquired, *How he comes by them?*

I know it is a received doctrine, that men have native ideas, and original characters, stamped upon their minds in their very first being. This opinion I have at large, examined already; and, I suppose what I have said in the foregoing book will be much more easily admitted, when I have shown whence the understanding may get all the ideas it has; and by what ways and degrees they may come into the mind; — for which I shall appeal to

everyone's own observation and experience.

2. Let us then suppose the mind to be, as we say, white paper, void of all characters, without any ideas: — How comes it to be furnished? Whence comes it by that vast store which the busy and boundless fancy of man has painted on it with an almost endless variety? Whence has it all the *materials* of reason and knowledge? To this I answer, in one word, from EXPERIENCE. In that all our knowledge is founded; and from that it ultimately derives itself. Our observation employed either, about external sensible objects, or about the internal operations of our minds perceived and reflected on by ourselves, is that which supplies our understandings with all the *materials* of thinking. These two are the fountains of knowledge, from whence all the ideas we have, or can naturally have, do spring.

3. First, our senses, conversant about particular sensible objects, do convey into the mind several distinct perceptions of things, according to those various ways where in those objects do affect them. And, thus, we come by those *ideas* we have of *yellow, white, heat, cold, soft, hard, bitter, sweet*, and all those which we call sensible qualities; which when I say the senses convey into the mind, I mean, they from external objects convey into the

mind what produces there those perceptions. This great source of most of the ideas we have, depending wholly upon our senses, and derived by them to the understanding, I call SENSATION.

4. Secondly, the other fountain from which experience furnishes the understanding with ideas is, — the perception of the operations of our own mind within us, as it is employed about the ideas it has got; — which operations, when the soul comes to reflect on and consider, do furnish the understanding with another set of ideas, which could not be had from things without. And such are *perception, thinking, doubting, believing, reasoning, knowing, willing*, and all the different acting of our own minds; — which we, being conscious of, and observing in ourselves, do from these receive into our understandings as distinct ideas as we do from bodies affecting our senses. This source of ideas every man has wholly in himself, and though it be not sense, as having nothing to do with external objects, yet it is very like it, and might properly enough be called *internal sense*. But as I call the other Sensation, so I call this REFLECTION, the ideas it affords being such only as the mind gets by reflecting on its own operations within itself. By reflection then, in the following part of this discourse, I would be under-

stood to mean, that notice which the mind takes of its own operations, and the manner of them, by reason whereof there come to be ideas of these operations in the understanding. These two, I say, External material things, as the objects of SENSATION, and the operations of our own minds within, as the objects of REFLECTION, are to me the only originals from whence all our ideas take their beginnings. The term *operations* here I use in a large sense, as comprehending not barely the actions of the mind about its ideas, but some sort of passions arising sometimes from them, such as is the satisfaction or uneasiness arising from any thought.

5. The understanding seems to me not to have the least glimmering of any ideas which it doth not receive from one of these two. *External objects* furnish the mind with the ideas of sensible qualities, which are all those different perceptions they produce in us; and *the mind* furnishes the understanding with ideas of its own operations.

These, when we have taken a full survey of them, and their several modes, combinations, and relations, we shall find to contain all our whole stock of ideas; and that we have nothing in our minds which did not come in one of these two ways. Let anyone examine his own thoughts, and thoroughly search into his

understanding; and then let him tell me, whether all the original ideas he has there, are any other than of the objects of his senses, or of the operations of his mind, considered as objects of his reflection. And how great a mass of knowledge so ever he imagines to be lodged there, he will, upon taking a strict view, see that he has not any idea in his mind but what one of these two have imprinted; — though perhaps, with infinite variety compounded and enlarged by the understanding, as we shall see hereafter.

6. He that attentively considers the state of a child, at his first coming into the world, will have little reason to think him stored with plenty of ideas, that are to be the matter of his future knowledge. It is by *degrees* he comes to be furnished with them. And though the ideas of obvious and familiar qualities imprint themselves before the memory begins to keep a register of time or order, yet it is often so late before some unusual qualities come in the way, that there are few men that cannot recollect the beginning of their acquaintance with them. And if it were worth while, no doubt a child might be so ordered as to have but a very few, even of the ordinary ideas, till he were grown up to a man. But all that are born into the world, being surrounded with bodies that perpetually and diversely affect them,

variety of ideas, whether care be taken of it or not, are imprinted on the minds of children. Light and colors are busy at hand everywhere, when the eye is but open; sounds and some tangible qualities fail not to solicit their proper senses, and force an entrance to the mind; — but yet, I think, it will be granted easily, that if a child were kept in a place where he never saw any other but black and white till he were a man, he would have no more ideas of scarlet or green, than he that from his childhood never tasted an oyster, or a pineapple, has of those particular relishes....

Chapter VIII

8. Whatsoever the mind perceives *in itself*, or is the immediate object of perception, thought, or understanding, that I call *idea*; and the power to produce any idea in our mind, I call *quality* of the subject wherein that power is. Thus a snowball having the power to produce those ideas in us, as they are in the snowball, I call qualities; and as they are sensations or perceptions in our understandings, I call them ideas; which *ideas*, if I speak of sometimes as in the things themselves, I would be understood to mean those qualities in the objects which produce them in us.

9. Qualities thus considered in

bodies are, *First*, such as are utterly inseparable from all body, in what state soever it be; and such as in all the alterations and changes it suffers, all the force can be used upon it, it constantly keeps; and such as sense constantly finds in every particle of matter which has bulk enough to be perceived; and the mind finds inseparable from every particle of matter, though less than to make itself singly be perceived by our senses: Take a grain of wheat, divide it into two parts; each part has still solidity, extension, figure, and mobility: divide it again, and it retains still the same qualities; and so divide it on, till the parts become insensible; they must retain still each of them all those qualities. For division (which is all that a mill, or pestle, or any other body, does upon another, in reducing it to insensible parts) can never take away either solidity, extension, figure, or mobility from any body, but only makes two or more distinct separate masses of matter, of that which was but one before; all which distinct masses reckoned as so many distinct bodies, after division, make a certain number.

These I call *original* or *primary qualities* of body, which I think we may observe to produce simple ideas in us, solidity, extension, figure, motion or rest and number.

10. *Secondly*, such qualities

which, in truth, are nothing in the objects themselves but powers to produce various sensations in us by their primary qualities, i.e. by the bulk, figure, texture, and motion of their insensible parts, as colors, sounds, tastes, etc. These I call *secondary qualities*. To these might be added a *third* sort, which are allowed to be barely powers; though they are as much real qualities in the subject as those which I, to comply with the common way of speaking, call qualities, but for distinction, secondary qualities. For the power in fire to produce a new color, or consistency in *wax* or *clay* — by its primary qualities, is as much a quality in fire, as the power it has to produce in *me* a new idea or sensation of warmth or burning, which I felt not before, — by the same primary qualities, the bulk, texture, and motion of its insensible parts....

13. ...let us suppose at present that the different motions and figures, bulk and number, of such particles, affecting the several organs of our senses, produce in us those different sensations which we have from the colors and smells of bodies; that a violet, by the impulse of such insensible particles of matter, of peculiar figures and bulks, and in different degrees and modifications of their motions, causes the ideas of the blue color, and sweet scent of that flower to be

produced in our minds. It being no more impossible to conceive that God should annex such ideas to such motions, with which they have no similitude, than that he should annex the idea of pain to the motion of a piece of steel dividing our flesh, with which that idea hath no resemblance.

14. What I have said concerning colors and smells may be understood also of tastes and sounds, and other the like sensible qualities; which, whatever reality we by mistake attribute to them, are in truth nothing in the objects themselves, but powers to produce various sensations in us; and depend on those primary qualities, bulk, figure, texture, and motion of parts as I have said.

15. From whence I think it easy to draw this observation, — that the ideas of primary qualities of bodies are resemblances of them, and their patterns do really exist in the bodies themselves, but the ideas produced in us by these secondary qualities have no resemblance of them at all. There is nothing like our ideas, existing in the bodies themselves. They are, in the bodies we denominate from them, only a power to produce those sensations in us: and what is sweet, blue, or warm in idea, is but the certain bulk, figure, and motion of the insensible parts, in the bodies themselves, which we call so.

16. Flame is denominated hot and light; snow, white and cold; and manna, white and sweet, from the ideas they produce in us. Which qualities are commonly thought to be the same in those bodies that those ideas are in us, the one the perfect resemblance of the other, as they are in a mirror, and it would by most men be judged very extravagant if one should say otherwise. And yet he that will consider that the same fire that, at one distance produces in us the sensation of warmth, does, at a nearer approach, produce in us the far different sensation of pain, ought to bethink himself what reason he has to say — that this idea of warmth, which was produced in him by the fire, is *actually in the fire*; and his idea of pain, which the same fire produced in him the same way, is *not* in the fire. Why are whiteness and coldness in snow, and pain not, when it produces the one and the other idea in us; and can do neither, but yet the bulk, figure, number, and motion of its solid parts?

21. Ideas being thus distinguished and understood, we may be able to give an account how the same water, at the same time, may produce the idea of cold by one hand and of heat by the other: whereas it is impossible that the same water, if those ideas were really in it, should at the same time be both hot and cold. For, if we imagine *warmth*, as it is in

our hands, to be nothing but a certain sort and degree of motion in the minute particles of our nerves or animal spirits, we may understand how it is possible that the same water may, at the same time, produce the sensations of heat in one hand and cold in the other; which yet *figure* never does, that never producing the idea of a square by one hand which has produced the idea of a globe by another. But if the sensation of heat and cold be nothing but the increase or diminution of the motion of the minute parts of our bodies, caused by the corpuscles of any other body, it is easy to be understood, that if that motion be greater in one hand than in the other; if a body be applied to the two hands, which has in its minute particles a greater motion than in those of one of the hands, and a less than in those of the other, it will increase the motion of the one hand and lessen it in the other; and so cause the different sensations of heat and cold that depend thereon....

When children have, by repeated sensations, got ideas fixed in their memories, they begin by degrees to learn the use of signs. And when they have got the skill to apply the organs of speech to the framing of articulate sounds, they begin to make use of words, to signify their ideas to others. These verbal signs they sometimes borrow from others, and sometimes

make themselves, as one may observe among the new and unusual names children often give to things in the first use of language.

The use of words then begin to stand as outward marks of our internal ideas, and those ideas being taken from particular things, if every particular idea that we take in should have a distinct name, names must be endless. To prevent this, the mind makes the particular ideas received from particular objects to become general; which is done by considering them as they are in the mind such appearances, — separate from all other existences, and the circumstances of real existence, as time, place, or any other concomitant ideas. This is called ABSTRACTION, whereby ideas taken from particular beings become general representatives of all of the same kind; and their names generate names applicable to whatever exists conformable to such abstract ideas. Such precise, naked appearances in the mind, without considering how, whence, or with what others they came there, the understanding lays up (with names commonly annexed to them) as the standards to rank real existences into sorts, as they agree with these patterns, and to denominate them accordingly. Thus the same color being observed today in chalk or snow, which the mind

yesterday received from milk, it considers that appearance alone, makes it a representative of all that kind; and having given it the name whiteness, it by that sound signifies the same quality where so ever to be imaged or met with; and thus universal, whether ideas or terms, are made....

From John Locke, *An Essay Concerning Human Understanding*, 1689.

