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An Essay Concerning Human Understanding Book III -- Words

By John Locke

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CHAPTER i: WORDS OR LANGUAGE IN GENERAL

1. God, having designed man to be a sociable creature, not only made him with an inclination and a need to have fellowship with other men, but also equipped him with *language*, which was to be the great instrument and common tie of society. So nature shaped man's organs so that he could make articulate sounds, which we call 'words'. But this was not enough to produce language, for parrots and some other birds can learn to make distinct enough articulate sounds, yet they are far from being capable of language.

2. Besides articulate sounds, therefore, man had also to be able to use these sounds as signs of internal conceptions, making them stand as marks for ideas in his own mind. This was so that he could make those ideas known to others, thus conveying thoughts from one mind to another.

3. But this still didn't suffice to make words as useful as they ought to be. If every particular thing had to be given a separate name, there would be *so many* words that the language would be too complicated to use; so a fully satisfactory language needs sounds that, as well as being signs of ideas, can be used in such a way that one idea covers a number of particular things. So language was improved in yet another way by coming to include *general terms*, so that one word can mark a multitude of particular things. Sounds could be used in this helpful manner only by signifying ideas of a special kind: names become general if they are made to stand for general ideas, and names remain particular if the ideas they signify are particular. [Locke regularly uses 'name' to cover not only proper names but also general words such as 'woman', 'island', 'atom' and so on.]

4. Besides these names standing for ideas, there are other words that men use to signify not any idea but rather the lack or absence of certain ideas or of all ideas whatsoever. Examples are 'nihil' [= 'nothing'] in Latin, and in English 'ignorance' and 'barrenness'. These negative or privative words can't be said properly to have no ideas associated with them, for then they would be perfectly meaningless sounds. Rather, they relate to positive ideas, and signify their absence.

[In section **5** Locke discusses the words referring to items far removed from anything of which we have sense-experience. The meanings of many such words, he says, are borrowed from ideas of sense-perception.] For example, 'imagine', 'apprehend', 'comprehend', 'adhere', 'conceive', etc. are all words taken from the operations of perceptible things and applied to certain modes of thinking....

6. But to understand better the use and force of language as a means for instruction and knowledge, we should tackle two questions. (1) In the use of language, what are names immediately applied to? Also, given that all words (except proper names) are general, and so stand not for particular things but for sorts and kinds of things, (2) what *are* these sorts and kinds (or, if you prefer Latin, these species and genera)? what do they consist in? how do they come to be made? When we have explored these thoroughly, we shall have a better chance of finding the right use of words, the natural advantages and defects of language, and the remedies that ought to be used to avoid obscurity or uncertainty in the signification of words. Without that we can't talk in a clear and orderly way about knowledge; and knowledge, which has to do with propositions (most of them universal ones) has a greater connection with words than perhaps is suspected.

So these matters will be the topic of the following chapters.

CHAPTER ii: THE SIGNIFICATION OF WORDS

1. A man may have a great variety of thoughts that could bring profit and delight to others as well as to himself; but they are all locked up inside him, invisible and hidden from others, and incapable of being brought out into the open. If society is to flourish, thoughts must be communicated; so people had to devise some external perceptible signs through which they could let one another know of those invisible ideas of which their thoughts are made up. For this purpose nothing was so suitable - because plentiful and quickly available - as those articulate sounds they found they could make so easily and in such variety. That is presumably how men came to use spoken words as the signs of their ideas. There is no natural connection between particular sounds and particular ideas (if there were, there

would be only one human language); but people arbitrarily chose to use such and such a word as the mark of such and such an idea. So that is what words are used for, to be perceptible marks of ideas; and the ideas they stand for are their proper and immediate signification [= 'meaning']. [Locke uses 'arbitrary' in what was then its dominant sense, as meaning 'dependent on human choice', with no implication that the choice was random or unreasonable or unmotivated. This will be important in v.3 and thereafter.]

2. Men use these marks either $\hat{\mathbf{Y}}$ to record their own thoughts as an aid to their memory or $\hat{\mathbf{Y}}$ to bring their ideas out into the open (so to speak) where others could see them. So words in their primary or immediate signification stand for nothing but the ideas in the mind of him that uses them, however imperfectly or carelessly those ideas are taken from the things they are supposed to represent. When one man speaks to another, it is so as to be understood; and the goal of his speech is for those sounds to mark his ideas and so make them known to the hearer. What words are the marks of, then, are the ideas of the speaker. And nobody can apply a word, *as a mark*, immediately to anything else. For that would involve making the word be a sign of his own conceptions, and yet apply it to another idea; which would be to make it a sign and yet not a sign of his ideas at the same time; which would in effect deprive it of all signification. In case it isn't clear to you why I say 'a sign of his own conceptions', I shall explain: applying the word *as a mark* of a thing involves applying it *intending it to stand for* that thing, which means applying it with an accompanying thought about the word's significance.

·Here is a second argument for the same conclusion·. Words are voluntary signs, and can't be voluntary signs imposed by someone on something that he doesn't know, for that would be to make them signs of nothing, sounds without signification. For a man to make his words be the signs either of \ddot{Y} qualities in things or of \ddot{Y} conceptions in someone else's mind, he must have *in his own mind* \ddot{Y} ideas of those qualities or conceptions. Till he has some ideas of his own, he can't suppose them to correspond with the conceptions of another man. And when a man represents to himself other men's ideas by some of his own, he may agree to give them the same names that other men do; but it is still his own ideas ·that he immediately signifies· - ideas that he has, not ones that he lacks.

3. This is necessary if language is to succeed - so necessary that in this respect ignorant people and learned ones all use words in the same ways. Meaningful words, in each man's mouth, stand for the ideas that he has and wants to express by them. A child who has seen some metal and heard it called 'gold', and has noticed nothing in it but its bright shining yellow colour, will apply the word 'gold' only to his own idea of that colour and to nothing else; and so he will call that same colour in a peacock's tail 'gold'. Someone who has also noticed that the stuff is heavy will use the sound 'gold' to stand for a complex idea of a shining, yellow, *and very heavy* substance. Another adds to those qualities fusibility; and then for him the word 'gold' signifies a body that is bright, yellow, *fusible*, and very heavy. Another adds malleability, and so on. Each uses the word 'gold' when he has occasion to express the idea that he has associated with it; but obviously each can apply it only to his own idea, and can't make it stand as a sign of a complex idea that he doesn't have.

4. But although words can properly and immediately signify nothing but ideas in the mind of the speaker, yet men in their thoughts give words a secret reference to two other things.

First, they suppose their words to be marks also of ideas in the mind of *the hearer*. Without that they would talk in vain; if the sounds they applied to one idea were applied by the hearer to another, they couldn't be understood, and would be speaking different languages. Men don't often pause to consider whether their ideas are the same as those of the hearers. They are satisfied with using the word in what they think to be its ordinary meaning in that language; which involves supposing that the idea they make it a sign of is precisely the same as the one to which literate people in that country apply that name.

5. Secondly, because a man wants his hearers to think he is talking not merely about his own imagination but about things as they really are, he will often suppose his words to stand \cdot not just for his ideas but also for the reality of things. This relates especially to *substances and their names*, as perhaps the former 'secret reference' does to *simple ideas and modes \cdot and their names* \cdot ; so I shall deal more fully with these two different ways of applying words when I come to discuss the names of mixed modes and especially of substances. Let me just say here that it is a perverting of the use of words, and brings unavoidable obscurity and confusion into their signification, whenever we make them stand for anything ideas in our own minds.

6. Two further points about words are worth noting. First, because they immediately signify one's own ideas, . . . the constant use of a word may create such a connection between that sound and the idea it signifies that hearing the word excites the idea almost as readily as if the relevant kind of object were presented to the senses. This is manifestly so in regard to all the obvious perceptible qualities, and in regard to in all substances that frequently come our way.

7. Secondly, through familiar use of words from our cradles we come to learn certain articulate sounds very perfectly, and have them readily on our tongues and always at hand in our memories, yet are not always careful about what exactly they mean; and so it comes about that men, even when they want to think hard and carefully, often direct their thoughts more to *words* than to *things*. Indeed it goes further. Many words are learned before the ideas for which they stand are known, and so it happens that some people - not only children, but adults - utter various words just as parrots do, because they have learned them and have been accustomed to those sounds. But so far as words are useful and significant, so far is there a constant connection between the sound and the idea, and a designation that the one stands for the other. 'Words' that are not thus connected with ideas are nothing but so much insignificant noise.

[In section 8 Locke emphasizes that each word has its meaning by a purely 'arbitrary imposition', and that ultimately it is for each individual to decide what idea he will associate with a given word. There are practical reasons for wanting one's own word-idea pairings to be the same as those of most speakers and hearer's in one's own society; but that is a practical concern that leaves standing the fact of personal responsibility for the meanings of one's speech.]

CHAPTER iii: GENERAL TERMS

1. Since all things that exist are particulars, it might be thought reasonable that words, which ought to conform to things, would stand for particular things. But the facts are

quite different: most words in all languages are *general* terms. There are reasons for this; indeed it was inevitable.

2. First, it is impossible for every particular thing to have a name all of its own. Because the meaningful use of words depends on the mind's connecting them with the ideas of which they are signs, the mind must contain those ideas, and it must have stored within itself all the information about which idea is signified by each word. But it is beyond our power to form and retain separate ideas of all the particular things we meet with: every bird and beast that men have seen, every tree and plant that has affected the senses, couldn't find a place in the most capacious understanding. When a general knows by name every soldier in his army, this is thought to be a prodigious feat of memory; so it is easy to see why men have never tried to give a name to each sheep in their flock, or every crow that flies over their heads; much less to call every grass-blade or grain of sand that comes their way by its own proper name.

3. Secondly, even if this were possible, it would be useless, because it would get in the way of language's main purpose. Nothing would be achieved by heaping up names of particular things: that wouldn't help us to communicate our thoughts. The only reason to learn names and use them in talk with others is so as to be understood; and that requires that the sound I make through my organs of speech shall arouse in your mind the same idea that I had in mind when I spoke. This can't be done through names that stand only for particular things of which I alone have the ideas in my mind. If you haven't encountered those very same things, the words that I use to stand for them won't be intelligible to you.

4. Thirdly, even if this were feasible (which I don't think it is), a separate name for every particular thing would not be of much use for increasing our knowledge. Although knowledge is ultimately based on particular things, it broadens itself to take general views of things; and for this it needs to group them into *sorts*, under *general* names. These sorts, with the names belonging to them, are fairly limited in number; they don't multiply beyond what the mind can contain or beyond what we have use for. That is why men have mostly relied upon such general names, though they also give individual names to particular things when it is convenient to do this - for example, giving proper names to individual people whom they often have occasion to mention.

5. Not only persons but also countries, cities, rivers, mountains, and other geographical items are often given singular names, and always for the same reason. If we had reason to mention particular *horses* as often as we have particular *men*, no doubt we would use proper names for the former as we do for the latter. . . That is how it is with jockeys, for whom horses have their proper names to be known and picked out by, because they often have occasion to mention this or that particular horse when he is out of sight .and therefore can't be designated by pointing.

6. Now we must consider how general words come to be made. For since all things that exist are only particulars, how do we come by general terms? Where do we find those 'general natures' they are supposed to stand for? Words become general by being made the signs of general ideas; and ideas become general by separating from them the circumstances of time and place and any other ideas that may tie them down to this or that particular existence. By means of such *abstraction* they are fitted to represent more than

one individual. Every individual that conforms to that abstract idea is of that *sort* (as we call it).

7. To understand this more clearly, let us trace our notions and names from their beginning in infancy, and see how they develop from there. It is perfectly obvious that the ideas of the persons children encounter are, like the persons themselves, only particular. The ideas of the nurse and the mother are well formed in the infants' minds. They represent only those individuals, and the only words that the infant has for the individuals are, in effect, proper names, like 'Nurse' and 'Mamma'. As they get older and meet more people, they notice that many other things in the world resemble - in shape and in other ways - their father and mother and other people they have been used to; and they form an idea that applies equally to all those many particular people, associating this idea with the name 'man'. [Here, as nearly everywhere, Locke uses 'man' to mean 'human'; it isn't confined to the male sex.] That is how they come to have a general name and a general idea. In doing this, they don't **Y**make anything new, but only **Y**leave out of the complex ideas they had of Nurse and Mamma, Peter and James, Mary and Jane, that which is unique to each, and retain only what is common to them all.

8. In the same way that they come by the general name 'man' and the general idea of man, they easily advance to names and notions that are even more general. They notice that various things that differ from their idea of man, and so can't be brought under the name 'man', nevertheless share certain qualities with man. By uniting just those qualities into one idea, leaving all other qualities out, they come to have another yet more general idea, which they associate with a new word that applies to more things than 'man' does. This new idea is made not by adding anything but only, as before, by leaving out the shape and some other properties signified by the name 'man, and retaining only *a body, with life, sense, and spontaneous motion*. Those are the properties signified by the name 'animal'.

9. It is obvious that this is how men first came to form general ideas and to associate general names with them. To see that it is right, you have only to consider what goes on in your mind, or in the minds of others, when you or they think and gain knowledge. Someone who thinks that general natures or notions are anything but such abstract and partial ideas, drawn from more complex ideas and originally taken from particular existing things, will be at a loss to say what they are. Reflect on your own mind and then answer this: How does your idea of man differ from that of Peter and Paul (or your idea of horse differ from that of Bucephalus) except by leaving out whatever is unique to each individual and retaining only what is present in all the complex ideas of particular men (or particular horses)? Again, by starting with the complex ideas signified by the names 'man' and 'horse', omitting whatever features they don't share and retaining only those that are common to both, we can form a complex idea to which we give the name 'animal'. Leave sense and spontaneous motion out of the idea of animal, and what remains are the simpler ideas of *body*, *life*, and *nourishment*; they constitute a more general idea that we associate with the term 'living'. In the same way the mind proceeds to 'body', 'substance', and at last to universal terms that stand for any of our ideas whatsoever - I mean terms such as 'being' and 'thing'. To conclude, this whole mystery of genera and species, which they make such a fuss about in the schools and which are rightly disregarded everywhere else, is simply a matter of more or less comprehensive abstract ideas, with names tied to them.

[A genus (plural: genera) is a large class; a species is a smaller one within it. Mankind may be seen as a species within the genus of animals. The 'schools' mentioned here are the universities of western Europe in the late Middle Ages. Thinkers who accepted the (mostly Aristotelian) doctrines in metaphysics, logic and theology that were taught there were known as 'Schoolmen' or 'Scholastics'.] There are no exceptions to this: every more general term stands for such an idea, and the idea is merely a part of any of the ideas associated with less general terms contained under the more general one \cdot so that, for instance, the idea of 'animal' is a part of the ideas of 'man' and of 'tiger'.

10. This may show us why we sometimes define a word - that is, declare its meaning - in terms of the 'genus' or next general word that covers it. This saves the labour of listing all the simple ideas that the next general word or genus stands for; and it may sometimes spare us from the shame of not being *able* to do that! Although defining by genus and differentia is the shortest way, however, it may not be the best. . . . [The 'differentia' is what marks off the species within the genus. Taking *human* as a genus and *woman* as a species, the differentia is *adult female*.] It is certainly not the only way, and so we are not absolutely required to follow it. To define a word is simply to make someone else understand through words what idea the defined word stands for; and the best way to do this is by straightforwardly enumerating the simple ideas that are combined in the meaning of the word being defined. If, instead, most of those simple ideas are conveyed by naming the genus under which the defined word falls, that is not done out of necessity, or even for greater clearness, but merely for the sake of speed and convenience. If someone wants to know what idea the word 'man' stands for, his needs will be as well met by being told that man is a solid extended substance, having life, sense, spontaneous motion, and a capacity for reasoning as by being told that man is a rational animal. The two definitions are really equivalent, by virtue of the meanings of 'animal', 'living' and 'body'. This example illustrates what led people to the rule that a definition must consist of genus and differentia; and it also shows that the rule is not necessary and not even very useful. . . . I shall say more about definitions in the next chapter.

11. To return to general words, it is plain from what I have said that *generality* and *universality* are not properties of reality itself; rather, they are something that the understanding has invented for its own convenience, and they apply only to \cdot verbal and mental signs - words and ideas. I repeat: $\dot{Y}a$ word is general when it is used as a sign of a general idea, so that it applies to many particular things; and $\ddot{Y}an$ idea is general when it is taken to be the representative of many particular things; but universality doesn't belong to things themselves, which are all particular in their existence - even the words and ideas that have general meanings. For example, the word 'chapter' at the end of your copy of the last section is *in itself* a particular array of ink on a page; but its *meaning* isn't particular but general, because it is applicable not just to some one particular chapter but to any chapter. So the only general items there are have been created by us, and they are 'general' only in the sense that we can use them to signify [= 'mean'] or represent many particulars. Their meaning is nothing but a relation that is added to them by the human mind.

12. Let us now consider what kind of signification general words have. Obviously such a word does not \ddot{Y} signify just one particular thing - for then it would not be a general term

but a proper name - but it is equally evident that it does not Ysignify a plurality. For example, 'man' isn't the name of some one man; but nor is it a name for some group of men or for the totality of all men. If it did signify a plurality, 'man' would mean the same as 'men', and the distinction between singular and plural would disappear. What a general word Ÿsignifies is a sort of things; and it does this by standing for an abstract idea in the mind. When existing things are found to conform to that idea, they come to be *classified* under that name, or - to say the same thing in different words - they come to be of that sort. This makes it evident that the essences of the sorts of things (or species of things if you prefer Latin) are nothing but these abstract ideas. [The 'essence' of a sort is the set of features that are essential for a thing to be of that sort. To know what is needed for something to be of a the sort gold (Locke is saying), you start with the general word 'gold', are led from that to your abstract idea of *gold*, and the features represented in that abstract idea are the essence *gold*.] What makes a thing belong to a \cdot sort or \cdot species is its having the essence of that species; and what gives a thing a right to a species name is its conforming to the idea with which that name is associated. So having the essence of a species is conforming to the idea associated with its name; that is all there is to it. I shall now re-state all this in slightly different terms, illustrating it through the sort *man*, though of course it applies equally well to any other sort, and any other general term. Each of the items in the following list is equivalent to the item that immediately follows it:

having the essence of man

being a man, or belonging to the species man

having a right to the name 'man'

conforming to the abstract idea that the name 'man' stands for.

So the first item is equivalent to the last: the abstract idea for which the name stands, and the essence of the species, is one and the same. This makes it easy to see that the essences of the sorts of things, and consequently the sorting of things, is all done by the understanding that abstracts and makes those general ideas.

13. I have not forgotten - still less do I deny - that nature makes things in such a way that some of them are *like* others. This is perfectly obvious, especially in the case of animals and plants. Still, it is all right to say that the sorting of things under general names is the work of the understanding. What it does is to attend to the similarities it finds amongst things, and on the basis of those it makes abstract general ideas (with names attached), which it uses as patterns. When a particular existing thing is found to agree with one of these patterns, it comes to be of that species, to have that name, or to be put into that class. For when we say 'This is a man', 'That is a horse', 'This is justice', 'That is cruelty', 'This is a watch', 'That is a bottle', all we do is to classify things under different specific names [= 'names of species'] because they conform with the abstract ideas which we use those names to signify. And the essences of those species that we have set out and marked by names are simply those abstract ideas in the mind, which are (as it were) the bonds that tie particular things to the names under which they are classified. What connects a general name with a particular thing is the abstract idea that unites them: So that the essences of species, as picked out and labelled by us, can't be anything but these abstract ideas that we have in our minds. If the supposed 'real essences' of things are different from our abstract ideas, they can't be the essences of the species into which we group things. Nothing in the natures of things themselves dictates which groups of them constitute a single species,

rather than two species or parts of a single species. What changes can you make in a horse or a piece of lead without making either of them belong to a different species? If you go by our abstract ideas, this is easy to answer; but if you try to go by supposed real essences, you will be at a loss - you will never be able to settle exactly when any thing ceases to belong to the species of *horse* or *lead*.

14. My assertion that these essences or abstract ideas are the work of the understanding will come as no surprise to anyone who realizes that complex ideas are often *different* collections of simple ideas in the minds of different men - so that people will differ, for instance, in what they mean by saying that someone is 'covetous'. Abstract ideas of substances seem to be dictated by the things themselves, yet even they are not settled and the same for everyone - even as regards our own species. It has sometimes been doubted whether a particular fetus born of a woman was human, with debates about whether it should be kept alive and baptized. This couldn't happen if the abstract idea or essence to which the name 'human' belonged were of nature's making, rather than being an uncertain collection of simple ideas that various people's understandings have put together in different ways and associated with a name. Really, then, every distinct abstract idea is a distinct essence, and the names that stand for such distinct ideas are the names of things that are different in their essences. Thus a circle is as essentially different from an oval as a sheep is from a goat; and rain is as essentially different from snow as water is from earth. In each case, the essence of one kind isn't present in the other. So any two abstract ideas that differ from one another in any way at all, with two distinct names annexed to them, constitute two distinct sorts or species, which are as essentially different as any two of the most remote or opposite in the world.

15. Some people think that the essences of things are wholly unknown, and they have some reason for this. To understand it, we should consider the various meanings of the word 'essence'.

First, 'essence' may be taken for the very being of any thing - what makes it be what it is. Using the term in this way, a thing's 'essence' is its internal constitution - the real but usually unknown inner nature on which its perceptible qualities depend. This is the proper original meaning of the word, as can be seen from its origin: the Latin *essentia* comes from the verb *esse*, which means 'to be'. The word 'essence' is still used in this sense, when we speak of the essence of particular things without giving them any name.

Secondly, academic wrangling about genus and species has had the effect of almost entirely suppressing that original meaning of 'essence'. Instead of referring to the *real* constitutions of things, essences these days are usually thought of in a second way, in which they are connected with the *artificial* constitution of genus and species. Real constitutions are ones that are laid down in the things themselves; artificial ones are products of human artifice, that is, of human classificatory procedures. When people talk in this way, they assume that each sort of things has a real constitution; and it is unquestionably true that any collection of simple ideas [here= 'qualities'] that regularly go together must be based on some real constitution. But the fact remains that when things are classified into sorts or species, and named accordingly, what we *go by* are the abstract ideas with which we have associated those names. The essence of each genus or sort - ·that is, what fixes the sort, what determines membership in it \cdot - is just the abstract idea that the general name stands for. This, we shall find, is how 'essence' is mostly used.

These two sorts of essences could reasonably be called the *real* and the *nominal* essence respectively ['real' comes from Latin *resemble* = 'thing'; 'nominal' comes from Latin *nomen* = 'name'].

16. Nominal essences are tightly tied to names. Whether a given particular thing is to be described by a given general name depends purely on whether thing has the essence that makes it conform to the abstract idea with which that name is associated.

17. There are two opinions about the real essences of bodies. \dot{Y} Some people think there is a certain limited number of real essences according to which all natural things are made. Each particular thing, they believe, exactly fits one of these essences, and thus belongs to one species. These folk use the word 'essence' without knowing what essences are. \dot{Y} Others have a more reasonable view: according to them, the essence of a natural thing is the real but unknown constitution of its imperceptible parts, from which flow those perceptible qualities on the basis of which we classify things into sorts under common names. The former of these opinions, which takes essences to be a certain number of forms or moulds into which all natural things are poured (so to speak) has created great confusion in the knowledge of natural things. In every animal species, monstrous births frequently occur, and human births sometimes produce imbeciles or other strange products which are not clearly human and not clearly non-human; and all this poses problems for this hypothesis about real essences. . . . Even apart from those difficulties, the mere fact that these \cdot first-opinion' real essences can't be known means that they are useless to us in classifying things, although they are supposed to mark off the real boundaries of the species! In our thoughts about classification, then, we ought to set these supposed real essences aside, and content ourselves with knowable essences of sorts or species. When we think the matter through, we shall see that these are, as I have said, nothing but the abstract complex ideas with which we have associated separate general names.

18. Having distinguished essences into *nominal* and *real*, I point out that in the species of Ÿsimple ideas and Ÿmodes the two kinds of essence are always the same, while with $\ddot{\mathbf{Y}}$ substances they are always quite different. Thus $\cdot a$ mode such as $\cdot a$ figure including a space between three straight lines is the real as well as the nominal essence of a triangle; for it isn't only the abstract idea to which the general name is attached, but also the very essentia or being of the thing itself, that foundation from which all its properties flow and to which they are all inseparably united. It isn't like that with the portion of matter that makes the ring on my finger, which apparently has two different essences. All its perceptible properties of colour, weight, fusibility, fixedness, etc. flow from .its real essence, that is the real constitution of its imperceptible parts; we don't know \hat{Y} this constitution, so we have no **Ÿ**particular idea of it and, therefore, no **Ÿ**name that is the sign of it. But its colour, weight, fusibility, fixedness, etc. are what make it gold, or give it a right to that name; so they are its nominal essence. What they constitute really is an 'essence', properly so-called, since nothing can be called 'gold' unless its qualities fit that abstract complex idea to which the word 'gold' is annexed. This distinction between two kinds of essence is especially relevant to substances, and I shall deal with it more fully when I come to the names of substances in vi-.

19. For more evidence that such abstract ideas with names attached to them really are essences, consider what we are told regarding essences, namely that they cannot be created or destroyed. This can't be true of the real constitutions of things, which begin and perish with the things. All things that exist (except God) are liable to change, especially the things we have come across and have sorted into groups under separate names. What is Ygrass to-day will tomorrow be Ythe flesh of a sheep, and a few days after that become **Y**part of a man. In all such changes, it is evident that the thing's real essence the constitution of it on which its properties have depend - is destroyed, and perishes with the thing. On the other hand, essences considered as *ideas established in the mind with names attached to them* are supposed to remain steadily the same, whatever changes the particular substances undergo. Whatever becomes of Alexander and Bucephalus, the ideas to which 'man' and 'horse' are attached are supposed to remain the same; and so the essences of those species - . of man and of horse. - are preserved whole and undestroyed, whatever changes happen to any man or horse, or indeed to all men or horses. By this means the essence of a species remains safe and whole, even if there doesn't exist a single individual of that kind. [Locke gives other examples: the idea of circle (supposing there were no exact circles), of *unicorn*, of *mermaid*. He concludes:] From what has been said it is evident that the doctrine of the unchangeability of essences proves them to be only abstract ideas. Being founded on the relation established between those ideas and certain sounds as signs of them, the doctrine will always be true as long as the same name can have the same meaning.

20. Summing up, all the great business of genera and species, and their essences, amounts to nothing but this: when people make abstract ideas and settle them in their minds with names attached, they enable themselves to think and talk about things in bundles, as it were. This enables them to communicate and learn more quickly and easily; their knowledge would grow very slowly if their words and thoughts were confined to particulars.

CHAPTER iv: THE NAMES OF SIMPLE IDEAS

1. Although all words immediately signify ideas in the mind of the speaker, and nothing else, closer scrutiny shows that each of the main categories of names - of simple ideas, of mixed modes (which I take to include relations), and of natural substances - has peculiarities of its own. I shall point out six of these. The first (section 2) is a feature shared by names of simple ideas and substances but not by mixed modes, the second (section 3) is a feature of the names of simple ideas and mixed modes but not of substances, the third (sections 4-14) and fourth (15) and fifth (16) are peculiarities of the names of simple ideas; the sixth (17) also differentiates names of simple ideas from those of substances and, even more strongly, from those of mixed modes.

2. First, the names of \ddot{Y} simple ideas and \ddot{Y} substances, as well as the abstract ideas in the mind that they immediately signify, indicate also some real existence from which came the idea that was their original pattern. But the names of \ddot{Y} mixed modes *terminate in the idea in the mind* and don't lead thoughts any further. I shall enlarge on this in the next chapter.

3. Secondly, the names of \ddot{Y} simple ideas and \ddot{Y} modes signify always the *real* as well as *nominal* essence of their species \cdot because with each of these the nominal essence *is* the

real essence. But the names of $\ddot{\mathbf{Y}}$ natural substances rarely if ever signify anything but the nominal essences of those species. I shall show this in vi.

4. Thirdly, the names of $\hat{\mathbf{Y}}$ simple ideas can't be defined; the names of all $\hat{\mathbf{Y}}$ complex ideas can. \cdot So can the names of $\hat{\mathbf{Y}}$ substances, but I shall say nothing about them in the following ten sections. So far as I know, nobody has explored the question of what words can and what can't be defined. The lack of knowledge about this seems to me to contribute to great wrangling and obscurity in men's discourses: some demand definitions of terms that can't be defined, and others think they ought to be satisfied with equating a word with a more general word and its restriction (or in technical terms, a 'definition through genus and difference'), even when the definition made according to that rule does not help anyone to understand the meaning of the word better than he did before. I think, anyway, that it is relevant to my present purposes to show what words can and what cannot be defined, and what a good definition consists in. This may throw enough light onto the nature of these signs and \cdot of their relation to \cdot our ideas to justify this more thorough enquiry.

5. I shan't trouble myself here to prove that not all terms are definable, arguing from the infinite regress that we would obviously be led into if we tried to define all names: if the terms of each definition had to be defined by yet another, where would the process end? \cdot Rather than labouring that, I shall argue from the nature of our ideas and the signification of our words, showing *why* some names can be defined and others cannot, and which are which. The argument from infinite regress does not pick on any name as indefinable, still less show why it is so.

6. I think it is agreed that to define a word is to show its meaning through several other words no one of which is synonymous with it. The meaning of a word is just the idea that the user makes it stand for; so he shows the meaning of a term - he *defines* it - when he uses other words to set before the hearers the idea that the defined word stands for. This is all that definitions are good for, and all they are meant to do; so it is the only measure of what is or is not a good definition.

7. On that basis, I say that the names of simple ideas, and they alone, cannot be defined. Here is why. Defining is really nothing but *showing the meaning of one word through several others no one of which signifies the same thing*; so the terms of a definition must *jointly* signify the idea that the defined word signifies; but different terms of a definition, signifying different ideas, cannot jointly represent an idea that is simple and thus has no complexity at all. So definitions can't be given for the names of simple ideas.

[In section 8 Locke jeers at Aristotelian philosophers ('the schools') for offering absurd definitions of some of these words, and for leaving many others 'untouched'. Their fault, one gathers, was to leave them untouched without saying why they had to do so.]

9. The modern philosophers have tried to throw off the jargon of the schools and to speak intelligibly, but they have not had much more success in defining \cdot names of \cdot simple ideas, whether by explaining their causes or in any other way. Consider the atomists, who define 'motion' as a passage from one place to another: what do they do except to put one synonymous word for another? For what is *passage* other than *motion*? Is it not at least as proper and significant to say 'Passage is a motion from one place to another' as to say

'Motion is a passage, etc.'? Equating two words that have the same signification is translating, not defining. If one word is better understood than the other, the equation may help someone to learn what idea the unknown word stands for; but this is very far from a *definition*. If you call it a definition, you will have to say that every English word in the dictionary is the definition of the Latin word it corresponds to, so that 'motion' is a definition of *motus*....

[In section 10 Locke mocks a supposed Aristotelian definition of 'light'. Its worthlessness can be seen, he says, from its obviously being useless as a way of enabling a blind man understand 'light'. (He remarks in passing that *this* type of argument can't be used against definitions of 'motion', because the idea of motion can enter the mind through touch as well as sight, so that there are no people who are perceptually cut off from motion as the blind are from light.) He continues:] Those who tell us that *light is a great number of little* globules striking briskly on the bottom of the eye speak more intelligibly than the schools; but these words, however well understood, would not help a man who has no idea of light to get such an idea. . . . Even if this account of the thing is true, it gives only the idea of the cause of light, and that doesn't give us the idea of light, any more than the idea of the shape and motion of a sharp piece of steel would give us the idea of the pain it can cause in us. The cause of a sensation and the sensation itself are two ideas, and are as different and distant one from another as two ideas can be. Therefore, if the globules that Descartes postulates were to strike ever so long on the retina of a blind man, that would never give him an idea of light, or anything like it, even though he perfectly understood what little globules are, and what it is for something to strike on another body. So the Cartesians do well to distinguish Ylight that causes that sensation in us from Ythe idea that the former produces in us. It is the latter that is *light* properly so-called.

11. Simple ideas, as I have shown, can be got only from the impressions that objects make on our minds through the sensory inlets appropriate for each sort. If one of them isn't received in this way, all the words in the world won't suffice to explain or define its name by producing in us the idea it stands for. Words are just sounds, and the only simple ideas they can produce in us are the ideas of those very sounds - except when a simple idea is connected with a word through common usage in which that idea is the word's meaning. If you doubt this, see whether you can by words give anyone who has never tasted pineapple an idea of the taste of that celebrated fruit. He may approach a grasp of it by being told of its resemblance to other tastes of which he already has the ideas in his memory, imprinted there by things he has taken into his mouth; but this is not giving him that idea by a definition, but merely raising up in him other simple ideas that will still be very different from the true taste of pineapple. [Locke continues with more along the same lines, applied to 'light and colours'. The section concludes:] A studious blind man who had used explanations written in books or given to him by his friends in an attempt to understand those names of light and colours that he often encountered bragged one day that he now understood what 'scarlet' signified. It was, he said, like the sound of a trumpet! That is the sort of 'understanding' of the name of a simple idea that can be expected from someone relying on verbal definitions or other explanations.

12. The case is quite otherwise with complex ideas. A complex idea consists of several simple ones, and words that stand for those constituent simple ideas can imprint the

complex idea in the mind of someone who had never had it before, and so make him understand the name of that idea. When a single name applies to such a collection of ideas, a definition can occur, teaching the meaning of one word by several others, making us understand the names of things that never came within the reach of our senses. [Locke adds the proviso that the person who learns a meaning through a definition must understand all the words that are used in it; and decorates this point with an uninstructive joke about a blind man adjudicating between a statue and a picture.]

13. Someone who had never seen a rainbow but had seen all those colours separately could come to understand the word 'rainbow' perfectly through an enumeration of the shape, size, position and order of the colours. But even a perfect definition of that kind would never make a \cdot congenitally \cdot blind man understand the word, because several of the simple ideas that make that complex one have not been given to him through sensation and experience and can't be aroused in his mind by words.

[Section 14 summarizes the content of the preceding ten sections.]

15. Fourthly [picking up from 'Thirdly' in section 4], although the names of \dot{Y} simple ideas don't have the help of definitions to fix their meanings, they are generally *less* doubtful and uncertain than are the names of \ddot{Y} mixed modes and \ddot{Y} substances. Because the former stand for one simple perception each, people mostly agree - easily and perfectly - about their meanings, there being little room for mistake and wrangling. Someone who once grasps that 'white' is the name of the colour he has observed in snow or milk will not be apt to misapply the word as long as he retains that idea; and if he entirely loses the idea, this will lead him not to mistake the meaning of the word but rather to see that he does not understand it. There is no multiplicity of simple ideas to be put together, which is what brings doubt into the names of \ddot{Y} mixed modes; nor is there a supposed but unknown real essence. . . . which creates problems over the names of \ddot{Y} substances. Rather, in the case of \ddot{Y} simple ideas the whole signification of the name is known at once, and doesn't consist of parts of which more or fewer may be put in by different people, making the signification of the name obscure or uncertain.

16. Fifthly, simple ideas and their names have only a few ascents in the line of predication from the lowest species to the highest genus. [An example of a word with many 'ascents' might be 'man': from it we can ascend to 'animal', to 'organism', to 'complex physical thing', to 'physical thing'.] This is because the lowest species is just one simple idea, so that nothing can be left out of it so as to get something more general in the way that something is left out of *man* to get the more general *animal*. For example, there is nothing that can be left out of the ideas of *white* and of *red* to make them agree in one common appearance and so have one general name; as *rationality* being left out of the complex idea of *man* makes it fall under the more general idea and name of 'animal'. When men want for brevity's sake to bring white and red and several other such simple ideas under one general name, they have had to do it with a word that denotes .not something common to the natures of these different ideas, but only the way they get into the mind. For when white, red, and yellow, are brought together under the genus or name 'colour', all that this means is that such ideas are produced in the mind only by the sight and get in only through the eyes. And when men want to frame a still more general term, to cover colours and sounds and the like simple ideas, they do it with a word that signifies

all ideas that come into the mind only by one sense. And so the general term 'quality' in its common meaning applies to colours, sounds, tastes, smells, and tangible qualities, as distinct from extension, number, motion, pleasure, and pain, which make impressions on the mind, and introduce their ideas, by more senses than one.

17. Sixthly, the names of simple ideas, substances, and mixed modes differ also in the following way. Names of \ddot{Y} mixed modes stand for ideas that are perfectly arbitrary; those of \ddot{Y} substances are not perfectly arbitrary, but refer to a pattern, though they have some latitude \cdot in how the patterning is done \cdot ; and those of \ddot{Y} simple ideas are perfectly taken from the existence of things, and are not arbitrary at all. In the following chapters we shall see what difference this makes in the significations of their names.

The names of simple modes are pretty much like those of simple ideas.

CHAPTER v: THE NAMES OF MIXED MODES AND RELATIONS

1. The names of mixed modes being *general*, they stand for *sorts* or *species* of things, each of which has its own special essence. The essences of these species are nothing but the abstract ideas in the mind, to which the name is attached. Up to here, the names and essences of mixed modes have nothing that they don't share with all other ideas; but if we look more closely we'll find that they have peculiarities of their own that may be worth studying.

2. The first peculiarity I shall note is that the abstract ideas (or, if you like, the essences) of the various species of mixed modes are *made by the understanding*. In this they are unlike those of [= the ideas of?] simple ideas. The mind has no power to make any one of the latter, but only accepts what comes to it through the operations on it of the real existence of things.

3. In the next place, these essences of the species of \ddot{Y} mixed modes are *very arbitrarily* made by the mind, without patterns or any reference to any real existence. [See note at end of iii.2.] In this they differ from those of \ddot{Y} substances, which carry with them the supposition of some real thing from which they are taken and which they fit. In its complex ideas of mixed modes, the mind permits itself not to follow the existence of things exactly. It unites and retains certain collections, each as a specific complex idea, while other collections that are just as common in nature and just as plainly suggested by outward things, are neglected and not given special names. When we examine a complex idea of a \cdot kind of *substance*, we have recourse to the real existence of things - \cdot that is, to the stuff itself \cdot ; but we don't proceed like that with *mixed modes*, checking them against patterns containing such complexes in nature. If you want to know whether your idea of adultery or incest is right, will you check it out against existing things? . . . No. All that is needed is for men to have put together such a collection into one complex idea; *that* is the archetype [= 'thing that is copied'], whether or not any such action \cdot as incest or adultery has ever actually been performed.

4. To understand this correctly, we must think about what the mind does in making such complex ideas. It \ddot{Y} selects some of the \cdot simpler \cdot ideas it already has, then \ddot{Y} connects them so as to turn them into one idea, and finally \ddot{Y} ties them together by a name. If we examine how the mind goes about these three activities, and what freedom of choice it exercises,

we shall easily see how these essences of the species of mixed modes are the workmanship of the mind, and consequently that the species themselves are of men's making.

5. To become sure that these ideas of mixed modes are made by a voluntary collection of ideas put together in the mind, independently of any original patterns in nature, think about the fact that any such idea can be made, abstracted, and named - so that a species is constituted - before any individual of that species exists. Obviously the ideas of *sacrilege* and *adultery* could have been framed in the minds of men and have names given to them - thus constituting these species of mixed modes - before either of them was ever committed. They could have been talked and reasoned about, and truths discovered concerning them, just as well Ÿback when they existed only in the understanding as Ÿnow when they are all too common in the real world. We cannot doubt that law-makers have often made laws about sorts of actions that were only the creatures of their own understandings, having no existence outside their own minds. And nobody can deny that *resurrection* was a species of mixed modes in the mind before it really existed.

[In section 6 Locke seeks to show 'how arbitrarily these essences of mixed modes are made by the mind' by looking at examples. It is *we* who choose to pick out *killing one's father* and not *killing a sheep*, and so on. The section concludes:] I don't say that these choices are made without reason (more about this later); but I do say that we have here are the free choice of the mind, pursuing its own ends; and that therefore *these species of mixed modes are artifacts of the understanding*. And it is utterly evident that when the mind forms these ideas it seldom looks for its patterns in nature, or checks the ideas it makes against the real existence of things. Rather, it puts together such collections of simple ideas as may best serve its own purposes, without tying itself to a precise imitation of anything that really exists.

7. But, although these complex ideas (or essences) of mixed modes depend on the mind and are made by it with great freedom, they are not made at random and jumbled together for no reason. They are always suited to the purpose for which abstract ideas are made. And although their constituent ideas have no more union with one another than various others which the mind never combines into one complex idea, they are always made for the convenience of *communication*, which is what language is mainly for. What language does is to enable the speaker to express general conceptions quickly and easily, through short sounds. The use of language is by short sounds to signify with ease and dispatch, . . . and so in making species of mixed modes men have attended only to such combinations as they have wanted to mention one to another. [The section continues with examples, and an explanation of why the ideas *daughter* and *mother* are both ingredients in the idea of a heinous kind of sexual intercourse (*incest*) though only *mother* is an ingredient in *parricide*, the idea of a heinous kind of killing.]

[Section 8 develops the point that a language may contain words that have no exact equivalent in another language, offering this as evidence for Locke's thesis that the ideas and names of mixed modes are answerable only to human interests and needs. The section concludes:] We shall find this much more so with the names of more abstract and compounded ideas, such as most of those that make up moral discourses. If you look carefully into how those words compare with the ones they are \cdot customarily \cdot translated

into in other languages, you will find that very few of them exactly correspond across the whole extent of their meanings.

9. The reason why I emphasize this thesis so strongly is to prevent us from being mistaken about *genera* and *species* and their essences, as if they were things regularly and constantly made by nature and had a real existence in things - that is, as though enquiring into the essence of the species *sacrilege* were like enquiring into the essence of the species *iron*... The suspect meaning of the word 'species' may make my statement 'The species of mixed modes are made by the understanding' grate in your ears; but you can't deny that the mind makes those Ÿabstract complex ideas to which specific names are given; and it is also true that the mind makes the Ÿpatterns for sorting and naming of things. Well, then, think about it: who makes the Ÿboundaries of the sort or species? (For me 'species' and 'sort' are equivalent, one Latin and the other English.)

10. For further evidence of the close inter-relations amongst \hat{Y}_a species, \hat{Y}_a essence, and \hat{Y}_{its} general name (at least with mixed modes), notice that it is the *name* that seems to preserve those *essences* and give them their lasting duration. The loose parts of those complex ideas are not held together by any particular foundation in nature; so they would lose their connection and scatter if something weren't holding them together. The mind *makes* the collection, but the name is the knot (so to speak) that *ties them together*. [The remainder of this section elaborates this point, with an example, and offers a final dig at 'those who look upon essences and species as real established things in nature'.]

11. So we find that when men speak of mixed modes, they seldom think of any species of them other than those that have been named. And we can see why this should be so.... To what purpose should the memory burden itself with such complexes other than to make them general by abstraction? And why would it do *that* if not so as to have general names for the convenience of discourse and communication? [The section goes on with examples of differences in the 'collections' made by people in different cultures.]

12. My account of the essences of the species of mixed modes is further confirmed by the fact that their names lead our thoughts *to the mind and no further*. When we speak of 'justice' or 'gratitude' we have no thought of any existing thing; our thoughts terminate in the abstract ideas of those virtues, and look no further. We *do* look further when we speak of a 'horse' or 'iron', whose specific ideas we think of not as merely \ddot{V} in the mind but as \ddot{V} in *things* that are the original patterns of those ideas. But with mixed modes - or at least the most important subset of them, namely the *moral* ones - we regard the original patterns as being \ddot{V} in the mind. . . . I think this is why these essences of the species of mixed modes are called 'notions', as pertaining in a special way to the understanding. [Here and in some other places, 'moral' means little more than 'pertaining to human conduct'.]

13. From this we can also learn why the complex ideas of \hat{Y} mixed modes are commonly more compounded - ·more complex· - than those \hat{Y} of natural substances. Ideas of mixed modes are made by the understanding for convenience in expressing through short sounds the ideas it wants to make known to others; and in thus pursuing its own purposes it exercises great freedom, often uniting into a single abstract idea things that don't in their own nature go together, and so under one name bundle together a great variety of

ideas. Think about the word 'procession': what a great mixture of independent ideas of persons, clothes, candles, orders, motions, and sounds have been arbitrarily put together by the mind of man to be expressed by that one word! Whereas the complex ideas of sorts of substances are usually made up of only a few simple ideas; and when it comes to the species of animals, the whole nominal essence often consists of nothing but shape and voice.

14. Another thing we can see from what I've said is that the names of mixed modes always signify the *real essences* of their species. These abstract ideas are the workmanship of the mind, and are not referred to the real existence of things, so there is no supposition of anything's being signified by that name beyond the complex idea the mind has formed. And all the properties of the species depend on and flow from that idea alone. Thus, in these \cdot species \cdot the real and nominal essences are the same. We shall see later what bearing this has on secure knowledge of general truths.

15. This may also show us why the names of mixed modes are usually learned before the ideas they stand for are perfectly known. It is convenient if not outright necessary to know the names before one tries to form these complex ideas because usually no attention is paid to the ones that don't have names (and all of them - \cdot it should be remembered- - are arbitrary mental constructs). The alternative is for a man to fill his head with a horde of abstract complex ideas \cdot of mixed modes \cdot which others have no names for and thus he has no use for, except to set them aside and forget them again! I agree that in the beginning of languages it was necessary to have the idea before one gave it the name; And so it is still when someone makes a new complex idea, gives it a new name, and thereby makes a new word. But . . . in language as a going concern, isn't it usual for children to learn the names of mixed modes of them? Does one child in a thousand ever form the abstract ideas of *glory* and *ambition* before hearing the names of them? With Ysimple ideas and Ysubstances it is otherwise. They are ideas that have a real existence and union in nature, and in their case it is a matter of chance which comes first, the idea or the name.

16. What I have said here about mixed modes can be applied with very little difference to relations as well; and I needn't go on about this, because everyone can see it for himself.

One reason for cutting that short is that my treatment of words in this third Book may strike some as excessively long for such a slight topic. I agree that it could have been briefer; but I was willing to take my reader through an argument that appears to me new, and a little out of the way (it certainly had not occurred to me when I began to write). My hope has been that if I explore it to the bottom, and turn it on every side, each reader may find in it something that fits with his own thoughts and leads him - however careless or disinclined he may be - to give some thought to a general blunder that has hardly been noticed before although it is of great consequence. When you think what a fuss is made about essences, and how greatly all sorts of knowledge, discourse, and conversation are bedevilled and disordered by the careless and confused use of words, you may think it worthwhile set all this out thoroughly. A reason why I think my views on this matter need to be inculcated (and this is an excuse for going on so long about them) is that the faults they expose don't just *hinder* true knowledge - they are positively admired and thought of as *being* true knowledge! If only men would look beyond fashionable sounds, and observe

what ideas are or are not conveyed by the words that they are so armed with at all points, and that they so confidently wield in battle, they would see what a vanishingly small pittance of reason and truth is mixed in with those puffed-up opinions they are swelled up with. I shall think I have done some service to truth, peace, and learning, if I can through an extended discussion of this subject $\ddot{\mathbf{Y}}$ make men reflect on their own use of language, and $\ddot{\mathbf{Y}}$ give them reason to suspect that they may sometimes have very good and approved words in their mouths and writings, with meanings that are uncertain, skimpy, or non-existent. They will acknowledge that others are frequently guilty of this, so might not *they* be guilty too? If they see this, it will be reasonable for them to become wary about their own performances, and willing to submit themselves to examination by others. With this purpose in mind, therefore, I shall continue with the rest of what I have to say about this matter.

CHAPTER vi: THE NAMES OF SUBSTANCES

1. The common names of substances, as well as other general terms, stand for *sorts* - which simply means that they are used as signs of complex ideas in which several particular substances do or might agree, by virtue of which they can be brought under one common conception and referred to by one name. I say 'do or might agree' for the following reason. There is only one *sun* in the world, but the idea of it is an abstract one, so that more substances *could* agree in it; *sun* is as much a *sort* as it would be if there were as many suns as there are stars. There are reasons for thinking that indeed there are, and that each fixed star when seen from a suitable distance would fit the idea the name 'sun' stands for. That, incidentally, illustrates how much the sorts of things - or, if you like, the *genera* and *species* of things (for those Latin terms mean the same to me as the English word *sort*) - depend on what collections of ideas men have made, and not on the real nature of things; since what is a sun to one person may be a star to someone else.

2. The measure and boundary of each sort or species, by which it is constituted as that particular sort and distinguished from others, is what we call its *essence*. This is nothing but the abstract idea to which the name is attached; so that everything contained in the idea is *essential* to that sort. Although this is the only essence of natural substances that we know, and the only one by which we can distinguish them into sorts, I give it the special name '*nominal* essence', to distinguish it from the Ÿreal constitution of substances. [See note at end of iii.15.] The latter is Ÿthe *source of* the nominal essence and of all the properties of that sort or species; and so it can be called 'the *real* essence' of the sort. For example, the nominal essence of *gold* is the complex idea that the word 'gold' stands for - something like *a body that is yellow, of a certain weight, malleable, fusible, and fixed*. But the real essence is the constitution of the imperceptible parts of that body, on which those qualities and all the other properties of gold depend. Although both of these are called 'essence', you can see at a glance how different they are.

3. The complex idea to which I and others attach the name 'man', making that the nominal essence of the species *man*, is the idea of *voluntary motion*, *with sense and reason, joined to a body of a certain shape*. Nobody will say that this complex idea is the \ddot{Y} real essence and source of all those operations that are to be found in any individual of that sort, that is, in any man. The \ddot{Y} foundation of all those qualities that are the ingredients of our

complex idea of *man* is something quite different. Angels may, and God certainly does, have a full knowledge of the **Y** constitution of man from which his faculties of moving, sensing, reasoning, and other powers flow; if we had it too, we would have a quite different idea of man's essence from what is now contained in our definition of our species. In that case, our idea of any *individual* man would be very different from what it is now; just as that the idea of the famous clock at Strasbourg possessed by someone who knows all its springs and wheels and other contrivances differs from the idea of it possessed by a gazing peasant, who merely sees the hands move, and hears the clock strike.

4. Here is evidence that *essence* in the ordinary sense of the word relates to sorts, and is applicable to particular things only to the extent that they are grouped into sorts. If you take away the abstract ideas by which we sort individuals and rank them under common names, then the thought of anything essential to any of them instantly vanishes. We have no notion of one (\cdot that is, of *essential property*) without the other (\cdot that is, of a sort or species), and that plainly shows how they are related. It is necessary for me to be as I am; God and nature have made me so. But nothing that I have is essential to me. An accident or disease may greatly alter my colour or shape; a fever or fall may take away my reason or memory, or both; an apoplexy may leave me with neither sense nor understanding indeed, with no life. Other creatures of my shape may be made with more and better, or fewer and worse, faculties than I have; and others may have reason and sense in a shape and body very different from mine. None of these are essential to the one, or the other, or to any individual whatever, till the mind refers it to some sort or species of things. The moment that is done, something is found to be essential according to the abstract idea of that sort. Examine your own thoughts, and you will find that as soon as you suppose or speak of some quality as 'essential', the thought of some species, or the complex idea signified by some general name, comes into your mind; and it is in reference to that that the quality in question is said to be essential. Is it essential to me, or any other particular corporeal being, to have reason? No. Just as it isn't essential to this white thing I write on to have words on it. But if the particular thing is counted as being of the sort man, and has the name 'man' given to it, then reason is essential to it (assuming reason to be a part of the complex idea the name 'man' stands for). Similarly, it is essential to this thing I write on to contain words, if I give it the name 'treatise' and put it into that species. Thus, 'essential' and 'not essential' relate only to our abstract ideas and the names attached to them. . . .

5. Thus, if for some people the idea of *body* is bare extension or space, then \cdot for themsolidity *is not* essential to body. If others give the name 'body' to the idea of solidity and extension, then \cdot for them \cdot solidity *is* essential to body. Whatever makes a part of the complex idea the name of a sort stands for is essential to the sort, and nothing else is. If we found some matter that had all the qualities of iron except that it was not affected by a magnet, would anyone raise the question of whether it lacked anything essential? It would be absurd to ask whether a really existing thing lacked something essential to it! Nor would it make sense to ask whether the unusual feature of this matter created an essential or specific difference [= 'put the stuff into a different species'] or not, for our only criterion for what is essential or specific is given by our abstract ideas. To talk of specific differences in nature, without reference to general ideas and names, is to talk unintelligibly. What is sufficient to make an essential difference in nature between any two particular things, \cdot considered just in themselves, and \cdot without reference to any abstract idea looked upon as the essence and standard of a species? When all such patterns and standards are laid aside, particular things considered barely in themselves will be found to have all their qualities equally essential: in each individual, *all* the qualities will be essential, or - more accurately - *none* of them will be so. It may be reasonable to ask whether obeying the magnet is essential to iron, but it is very improper and insignificant to ask whether it is essential to the particular bit of matter that I sharpen my pen with, without considering it under the name 'iron' or as belonging to a certain species. . . .

6. I have often mentioned a 'real essence' that is distinct in substances from those abstract ideas of them that I call their 'nominal essence'. By this real essence I mean the real constitution of a thing, which is the foundation of all those properties that are combined in and constantly found to co-exist with the nominal essence; that particular constitution that every thing has within itself, without reference to anything else. But 'essence', even in this sense, relates to a *sort* and presupposes a *species*. It is that real constitution on which the properties depend, so it necessarily presupposes a sort of things, because properties belong only to species and not to individuals. [Locke is here using 'property' in an old technical sense according to which 'a property of iron' is a quality or attribute that has to be possessed by all specimens of iron'; it is supposed to follow from the essence of iron without actually being part of that essence. In this sense of the word, 'a property of this' said by someone who is pointing to a piece of iron - is meaningless.] For example, supposing the nominal essence of gold to be a body of such and such a special colour and weight, with malleability and fusibility, the real essence is that constitution of the parts of matter on which these qualities and their union depend; and this is also the foundation of its solubility in aqua regia and other properties accompanying that complex idea. Here are essences and properties, but all on the supposition of a sort or general abstract idea. The latter is considered as immutable, but there is no individual bit of matter to which any of these qualities are attached in such a way as to be essential to it or inseparable from *it*. Indeed, we don't know precisely what any real essence is; but we suppose that it is *there* and is the cause of the nominal essence; and that supposed link with the nominal essence is all that ties the real essence to the species.

7. Which of those essences is it by which substances are determined into sorts or species? Obviously, the nominal essence, for it alone is what the name of the species signifies. Nothing could possibly determine the sorts of things that we rank under a given general name except the idea which that name is designed as a mark for - namely, the nominal essence. Why do we say 'This is a horse', 'That is a mule', if not because the thing fits the abstract idea that the name is attached to?....

8. Here is more evidence that the species of things are nothing to us but a grouping of them under distinct names according to complex ideas *in us*, and not according to precise, distinct, real essences *in them*. We find that many of the individuals we group into one sort, call by one common name, and so accept as members of one species, are in some respects as much unlike one another as they are unlike things that are regarded as belonging to different species. . . . Chemists especially are often by sad experience

convinced of this when, having found certain qualities in one portion of sulphur, antimony or vitriol, they have looked for it in vain in other portions. . . . If things were distinguished into species according to their real essences, it would be as impossible to find different properties in any Ÿtwo individual substances of the same species as it is to find different properties in Ÿtwo circles or Ÿtwo equilateral triangles. . . .

9. We don't know the real essences of things, and so we *can't* use real essences as the basis on which to rank and sort things and so to name them (for what sorting is *for* is naming). The nearest our faculties will let us get to knowing and distinguishing substances is a collection of the perceptible ideas [here = 'qualities'] that we observe in them. And even if we collect these with the greatest diligence and exactness we are capable of, it remains quite remote from the true internal constitution from which those qualities flow.

. . There is no plant or animal, however lowly and insignificant, that doesn't baffle the most enlarged understanding. Though our familiar dealing with things around us stops us from wondering about them, it doesn't cure our ignorance. When we come to examine the stones we tread on or the iron we handle, we immediately find that we don't know how they are constructed, and can give no reason for the different qualities we find in them. What is the texture of parts, the real essence, that makes lead and antimony fusible, wood and stones not? What makes lead and iron malleable, antimony and stones not? We have not the slightest idea. And we all know how vastly less difficult and complex the constitutions of these substances are than the fine contrivances and inconceivable real essences of plants and animals. The Ÿworkmanship of the all-wise and powerful God in making the great fabric of the universe and every part of it outstrips the Ycapacity and comprehension of the most enquiring and intelligent man, by more than the Ÿbest contrivance of the most ingenious man outstrips the Y conceptions of the most ignorant. So it is in vain for us to claim to put things into sorts and classes, under names, on the basis of their real essences that we are so far from knowing or understanding. A blind man may as soon sort things by their colours! . . .

[In section 10 Locke dismisses, as heading in the wrong direction and also as unintelligible, the theory that species and genera depend upon the 'substantial forms' of things.]

11. Consider our ideas of \cdot unembodied \cdot *spirits*. The mind through reflection on itself gets simple ideas of *perfections* - that is, qualities that it is better to have than to lack - and its only notion of a spirit is one \ddot{Y} made out of those simple ideas and \ddot{Y} thought of as applying in higher degree to a sort of beings without matter's coming into it. Even our most advanced notion of *God* comes from attributing to him in an unlimited degree the same simple ideas of the same perfections. By reflecting on ourselves we get the ideas of existence, knowledge, power, and pleasure, each of which we find it better to have than to lack, and the more we have of each the better; and by joining all these together, with infinitely wise and happy Being. We are told that there are different species of angels; but we don't know how to form distinct specific [here = 'detailed'] ideas of them; not because \ddot{Y} we fancy ourselves as the only kind of spirit there can be, but because \ddot{Y} the only simple ideas we do or can have to apply to them are ones taken through reflection from ourselves. Our only way of thinking about other species of spirits is by attributing to them

various perfections in higher or lower degree; and it seems to me that we think of God as different from them not in *what* simple ideas are applicable to each but only in the *degree* to which they are applicable - with all the perfections being thought of as possessed by God to an infinite degree, to angels with a lesser degree than that....

12. It isn't inconceivable or impossible that there should be many species of spirits that are marked off from one another by distinct properties of which we have no ideas, just as the species of perceptible things are distinguished from one another by qualities that we know and observe in them. I think it probable that there indeed are more species of thinking creatures above us than there are of sentient and material creatures below us. Here is why. In all the visible physical world we see no chasms or gaps. All the way down from us the descent goes by easy steps, and a continued series of things that at each step differ very little from the ones just above. [The section continues with remarks about fish with wings, birds that swim, amphibians, sea-going mammals; non-human animals 'that seem to have as much knowledge and reason as some that are called men'; the almost invisible line between the lowest animals and the highest plants, and so on. Locke continues:] When we consider God's infinite power and wisdom, we have reason to think that it is suitable to the magnificent harmony of the universe, and the great design and infinite goodness of its architect, that the species of creatures should also by gentle degrees ascend *upward* from us towards his infinite perfection, as we see they gradually descend from us *downwards*. This would give us reason to be convinced that there are far more species of creatures above us than there are beneath, because our own level of perfection is .less than half-way up, i.e. it is much more remote from the infinite being of God than we are from the lowest kind of thing. And yet of all those different species we have, for the reasons I have given, no clear distinct ideas.

13. Let us return to the species of material substances. Are ice and water two distinct species of things? Most people would answer Yes, and rightly so; but an Englishman who grew up in Jamaica, had not experienced ice and did not know the word 'ice', might upon coming to England and finding the water in his basin had frozen overnight call it 'hardened water'. He would *not* be treating ice as a new species, different from water, any more than we think of liquid gold in the furnace as a distinct species from hard gold in the hands of a workman. This makes it clear that our different species are nothing but different complex ideas with different names attached to them. It is true that every substance that exists has its particular constitution which is the source of the perceptible qualities and the powers we observe in it; but the grouping of things into species - which is simply sorting them under different titles - is something we do on the basis of the ideas that we have of them. This is enough for us for us to pick them out verbally so that we can talk about them in their absence; but anyone who thinks we do it by their real internal constitutions, and that the verbal distinctions we make amongst species correspond to real-essence distinctions made by nature, is liable to make great mistakes. In sections 14-19 I shall give reasons for this.

14. For \ddot{Y} us to distinguish substantial beings into species according to the usual supposition that there are certain precise essences or forms of things by which \ddot{Y} nature sorts all existing individuals into species, these ·four· things would be necessary.

15. First, we would have to be assured that when nature produces things it always designs or intends them to have certain regulated established essences, which are to be the models of all things to be produced. We can't assent to this until it is presented more clearly than it customarily is.

16. Secondly, we would need to know whether nature always *attains* the essence that it *designs* in the production of things. The irregular and monstrous births that have been observed in various sorts of animals will always give us reason to doubt one or both of these - \cdot that is, that an essence is intended, and/or that the intention is always fulfilled.

17. Thirdly, we would need to have settled whether the creatures we call 'monsters' - congenitally deformed plants or animals- - are really of a separate species, according to the scholastic notion of the word 'species'. Everything that exists has its particular constitution \cdot and so has a 'real essence' in the reasonable sense of that phrase-, but we find that some of these monstrous productions have few if any of the qualities that are supposed to result from and accompany the essence of that species to which they seem - judging by their descent - to belong.

18. Fourthly, the real essences of the things that we sort into species and give names to would need to be known - that is, we would need to have ideas of them. But since we are ignorant in these four points \cdot that I have raised in sections 15-18 \cdot the supposed real essences of things won't serve us as a basis for distinguishing substances into species.

19. There remains only one fall-back position: perhaps we could form perfect complex ideas of the properties of things that flow from their different real essences, and could distinguish them into species on that basis. [See the explanation of 'property' in section 6.] But this can't be done either. Because we don't know the real essence itself, we can't know what all the properties are that flow from it and are tied to it so tightly that if any one of them were absent we could conclude that the essence was not there and thus that the thing was not of that species. To know what is the precise list of properties that depend on the real essence of gold (so that if any one of them were lacking, the real essence of gold would be lacking, and so the stuff would not be gold), we would have to know what the real essence of gold is; and we do not. (By the word 'gold' here I must be understood to designate a particular piece of matter - e.g. the last guinea that was coined or the portion of matter circling my finger. For if in *this* context I used the word in its ordinary meaning, as signifying that complex idea that we call the idea of gold - that is, for the nominal essence of gold - the result would be a meaningless babble, because I would be discussing 'the *real* essence and properties of gold' with the word 'gold' understood in terms of the *nominal* essence of gold; and that would produce a conceptual mix-up, using one kind of essence in a discussion of the other kind. So I ask you to understand me as discussing 'the real essence and properties of *this*' - and then I *point* to a particular piece of gold without calling it 'gold'. You see how hard it is to exhibit the meanings and the imperfections of words - *in words*!)

20. All this \cdot material in sections 14-19 \cdot shows clearly that we don't distinguish substances into named species on the basis of their real essences; nor can we claim to put them exactly into species on the basis of internal essential differences.

21. Needing general words, and not knowing the real essences of things, all we can do is to make complex ideas out of collections of simple ideas that we find united together in existing things. This idea, though not the real essence of any substance that exists, is the specific essence to which the name belongs, and is interchangeable with that name. That gives us a test for the truth of claims about these nominal essences. For example, some say that the essence of body is extension. If that is right, we can never go wrong through putting one for the other - the essence for the thing itself. Try substituting 'extension' for 'body': instead of saying 'Body moves' say 'Extension moves' - how does that look? Someone who said 'When one extension bumps into another extension, it makes it move' would by his mere form of words show the absurdity of such a notion. The essence of anything (for us) is the whole complex idea marked by that name; and for substances that 'whole' includes not only various simple ideas but also the confused idea of *substance*, or of an unknown support and cause of the union of the qualities corresponding to the simple ideas. Thus, the essence of body is not bare *extension*, but rather an extended solid thing. It is just as good to say 'When one extended solid thing bumps into another, it makes it move' as to say 'When a body moves' etc. Similarly, it is all right to say 'A rational animal is capable of conversation', for this doesn't really differ from 'A man is capable etc.'. But nobody will say 'Rationality is capable of conversation', because 'rationality' does not make the whole essence to which we give the name 'man'.

[In sections **22-3** Locke discusses problems of classification in the animal kingdom, highlighting abnormal births producing creatures that are not easy to classify. His main point is that we must approach these questions in terms of nominal essences, so that it is for us to *decide* how to answer them; there is no hidden fact of the matter. He mentions the possibility of classifying purely on the basis of parentage, and raises three objections to it. ŸIt could work only for organisms; other problems about classification would remain. ŸIt fails in the face of the offspring of copulation across species lines ('If history doesn't lie, women have conceived by monkeys'), and Ÿat the end of section 23:] If the species of animals and plants are to be distinguished only by propagation, must I go to India to see the parents of the one, and the plant from which the seed was gathered that produced the other, to know whether this is a *tiger* or that is *tea*?

24. Looking at the whole picture, it is evident that what men make to be the essences of the various sorts of substances are \ddot{Y} perceptible qualities that they collect, and that the vast majority of men sort substances without reference to \ddot{Y} their real internal structures. Much less were any 'substantial forms' ever thought of except by those who have in this one part of the world - ·western Europe· - learned the language of the schools [see explanation in iii.9.] And yet those ignorant men who make no claim to insight into real essences and give no thought to substantial forms, but are content with distinguishing things by their perceptible qualities, often do better than those learned quick-sighted men who look so deeply into things and talk so confidently of something hidden and essential. They do better in that they are often better acquainted with the differences amongst substances, make finer discriminations amongst them on the basis of their uses, and know more what to expect from each,

25. Even if the real essences of substances could be discovered by thorough scientific research, we couldn't reasonably think that the ranking of things under general names is

regulated by those internal real constitutions, or by anything else but their obvious appearances. Languages in all countries were established long before sciences. So the general names that are in use amongst the various nations of men have not been the work of scientists or logicians or men who troubled themselves about forms and essences. Rather, each language's more or less comprehensive terms have been created and given meanings by ignorant and illiterate people who sorted and named things on the basis of the perceptible qualities they found in them. . . .

[In sections **26-7** Locke returns to the supposed facts about borderline cases, monstrous births, etc., drawing the same moral as before.]

28. But though these nominal essences of substances are made by the mind, they are not made as arbitrarily as are those of mixed modes. For the making of any nominal essence two things are necessary. First, that Ythe ideas of which it is composed be united in such a way as to constitute a single idea. Secondly, that $\hat{\mathbf{Y}}$ any instance of the complex idea making the meaning of some word be composed of exactly the same particular ideas as any other idea making the meaning of that same word, neither more nor less. As regards the second requirement. If two abstract complex ideas differ in how many simple ideas they contain or in which ones, they make two different essences, not just one. Regarding the first requirement: When the mind makes its complex ideas of substances, it only follows nature and puts none together that are not supposed to be united in nature. Nobody - unless he wants to fill his head with chimeras and his discourse with unintelligible words - joins the voice of a sheep with the shape of a horse, or the colour of lead with the weight and fixedness of gold, offering these as the complex ideas of real substances. Men may make what complex ideas they please, and give them what names they will; but if they want to be understood when they speak of really existing things, they must to some extent conform their ideas to the things they want to speak of....

29. Although the mind of man, in making its complex ideas of substances, never puts any together that do not really or are not supposed to co-exist, exactly which ones it brings into the combination depends upon the care, industry, or fancy of the individual person who is making the idea. Men generally content themselves with a few obvious perceptible qualities, and often if not always they omit others that are just as important and as firmly united to the rest as those that they take. Of the two sorts of perceptible substances, one consists of organized bodies that are propagated by seed; and with these we take the shape as the leading quality and most characteristic part that determines the species. For vegetables and animals, therefore, all we need usually is an extended solid substance of such a such a shape. [Locke adds a side-swipe at the definition of 'man' as 'rational animal' - see II.xxvii.8.] Whereas in plants and animals it is the shape that we most fix on and are mainly led by, in most other bodies (ones not propagated by seed) it is the colour. Thus where we find the colour of gold we are apt to imagine that all the other qualities contained in our complex idea are there also. It is because we commonly take shape and colour to be our rules of thumb of various species that when we see a good picture we readily say 'This is a lion', 'That is a rose', 'This is a gold goblet and that a silver one', going purely by the different shapes and colours presented to the eye by the paint-brush.

30. But though this serves well enough for rough and ready ways of talking and thinking, men are still far from having agreed on exactly what simple ideas or qualities belong to any

sort of thing signified by a given name. That isn't surprising, for it requires much time, trouble, skill, and assiduity to find out what the simple ideas are that are constantly and inseparably united in nature and always to be found together in the same subject. [Locke goes on to say that most men can't provide all that, and so instead they classify things by their obvious outward appearances. The paucity of 'settled definitions', he says, should warn us against becoming embroiled in debates about species and genera, and invoking 'forms', and should make us think that 'forms are only chimeras, which give us no light into the specific natures of things'. He continues:] It is true that many particular substances are so made by nature that they are like one another and so afford a basis for being grouped into sorts. But since our sorting of things - our making of determinate species - is done for the purpose of naming them and bringing them under general terms, I don't see how it can properly be said that *nature* sets the boundaries of the species of things. Or if it does, *our* boundaries of species are not exactly nature's. For we, needing general names that we can use *right now*, don't wait for a perfect discovery of all the qualities that would best show us substances' most important differences and likenesses. Rather, we ourselves divide them into species on the basis of certain obvious appearances, so that we can more easily communicate our thoughts about them under general names...

[In section **31** Locke says that if we look into the more complete ideas that people have in the background of their rough and ready ones, we shall find considerable differences; and when two people have different definitions for the same general word, there is no fact of the matter about which of the two complex ideas is more right. This helps to confirm that different essences of gold are of human artifacts 'and not of nature's making'.]

32. [In this section Locke writes about larger classes (genera) which can be divided up into smaller ones (species). The 'lowest species' are just the classes that we don't divide up into still smaller ones.] If the simple ideas making the nominal essences of Ÿthe lowest species . . . depend on the how people choose to collect them together, it is even more obvious that this is so for the nominal essences of $\hat{\mathbf{Y}}$ the more comprehensive classes that the masters of logic call 'genera'. These are complex ideas that are meant to be incomplete: you can see at a glance that some of the qualities that are to be found in the things themselves are purposely left out of generic ideas. To make Ygeneral ideas that cover several particulars, the mind leaves out the ideas of time and place and any others that would stop the resultant idea from fitting more than one individual; and similarly, to make Yideas that are even more general, and can cover .not just different *individuals* but. different sorts, the mind leaves out the qualities that distinguish the sorts from one another, and puts into its new collection only such ideas - .or, more accurately, ideas of only such qualities. - as are common to several sorts. The same reasons of convenience that made men bring various portions of yellow matter under one name, also led them to make a name that could cover both gold and silver and some other bodies of different sorts. This was done by leaving out the qualities that are special to each sort, and retaining in the complex idea only those that are common to them all. When the name 'metal' is assigned to this complex idea, there is a *genus* constituted; and its essence is a certain abstract idea that contains only Ymalleableness and Yfusibility, along with Ycertain degrees of weight and fixedness that are shared by some bodies of various kinds, and it leaves out

Ÿthe colour and Ÿother qualities peculiar to gold or to silver or to other sorts comprehended under the name 'metal'. This shows plainly that when men make their general ideas of substances they don't follow exactly any patterns set for them by nature, for there is no body anywhere that has only malleableness and fusibility without other qualities that belong to it as inseparably as those two do.... So that in this whole business of genera and species Ythe genus is merely a partial conception of what is in Ythe species, and Ÿthe species is merely a partial idea of what is to be found in each Ÿindividual. So if you think that a man, and a horse, and an animal, and a plant, etc. are distinguished by real essences made by nature, you must think nature to be very free-handed with these real essences, making one for *body*, another for *animal*, and a third for *horse*, and generously bestowing all these essences on Bucephalus! But the real story about what is done in all these genera and species (or sorts) is that no new *thing* is made, but only more or less comprehensive *signs* through which we can talk, using few words, about very many particular things that fit the more or less general conceptions that we have formed for that *purpose*. Notice that the Ÿmore general term is always the name of a Ÿless complex idea, and that each ÿgenus is merely a *partial* conception of the ÿspecies that fall under it. So the only sense in which any of these abstract general ideas can be *complete* is its containing everything that is generally understood to be meant by a certain name; it cannot be complete in relation to anything that exists in nature.

[In sections **33-4** Locke expands his remarks about how we classify for our convenience, with examples, including a remark about the semantic richness of 'the short monosyllable *man*'.]

35. What I have said makes it evident that men make sorts of things. They do it by *making* the abstract ideas, which *are* the nominal essences and therefore *make* the species or sort. If we found a body having all the qualities of gold except malleableness, we would discuss whether it was gold or not. This could be settled only by the abstract idea to which everyone attached the name 'gold'; so it would be gold to someone whose nominal essence for gold did not include malleableness, and not gold to someone who did include malleableness in his specific idea. And who would be making these two different species under the name 'gold' - who but *men*?

36. This, briefly, is how things stand. Nature makes many particular things that are alike in many perceptible qualities, and probably also in their \ddot{Y} internal structure and constitution. But it isn't this \ddot{Y} real essence that separates them into species; it is men who do that. On the basis of the qualities they find to be possessed in common by various individuals, men group things into *sorts*, so that they can talk about them conveniently. In this procedure men employ comprehensive signs under which individual things come to be ranked, according to which abstract ideas they fit - like soldiers under regimental flags.

This soldier belongs to the blue regiment, that to the red one.

This is a man, that is a monkey.

In this, I think, consists the whole business of genus and species.

37. I don't deny that nature, in its constant production of particular things, doesn't always produce completely new kinds of things, but \cdot often \cdot makes them very similar to one another. Still I think it is true that the boundaries of the species whereby men sort them are made by men...

38. One thing I am sure will seem very strange in this doctrine, namely the conclusion that each abstract idea, with a name attached to it, makes a separate species. But who can help it if truth will have it so? For so it must remain until somebody can show us that the species of things are distinguished by something else, and that general terms signify something other than our abstract ideas. I would like to know why a poodle and a hound are not of species as different as a spaniel and an elephant are. We have no more idea of the difference of essence between an elephant and a spaniel than we have of the difference of essence between a poodle and a hound, because all the essential difference that we *know* in each case - the difference in what collection of simple ideas we have associated with those different names.

39. In addition to the ice/water example that I gave in section 13, here is another. A silent watch and a striking one are \ddot{V} one species to those who have only one name for both; but they are of \ddot{V} different species for someone who has the name 'watch' for one and 'clock' for the other, with a different complex idea for each. It may be said that the difference in the inner workings of these two puts them into different species; but the watch-maker has a clear idea of that difference, yet they are plainly of only one species ·even · for him if he has only one name for both. Why should inner workings suffice to make a new species? Some watches are made with four wheels, others with five: is this a specific difference to the watchmaker? Some have the balance loose, others have it regulated by a spiral spring and yet others by hogs' bristles. Is this enough to make a specific difference to the watchmaker who knows these and other differences in the internal constitutions of watches? Each creates a real difference from the rest, certainly; but whether it is an essential (specific) difference or not relates only to the complex idea to which the name 'watch' is given. [The section continues with remarks about the choices one has in creating ever smaller species, illustrated with *watch* and with *man*.]

[In section 40 Locke remarks, partly on the basis of the preceding discussion, that 'with the species of artificial things there is generally less confusion and uncertainty than with natural ones'. In section 41 he defends his view that there are species of artifacts as well as of 'natural substances' such as organisms.]

42. Of all the things to which we apply our various sorts of ideas, only substances have *proper names*, by which one particular thing is signified. Where simple ideas, modes, and relations are concerned, it seldom happens that someone has occasion to mention this or that particular one in its absence. Also, the greatest part of mixed modes are *actions*, which perish in their birth; so they are not capable of a lasting duration in the way that substances (the actors) are...

43. Forgive me for having dwelt so long on this subject. Perhaps some of my discussion has been obscure, \cdot and I apologize for that too \cdot . But think about how difficult it is to lead someone by *words* into thoughts about *things* \cdot *considered in themselves, things* \cdot *stripped of those specific differences we give them.* If I don't name the things I don't say anything; and if I do name them I thereby classify them in some way, bringing to your mind the usual abstract idea of the species \cdot associated with the name I use \cdot , which is contrary to my purpose. The proposal:

Let's talk about a man while setting aside the ordinary meaning of the name 'man', which is the complex idea we usually attach to it; let's consider man as he is in himself, and as he is really distinguished from others in his internal constitution or real essence, i.e. by something we don't know

seems silly. But that is what must be done by someone who wants to \ddot{Y} speak of the supposed real essences and species of things as thought to be made by nature, even if he only wants to \ddot{Y} say that no such real essences are signified by the general names that substances are called by! Because it is difficult to do this by known familiar names, let me introduce an example through which I hope to make clearer the mind's different handlings of specific names and ideas, and to show how the complex ideas of modes are sometimes copied from archetypes in the minds of other thinking beings (that is, to the common meanings of their accepted names), and sometimes from no archetypes at all. I plan also to show how the mind always copies its ideas of substances either from the substances themselves or from the meanings of their names....

[In sections **44-5** Locke presents a fiction in which Adam invents words meaning 'suspicion' and 'disloyalty' in advance of encountering instances of either; he sketches a possible history of the gradual entry of these words into common use. In section **46** he gives a fiction about Adam being brought a piece of gold and thereupon inventing a word for it; and in **47** a possible subsequent history of that word - a history in which *every* newly discovered quality of the stuff is added to the complex idea that is to mark off the species. This, Locke says, would mean that the archetype for the idea is *every discoverable property of the stuff*; and that would condemn men's actual idea of gold to being for ever 'inadequate' (see II.xxxi.13). In section **48** he adds that this procedure would also lead to people's having different ideas of gold because their varying experiences of it lead to differences in what properties they know it to have.]

49. To avoid this, therefore, people have supposed that every species has a real essence from which its properties all flow, and they want their name of the species to stand for that. But they have no idea of that real essence; and their words $\cdot \text{can} \cdot \text{signify nothing but}$ their ideas; so all that they achieve by this attempt \cdot to stabilize the meaning of the species name by tying it to a real essence is to put *the name* in the place of *the thing having that real essence*, without knowing what the real essence is. That is what men do when they speak of species of things as though they were made by nature and distinguished from one another by real essences.

50. Consider what is happening when we affirm *All gold is fixed*. We could mean Ythat fixedness is a part of the definition, part of the nominal essence the word 'gold' stands for; in which case our affirmation contains nothing but the meaning of the term 'gold'. Or else we mean \ddot{Y} that fixedness, though not part of the definition of the word 'gold', is a property of *that substance itself*: in which case we are plainly using the word 'gold' to stand in the place of a substance having the real made-by-nature essence of a species of things. Substituting for 'gold' in this way gives it a confused and uncertain meaning. So much so that, although with 'gold' thus understood the proposition *Gold is fixed* is an affirmation of something real, it is a truth that we shall never be able to apply in particular cases, and so isn't something we can use or be certain of. However true it is that *whatever has the real essence of gold is fixed*, what use can we make of this when we don't know what is

and what is not 'gold' in this sense? If we don't know the real essence of gold, we can't possibly know which bits of matter have that essence or, therefore, which bits are truly gold ·in the sense of 'gold' now being examined.

51. To conclude: Adam's initial freedom to make complex ideas of mixed modes on the pattern of nothing but his own thoughts is a freedom that all men have had ever since. And his need to conform his ideas of substances to things outside him, as to archetypes made by nature, is a need that all men have had ever since. His liberty to give any new name he liked to any idea is one that we still have (especially when we are *inventing* a language, if we can imagine such a thing happening now), except that in a society with an already-established language the meanings of words should be altered only cautiously and sparingly. [The section concludes with a statement of the fairly obvious reason for this.]

CHAPTER vii: PARTICLES

1. Besides \hat{Y} words that name ideas in the mind, there are many others that we use \hat{Y} to signify how the mind connects ideas or propositions with one another. To communicate its thoughts to others, the mind needs not only \hat{Y} signs of the ideas it then *has before it*, but also \hat{Y} signs to show what in particular it is *doing* at that moment with those ideas. It does this in several ways. For example, 'is' and 'is not' are the general marks of the mind's affirming or denying; and without these there would be in words no truth or falsehood. The mind also has ways of showing not only how it is connecting the parts of propositions to one another, but also how it is connecting whole sentences one to another, giving them various relations and dependencies so as to make a coherent discourse.

2. The words the mind uses to signify how it is connecting the various affirmations and negations that it is bringing together into a single continued reasoning or narration are generally called *particles*. The proper use of particles is the chief contributor to the clearness and beauty of a good style. To think well, it isn't enough that a man has ideas that are clear and distinct, nor that he observes the agreement or disagreement of some of them. He must also think in sequence, and observe the dependence of his thoughts and reasonings upon one another. And to express such methodical and rational thoughts well he needs words to show what connection, restriction, distinction, opposition, emphasis, etc. he gives to each part of his discourse. If he gets any of these wrong he will puzzle his hearers instead of informing them. And so it is that these words, which are not truly the names of ideas, are of constant and indispensable use in language, contributing greatly to men's expressing themselves well.

3. This part of grammar has, I suggest, been as much neglected as some others have been over-diligently cultivated. It is easy for men to work their way systematically through cases and genders, moods and tenses, gerunds and supines. With these and their like the grammarians have been diligent; and even particles have in some languages been set out and classified with a great show of exactness. But although 'preposition' and 'conjunction' etc. are names well known in grammar, and the particles contained under them carefully sorted into their distinct subdivisions, someone who wants to show the *right use* of particles, and what significancy [Locke's word] and force they have, \cdot must look elsewhere than in grammar books. He \cdot must take a little more pains, scrutinize his

own thoughts, and observe in accurate detail the various *postures of his mind* when he talks.

4. Dictionaries usually explain these words through words of another language that come nearest to their meaning; but that isn't good enough, for what they mean is commonly as hard to grasp in the second language as in the first. They are all marks of something the mind is *doing* or *indicating;* so we need to attend diligently to the various views, postures, stands, turns, limitations, exceptions, and various other thoughts of the mind, for which we have no names - or no good ones. There is a great variety of these, far more than most languages have corresponding particles for; so it is no wonder that most particles have several meanings, sometimes almost opposite ones. In the Hebrew language there is a particle consisting of one single letter, which is said to have - was it *seventy*? anyway, certainly *more than fifty* different meanings.

5. 'But' is a particle, none more familiar in our language; and someone who calls it a 'discretive conjunction' and says that it corresponds to *sed* in Latin or to *mais* in French thinks he has sufficiently explained it. But it seems to me to indicate certain relations that the mind gives to various propositions or parts of them that it joins by this monosyllable.

First, 'BUT to say no more'; here the word indicates that the mind has stopped in its course, before reaching the ·intended· end of it.

Secondly, 'I saw BUT two planets': here it shows that the mind limits the sense to what is expressed, with a negation of everything else.

Thirdly, 'You pray; BUT it is not that God would bring you to the true religion. . .'

Fourthly, '... BUT that he would confirm you in your own.' The first of these 'but's indicates a supposition in the mind of something's not being as it should be; the latter shows that the mind makes a direct opposition between that and what goes before it.

Fifthly, 'All animals have sense; BUT a dog is an animal': Here the word signifies little more than that the latter proposition is joined to the former as the minor \cdot premise \cdot of a syllogism.

6. No doubt this particle has many other significations as well, but it isn't my business to examine the word in all its uses, let alone to give a full explication of particles in general. What I have said about this one may lead us to reflect on the use and force of particles in language, and to contemplate various actions of our minds in discoursing that we indicate to others by these particles - of which some in some constructions, and others always, contain within them the sense of a whole sentence.

CHAPTER viii: ABSTRACT AND CONCRETE TERMS

1. If the ordinary words of language, and our common use of them, had been attentively considered, they would have thrown light on the nature of our ideas. The mind has a power to abstract its ideas, and so they become essences, general essences, by which *sorts* of things are distinguished. Each abstract idea is distinct, so one such idea can never *be* another, so the mind will by its intuitive knowledge see the difference between any two ideas; and therefore no one whole idea can ever be affirmed of another. We see this in the common use of language, which does not permit any abstract word, or name of an abstract idea, to be affirmed of another such. However certain it is that man is an animal, or is rational everyone at first hearing sees the falsehood of 'Humanity is animality' and

'Humanity is rationality'. All our ·legitimate· affirmations are concrete ones, which don't affirm that one abstract idea *is* another, but *join* one abstract idea to another. . . . Where substances are concerned, the attributed abstract idea is most often the idea of a power; for example, 'A man is white' signifies that the thing that has the essence of a man has also in it the essence of whiteness, which is nothing but power to produce the idea of whiteness in the eyes of sighted people. . . .

2. This difference among words points to a difference among our ideas. We find upon enquiry that our simple ideas all have abstract names as well as concrete ones: the former are substantives or nouns, the latter adjectives; as 'whiteness' and 'white', 'sweetness' and 'sweet'. The same holds for ideas of modes and relations - 'justice' and 'just', 'equality' and 'equal'.... For our ideas of substances we have very few if any abstract names. For though the schools have introduced 'animality', 'humanness', 'corporeity' [Locke gives these in Latin] and some others, they are infinitely outnumbered by the substance-names that the schoolmen *didn't* make fools of themselves by trying to match with abstract ones. Those few that the schools constructed and put into the mouths of their scholars could never come into common use or win general approval. That looks to me like a tacit confession by all mankind that they have no ideas of the real essences of substances, since they have no names for any such ideas. They would have had such names if their awareness of their ignorance of them - . that is, of real essences of substances. - not kept them from trying anything so futile. And, therefore, although they had enough ideas to distinguish gold from a stone, and metal from wood, they approached in a gingerly fashion such terms as 'goldenness', 'stonehood', 'metalicity', and 'woodness' [Locke gives these in Latin] - names that would purport to signify the real essences of those substances, of which they knew they had no ideas. It was only the doctrine of substantial forms, and the confidence of mistaken claimants to a knowledge that they lacked, that first coined and then tried to propagate 'animality', 'humanness' and the like. These went very little further than their own schools, and could never get to be current amongst intelligent people...

CHAPTER ix: THE IMPERFECTION OF WORDS

1. From the preceding chapters it is easy to see what imperfection there is in language, and how the very nature of words makes it almost inevitable that many of them should be doubtful and uncertain in their meanings. To examine how words can be perfect or imperfect, we should first consider what our goals are in using them; for their fitness to achieve those goals is a measure of how perfect or imperfect they are. In earlier parts of this work I have often mentioned in passing a double use of words: we use them \ddot{Y} for recording our own thoughts, and \ddot{Y} for communicating our thoughts to others.

2. In the first of these, the recording our own thoughts as an aid to our memories, we are (so to speak) *talking to ourselves*; and for this purpose, any words will do. Sounds are voluntary and arbitrary signs of ideas, and a man can use any words he likes to signify his own ideas to himself. There will be no imperfection in them, if he constantly uses the same sign for the same idea, for in that case he cannot fail to *have his meaning understood*, which is the right use and perfection of language.

3. Secondly, as to communication by words, that too has a double use: \dot{Y} Civil. \ddot{Y} Philosophical.

By their 'civil use' I mean the use of words to communicate thoughts and ideas in a manner that serves for upholding ordinary conversation and commerce about the everyday affairs and conveniences of civil life.

By the 'philosophical' use of words I mean the kind of use of them that can serve to convey precise notions of things, and to express in general propositions certain and undoubted truths that the mind may be satisfied with in its search for true knowledge. [In Locke's time the meaning of 'philosophical' extended to 'scientific'.]

These two uses of language are very different, and one needs much less exactness than the other, as we shall see.

4. The chief end of language in communication is to be understood, and words don't serve well for that end - whether in civil or in philosophical discourse - when some word fails to arouse in the hearer the idea it stands for in the mind of the speaker. Sounds have no *natural* connection with our ideas; they get their meanings from the arbitrary decisions of men; so when they are doubtful and uncertain in their meaning (which is the imperfection I am are speaking of), the cause of this lies in the Ÿideas they stand for rather than in any Ÿword's being an inferior sign for a given idea - for in that respect they are all equally perfect.

So, what makes some words more doubtful and uncertain in their meanings is the difference in the ideas they stand for.

5. The idea that each word stands for must be learned and remembered by those who want to exchange thoughts and have meaningful conversations with others in the language in question. There are four kinds of situation where this is especially hard to achieve:

 $\dot{\mathbf{Y}}$ where the idea a word stands for is very complex, and made up of many constituent ideas put together (·discussed in section 6·),

 $\hat{\mathbf{Y}}$ where the \cdot constituent parts of the \cdot idea the word stands for have no certain connection in nature, and so no settled standard anywhere in nature by which to correct the idea (\cdot sections 7-10 \cdot),

 $\dot{\mathbf{Y}}$ where the meaning of the word relates to a standard that isn't easy to know (sections 11-12), and

 $\hat{\mathbf{Y}}$ where the meaning of the word and the real essence of the thing are not exactly the same.

(These are difficulties that affect the meanings of various words that are nevertheless intelligible. I needn't discuss ones that are not intelligible at all, such as a name for a simple idea that the hearer can't acquire because of a lack in his sense-organs or his faculties....)

In all these cases we shall find an imperfection in words in their particular application to our different sorts of ideas. When I get into the details, we shall find that the names of mixed modes are most liable to doubtfulness and imperfection for the first two of these ·four listed· reasons, and the names of substances chiefly for the third and fourth reasons.

6. Many names of mixed modes are liable to great uncertainty and obscurity in their meanings \cdot for either of two reasons \cdot .

One is that many complex ideas are *extremely* complex. For words to be serviceable in communication, they must arouse in the hearer exactly the same idea they stand for in the speaker's mind. Without this, men fill one another's heads with noise and sounds but don't convey their thoughts or lay their ideas before one another. But when a word stands for a very complex idea that is compounded and decompounded [the sentence up to here is from Locke verbatim], it isn't easy for men to form and retain that idea exactly enough for the name in common use to stand for exactly the same precise idea. That is why men's names of very complex ideas, such as most of the moral words, seldom have exactly the same meaning for two different men. Not only does one man's complex idea seldom agree with another's, but it also often differs from the idea that he himself had yesterday, or from the one he will have to-morrow.

7. Most names of mixed modes lack standards in nature in terms of which men could correct and adjust their meanings; and that makes them very various and doubtful. They are collections of ideas that the mind has put together to suit *its own* notions and in the furtherance of *its own* conversational purposes, not intending to copy anything that really exists but merely to name and sort things according to whether they agree with the archetypes or forms it has made. . . . Names that stand for collections of ideas that the mind makes at pleasure, are bound to have doubtful meanings, when such collections are nowhere to be found constantly united in nature . . . What the word 'murder' . . . signifies can never be known from things themselves. Many parts of the complex idea of murder are not visible in the murderous action itself: the intention of the mind, which is a part of the idea of murder, has no necessary connection with the outward and visible action of the murderer; and the pulling of the trigger through which the murder is committed - possibly the only visible feature of the action - has no natural connection with those other ideas that make up the meaning of the word 'murder'. All those ideas are united and combined only by the understanding, which unites them under one name; but when this is done without any rule or pattern it is inevitable that the meaning of the name should be different in the minds of different men.

8. It is true that common use - the 'rule of propriety' - is of some help in settling the meanings in a language. It does this pretty well for ordinary conversation; but in the absence of any authority to establish the precise meanings of words, common use doesn't suffice to fit them for philosophical discourses; because almost every name of any very complex idea has a great latitude in common use, and can be made the sign of widely different ideas without going beyond the bounds of propriety. Also, the rule of propriety itself is indeterminate: it is often matter of dispute whether this or that way of using a word conforms to propriety of speech. So the names of such very complex ideas are naturally liable to the imperfection of being of doubtful and uncertain signification, and don't always stand for the same idea in the minds of speaker and hearer, even when these are people who *want* to understand one another. . . .

9. Doubtfulness over the meanings of the names of mixed modes comes partly from how they are ordinarily learned. How *do* children learn languages? To make them understand what the names of *simple ideas*, or of *substances*, stand for, people ordinarily show them the thing of which they want them to have the idea; and then repeat the name that stands for it - 'white', 'sweet', 'milk', 'sugar', 'cat', 'dog'. But as for *mixed modes*, especially

the most important of them, moral words [see explanation at the end of v.12], the sounds are usually learned first; and then to know what complex ideas they stand for the child must look to explanations by adults or (more commonly) is left to find out for himself through his own observation and hard work. And since not much observation or hard work is expended on the search for the true and precise meaning of names, these moral words are in most men's mouths little more than bare sounds; and when they have any meaning it is for the most part very loose and undetermined, and thus obscure and confused. [The remainder of the section is a lively complaint about the consequences of this situation in academic debates, especially on theological and legal topics. It concludes:] In the interpretation of laws, whether divine or human, there is no end. Comments beget comments, and explanations provide fodder for yet further explanations. . . . Many a man who was pretty well satisfied of the meaning of a text of scripture at a first reading has by consulting commentators quite lost the sense of it. . . . I don't say this with the thought that commentaries are needless; but only to show how uncertain the names of mixed modes naturally are, even in the mouths of those who had both the intention and the ability to speak as clearly as language would let them.

[Section 10 points out that Locke's view is confirmed by the amount of trouble we take trying to understand what great writers of the past meant by their writings. This holds especially for ones dealing with 'truths we are required to believe, or laws we are 'required to obey'. Where less is at stake, we are less concerned with exact meanings.]

11. Whereas the meanings of the names of *mixed modes* are uncertain because there are no real standards existing in nature by which to adjust those ideas, the names of *substances* have doubtful meanings for a contrary reason - namely because the ideas they stand for are supposed to conform to the reality of things, and *are* referred to standards made by nature. In our ideas of substances we are not free as we are with mixed modes simply to *choose* what combinations we want as criteria to rank and name things by. If we want our names to be signs of substances and to stand for them, we must follow nature, suit our complex ideas to real existences, and regulate the meanings of their names with guidance from the things themselves. Here we *do* have patterns to follow, but they are patterns that make the meanings of the names very uncertain, because the patterns either can't be known at all, or can be known only imperfectly and uncertainly.

12. The names of substances have a double reference in their ordinary use.

First, sometimes they are made to stand for things' *real constitutions* - the constitutions that are the centre and source of all the things' properties. And so the complex ideas that are their meanings of substance-names are supposed to fit with these real constitutions, or 'essences' as they are apt to be called. But they are utterly unknown to us, so any sound that is meant to stand for one of them must be very uncertain in its application. It will be impossible to know what things are properly called 'horse' or 'antimony', when those words are put for real essences of which we have no ideas at all. Thus, when the names of substances are taken in this way, and referred to standards that can't be known, their meanings can never be corrected and established by those standards.

13. Secondly, what the names of substances immediately signify are the simple ideas \cdot of qualities that are found to co-exist in the substances; so *these*, united as they are in the substance in question, are the proper standards by which the meanings of substance-names

may be best corrected. But these patterns don't serve the purpose well enough to protect the names from a variety of uncertain meanings. The simple ideas that are united in a single substance are very numerous, and all have an equal right to enter into the complex idea that the specific name is to stand for; so people who want to talk about the same thing nevertheless form very different ideas about it; and so their name for it unavoidably comes to mean different things for different men. [In the remainder of this section Locke explains why so many simple ideas are eligible for inclusion in the meaning of a given substance name. Most of them concern powers to interact thus and so with other things; the number of such powers (for a given kind of substance) multiplied by the number of kinds of 'other thing' yields a formidable product; Locke calls it 'almost infinite'. And when men freely choose to make certain selections from this multitude, Locke remarks, it is inevitable that their complex ideas of substances will be very various, and thus that the meanings of substance-names will be very uncertain.]

[Section 14 continues with the topic of the numerousness and variety of the eligible simple ideas.]

[In section **15** Locke concedes that most of our names for substances are determinate and uniform enough for everyday purposes, but 'in philosophical enquiries and debates, where general truths are to be established and consequences drawn from positions laid down', he insists, they are not.]

16. This is a natural and almost unavoidable imperfection in almost all names of substances, as soon as we move from confused or loose notions to stricter and more precise enquiries. . . . I was once in a meeting of very learned and able medical men when the question arose as to whether any liquor [= 'fluid'] passes through the filaments of the nerves. After the debate had gone on for a good while, with a variety of arguments on each side, I suggested that before carrying on with this dispute they should first make sure that they all meant the same thing by 'liquor', and *what* they meant by it. (I had for some time suspected that most disputes are about the meanings of words more than they are about a real difference in the conception of things.) At first they were a little surprised at my proposal; everyone who was there thought he understood perfectly what the word 'liquor' stands for ; and it is a tribute to their qualities of intellect that they didn't treat the proposal as a very frivolous or extravagant one. They agreed to go along with my suggestion, and that led them to discover that the meaning of that word was not as settled and certain as they had all imagined, and that each of them had made it a sign of a different complex idea. This showed them that the core of their dispute concerned the meaning of that term, and that they didn't differ much in their opinions about some *fluid and very* finely divided matter passing through the channels of the nerves. It was not so easy to agree on whether it was to be called 'liquor' or not, but they came to think that this wasn't worth wrangling over.

[In section 17 Locke discusses gold, the number and variety of its qualities and powers, and the resulting potential for uncertainty and interpersonal difference in the meaning of 'gold'.]

18. From what I have said it is easy to see that the names of simple ideas are the least liable to mistakes, for the following \cdot two \cdot reasons. First: the ideas they stand for, each

being just one single perception, are easier to acquire and to retain clearly than are the more complex ones. Second: they are never associated with any essence except the perception that they immediately signify, whereas the names of substances run into trouble through being associated with something else. Men who don't use their words perversely or deliberately start quarrels seldom make mistakes involving the use and meaning of the names of simple ideas. 'White' and 'sweet', 'yellow' and 'bitter', carry a very obvious meaning with them, which everyone precisely comprehends or easily sees that he is ignorant of. But what precise collection of simple ideas 'modesty' or 'frugality' stand for in someone else's use isn't so certainly known. And however apt we are to think we know well enough what is meant by 'gold' or 'iron', the precise complex idea that others make them the signs of isn't so certain; and I think it seldom happens that a speaker makes them stand for exactly the same collections as the hearer does....

19. The names of simple modes are second only to those of simple ideas in their freedom from doubt and uncertainty (and for the same reasons). This is especially true of names of shapes and numbers. Who ever mistook the ordinary meaning of 'seven' or 'triangle'? In general the least complex ideas in every kind have the least dubious names.

20. So \ddot{Y} mixed modes that are composed of only a few obvious simple ideas usually have names whose meanings are not very uncertain. But the names of \ddot{Y} mixed modes that include a great number of simple ideas are commonly of a very doubtful and undetermined meaning, as I have shown. The names of substances . . . are liable yet to greater imperfection and uncertainty, especially when we come to a philosophical use of them.

21. Given that the great disorder in our names of substances comes mostly from our lack of knowledge, and from our inability to penetrate into their real constitutions, you may be wondering why I call this an imperfection in our words than in our understandings. This question seems so reasonable that I think I must explain why I have followed this method. When I first began this treatise on the understanding, and for a good while after, it didn't occur to me that it needed to include any consideration of words. But after I had dealt with the origin and content of our ideas, I began to examine the extent and certainty of our knowledge; and then I found that knowledge is so closely connected with words that very little could be said clearly and relevantly about it unless attention were first paid to the power of words and to how they have meaning. Knowledge has constantly to do with propositions; and though it terminates in things, it gets to things so much by the intervention of Ÿwords that Ÿthey seemed hardly separable from our general knowledge. At least Ÿthey interpose themselves so much between our understandings and the truth that it seeks to think about and grasp that *Y*their obscurity and disorder often cast a mist before our eyes (like fogged glass), and intrude on our understandings. In the fallacies to which men subject themselves and others, and in the mistakes in their disputes and in their thinking, much of the trouble comes from the uncertain or wrong meanings of words. So much so, indeed, that we have reason to think that defects in words are a large obstacle to getting knowledge. It is especially important that we should be carefully warned about this ·confusion of language· because people, so far from seeing it as a drawback, have studied the arts of *increasing* it, giving them the reputation of learning and subtlety, as we shall see in the next chapter. I'm inclined to think that if the imperfections of language, as the instrument of knowledge, were more thoroughly weighed, a great many of the

controversies that make such a noise in the world would cease, and there would be a more open road than we now have to knowledge, and perhaps to peace also.

[In section 22 Locke says that the dependence of meaning on 'the thoughts, notions, and ideas' of the speaker implies that men must have trouble understanding speakers of their own language; and that the trouble is magnified when one tries to understand texts written far away and long ago in a foreign language. Therefore 'it would become us to be charitable to one another in our interpretations or misunderstanding of those ancient writings'.]

23. The volumes of interpreters and commentators on the Old and New Testaments are manifest proofs of this. Even if everything said in the text is infallibly true, the reader can't help being very fallible in his understanding of it. We shouldn't be surprised that the will of God, when clothed in words, should be liable to the doubt and uncertainty that inevitably goes with verbal communication; bear in mind that even his Son, while clothed in flesh, was subject to all the weaknesses and drawbacks of human nature, except for sin. We ought to magnify God's goodness in spreading before all the world such legible testimony of his works and his providence, and giving all mankind a light of reason that is bright enough so that anyone who seeks the truth, even if he didn't have help from written word, couldn't avoid concluding that there is a God and that he owes obedience to him. So \hat{Y} the precepts of natural religion are plain and very intelligible to all mankind, and seldom disputed; and **Ÿ**other revealed truths, conveyed to us by books and languages, are liable to the common and natural obscurities and difficulties that words bring with them. I think, then, that we would do well to be more careful and diligent in observing Ythe former, and less dogmatic, confident, and bullying in imposing our own sense and interpretations of Ÿthe latter.

CHAPTER x: THE ABUSE OF WORDS

1. In addition to language's *natural* imperfection, and the obscurity and confusion that it is so hard to avoid in the use of words, there are several *wilful* faults and failures that men are guilty of when using language, making words less clear and distinct in their meanings than they need to be. I shall deal with one of these in sections 2-4, a second in 5, a third in 6-13, a fourth in 14-16, a fifth in 17-21, a sixth in 22.

2. The first and most palpable abuse is using words without clear and distinct ideas, or - even worse - using signs without *anything* being signified. This occurs in two ways.[The section continues with the first of the two, namely the founders of sects and systems who coin new words without giving them respectable meanings. If you want examples, Locke concludes:] you will get plenty of them from the schoolmen and metaphysicians, in which I include the disputing scientists and philosophers of recent times.

[In sections **3-4** Locke rails against those who take words that do have respectable common meanings and 'by an unpardonable negligence' use them 'without any distinct meaning at all'. In everyday life and speech men do what is needed to make themselves understood; but in academic debates there is no pressure to be intelligible to others. On the contrary, talking without clear meaning is a device for protecting oneself against being discovered to be wrong. Locke concludes:] When a person has no settled notions, drawing him out of his mistakes is like expelling a homeless person from his home!

5. Secondly, another great abuse of words is inconstancy in the use of them. It is hard to find a discourse on any subject, especially a controversial one, in which the same words - often ones that are crucial to the argument - are not used sometimes for one collection of simple ideas and sometimes for another. [The section continues with an explanation of why this is 'plain cheat and abuse', and of what makes it so serious. Locke asks whether we would like to do business with someone who uses '8' sometimes for eight and sometimes for seven. He continues:] In arguments and learned disputes the same sort of proceeding is often mistaken for wit and learning. I see it as a greater dishonesty than the misplacing of counters in calculating a debt; and the cheat is greater by the amount that truth is worth more than money.

6. Thirdly, another abuse of language is intentional obscurity - either giving old words new and unusual meanings without explaining them, or introducing new and ambiguous terms without defining them, or combining words in such a way as to defeat their ordinary meanings. The Aristotelian philosophy has been most conspicuous in doing this, but other sects have not been wholly clear of it. [In the rest of this section Locke continues the attack on people who shelter under the obscurity of their words, mentioning in passing the view that 'body' and 'extension' are synonymous, which he says is easily refuted by attention to the ordinary meanings of those words. See II.xiii.11.]

[Sections **7-8** continue the angry attack on those who make careers and reputations out of wilful obscurity.]

9.... The best way to defend strange and absurd doctrines is to guard them with legions of obscure, doubtful, and undefined words. Yet that makes these retreats more like dens of robbers or holes of foxes than like fortresses manned by sturdy warriors; and what makes it hard to get them - \cdot the absurd doctrines - out of their retreat isn't their strength but rather the dark tangle of briars and thorns they are surrounded with. Because untruth is unacceptable to the mind of man, the only defence left for absurdity is obscurity.

[In sections **10-11** Locke speaks of 'this learned ignorance', and condemns the practice of those who advance their own causes, and sometimes win respect and admiration, by displays of idle subtlety through which they 'render language less useful than its real defects would have made it' - an achievement of which illiterate people are not capable.]

12. This mischief hasn't been confined to logical niceties, or mind-teasing empty speculations. Rather, it has Ÿinvaded the important affairs of human life and society, Ÿobscured and tangled the significant truths of law and divinity, Ÿbrought confusion, disorder, and uncertainty into the affairs of mankind, and Ÿharmed the two great guides, religion and justice - if not destroying them then at least making them mainly useless. Most of the commentaries and disputes concerning the laws of God and man have served only to make the meaning more doubtful, and to tangle the sense. All those intricate distinctions and fine points have merely brought obscurity and uncertainty, leaving the words *more* unintelligible and the reader *more* at a loss! That is why rulers are easily understood when giving ordinary spoken or written commands to their servants, but are *not* easily understood when they speak to their subjects in their laws....

13. . . . Mankind's business is to know things as they are, and to do what they ought, and not to spend their lives in talking about things or tossing words to and fro. So wouldn't it be good for us if the use of words were made plain and direct, and if our language - which we were given for the improvement of knowledge and as a bond of society - were *not* employed to Ÿdarken truth and Ÿunsettle people's rights, to Ÿraise mists and Ÿmake both morality and religion unintelligible? Or if Ÿthese things do go on happening, wouldn't it be good if they stopped being thought of as signs of learning or knowledge? That completes my discussion of the third of the abuses of words that I listed in section 1.

14. Fourthly, another great abuse of *words* is taking them for *things*. Although this in some degree concerns names of all kinds, it particularly affects names of substances. [As this section progresses, we find that by 'taking words for things' Locke means 'uncritically assuming that certain noun phrases in which one has been indoctrinated *stand for real things*'. For example, someone brought up in the Aristotelian philosophy never doubts that phrases like 'substantial form', 'vegetative soul' and 'abhorrence of a vacuum' each stand for something real. Locke also gives examples from the vocabularies of Platonists and Epicureans.]

15. Attentive reading of philosophical writers gives one plenty of examples of how the understanding is led astray by taking names for things. I shall present just one familiar example. There have been many intricate disputes been about matter, as if there were some such *thing* really in nature, distinct from body; as it is evident that the *idea* for which the word 'matter' stands is different from that for which 'body' stands. If those two ideas were the same, the words would be interchangeable in all contexts, which they are not: it is all right to say 'There is one matter of all bodies' but not to say 'There is one body of all matters'; we can say that one body is bigger than another, but it would sound wrong to say that one matter is bigger than another (and I don't think anyone ever does say this). What makes the difference? Well, although matter and body are not *really distinct* - . that is, are not distinct *things*. - and so wherever there is one there is the other, yet the words 'matter' and 'body' stand for two different *conceptions*, one of them being incomplete, and a part of the other. For 'body' stands for a Ÿsolid extended shaped substance, of which 'matter' is a partial and more confused conception, apparently standing for the Ÿsubstance and solidity of body, without taking in its Ÿextension and shape. That is why we always speak of matter as *one*, because it contains nothing but the idea of a solid substance, which is everywhere the same, everywhere uniform. So we don't think or speak of different matters in the world, any more than we do of different solidities; whereas we do think and speak of different bodies, because extension and shape are capable of variation. But solidity can't exist without extension and shape, \cdot so wherever there is matter there is body, as well as vice versa. So when some philosophers took 'matter' to be the name of something really existing in that abstract form - .possessing only the qualities mentioned in the definition of 'matter' - they set off the obscure and unintelligible discussions and disputes that have filled the heads and books of philosophers concerning 'materia prima' *first matter*, conceived in Aristotelian philosophy as undifferentiated matter, lacking qualities that would differentiate parts of it from one another. I leave it to you to think about how many other examples of this trouble there have been. But I will say this: We would have many fewer disputes if words were taken for what they are, the signs of our

ideas only, and not for things themselves. For when we argue about 'matter' or the like, we are really arguing only about the idea we express by that word, without regard for whether that precise idea agrees to anything really existing in nature...

[In section **16** Locke expresses pessimism about curing anyone of such a verbal fault if he has lived with it for many years. This, he says, is a major reason why it is so hard to get men to give up their errors, 'even in purely philosophical opinions, and ones where their only concern is with truth'.]

17. Fifthly, another abuse of words is to set them in the place of *things that they do not and cannot signify*. My only examples of this are attempts to use words to signify *the real essences of substances*; I shall discuss this through five sections. When we affirm or deny a proposition about some sort of substance, knowing only its nominal essence, we usually tacitly try to, or intend to, name the real essence of that sort of substance. When a man says Gold is malleable, he means and wants to get across more than merely

What I call gold is malleable,

though truly that is all the sentence amounts to. Rather, he wants it to be understood that Gold, i.e. what has the real essence of gold, is malleable,

which amounts to saying that malleableness depends on and is inseparable from the real essence of gold. But since he doesn't know what that real essence consists in, what he connects malleableness with in his mind is not really that unknown essence but only the sound 'gold' that he puts in place of it. [The section then discusses futile debates about the proper definition of 'man', which have to be understood - Locke says - as concerning what qualities are inevitable consequences of the real essence of *man*.]

18. It is true that the names of substances would be much more useful, and propositions made with them would be much more certain, if the ideas in our minds that they signified *were* the real essences of the substances. It is because of our lack of \cdot knowledge of \cdot those real essences that our words convey so little knowledge or certainty when we talk about substances. So the mind is just trying to remove that imperfection as far as it can when it makes it a substance-name secretly stand for a thing having that real essence, as if that would somehow bring it nearer to the real essence. . . . Actually far from \ddot{Y} lessening the imperfection of our words, this procedure \ddot{Y} increases it; for it is a plain abuse to make a word stand for something that it can't possibly be a sign of because our complex idea doesn't contain it.

19. This lets us explain why with *mixed modes* any change in the simple ideas entering into the complex one results in a new species, as can plainly be seen with 'manslaughter', 'murder', 'parricide'. The reason is that the complex idea signified by such a name is the *real* as well as *nominal* essence; and there is no secret reference of that name to any other essence but that. But with substances it is not so. It may happen that one man includes in his complex idea of what he calls 'gold' something that another omits, and vice versa; but they don't usually think they are talking about different species. That is because they secretly, mentally assume that the word 'gold' is tied to a real unchanging essence of an existing thing, on which depend the properties included in the complex idea(s). When someone adds to his complex idea of gold the ideas of fixedness and solubility in aqua regia, which he had previously left out, he isn't thought to have changed the species he is talking about. Rather, he is thought only to have acquired a more complete idea by adding

another simple idea that is always in fact joined with the others of which his former complex idea consisted.

But relating the name to a thing of which we have no idea, far from helping us, merely serves to increase our difficulties. When the word 'gold' is used to stand merely for a more or complete collection of simple ideas, it designates that sort of body well enough for everyday purposes; but when it is tacitly related to the real essence of that species, the word comes to have no meaning at all, because it is put for something of which we have no idea at all, and so it can't signify anything in the absence of the actual gold. You may think that there is no difference here; but if you think about it carefully you will see that \dot{Y} arguing about gold in name - that is, arguing about it in the abstract, without actually having any on hand- - is quite different from \ddot{Y} arguing about an actual portion of the stuff, e.g. a piece of gold leaf laid before us.

20. Men are encouraged to \cdot try to \cdot use names of species of substances to designate the real essences of the species by their supposition that nature works regularly in the production of things, and sets the boundaries to each species by giving exactly the same real internal constitution to each individual that we rank under one general name. See vi.14-18. Yet anyone who observes their different qualities can hardly doubt that many of the individuals called by the same name differ in their internal constitutions as much as ones that are ranked under different specific names. But the supposition that exactly the same internal constitution always goes with the same specific name encourages men to take those names to represent those real essences, though really they signify only the complex idea in the speaker's mind. . . This is bound to cause a great deal of uncertainty in men's discourses, especially of those who have thoroughly absorbed the doctrine of *substantial forms*, by which, they are sure, the various species of things are fixed and distinguished.

[In section **21** Locke says that the 'preposterous' belief that we are referring to real essences is visibly at work when men ask such questions as whether a certain monkey or 'monstrous foetus' is a man or not. If they knew that they can only use 'man' to name their complex idea of *man*, they would see that there is nothing to wonder or argue about. He continues:] In this wrong way of using the names of substances, two false suppositions are contained.

First, that *nature makes all particular things according to certain precise essences, by which they are distinguished into species.* Of course everything has a real constitution that makes it what it is, and on which its sensible qualities depend; but I think I have proved that this does not underlie *our* sorting, distinguishing, and naming of the species.

Secondly, this \cdot mistake \cdot also tacitly insinuates that we have ideas of these proposed essences. What would the point be of enquiring whether this or that thing has the real essence of the species man if we did not suppose that such a specific essence was known to us? which yet is utterly false...

[In section 22 Locke presents his sixth 'abuse of words', which he says is 'more general, though perhaps less observed' than the others. It consists in assuming too confidently that others mean the same by a given word as one does oneself, an 'abuse' of which both speakers and hearers are often guilty. He cites the word 'life' as one that turns out upon enquiry to be far from having exactly the same meaning in the minds of all speakers of English, though most people would feel almost insulted if they were asked to explain what

they mean by 'life'. It is important to ask such questions, Locke insists, because:] This abuse of taking words upon trust has nowhere spread so far nor with such ill effects as amongst men of letters. The multiplication and obstinacy of disputes that have so laid waste the intellectual world is due - more than to anything else - to this ill use of words. For though it is generally believed that there is great diversity of *opinions* in the books and debates the world is distracted with, it seems to me that the contending learned men of different parties are merely *speaking different languages*. I am inclined to think that if they got away from *words* and attended to *things*, and became clear about what they think, it would turn out that they all *think* the same - though they might still differ in what they *want*.

23. To conclude this consideration of the imperfection and abuse of language: the ends of language in our discourse with others are chiefly (1) to make one man's thoughts or ideas known to another, (2) to do that as easily and quickly as possible, and (3) thereby to convey the knowledge of things. Language is either abused or deficient when it fails in any of these three purposes.

23a. [This isn't Locke's numbering.] First, words fail in the first purpose, and don't bring one man's ideas into the view of others, \ddot{Y} when men have words in their mouths with no corresponding determinate ideas in their minds; \ddot{Y} when they apply established words of a language to ideas to which common usage in that language does not apply them, and \ddot{Y} when they apply words very unsteadily, making them stand first for one idea and then for another.

24. Secondly, men fail to convey their thoughts as quickly and easily as they could, when they have complex ideas without having any distinct names for them. This is sometimes the fault of the language itself, which doesn't contain a word with the required meaning; and sometimes the fault of the man, who hasn't yet learned the word for that idea he wants to exhibit to his hearer.

25. Thirdly, no knowledge of things is conveyed by men's words when their ideas don't agree with the reality of things. This is basically a defect in our \ddot{Y} ideas, which are defective in not being as true to the nature of things as they would be if we were more careful and thorough; but it also stretches out to become a defect in our \ddot{Y} words too, when we use them as signs of real things that don't exist and never did.

26. A comment on the first item in 23a: Someone who has words of a language with no distinct ideas in his mind to be their meanings, uses them in conversation only make a noise without any sense or meaning; and no matter how learned he may seem through his use of hard words or learned terms, none of this makes him knowledgeable, any more than a man would count as learned if he had in his study nothing but the bare titles of books, without having their the contents. . . .

27. A comment on 24: Someone who has complex ideas without particular names for them is no better off than a bookseller whose warehouse contains only unbound volumes, without titles, so that he could make them known to others only by showing the loose pages. This man is hindered in his discourse by lack of words to communicate his complex ideas, so that he is forced to make them known by an enumeration of the simple ideas that make them up, with the result that he often has to use twenty words to express what another man signifies in one.

28. A comment on the third item in 23a: Someone who doesn't constantly use the same sign for the same idea, instead using a word sometimes with one meaning and sometimes with another, ought to be regarded in academic and social circles with as much disapproval as someone who in commercial circles sells different things under the same name.

29. A comment on the second item in 23a: Someone who applies the words of a language to ideas different from those to which the common use of that country applies them won't be able to convey much to other people by the use of *those* words unless he defines them - even if he has much to convey...

30. A comment on 25: Someone who imagines to himself substances such as never have existed, and fills his head with ideas that don't correspond to the real nature of things, and gives these ideas settled and defined names, may fill his discourse and perhaps his hearer's head with the fantastical imaginations of his own brain, but he'll be far from advancing a step in real and true knowledge.

[Section **31** briefly recapitulates the content of sections 26-30.]

32. In our notions concerning substances we are liable to all those mishaps. For example, someone \ddot{Y} who uses the word 'tarantula' without having any idea of what it stands for, . . . \ddot{Y} who in a newly discovered country sees various sorts of animals and vegetables, but can speak of them only by descriptions, . . . \ddot{Y} who uses the word 'body' sometimes for pure extension and sometimes for extension and solidity together, . . . \ddot{Y} who uses the word 'horse' with the meaning common usage gives to 'mule', . . . \ddot{Y} who thinks the word 'centaur' stands for some real thing. . . .

33. With modes and relations generally we are liable only to the first four of these troubles. (1) I may have in my memory the names of modes, for example 'gratitude' or 'charity' and yet have no precise ideas attached in my thoughts to those names. (2) I may have ideas and not know the words that express them. For example, I may have the idea of a man's drinking till his colour and mood are altered, till his tongue trips, his eyes look red, and his feet fail him - and yet not know that the word for this is 'drunkenness'. (3) I may have the ideas of virtues or vices, and have names for them also, but apply the names wrongly. For example when I apply the word 'frugality' to the idea that others signify by 'covetousness'. (4) I may use any of those names in an inconstant manner. (5) But with modes and relations I can't have ideas disagreeing with the existence of things; for modes are complex ideas that my mind makes at its pleasure, and relations come from considering or comparing two things together, and so they are also ideas of my own making; so these ideas can hardly be found to disagree with anything existing! I don't have them in my mind as copies of things regularly made by nature, or as ideas of properties inseparably flowing from the internal constitution or essence of any substance. I have them only as patterns lodged in my memory, with names attached to them, to apply to actions and relations as they come to exist. . . .

34. Wit and fancy get a better welcome in the world than dry truth and real knowledge; so people will hardly think that the use of *figurative language and ·literary· allusion* constitutes an imperfection or abuse of language. In contexts where we seek pleasure and delight rather than information and improvement, such ornaments are indeed not faults.

But if we want to speak of things as they are, we must allow that all the art of rhetoric (except for order and clearness) - all the artificial and figurative application of words that eloquence has invented - serve only to insinuate wrong ideas, move the passions, and thereby mislead the judgment; and so they are perfect cheats. . . . It is evident how much men love to deceive and be deceived, since rhetoric - that powerful instrument of error and deceit - has its established practitioners, is publicly taught, and has always been highly regarded. No doubt I will be thought rash or oafish to have spoken against it. . . .

CHAPTER xi: THE REMEDIES OF THE FOREGOING IMPERFECTIONS AND ABUSES

1. We have examined at length the imperfections, both natural and contrived, of languages. As speech is the great bond that holds society together, and the channel through which knowledge is conveyed from man to man, and down the generations, it would be thoroughly worthwhile to consider seriously what remedies are to be found for the above-mentioned troubles.

2. I am well aware that I would cut a ridiculous figure if I tried to effect a complete reform of the language of my own country, let alone of the languages of the world! To require that men use their words always in the same sense, and only for determined and uniform ideas, would be to think that all men should have the same notions and should talk only of what they have clear and distinct ideas of; and no-one can try to bring that about unless he is vain enough to think he can persuade men to be either very knowing or very silent!....

3. Well, the shops and business offices can be left to their own ways of talking, and social chatter can be allowed to continue as it always has. But, though the schools and men of argument might object to any proposal to make their disputes shorter or fewer, I think that those who claim to search seriously after truth, or to maintain it, *ought* to study how they might say what they have to say without obscurity, doubtfulness, or ambiguity - to all of which men's words are naturally liable if care is not taken.

[In sections **4-6** Locke adds colour and detail to his picture of the prevalence of abuses of language and of the damage that they do. In section **4** he says there is reason to suspect that 'language, as it has been employed, has contributed less to the improvement than to the hindrance of knowledge amongst mankind'. Sections **5** and **6** expand this thought with angry passion.]

7. 'Is a bat a bird?' That isn't the question - which it would be quite absurd to ask - whether a bat is something other than what it is, or has qualities other than those it has. There are two questions that *could* be being asked. (1) Between people who admit to being not quite clear about just what a bat is and just what a bird is, the question may arise as part of an endeavour to learn whether all the simple ideas to which in combination they both give the name 'bird' are all to be found in a bat. Understood in this way, it is a question asked only by way of enquiry, not dispute. (2) The question might come up between disputants one of whom says that a bat *is* a bird while the other denies this. In that case the question is purely about the meaning of 'bat' or of 'bird' or of both. . . . If the disputants agreed about the meanings of these two names, there couldn't possibly be any dispute about them. [The section continues with the suggestion that most disputes are 'merely verbal', reflecting differences in what people mean by the same word.]

8. To provide some remedy for the defects of speech that I have mentioned, and to prevent the troubles that follow from them, I think it would be useful to conform to the following rules.

First, a man shall take care to use no word without a meaning, no name without an idea for which he makes it stand. [The remainder of the section sketches evidence that this rule is often not followed.]

9. Secondly, it isn't enough for a man to use his words as signs of some ideas; the ideas must be \ddot{V} if simple then clear and distinct, and \ddot{V} if complex then determinate - that is, he must have a precise collection of simple ideas firmly in mind, and have attached to it a word that is his sign of just that collection and no other. [The section continues with remarks about the need for this, and about how it is flouted in people's uses of words like 'justice'. Locke describes the procedure one would have to go through to be sure and clear about one's meaning for 'justice', and then continues:] I don't say that a man should recall this analysis and run through it in detail every time he encounters the word 'justice'; but he should at least be able to do that when he pleases, as a result of having examined the meaning of the word and settled the idea of all its parts in his mind. . . . This \ddot{V} exactness may be thought to be too much trouble, and therefore most men will let themselves off from settling the complex ideas of mixed modes so precisely in their minds. But until they do this they can expect to have a great deal of obscurity and confusion in their own minds and a great deal of wrangling in their conversations with others.

10. More is required for a right use of the names of *substances* than merely determined ideas. Here the names must also fit things as they exist; but I shall say more about this later \cdot in sections 19-25 \cdot . This Ÿexactness is absolutely necessary in the search for philosophical and scientific knowledge, and in controversies about truth. It would be good if it also carried over into common conversation and the ordinary affairs of life, but I suppose that is hardly to be expected. Unlearned notions suit unlearned talk; and although both are confused enough they still serve quite well the market and the village fête. Merchants and lovers, cooks and tailors, have the words they need to dispatch their ordinary affairs; and I think the same might also be true of philosophers and disputants if they really wanted to understand and be clearly understood.

11. Thirdly, it isn't enough that men have ideas, determined ideas, for which they make these signs stand; they must also do their careful best to give their words meanings that are as near as possible to the ones common usage has attached them to. For words, especially in languages already formed, are \ddot{Y} no man's private possession but rather \ddot{Y} the common measure of commerce and communication, so no-one is at liberty to please himself about what to mean by them - and if he really needs to change a word's meaning he should declare that he is doing so. And that ought not to happen often. Our aim in speaking is or should be to be understood, and that will be thwarted if we give frequent explanations, demands, and other such awkward interruptions that occur when men don't follow common usage....

[In section **12** Locke says ('Fourthly') that there is sometimes a legitimate need to declare clearly and explicitly what one means by some word. One may be for good reasons introducing a new word, or using a common word in a new sense.]

13. The ideas that men's words stand for are of different sorts, and there are corresponding differences in the ways of making clear, as needed, *what* those ideas are. *Definition* is generally thought to be the right way to make known the proper meaning of a word; but $\ddot{\mathbf{Y}}$ some words can't be defined; $\ddot{\mathbf{Y}}$ others have meanings that can't be elucidated except through definition; and perhaps there is $\ddot{\mathbf{Y}}$ a third kind of word that has something in common with each of the other two kinds \cdot in being capable of having their meanings explained through definitions or in other ways. Let us see all this in action in connection with the names of $\ddot{\mathbf{Y}}$ simple ideas, $\ddot{\mathbf{Y}}$ modes, and $\ddot{\mathbf{Y}}$ substances.

14. First, when a man uses the name of a *simple idea*, and sees that it isn't understood or risks being misunderstood, he ought . . . to declare his meaning. I have shown that he can't do this with a definition ($(iv.7\cdot)$); and he has only two other resources. He can \ddot{Y} name some object in which $\cdot a$ quality signified by \cdot that simple idea is to be found - e.g. telling a farmer what 'feuillemorte' means, by saying that it is the colour of withered leaves falling in autumn. But the only sure way of telling someone the meaning of the name of any simple idea is \ddot{Y} by presenting to his senses an object which produces in his mind the idea that word stands for.

[In section **15** ('Secondly') Locke turns to mixed modes. Because they are constructions of ideas voluntarily put together by the mind, someone who employs a name of a mixed mode is perfectly placed to define it, that is, to set out explicitly what *he* means by it; and because they have no patterns in nature, their names can't be explained in any other way. Locke objects fiercely to obscurity in 'moral discourses', because the topic is of great importance and there is no excuse for unclarity because the cure for it - verbal definition - is easy to provide.]

16. That is why I venture to think that morality is capable of demonstration, as well as mathematics. The precise real essences - which are also the nominal essences - of the things that moral words stand for can be perfectly known; and so the congruity and incongruity of the things themselves can be certainly discovered, which is to say that there can be perfect knowledge of them. It may be objected that the names of substances are often used in morality, and that they will introduce obscurity; but they won't. When substances are involved in moral discourses, their various natures are not being *enquired* into but presupposed. For example, when we say that man is subject to law, all we mean by 'man' is a corporeal rational creature, with no concern for what the real essence or other qualities of that creature are. Whether a certain imbecile is a man in a physical sense is something the scientists may dispute about, but it doesn't affect the moral man - so to call him - which is this immovable unchangeable idea, a corporeal rational being. For if we found a monkey or any other creature that had enough use of reason to be able to understand general signs and to draw conclusions using general ideas, he would no doubt be subject to law and in that sense be 'a man', however much he differed in shape from the rest of us. The names of substances, if they are used as they should be, can no more make trouble in moral discourses than they do in mathematical ones: if a mathematician speaks of a cube or globe of gold, he has his clear settled idea that doesn't vary even if by mistake he is applying it to a particular body that isn't gold.

[In section 17 Locke repeats and develops a little his view that the defining of names of mixed modes is important (especially in moral discourses) and easy, so that there is no

excuse for not doing it:] It is far easier for men \dot{Y} to form an idea to serve as their standard for the name 'justice', so that actions fitting that pattern will be called 'just', than \ddot{Y} to see Aristides and form an idea that will in all things be exactly like him. Aristides is as he is, whatever idea men choose to make of him! For \ddot{Y} the former, they need only to know the combination of ideas that are put together in their own minds; for \ddot{Y} the latter they must enquire into the whole nature and abstruse hidden constitution and various qualities of \cdot Aristides, a thing existing outside them.

[Section 18 repeats that verbal definition is our only way of making the meanings of such names clearly known.]

19. Thirdly, for explaining the meanings of the names of substances, as they stand for the ideas we have of their different species, each of the previously mentioned ways - showing and defining - is often needed. Within our complex idea of a kind of substance there are usually a few *Yleading qualities* to which we suppose the other ideas to be attached; and we readily apply the specific name to anything that has that *Y*characteristic mark that we take to be the most distinguishing idea of that species. These salient or *characteristic* ideas (so to call them) are mostly of shape in the species of animals and plants, and of colour (and sometimes shape as well) in inanimate bodies, as I pointed out in vi.29 and ix.15.

20. Now, these leading perceptible qualities are \hat{Y} the chief ingredients in our ideas of species of substances, which makes them also **Y**the most conspicuous and invariable elements in the definitions of our names of those species. The sound 'man' is in itself as apt to signify animality and rationality, united in the same subject as to signify any other complex idea; but when we use that sound to stand for creatures that we count as being of our own kind, it may be that outward shape is as essential an ingredient in our complex idea as any other. So it won't be easy to show that Plato's 'featherless biped' is a worse definition than 'rational animal' for the word 'man', as a label for creatures of that sort. For the leading quality that most often seems to determine that species is *shape*, rather than a faculty of reasoning; indeed, reason doesn't show up in the early stages of human life, and in some it never shows up. If you don't agree with this, I don't see how you can avoid condemning as *murderers* those who kill new-born monsters (as we call them) because of their extraordinary shape, without knowing whether they have a rational soul for *that* question can't be answered at the birth of any infant, however it is shaped. And you can't get out of this by pleading that the strange shape is evidence for the lack of a rational soul: who has told us that a rational soul can't inhabit a lodging that doesn't have such and such a kind of exterior - i.e. that it can't join itself to and inform a body unless the body has such and such an outward structure?

21. These leading qualities are best made known by *showing*, and can hardly be made known in any other way. Seeing a horse or an ostrich will give an idea of its shape a thousand times better than could be done in words; and the only way to get idea of the particular colour of gold isn't by description but by frequently seeing it; which is why people who are used to gold can often tell true gold from counterfeit, pure gold from alloy, by sight alone, where the rest of us, though are eyes are all right, can't see any difference because we don't have the precise fine-grained idea of that particular yellow. . .

22. But many of the simple ideas that make up our specific ideas of substances are *powers* that are not immediately observable in the ordinary appearance of the things; so in explaining our names of substances we do better if part of the meaning is given by enumerating those simple ideas rather than showing the substance itself. If someone has acquired through sight the idea of the yellow shining colour of gold, and then adds to that - from my enumerating them - the ideas of great ductility, fusibility, fixedness, and solubility in aqua regia, he will have a more complete idea of gold than he could get just by seeing a piece of gold and thereby imprinting on his mind its obvious qualities. But if the formal constitution \cdot or real essence \cdot of this shining, heavy, ductile thing lay open to our senses as does the formal constitution or essence of a triangle, the meaning of the word 'gold' might as easily be ascertained as that of triangle.

23. This reminds us of how much the foundation of all our knowledge of the physical world lies in our senses. Unembodied spirits are sure to have much better knowledge and ideas of these things than we have; but we haven't the slightest idea about how they might *get* such knowledge. The whole extent of our knowledge or imagination reaches only as far as our own ideas, which are limited to our ways of perception. It isn't to be doubted that spirits of a higher rank than those immersed in flesh \cdot as we are \cdot may have as clear ideas of the radical constitution of substances as we have of a triangle, and so perceive how all their properties and operations flow from that; but we can't conceive how they could come by that knowledge.

24. But although definitions serve to explain our substance-names as they stand for our *ideas*, they do a poor job of explaining them as they stand for *things*. For our names of substances are not merely signs of our ideas; they are also used ultimately to represent things, and so are put in the place of things; therefore their meaning must agree with the truth of things as well as with men's ideas. Where substances are concerned, therefore, we shouldn't always rest content with the ordinary complex idea that is commonly accepted as the meaning of that word. Instead we should go a little further and enquire into the nature and properties of the things themselves, and thereby make our ideas of their species as complete as possible. For since their names are meant to stand not only for Ythe complex idea in other men's minds that in their ordinary meaning they stand for, but also for Ycollections of simple ideas that really do exist in things themselves, their names can't be defined properly unless natural history is enquired into and their properties are discovered through careful examination. For avoiding troubles in discourse and disputes about natural bodies and substantial things, it isn't enough merely to have learned the confused or otherwise imperfect idea that gives each word its common meaning, and to keep the words to those ideas in our use of them. We must also \hat{Y} acquaint ourselves with the natural history of each species that we speak about, on that basis. Yrectify and settle our complex idea belonging to the name of the species, and when there is a need for it \ddot{Y} explain to others what the complex idea is that we use the name to stand for. [The remainder of the section exclaims about what a great need for this is created by the sloppiness of most people's talk and thought.]

25. So it would be a good thing if people who are experienced in scientific enquiries, and acquainted with the various sorts of natural bodies, would list the simple ideas - \cdot or rather the corresponding qualities - in which they observe the individuals of each sort to agree.

That would remedy a great deal of that confusion that comes from different people applying the same name to smaller or larger collections of perceptible qualities, in proportion to the breadth or the carefulness of their experiences of the species in question. But a dictionary of that sort - containing a natural history, so to speak - would require too many people, as well as too much time, cost, trouble and intelligence, ever to be hoped for. Lacking that, we must content ourselves with such definitions of the names of substances as explain the meanings that men give to them in use. It would be good if those, at least, were provided when there is a need for them; but this isn't usually done. [Locke continues with remarks about the need for such clarifications; and about the shortage of them, which he traces to a misplaced confidence that the meanings of common words are settled and uniform, and to a misguided sense that there is something shameful in having about to ask about meanings. He goes on:] Though such a dictionary as I mentioned above would be too demanding to be hoped for these days, I still think it is reasonable to suggest that words standing for things that are known and distinguished by their outward shapes should be expressed by little pictures of them. A vocabulary-list made in that way could perhaps teach the true meanings of many terms, especially in languages of remote countries or ages, more easily and quickly than do all the large and laborious comments of learned critics. Naturalists who treat of plants and animals have found the benefits of this procedure, and anyone who has had occasion to consult their pictures will have reason to concede that he has a clearer idea of apium or ibex from a little print of that plant or animal than he could have from a long definition of the names of either of them. [The section continues with further examples.]

[In sections **26-7** Locke says that men often change what they mean by a word in the course of a single discourse, and that sometimes they are 'forced' to do this because 'the provision of words is so scanty in respect to the infinite variety of thoughts'. In some cases the context makes clear enough what change has occurred; but where it does not do so the speaker or writer ought to declare the change openly.]