

represents it to be an extended substance, without any other quality, and embracing space as a part of itself. Now, if such an idea appertained naturally to him, it must, in like manner, appertain naturally to every one. Let me, then, ask the audience I have the honour of addressing, whether the same notion has ever presented itself, as it necessarily ought to have done, to the minds of every one or of any one before me? and whether they seriously believe that SPACE is a part of MATTER? So far from it, that I much question whether even the meaning of the position is universally understood; while, with respect to those by whom it is understood, I have a shrewd suspicion it is not assented to; and that they would even apprehend some trick had been played upon them if they should find it in their minds. The good father Malebranche, as excellent a Cartesian as ever lived, and who possessed withal quite mysticism enough to have succeeded Plato, upon his death, and turned Xenocrates out of the chair, suspected that tricks like these are perpetually played upon us. For he openly tells us, in his *Recherche de la Vérité*, that ever since the fall, Satan has been making such sad work with our senses, both external and internal, that we can only rectify ourselves by a vigorous determination to doubt of every thing, after the tried and approved Cartesian recipe: and if a man, says he, has only learned to doubt, let him not imagine that he has made an inconsiderable progress. And for this purpose, he recommends retirement from the world, a solitary cell, and a long course of penitence and water-gruel: after which our innate ideas, he tells us, will rise up before us at a glance: our senses, which were at first as honest faculties as one could desire to be acquainted with, till debauched in their adventure with original sin, will no longer be able to cheat us, we shall see into the whole process of transubstantiation, and though we behold nothing in matter, we shall behold all things in God.

It may, perhaps, be conceived that I treat the subject before us somewhat too flippantly or too cavalierly. It is not, however, the subject before us that I thus treat, but the hypothesis; and, in truth, it is the only mode in which I feel myself able to treat it at all; for I could as soon be serious over the "Loves of the Plants," or "The Battle of the Frogs." And I must here venture to extend the remark a little farther, and to add, that there is but one hypothesis amid all those that yet remain to be examined, that I shall be able to treat in any other manner; for, excepting in this one, there is not a whit of superiority that I can discover in any of them; and the one I refer to, though I admit its imperfections in various points, is that of our own enlightened countryman, Mr. Locke. I may, perhaps, be laughed at in my turn, and certainly should be so if I were as far over the Tweed as over the Thames, and be told that I am at least half a century behind the times. Yet, by your permission, I shall dare the laugh, and endeavour, at least, to put merriment against merriment; and shall leave it to yourselves to determine, after a full and impartial hearing, who has the best claim to be pleasant. So that the study of metaphysics may not, perhaps, appear quite so gloomy and repugnant as the writings of some philosophers would represent it. If it have its gravity, it may also be found to have its gayety as well; and to prove that there is no science in which it better becomes us to adopt the maxim of the poet, and to

Laugh where we may, be serious where we can,
But vindicate the ways of God to man.

LECTURE IV.

ON HUMAN UNDERSTANDING.

(The Subject continued.)

In our preceding study we commenced a general survey of the chief opinions and hypotheses that have been urged in different periods upon the important subject of Human Understanding; and, opening our career with the Greek schools, we closed it with that of Des Cartes.

Des Cartes, who was born in 1596, was for nearly a century the Aristotle of his age; and, although from his very outset he was opposed by his contemporaries and literary friends Gassendi and Hobbes, he obtained a complete triumph, and steadily supported his ascendant, till the physical philosophy of Newton, and the metaphysical of Locke, threw an eclipse over his glory, from which he has now no chance of ever recovering.

Nothing, however, can prove more effectually the influence which fashion operates upon philosophy as well as upon dress, than a glance at the very opposite characters by whom the Cartesian system was at one and the same time principally professed and defended—Malebranche and Spinoza, Leibnitz and Bayle. It would, perhaps, be impossible, were we to range through the whole scope of philosophical or even of literary biography, to collect a more motley and heterogeneous group: the four elements of hot, cold, moist, and dry cannot possibly present a stronger contrast; a mystical Catholic, a Jewish materialist, a speculative but steady Lutheran, and a universal skeptic.

It was only, however, for want of a simpler and more rational system, that Des Cartes continued so long and so extensively to govern the metaphysical taste of the day. That system was at length given to the world by Mr. Locke, and the "PRINCIPIA PHILOSOPHÆ" fell prostrate before the "ESSAY CONCERNING HUMAN UNDERSTANDING."

This imperishable work made its first appearance in 1689: it may, perhaps, be somewhat too long; it may occasionally embrace subjects which are not necessarily connected with it: its terms may not always be precise, nor its opinions in every instance correct; but it discovers intrinsic and most convincing evidence that the man who wrote it must have had a head peculiarly clear, and a heart peculiarly sound. It is strictly original in its matter, highly important in its subject, luminous and forcible in its argument, perspicuous in its style, and comprehensive in its scope. It steers equally clear of all former systems: we have nothing of the mystical archetypes of Plato, the incorporeal phantoms of Aristotle, or the material species of Epicurus; we are equally without the intelligible world of the Greek schools, and the innate ideas of Des Cartes. Passing by all which, from actual experience and observation it delineates the features and describes the operations of the human mind, with a degree of precision and minuteness which have never been exhibited either before or since.* "Nothing," says Dr. Beattie, and I readily avail myself of the acknowledgment of an honest and enlightened antagonist, "was farther from the intention of Locke than to encourage verbal controversy, or advance doctrines favourable to skepticism. To do good to mankind by enforcing virtue, illustrating truth, and vindicating liberty, was his sincere purpose. His writings are to be reckoned among the few books that have been productive of real utility to mankind."†

To take this work as a text-book, of which, however, it is well worthy, would require a long life instead of a short lecture: and I shall, hence, beg leave to submit to you only a very brief summary of the more important part of its system and of the more prominent opinions it inculcates, especially in

* Study of Med. vol. iii. p. 49, 2d edit.

† Essay on Truth, part ii. ch. ii. § 2.

respect to the powers and process of the mind in acquiring knowledge. The work consists of four divisions, the first of which, however, is merely introductory, and intended to clear the ground of that multitude of strong and deep-rooted weeds at which we have already glanced, and which, under the scholastic name of *præcognita*, innate ideas, maxims, and dictates, or innate speculative and practical principles, prevented the growth of a better harvest; and, to a certain extent, superseded the necessity of reason, education, and revelation, of national institutions and Bible societies; by teaching that a true and correct notion of God, of self or consciousness, of virtue and vice, and, consequently, of religious and moral duties, is imprinted by nature on the mind of every man; and that we cannot transgress the law thus originally implanted within us without exposing ourselves to the lash of our own consciences. Discarding for ever all this jargon of the schools, the Essay before us proceeds in its three remaining parts to treat of IDEAS, which, in the popular, and not the scholastic, sense of the term, are the elements of knowledge; of WORDS, which are the signs of ideas, and consequently the circulating medium of knowledge; and of KNOWLEDGE itself, which is the subject proposed, and the great end to be acquired.

The whole of the preceding rubbish, then, being in this manner cleared away, the elaborate author proceeds to represent to us the body and mind as equally at birth a *tabula rasa*, or unwritten sheet of paper: as consisting equally of a blank or vacuity of impressions, but as equally capable of acquiring impressions by the operation of external objects, and equally and most skilfully endowed with distinct powers or faculties for this purpose; those of the body being the external senses of sight, hearing, smell, taste, and touch; and those of the mind the internal senses of perception, reason, judgment, imagination, and memory.*

It is possible that a few slight impressions may be produced a short time antecedently to birth; and it is certain that various instinctive tendencies, which, however, have no connexion with the mind, are more perfect, because more needful, at the period of birth than ever afterward; and we have also frequent proofs of an hereditary or accidental predisposition towards particular subjects. But the fundamental doctrine before us is by no means affected by such collateral circumstances; to the correctness of which our most eminent logicians of later times have given their entire suffrage. Thus Bishop Butler, and it is not necessary to go farther than this eminent casuist:—"In these respects," meaning those before us, "mankind is left by nature an unformed, unfinished creature, utterly deficient and unqualified, before the acquirement of knowledge, experience, and habits, for that mature state of life which was the end of his creation, considering him as related only to this world. The faculty of reason is the candle of the Lord within us; though it can afford no light where it does not shine, nor judge where it has no principles to judge upon."†

External objects first impress or operate upon the outward senses, and these senses, by means hitherto unexplained, and, perhaps, altogether inexplicable, immediately impress or operate upon the mind, or excite in it perceptions or ideas of the presence and qualities of such objects; the word idea being employed in the system before us, not, as we have already hinted at, in any of the significations of the schools, but in its broad and popular meaning, as importing "whatever a man observes and is conscious to himself he has in his mind;"‡ whatever was formerly intended by the terms archetype, phantasm, species, thought, notion, conception, or whatever else it may be, which we can be employed about in thinking.§ And to these effects, without puzzling himself with the inquiry how external objects operate upon the senses, or the senses upon the mind, Mr. Locke gave the name of *ideas of SENSATION*, in allusion to the source from which they are derived.

* An abstract of this view of Mr. Locke's system, abbreviated for the occasion, the author found himself called upon to introduce into his Study of Medicine. Vol. iv. p. 50—55, 2d edit. 1825.

† Analogy of Religion, Natural and Revealed, part i. ch. v. part ii. Conclusion.

‡ Locke, book i. ch. i. § 3.

§ Ib. § 8.

But the mind, as we have already observed, has various powers or faculties as well as the body; and they are quite as active and lively in their respective functions. In consequence of which the ideas of external objects are not only perceived, but retained, thought of, compared, compounded, abstracted, doubted, believed, desired; and hence another fountain, and of a very capacious flow, from which we also derive ideas, namely, a reflex act or perception of the mind's own operations; whence the ideas derived from this fountain are denominated *ideas of REFLECTION*.

The ideas, then, derived from these two sources, and which have sometimes been called OBJECTIVE, and SUBJECTIVE,* constitute all our experience, and consequently all our knowledge. Whatever stock of information a man may be possessed of, however richly he may be stored with taste, learning, or science, if he turn his attention inwards, and diligently examine his own thoughts, he will find that he has not a single idea in his mind but what has been derived from the one or the other of these two channels. But let not this important observation be forgotten by any one; that the ideas the mind possesses will be fewer or more numerous, simpler or more diversified, clear or confused, according to the number of the objects or subjects presented to it, and the extent of its reflection and examination. Thus, a clock or a landscape may be for ever before our eyes, but unless we direct our attention to them, and study their different parts, although we cannot be deceived in their being a clock or a landscape, we can have but a very confused idea of their character and composition. The ideas presented to the mind, from which of these two sources soever derived, or, in other words, whether objective or subjective, are of two kinds, SIMPLE and COMPLEX.

SIMPLE IDEAS consist of such as are limited to a single notion or perception; as those of unity, darkness, light, sound, hardness, sweetness, simple pain, or uneasiness. And in the reception of these the mind is passive, for it can neither make them to itself, nor can it, in any instance, have any idea which does not wholly consist of them; or, in other words, it cannot contemplate any one of them otherwise than in its totality. Thus, on looking at this single sheet of paper, I have the idea of unity; and though I may divide the single sheet of paper into twenty parts, I cannot divide the idea of unity into twenty parts; for the idea of unity will and must as wholly accompany every part as it accompanies the collective sheet. And the same remark will apply to all the rest.

COMPLEX IDEAS are formed out of various simple ideas associated together, or contemplated derivatively. And to this class belong the ideas of an army, a battle, a triangle, gratitude, veneration, gold, silver, an apple, an orange: in the formation of all which it must be obvious that the mind is active, for it is the activity of the mind alone that produces the complexity out of such ideas as are simple. And that the ideas I have now referred to are complex, must be plain to every one; for every one must be sensible that the mind cannot form to itself the idea of an orange without uniting into one aggregate the simple ideas of roundness, yellowness, juiciness, and sweetness. In like manner, in contemplating the idea of gold, there must necessarily be present to the mind, and in a complex or aggregate form, the ideas of great weight, solidity, yellowness, lustre: and if the idea be very accurate, great malleability and fusibility.

Complex ideas are formed out of simple ideas by many operations of the mind; the principal of which, however, are some combination of them, some abstraction, or some comparison. Let us take a view of each of these:—

* "On appelle, dans la philosophie Allemande, idées subjectives celles que naissent de la nature de notre intelligence et de ses facultés, et idées objectives toutes celles que sont excitées par les sensations."—Mad. de Staël Holstein, de l'Allemagne, tom. iii. p. 76.

Mad. de Staël, however, has fallen into the common error of the French philosophers, from whom she appears to have generally informed herself of the principles of Locke's system, in supposing that he derived all ideas from sensation. "A l'époque où parut la Critique de la Raison pure, il n'existoit que deux systèmes sur l'entendement humain parmi les penseurs; l'un, celui de Locke, attribuoit toutes nos idées à nos sensations; l'autre, celui de Des Cartes et de Leibnitz, s'attachoit à démontrer la spiritualité et l'activité de l'âme, de libre arbitre, enfin toute la doctrine idéaliste."—Ib. p. 70.

And, first, of complex ideas of COMBINATION. Unity, as I have already observed, is a simple idea: and it is one of the most common simple ideas that can be presented to the mind, for every object without, and every idea within, tend equally to excite it. And, as being a simple idea, the mind, as I have also remarked, is passive on its presentation; it can neither form such an idea to itself, nor contemplate it otherwise than in its totality: but it can combine the ideas of as many units as it pleases, and hence produce the complex idea of a hundred, a thousand, or a hundred thousand. So beauty is a complex idea; for the mind, in forming it, combines a variety of separate ideas into one common aggregate. Thus Dryden, in delineating the beautiful Victoria, in his "Love Triumphant:"—

Her eyes, her lips, her cheeks, her shape, her features,
Seem to be drawn by Love's own hand; by Love
Himself in love.

In like manner the mind can produce complex ideas by an opposite process, and that is, by ABSTRACTION, or separation. Thus chalk, snow, and milk, though agreeing, perhaps, in no other respect, coincide in the same colour; and the mind, contemplating this agreement, may abstract or separate it from the other properties of these three objects, and form the idea which is indicated by the term *whiteness*; and having thus acquired a new idea by the process of abstraction, it may afterward apply it as a character to a variety of other objects: and hence particular ideas become general or universal.

Other complex ideas are produced by COMPARISON. Thus, if the mind take one idea, as that of a foot, as a determinate measure, and place it by the side of another idea, as the idea of a table, the result will be a formation of the complex idea of length, breadth, and thickness. Or if we vary the primary ideas, we may obtain as a result the secondary ideas of coarseness and fineness.

And hence, complex ideas must be almost infinitely more numerous than simple ideas, which are their elements or materials, as words must be always far more numerous than letters. I have instanced only a few of their principal kinds; but even each of these kinds is applicable to a variety of subjects, of which Mr. Locke mentions the three following:—

I. IDEAS OF SUBSTANCES; or such as we have uniformly found connected in the same thing, and without which, therefore, such thing cannot be contemplated. To this head belong the complex ideas of a man, a horse, a river, a mountain.

II. IDEAS OF MODES; or such as may be considered as representative of the mere affections, or properties of substance; of which the idea of number may once more be offered as an example: the ideas of expansion or extension and duration belong to the same stock; and in like manner those of power, time, space, and infinity, which are all modes, properties, or affections of substance; or secondary ideas derived from or excited by the primary idea of substance of some kind or other.

III. IDEAS OF RELATIONS; which are by far the most extensive, if not the most important, branch of subjects from which our complex ideas are derived; for there is nothing whatever, whether simple idea, substance, mode, relation, or even the name of any of them, which is not capable of an almost infinite number of bearings in reference or relation to other things. It is from this source, therefore, that we derive a very large proportion of our thoughts and words. As examples under it, I may mention all those ideas that relate to or are even imported by the terms father, brother, son, master, magistrate, younger, older, cause and effect, right and wrong, and, consequently, all moral relations.

It must hence appear obvious that many of our ideas have a NATURAL CORRESPONDENCE, congruity, and connexion with each other. And as many, perhaps, on the contrary, a NATURAL REPUGNANCY, incongruity, and disconnexion. Thus if I were to speak of a cold fire, I should put together ideas that are naturally disconnected and incongruous, and should consequently make an absurd proposition, or, to adopt common language, talk nonsense. I should

be guilty of the same blunder if I were to speak of a square billiard-ball, or a soft reposing rock. But a warm fire, on the contrary, a white, or even a black billiard-ball, and a hard, rugged rock, are congruous ideas, and, consequently, consistent with good sense. Now, it is the direct office of that discursive faculty of the mind which we call reason, to trace out these natural coincidences or disjunctions, and to connect or separate them by proper relations; for it is a just perception of the natural connexion and congruity, or of the natural repugnancy and incongruity, of our ideas, that constitutes all real knowledge. The wise man is he who has industriously laid in and carefully assorted an extensive stock of ideas; as the stupid or ignorant man is he who, from natural hebetude, or having had but few opportunities, has collected and arranged but a small number. The man who discovers the natural relations of his ideas quickly is a man of sagacity; and, in popular language, is said, and correctly so, to possess a quick, sharp intellect. The man, on the contrary, who discovers these relations slowly, we call dull or heavy. If he rapidly discover and put together relations that lie remote, and perhaps touch only in a few points, but those points striking and pleasant, he is a man of wit, genius, or brilliant fancy; of agreeable allusion and metaphor. If he connect ideas of fancy with ideas of reality, and mistake the one for the other, however numerous his ideas may be, and whatever their order of succession, he is a madman: he reasons from false principles; and, as we say in popular language, and with perfect correctness, is out of his judgment.

Finally, our ideas are very apt to ASSOCIATE or run together in trains; and upon this peculiar and happy disposition of the mind we lay our chief dependence in sowing the important seeds of education. It often happens, however, that some of our ideas have been associated erroneously, and even in a state of early life, before education has commenced: and hence, from the difficulty of separating them, most of the sympathies and antipathies, the whims and prejudices, that occasionally haunt us to the latest period of old age. Peter the Great, having been terrified by a fall into a sheet of water when an infant, could never, till he became a man, go over a bridge without shuddering; and even at last had no small difficulty in breaking the connexion of the ideas that were thus early and powerfully associated. Avarice did not by any kind of predisposition belong to the miser Elwes, for in his youth he was of gay manners, and a spendthrift; but he caught the vice by living with his uncle: uninterrupted habit, the strong power of association, gave strength to its influence, and what was originally his abhorrence, became at length his idol.

Such, then, is the manner in which the mind, at first a sheet of white paper, without characters of any kind, becomes furnished with that vast store of ideas, the materials of wisdom and knowledge, which the busy and boundless fancy of man has painted on it with an almost endless variety. The whole is derived from experience—THE EXPERIENCE OF SENSATION OR REFLECTION; from the observations of the mind employed either about external sensible objects, or the internal operations of itself, perceived and reflected upon by its own faculties.

But man is a social as well as a rational being; he is dependent, for the supply of his wants, upon his fellow-man; and his happiness is made to consist in this dependence. The ideas he possesses he feels a desire of communicating, and those possessed by others he feels an equal desire of diving into. But ideas in themselves are incommunicable: he requires here, as in the case of sensible objects, a circulating medium by which their value may be expressed. And what he requires is freely granted to him: it consists in the high faculty of speech; in reducing ideas to articulate sounds or words, the aggregate of which constitutes language. And hence the great and valuable systematic work to which I have now chiefly directed your attention, proceeds from a general analysis of our ideas to a general analysis of their vocal representatives: a subject which every one must perceive to be of the utmost importance in the progress of human understanding. Important, however, as it is, it is a subject rather collateral than direct. We have briefly

glanced at it already,* and may perhaps return to it hereafter, but I shall postpone it for the present, that we may hasten with due speed to the goal before us. Allow me, however, before we quit it, to observe that words bear precisely the same relation to ideas that ideas do to objects; for as ideas are the mere signs of objects, so words are the mere signs of ideas; and hence that every rule which applies to the variety, precision, and arrangement of our ideas, applies with equal force to the variety, precision, and arrangement of our words; and that without a clear and determinate meaning to the latter, we can no more have a clear and determinate apprehension of the former than we can have of a person's features by a confused or unlike picture. And hence the importance of attending to our vocabulary; of minutely measuring and weighing the terms we make use of, so as to adjust them exactly to the measure and weight of our ideas, must be obvious at the first glance; as it must be also that the more exact and copious a language is found, the more clear and comprehensive must be the general knowledge of the nation to which it belongs.

But ideas and words, though the materials of which knowledge is constructed, and without which it cannot among mankind be constructed at all, are no more knowledge itself than the bricks and mortar of a house are the house itself. Both, as I have indeed hinted at already, must be collected in sufficient abundance, compared with each other, duly assorted, arranged, and united together, before the proper building can be produced; and we have yet, therefore, to contemplate the most important part of the subject before us, and that to which the preceding parts are subservient—the general nature of knowledge, its kinds, degrees, and reality.

KNOWLEDGE may be defined the PERCEPTION OF TRUTH, OR, in the language of Aristotle, THE SCIENCE OF TRUTH: and, consequently, he who acquires knowledge perceives or acquires truth. But what is truth? This is a question which has been asked for ages: the particular answer, however, must necessarily depend upon the particular subject to which it refers. We are now considering *general truth*, which may be defined the connexion and agreement, or repugnancy and disagreement, of our ideas.

This definition requires some attention; but when it is thoroughly comprehended, it will be found to apply to truths of every kind, in the arts, physics, and morals, as well as in metaphysics; for the law of adjustment, of connexion and disconnexion, of congruity and incongruity, it refers to, is a universal law or constitution of nature, and hence must hold equally every where. Thus, in a building, where the different parts of which it consists perfectly agree, the lines accurately correspond, and the dependencies fit and are proportioned to each other, every part is TRUE to every part, and the whole is TRUE to itself.

So in working a mathematical problem, or determining a fact from circumstantial evidence, every separate link or idea that constitutes a part of the general chain, must have its proper connexion or agreement with the link or idea that lies next to it, as well above as below: for it is these connexions or agreements between one idea and another that constitute the proofs, and a failure in any one destroys our knowledge upon the subject; or, in other words, prevents us from perceiving its truth.

It sometimes happens that we are able to discover at once this agreement or disagreement, this connexion or repugnancy, in the ideas that are presented to us; and in such case our knowledge is instantaneous, and constitutes what we call INTUITION OR INTUITIVE KNOWLEDGE. But it happens far more generally that the agreement or disagreement is by no means obvious; and we are obliged, as in the case of circumstantial evidence, to look out for some intermediate idea, which the schools denominate a *medius terminus*, by which the separate ideas may be united. To make this research is the peculiar province of the discursive faculty of reason; and hence the information thus obtained is called RATIONAL KNOWLEDGE.

Let us take a brief view of both these. When I affirm that white is not

* Series II. Lecture VIII. ix. x.

black; or, which is a proposition of the same kind, that white is white and black is black, I affirm what I know intuitively. The colours of white and of black have excited ideas in my mind, which, whenever they occur, must be identic and true to themselves; for it is not possible for me to have any other idea of white than white, or of black than black: the agreement in this case is the AGREEMENT OF IDENTITY, the agreement of either idea with itself; and hence the man who asks me to prove that white is white, or that white is not black, or red, or yellow, asks me to prove what I neither can prove nor want to prove. I do not want to prove it, for I know it with certain knowledge, or, in other words, it is SELF-EVIDENT. And I cannot prove it for this reason; that every proof consists in placing between two ideas that we want to unite together by an agreement which we do not perceive an idea whose agreement with both of them is more obvious. But what idea can I place by the side of the idea of white, of black, of red, or of yellow, that can agree more fully with either of these ideas than such ideas agree with themselves? Every one must see that there is no such idea to be had; and, consequently, that I can neither offer a proof nor want one. And the very attempt to obtain such a proof would be an absurdity: for could it possibly be acquired, it would not add to my knowledge, which is perfect and certain already, and depends upon the constant agreement of the idea with itself—the agreement of identity.

Nothing has been productive of more mischief in the science of metaphysics than this absurd restlessness in seeking after proofs in cases of intuition, where no proofs are to be had, and the knowledge is certain without them. M. Des Cartes's hypothesis, as I had occasion to notice in our last lecture, commences with an instance of this very absurdity, and it has proved the ruin of it; and the same attempt in various other hypotheses of later date that we shall yet have to touch upon, and particularly those of Bishop Berkeley and Mr. Hume, has equally proved the ruin of these. When I affirm that *I am*, I affirm that of which I have an intuitive knowledge: and when I affirm that *I think*, I only make a proposition of the same kind. The connexion between the two ideas *I am*, and the two ideas *I think*, is a connexion of coexistence or absolute necessity. It is not possible to separate them, and they want no third or intervening idea to unite them; for if it were possible for me to doubt whether I thought, or whether I existed, the very doubt itself would answer the purpose of a proof in either case. Now one of the chief absurdities of M. Des Cartes's argument, *I think, therefore I am*, consists in his putting two propositions equally self-evident and intuitive by the side of each other, and making the first the proof of the second: for being equally intuitive, the second must be just as good a proof of the first as the first is of the second; since the mind can no more put together the two ideas *I am* without *thinking*, than it can put together the two ideas *I think*, without *being*. But nothing is gained by their being put together in the way of proof or demonstration; for I have no more evidence of my existence by calling up the ideas *I think*, than I had before this proposition was conceived; and hence the attempt not only fails, but could lead to no use if it could stand its ground.

Our knowledge of personal identity is derived from the same source. It is INTUITIVE. This is a subject which has excited a great deal of learned controversy,—and called forth many a different proof, or attempt at proof, from the different disputants who have engaged in it. Mr. Locke himself, with a singular deviation from the principles of his own system, has fallen into a common error and offered as a proof the idea of consciousness. No proof, however, or attempt at proof, is more imperfect; for the identity often continues when the consciousness is interrupted, as in sleep without dreaming, in apoplexy, catalepsy, drowning, and various other cases: and hence, if identity were dependent on consciousness, the same man in a dead sleep and out of it would be two or more different persons. The truth is, that our knowledge of identity is intuitive; the two ideas *I am*, and the two ideas *I was*, a combination of which constitutes the more complex idea of personal identity, are ideas of necessary connexion from the first moment the connexion can be formed: and hence they produce certain knowledge, and can have no proof; since

there can be no intermediate idea capable of possessing a closer connexion with either proposition, and consequently fitted to enter between them. "Here, then," to adopt the language of Bishop Butler, whose reasoning upon this subject bears a close resemblance to the present, "we can go no farther. For it is ridiculous to attempt to prove the truth of those perceptions whose truth we can no otherwise prove than by other perceptions of exactly the same kind with them, and which there is just the same ground to suspect; or to attempt to prove the truth of our faculties, which can no otherwise be proved than by the use or means of those very suspected faculties themselves."*

I may now advance a step farther, and observe that in all cases in which the agreement or disagreement of two or more ideas can be immediately perceived and compared together, our knowledge is of a like kind, and consequently approaches to intuitive; although to other persons such ideas may be very remote, and require a long chain of intermediate ideas to connect or separate them, or prove their agreement or repugnancy. Thus I know intuitively, or without going through the process, that the arc of a circle is less than the entire circle; that a circle itself is a line equidistant in every part of it from its centre; that the three angles of a triangle are equal to two right angles; that the square of four is sixteen. No man, however, can, perhaps, have any kind of knowledge at first sight upon any of these subjects; he cannot put the extreme ideas together in such a manner as to perceive their agreement or disagreement, and he is not acquainted with the intermediate ideas which are to compare them, and prove their relation. If he could perceive that relation at first sight, he would at first sight have intuitive knowledge upon the subject; and some persons have a much more comprehensive power of this kind than others; for they can perceive and compare the relations of ideas both more readily and more extensively. Euler was a striking example of this endowment, in regard to the science of abstract quantities: Jedediah Buxton appears to have obtained a similar degree of intuitive knowledge in regard to the science of numbers; and we seem in our own day to have another instance of the same kind in the very extraordinary young calculator from America, not more than eight years old.†

I have already stated, that when we cannot immediately perceive the agreement or disagreement of two or more ideas, which we are desirous of bringing into comparison, we are obliged to seek out for some intervening idea whose agreement or disagreement with them is obvious to us; and I have also stated, that as this general search is the immediate office of the faculty of reason, the knowledge thus obtained is called RATIONAL KNOWLEDGE. In many cases we are so fortunate as to hit upon intervening ideas whose connexion with the one, the other, or both, as in a chain of perfect evidence, is clear and distinct; and in such case, whether the reasoning consist of a single step or of many, as soon as the mind is able to perceive the connexion or repugnancy, the agreement or disagreement, of the ideas in question, the degree of rational knowledge hereby obtained becomes equal, or nearly so to INTUITION, and is called DEMONSTRATION. If the proofs, or intervening ideas, do not quite amount to this, we have necessarily an inferior degree of rational knowledge, and we distinguish it by the name of BELIEF, ASSENT, OR OPINION; and according to the nature of the proofs or intermediate ideas, as decided by the faculty of the judgment, the opinion is rendered INDURITABLE, PROBABLE, CONJECTURAL, OR SUSPICIOUS.

It is upon this comparison of two ideas, by means of a mediate idea expressed or understood, that most of our moral information or common knowledge would be found to depend, if we were to analyze it. Thus, on going into the street, and hearing a man whom I am acquainted with asking which is the way to London Bridge, I may, perhaps, observe to a by-stander, "That man ought to know the way." The by-stander immediately compares the two

* Analogy of Religion, Natural and Revealed. Of Personal Identity, forming Diss. I.

† See "Some account of Zerah Colburn, an American child, who possesses some very remarkable powers of solving questions in arithmetic, by computation without writing, or any visible contrivance."—Nicholson's Journal of Nat. Phil. vol. xxxiv. p. 5.

ideas of going to London Bridge, and the man's right to know the way, but can find no connexion or agreement between them, and consequently is ignorant of what I mean. He applies to me, therefore, for the intermediate idea by the question, "Why so?" and I give it to him by answering, "Because he has repeatedly been the same road before:" and although he does not put the three ideas into the measured form of the schools, which is called a syllogism, every one as regularly passes through his mind, and gives him the same satisfactory information as if they were to assume such order; in which case they would perhaps run as follows:—

Every man who goes repeatedly the same road should know his way;
This man has been repeatedly the same road:
Therefore this man should know his way.

It would be absurd to introduce this part of logical analysis into common discourse: but it is of high use in the closet, as teaching us precision, by compelling us to measure the force and value of every idea and word of which a proposition consists. We are indebted to Aristotle for its invention: and though it was at one time carried to an absurd excess, it has of late years been far too generally discontinued.

The connective or intermediate idea is not always expressed either in speaking or writing; and hence is not always obvious to the hearer or reader, though it is, or ought to be, so to the framer of the argument. Let me exercise the ingenuity of the audience before me by throwing out as a trial, the following well-known sentiment of Mr. Pope:—

Who governs freemen should himself be free.

Here are two distinct propositions; and Dr. Johnson, not immediately perceiving their agreement, nor immediately hitting upon any intervening idea or proposition by which they might be united, declared the whole to be a riddle, and that the poet might just as well have written,

Who drives fat oxen should himself be fat.

Had Johnson, however, lived in our own day, and turned his attention to the Continent, it would have been a riddle to him no longer; for he would have called to mind, as I doubt not every one before me has done already, the mischief that has happened to many a free people on the Continent, from the unfortunate want of freedom in the sovereign who is placed over them, and his being under the detestable control of one of the worst, and, unluckily, one of the most universal, tyrants the world has ever witnessed.* He would have been, as every one before me must be, at once prepared to have connected the two ideas of *freemen*,—and the propriety of their being governed by a *free sovereign*, by means of a third or intervening idea to this effect, that otherwise the people themselves might run no small risk of having their freedom destroyed by foreign force; the whole of which might assume the following appearance if reduced to the form of a syllogism:—

Who governs freemen should be able to maintain their freedom:
But he who is not free himself is not able to maintain their freedom:

Therefore,

Who governs freemen should himself be free.

PROPER OR REAL KNOWLEDGE, then, is of two kinds or degrees, INTUITION and DEMONSTRATION; below which, all the information we possess is imperfect knowledge or OPINION. Mr. Locke, nevertheless, out of courtesy to the Cartesian hypothesis, rather than from any other cause, makes proper or real

* Napoleon Buonaparte. This lecture was delivered in 1814.

knowledge to consist of three degrees, placing sensible knowledge, or that obtained by an exercise of the external senses, below the two degrees of intuition and demonstration, though above the authority of opinion. In most instances, however, the ideas we obtain from the senses are as clear and as identic as those obtained from any other source: and in all such cases the knowledge they produce is self-evident or intuitive. And although, at times, the idea excited by a single sense may not be perfectly clear, yet, as we usually correct it, or destroy the doubt which accompanies it, by having recourse to another sense, which furnishes us with the proof or intermediate idea, the knowledge obtained, even in these cases, though not amounting to intuition, is of the nature of demonstration: whence all sensible knowledge (the organs of sense being in themselves perfect, and the objects fully within their scope) falls, if I mistake not, under the one or the other of these two divisions.

DEMONSTRATIVE KNOWLEDGE, where the intervening proofs or ideas perform their part perfectly, approaches, as I have already observed, to the certainty of intuition. But it has generally been held that this kind of demonstration can only take place in the science of mathematics, or, in other words, in ideas of number, extension, and figure. I coincide, however, completely with Mr. Locke, in believing that the knowledge afforded by physics may not unfrequently be as certain. I have already stated that the knowledge we possess of our own existence is INTUITIVE. Our knowledge of the existence of a God is, on the contrary, DEMONSTRATIVE. Examine, then, the proofs of this latter knowledge, and see whether it be less certain. Am I asked where proofs to this effect are to be found? On every side they press upon us in clusters.—I cannot, indeed, follow them up at the present moment, for it would require a folio volume instead of the close of a single lecture; and I merely throw out the hint that you may pursue it at home. But this I may venture to say, that whatever cluster we take, it will develope to us a certain proof, and, in its separate value, fall but little short of the force of self-evidence. If I ascend into heaven, he is there; in peerless splendour, in ineffable majesty; diffusing, from an inexhaustible fountain, the mighty tide of light, and life, and love, from world to world, and from system to system. If I descend into the grave, he is there also; still actively and manifestly employed in the same benevolent pursuit: still, though in a different manner, promoting the calm but unceasing career of vitality and happiness; harmoniously leading on the silent circle of decomposition and reorganization: fructifying the cold and gloomy regions of the tomb; rendering death itself the mysterious source of reproduction and new existence; and thus literally making the “dry bones live,” and the “dead sing praises” to his name. If I examine the world without me, or the world within me, I trace him equally to a demonstration:—I feel,—nay, more than *feel*,—I *know* him to be eternal, omniscient, omnipotent, the creator of all things, and therefore God. I discover him, not by the vain maxims of tradition, or the visionary conceit of innate principles, but by the faculty with which he has expressly endowed me to search for him,—by my reason. There may, perhaps, be some persons, as well learned as unlearned, who have never brought together these proofs of his existence, and are therefore ignorant of him; as there certainly are others who have never brought together the proofs that the three angles of a triangle are equal to two right angles, and are therefore ignorant of geometry: but both facts have a like truth and a like foundation: both flow from and return to the same fountain: for God is the author of every truth,—for God is truth itself.

LECTURE V.

ON ANCIENT AND MODERN SKEPTICS.

FROM a system that is simple, intelligible, and satisfactory, adapted to the condition of man, and pregnant with useful instruction, we have now to turn our attention to a variety of hypotheses, that are scarcely in any instance worthy of the name of systems, and which it is difficult to describe otherwise than by reversing the terms we have just employed, and characterizing them as complicated, unintelligible, unsatisfactory; as not adapted to the condition of man, and barren of useful instruction.

It is a distinguishing and praiseworthy feature in the Essay on Human Understanding, that it confines itself to the subject of human understanding alone, and that, in delineating the operations of the mind, it neither enters into the question of the substance of mind, or the substance of matter; neither amuses us with speculations how external objects communicate with the senses, or the senses with the mental organ. It builds altogether upon the sure foundation of the simple fact, that the senses are influenced, and that they influence the mind; and as, in the former case, it calls the cause of this influence external objects, so in the latter case it calls the effects it produces internal ideas. Of the nature of these objects it says little, but of their substantive existence; of the nature of these ideas it says little, but of their truth or exact correspondence with the objects that excite them; its general view of the subject being reducible to the two following propositions:—

First, that as objects are perceivable at a distance, and bodies cannot act where they are not, it is evident that something must proceed from them to produce impulse upon the senses, and that the motion hereby excited must be thence continued by the nerves, or connecting chain, to the brain or seat of sensation, so as to produce in our minds the particular ideas we have of them.*

And, secondly, that the ideas thus produced, so far from being images or pictures of the objects they represent, have no kind of resemblance to them, except so far as relates to their real qualities of solidity, extension, figure, motion, or rest, and number.†

Thus far, and thus far only, does the author of the Essay on Human Understanding indulge in a digression into physical science; and even for this he feels it necessary to offer an apology to his reader: “I hope,” says he, “I shall be pardoned this little excursion into natural philosophy, it being necessary in our present inquiry.”‡

For myself, I am glad he did not proceed farther, and should have been still more satisfied if he had not proceeded even so far; for the subject proves itself, even in his hands, to be inexplicable; and if he be here found to evince some degree of obscurity, it is only, perhaps, because it is not possible to avoid it. Of the PRIMARY or real qualities of bodies, as he denominates them, we know but little; and it is probable, that Mr. Locke has enumerated one or two under this head that do not properly belong to the list. And although it is not difficult to determine his meaning where he asserts that their ideas resemble them, as being drawn from patterns existing in the bodies themselves, the sense of the passage has been very generally mistaken, and opinions have hence been ascribed to him which are contrary to the whole tenor of his system. In consequence of being real representatives of real qualities, they resemble them in respect to REALITY. And this, I think, seems to be what Mr. Locke intended to express upon this subject; though he does not discover his usual clearness as to what he designed to convey by the term RESEMBLANCE. This view, however, will be still more obvious by comparing the seventh, ninth, and twenty-third sections of the

* Essay on Hum. Underst. book ii. ch. viii. § 12.

† Ib. § 15.

‡ Ib. § 22.