THE MONIST

MORS MORTIS.*

ἔσχατος ἐχθρὸς καταργεῖται ὁ θάνατος.

—1 Cor. xv. 26

WE read in Ivanhoe, if any one now ever reads Ivanhoe, that in the single combat between De Bois Guilbert and the Disinherited Knight, the latter, as their steeds rushed together, first leveled his lance at the corslet of the champion, but almost at the very moment of collision he changed his aim to the visor, a mark much more difficult to attain but where the shock would be irresistible. Slightly similar has been the procedure of your speaker. It was his purpose long cherished to address you under some sufficiently cryptic title on the general mission of philosophy as the guide of life and the guardian of the higher ideas and ideals that dignify humanity and vindicate the claim of man to be the head of creation. However, regarding the subject more and more nearly, he grew appalled at its magnitude and convinced of the impossibility of any adequate discussion within the limits of your patience. Then it was that the choice of the narrower mark was finally made, a mark most difficult to attain, but yet most certainly well worth attaining. Even now he fears that the barrel is too big for the hoop, that it will be impossible to compress any half-way sufficient presentation within the time allowed. Hence it may be that the necessary directness of statement

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will often take on the appearance of dogmatism. Time fails for establishing in detail every position assumed, some things will have to be taken for granted, but only such as it seems certain can be proved beyond reasonable doubt. Now as the hour contracts, and the way, though broad and smooth, is also exceeding long and exceeding steep, let us without further preliminaries go straight for the heart of the matter.

The basis of all that follows is a strictly spiritual, psychical, or idealistic conception of the universe. When you look round you upon the stars, the sky, the sun, the moon, the earth, the sea, the land, the walls of the house, the bodies of animals and plants, the bodies of your fellows, yea, your own body, the impulse is almost irresistible to declare that these things are the world, or at least its main elements, that they are precisely what they are quite independently of you and your thought or your existence, that you do not make them at all or in any sense, but that your own every-day experience is shaped and determined by them in all its details. You rise in the morning because the sun has arisen and poured its light upon you and dispelled the dark and revealed the smiling countenance of creation.

"Awake! for morning in the bowl of night
Has flung the stone that puts the stars to flight,
And lo! the Hunter of the East has caught
The Sultan's turret in a noose of light."

But the stars and the great stone of the sun and the bowl of heaven and the light itself all seem to be just what they are, no matter what you are, objects independent of you, existing before you and after you, and moulding your own activity at every step, and all in apparent indifference to you as to a puny pygmy. You seem to be but the veriest mote in the sunbeam, dancing there for a moment and then shaken out and falling asunder forever, re-swallowed by

the infinite ocean swifter and surer than even Goethe dreamed of when he wrote:

"We by a billow
Are lifted, a billow
Engulfs us, we sink
And are heard of no more."

Such, apparently, is the tremendous pronouncement of common sense, and it receives daily more and more solemnly the sanction of science, particularly of the grand science of life, with all of her handmaids, zoology, and botany, and physiology, and chemistry, and mechanics, the chiefest of them all.

Against this awful oracle of science and of common sense it is in vain that authority and tradition in any and all of their forms raise an empty protest and appeal to creeds outworn and to dogmas whose origin is only too well understood. What Coleridge declared a century ago of the fair humanities of old religion may now be declared with added emphasis concerning the *whole* body of extra-rational doctrines that for millenniums have swayed the minds and inspired the hearts of the European. All these have vanished, they live no longer in the faith of reason. The common-sense and quasi-scientific view of man and the universe moves on daily with firmer and surer and haughtier tread, reminding us of Homer's description of Discord:

"Small indeed when at first her front she uplifteth, but later
Holding her head up in heaven, the while on earth she is treading."

There is only one name given under heaven whose magic may arrest the march of this conception, which now rushes over the earth like the shadow of a dim eclipse shedding disastrous twilight over the soul. And that name is philosophy,—not any visionary and unreal speculation, but philosophy more scientific than science herself, philosophy that is the equator and Venus-girdle of the whole

sphere of the sciences, philosophy that neglects no element of experience but submits all the data of all the sciences to the severest analysis of which the human mind is capable. It is only scientific philosophy, philosophy that is the science of science, or science in the second degree, that can transfigure and glorify science herself and weave the harsh words of her oracles into rhythmic verse and set them to heavenly music.

Ah! you smile incredulous, you say these are lofty pretensions, but what semblance of justification can be offered? Well, let us see. The domain of science is the objective world about us, sun, moon, and stars, earth, sea, and air, plants, animals, and minerals, blood and bone and nerve and cells, ether and atoms and sub-atoms and electrons and ions and protons, in a word, the whole universe of mass and motion. All of these science struggles with ever finer and finer subdivision to arrange and order and describe harmoniously and consistently in regular forms called laws. A prodigious, an infinite task, which can never be perfectly performed, but which may be advanced on its way further and further without end; a great and a glorious task, which it is the honor and the dignity, the necessity and the blessedness of the human soul to set itself and to work at forever.

But what are all these objects, this whole sensible world around us? Are they the ultimates of the universe? Are they its finalities? Are they all? Is everything derived from them? and beside them is there no other? To give the answer Yes! as so often is hastily done, even where we might expect something better, is to make the greatest mistake of which human nature is capable. That the universe, the sum total of being, consists of atoms or anything like atoms, or of masses in motion, is the greatest error possible to our understanding, and also the most dangerous; for however noble may be the spirit that strikes into

this path, it must be led thereby ever downward deeper and deeper into the shade, to the City of Dreadful Night. The conception of the universe as a mere dance of atoms is indeed an appalling, a paralyzing conception; nothing to me sounds more piteous than the cry of a mighty soul, of some strong swimmer in his agony, as of Bertrand Russell or Matthew Arnold, while this tremendous quasi-scientific conception enswathes it with impenetrable gloom. Hear the poet in his famous lines on "Dover Beach."

"Ah, love, let us be true
To one another! For the world which seems
To lie before us like a land of dreams,
So various, so beautiful, so new,
Hath really neither joy, nor love, nor light,
Nor certitude, nor peace, nor help for pain;
And we are here as on a darkling plain
Swept with confused alarms of struggle and flight,
Where ignorant armies clash by night."

The temptation is strong to dwell upon the deep and widespread and all-pervasive working of this materialistic conception, to show how it moulds, and how it tinges where it does not mould, all our modes of thought and feeling, all the activities of our life, our politics, our society, our amusements, our literature, and even our art. Consider the Omar Khayyam craze that swept over us some years ago, consider the beautiful illustrations by Elihu Vedder, with their ever recurrent swirl expressing the alternate collection and dissipation of the life-elements, now gathered up into a person, now scattered to the winds. But the minutes will not wait, we must hurry on. The popular, the current, the quasi-scientific answer "yes," is then an utterly hopeless answer; but that is not the whole of it; the answer is not only hopeless, it is also false. Precisely here philosophy must and does administer its great corrective, not by way of any abridgement but by way of enlargement and supplementation. What science maintains about the physical world is just and true, and immensely impor-

tant. But such is not the whole story. The physical world of moving masses is not the final, not the ultimate world. On the contrary, it is a construct, a world of images, of symbols that are not at all like the things they symbolize. Such is the central and fundamental proposition of philosophy, the pivot on which all our thinking turns.

As already hinted, no complete proof can be given at present, though certain clear indications should suffice. Hold up a pencil before your face and look with both eyes open straight at the moon,—you will see two pencils; now look straight at the pencil,—you will see two moons. The two pencils and two moons are clearly constructs which you make in the act of seeing; your seeing consists in the making of these constructs. What is said of the pencils holds equally of the world around you: it is made by you in the act of seeing, it is made double, to every point P there corresponds a point P' ; only in a certain region, a line or surface called the horopter, do the corresponding points P and P' fall together into one. Moreover, this horopter changes immensely from instant to instant, it flutters like a flag in a September gale. Since this world of sight is thus built up and changed from instant to instant and is in general always double, it is idle to talk of this visible world as being an ultimate or final thing; it is demonstrably a vision, a construct of your own spirit activity.

Similarly, if you press gently on your eye-ball you will see the page before you divide and another page swim out just like the first, and you will also see a bright ring appear above the other eye. These visions are also constructs, or spatial interpretations of your unspatial mental states. So, too, if you fall and strike the back of your head while roller-skating on the sidewalk, you will perhaps see stars. If you stand before a mirror, you will construct a world behind the mirror and call it a reflection, but it is a construct none the less. If you look at the smooth pictures in a

stereoscope, you will construct what has no depth into endless depths of space. If disturbed in sleep or treated with hashish or opium, you may have amazing dreams, in which you see or construct titanic scenes and enact a long-drawn-out history. All these are constructs, all of the same general nature, all the creatures of your ever active soul.

But you say, all these are unreal imaginations, whereas the tree, the house, your friend's body, and your own are all real objects permanent and sensible to all. However, we have just seen that the apparently permanent things, like pencil and moon, are not permanent and unchanging, they are swiftly changing every moment. But is there no difference between the real and the unreal? Certainly, an immense difference. The real is what we *all* construct alike, or so nearly alike that it may and does pass as exactly alike; hence we speak of it as the same. A and B looking at the sky construct each his own moon, but since A and B are *nearly identical*, the two constructs or moons are also nearly identical. The Real then is the common and constant element in the constructs of individual spirits; hence it appears permanent, unchanging, the same for all men.¹

What has been said about seeing may be said about all other forms of sensing, as hearing, tasting, smelling, touching etc.: all are modes of constructing, of forming space-and-time symbols of spiritual activities that are not in space or time.

It is curious to note what seemingly strange forms these constructions take. You have an experience of strain, of muscle contraction, and you construct a certain sight as near; you have an experience of relaxation, and you construct the object as far away. You have a certain feeling of rotation of the eyes, and you construct the object as *tall* or *high*; you have another different *feeling* of rotation

¹ For an interesting though unsatisfactory discussion of this point see F. Enriques, *Problemi della Scienza*, Chap. II, pp. 58-107.

and you construct the object as *long* or horizontally extended. You have a certain *experience* that rises and falls and returns to its first stage, and you construct the sight as of a circle or other closed curve. You have another *experience* of even, gentle relaxation, and you construct a level moon-beam or perhaps a straight railroad track.

Well, then, your visible, tangible, audible, sensible world is a world of constructs, the products of your own spirit-activity, and it is *real* just so far as your spirit-activity agrees with itself and with the communal spirit-activity of your spirit-fellows. But what, you ask, is a spirit, a soul, a mind, anyway? That is a question each of you must answer for yourself, no one can answer it for you. Your inner experience is known to you and to you only. I can only guess whether you are interested or bored. You may be in accord, or you may be spurning my words as nonsense. But you know, each one of you, though your knowledge is strictly incommunicable, whatever signs or gestures you may make; for a word is a sign, it is a gesture of the vocal organs.

What then do you know? I can never tell. But I may be allowed to make a bold and momentous hypothesis. I guess that you are like me. Observing that my own body, as a sense-construct, corresponds to my own spirit-nature, to my own soul-experiences, and observing that your body, as also a sense-construct, resembles my own in general plan and countless details, I apply the familiar Rule of Three and form the proportion: As my body is to my spirit, so is your body to—your spirit.

Such is my reason, not a strictly logical, but an extremely probable analogical, reason for supposing there are other spirits than my own, and that I am not now talking to a congregation of vapors and automata. Correct or incorrect, we proceed on this hypothesis. I suppose then that there are as many inner experiences as there are faces

before me, inner experiences much like my own. If so, then you feel, you think, you will, you hope, you fear, you love, you hate, and do a million other such things that you know about and that no other can or at least does know about. All these incommunicables are elements or contents of your experience.

But who are *you*? Well, these contents of experience, these hopes, fears, pains, pleasures, thoughts, feelings, wills, and the rest, known and knowable to you and you only, are not a mere bundle; they are all tight interwoven at each and every instant, each essential to every other, and all interlocked in a definite way not quite the same for any two of you: No one of you thinks or feels precisely the same as any other at this instant. This is not all, however. No one of you is quite the same at any two instants, that is, the total complex of your experience varies from instant to instant, like an iridescent garment gleaming in the sun. Such a total complex (at any instant) of your thoughts, feelings, desires, and the like we may call a cross-section of your being. These cross-sections vary from instant to instant as your life runs along. But they do not vary wildly and at random from moment to moment, from hour to hour, from day to day, from year to year. On the contrary, they change in a very definite way as you move on in life, a way that is very much alike in us all, but not exactly alike in any two, though extremely alike in unioval twins. So then your total soul-experience, the sum of your psychic experiences (both conscious and subconscious), hangs together in a definite unity at every instant and also in a definite series of such unities from instant to instant. Now this whole definite way in which your experience hangs together not only at every moment but all the time from moment to moment, this entire *connectivity*, is your Self, your Ego, your Personality, which is thus seen to be a *Law of Psychic Form*.

Now that there actually is such a thing as psychic experience, such a thing as thought, feeling, volition, as hope and fear, pleasure and pain, purpose and the like, is the one thing that I know and you know, each for himself as a fact, and we each *assume* it for all of our fellows. Not merely, however, for all our fellow men, but also for all our fellow beasts: we assume that each of these is really a spirit, that it has psychic experience similar to our own, though of far lower order, and all our daily life proceeds on this assumption. We ascribe feelings, such as fear and desire and pain and pleasure and the like, to dogs and cats and horses and birds. These latter, indeed, Aristophanes seems to have regarded with awe and wonder as an airy antemundane thing, as being

"Born the first of things
Before the sun, before the wind,
Before the gods, before mankind
.....
Wishes there and feelings strong,
Incommunicable throng."

Note, however, very carefully. We must not think of the body of any animal as the dwelling of its soul, as a place or region where the soul lives and has all these psychic experiences. By no means; the soul does not dwell in any body, it is vain to hunt for it there or anywhere else. It dwells in no place at all, it is placeless. All the bodies that you see are your own constructs, the creatures of your own soul-activity, and not one of these bodies has any soul, not even your own body. But you are a complex of well-ordered soul-experiences which correspond to your body and to which your body corresponds. And since as a matter of fact your soul-experience corresponds to your body, you *assume* that there is a soul-experience corresponding to your neighbor's body; and also to your pet parrot's body, and also to the fierce tiger's body, and to the body of the oyster and the earth-worm, and of all the rest. But these

assumed soul-experiences corresponding to these bodies by no means dwell *in* these bodies. If then we speak of the soul of any body it is only an elliptical expression; we mean the complex of soul-experiences not dwelling in that body but only corresponding to that body. Pardon me for insisting so much on this point, but it is all important and extremely likely to be misunderstood.

Well, then, with this made clear once for all, we can see at once that it is quite impossible to stop anywhere in the descent upon the Jacob's ladder of spirits. It is a question of degree and not of kind. If we assume a soul-life corresponding to the body of A, and we must do the like for B and C and D and so on clear down to Z, through the whole alphabet of bodies; there must be a soul-life corresponding to every animal and as well to every plant. Nay, we cannot stop there, for the biologist can find no clear dividing line between the organic and the inorganic, as Shaefer so recently declared in his famous Dundee address. We must assume a soul-life, though of inexpressibly low degree, as corresponding to the colloids, to the crystals, to the molecules, to the atoms, to the sub-atoms, the electrons, and to whatever other finer pulverizations may be discovered in the constitution of matter. In other words, we must assume soul-life, psychic experience, of order however infinitely low, as *corresponding* to every phase, however elemental, in the vast complex of constructs that each soul builds up around it and calls the physical world.

If such be the case, then each one of us is a soul, a spirit, and the universe is a republic of spirits, a city of souls. And each one of us builds up around him at every instant a vast world of constructs, of *symbols* that represent to him the unbounded spiritual realm of which he is a citizen. It is only through the medium of these constructs, of this amazing system of symbols, this consummate social device, that any one spirit can or does enter into communi-

cation with any other. You can not tell what your friend or your foe is feeling or thinking or willing except through his words and deeds, but these words and deeds are phenomena of mass and motion; they are not spirit, they are only the signs, the symbols of spirit. When your friend smiles, when your foe scowls, you do not see his love or his hate, you see only certain motions of his features, certain changes in the configuration of masses. You interpret these changes to signify love or hate. But the whole body of your friend or foe was your own construct, your own mental creation, which you made involuntarily as the sign or symbol of your own mental state, and your own mental state not in itself but in relation to another assumed mental or spiritual being called your friend or your foe.

Let us then grasp firmly and hold tenaciously this important notion, that each of us is a spirit in the midst of spirits; that we are acting and interacting with each other continually, and that the vast image of this system of mutual interactions is the boundless physical world of sights and sounds and masses and motions with which each one, each spirit, engirdles himself at every moment, spinning the universe of space and time all round him as the silk worm spins its costly cocoon.

This is not yet all, however. Not only is every spirit compassed about by an infinite engirdling cloud of spirits symbolized by earth and heaven and all that in them is, but the *union of these spirits is complete and perfect*. There is not only a Many, there is also a One. The universe is a unit. It is a Whole. All the exactest science proceeds and must proceed on this supposition. The law of Newton declares that every two particles attract each other directly as the product of their masses and inversely as the squared distance between them. Newton indeed was thinking solely of our solar system, but his successors do not hesitate to extend his law to the remotest stars. If in the depths

of space there should be found any exception, that would only be an occasion to seek for some still higher law of mutual interaction; the physicist does not admit the notion of any particle in the universe out of harness with the rest, —if there were any such, it would be of itself another Universe. He thinks of each atom as the center of a web whose fibers shoot thence in every direction to every other atom in the world. Thus, with its radiant lines of force, every atom fills the whole physical world. But none excludes any other, they are all interpenetrative.

The most modern physicist, who thinks of the atom or ion as a phase of strain in the universal ether, illustrates the same necessity of viewing the world as a whole; for his ether is universal, and each phase at every point is determined by the total stress and strain of the one all-comprehending whole. We do indeed roughly and inaccurately imagine the universe as granular, as like an immense swarm of bees broken up into a countless host of subordinate swarms, and these seem to us to be separate and very distinct. Thus you say the desk is here, the door is there, the tree is yonder. But this segregation is artificial, for convenience only. The physicist, the astronomer, the man of science cannot endure it. His thinking restores and forces him to restore the shattered unity of the world. Similarly a sentence is granulated into words, and these into letters; but it is the sentence that is relatively primitive and unital.

Now this physical frame of things is only a construct, a symbol of spirit interacting amid spirit. The merely seeming separation of the elements of this material universe is a defect, or at least a peculiarity, in this symbolism, which we have just seen it is the self-imposed task of scientific thought to overcome. Since thought cannot rest satisfied with a granulated or subdivided world, but insists on thinking the physical world as one, it would

seem that we cannot hesitate, but must regard the spirit world, the original of the physical picture, as also a unit, as an entirety, as a whole. This unital spirit is what a Hegel might call the Absolute, but we do not need the term. There are many other indications that point clearly toward this spiritual oneness of the world, many other paths of thought that lead to the same goal. But time fails us, we can not pursue them now. Mark well, however, that this unity is noway inconsistent with infinite multiplicity. The individual spirit may be one with the universal spirit and yet by no means cease to be individual. This individual spirit is perhaps best conceived not as a part, but as a phase, of the universal spirit, even as the modern physicist may think of his electron or proton as a phase of strain or displacement in his universal ether. In fact, this conception, though certainly difficult and at first puzzling, admits of the most various illustrations. Even if none of these be quite satisfactory by itself, yet the general convergence of their indications may content us. When we find the meridians all coming together towards a pole, we feel sure there is something of the kind there somewhere, though it is unlikely that any of Dr. Cook's tracks are to be found in its vicinity. Since this conception of the unity of all spirits in one spirit is essential for what follows, it may be well to pause and resort to some of these illustrations.

Imagine a sphere of water, like the earth before dry land appeared, with its surface swaying in gentle waves, and consider one of those waves. Look at it closely, and you see it made up of countless crinkles and wavelets. Suppose you would define one of these wavelets precisely, would tell exactly what it is. To do this you would have to consider the adjacent wavelets and tell what they were; for the wavelet is what it is only by virtue of the bordering wavelets being each exactly what they are; any change in

the next lying wavelet would induce a corresponding change in the central wavelet. But the wavelets of this first ring are similarly determined by the second ring, and these by the third, and so on throughout. It is plain that the central wavelet is thus determined by the whole sphere. The being of the tiniest dimple on the face of the ocean thus extends itself throughout the whole. In this sense then we may say that the wavelet is identical with the sphere, but every other wavelet is similarly identical, they differ only in degree, not in kind, and the whole sphere is the perfect unity of all the wavelets.

Consider also the case of a vibrating chord, as of a violin, or of an ether-beam, a ray of light. The physicist will tell you that either of these is or may be vibrating in millions of ways all at the same time. The unital sensation in question and corresponding to this physical construct called vibrating ether-thread is (we may say) that of white light; this white-light sensation (or may be purple-light sensation) is felt as just as simple as the purest blue, or the purest yellow of the line D, yet it is resolvable into indefinitely many frequencies of vibration and may be spread out in a long rainbow spectrum (not to mention higher and lower frequencies). In case of the vibrating chord, one form of vibration (of the chord as a whole) corresponds to the fundamental tone, while the other so-called over-tones or upper harmonics correspond to the vibrations of the chord in parts. These overtones coexist with the fundamental ground tone, the chord vibrates at the same time as a whole and as subdivided in countless ways into parts. These vibrations coexist and in no way interfere with each other. The corresponding over-tones coexist and in no way interfere with each other or with the ground-tone, but all melt into one tone which is rich in its timbre because of the over-tones, whereas without them the ground-tone would be thin and poor. But the tone is felt

as one, though it may be thus mathematically and even experimentally analyzed into many.

But we need not go to light nor to sound for an example of this coexistence of unity with multiplicity. Your daily life is full of it. You get on the Samson for a river trip and steam up against the current. This current is bearing you downstream four miles an hour, but the wheel drives on the vessel upstream much faster. Meantime you are spinning round the earth's axis from west to east say 800 miles per hour; and with the earth you are racing round the sun nearly 19 miles per second; and with the sun and all the planets and a motley crowd of eccentric comets and meteors you are driving through the sky toward the constellation of Hercules. All the while you are moving every way on deck and perhaps throwing a ball with accuracy; for the movement of the throw melts together with all these other motions into perfect unity. They all coexist and mutually determine but nowise interfere.

Nor is there any limit whatever to this composition or resolution, as there seems to be no limit to the refinement of the physicist in his dissipation of masses into molecules, and molecules into atoms, and atoms into sub-atoms, and so on without end. There is a wonderful curve known as the curve of Weierstrass, that prince of mathematical exactness. At first sight it would look like an ordinary smooth curve of sines, such as you see when you shake a line that is fastened at one end, or as when you snap a whip-cracker. But on scanning it closely you would see that it was not smooth but undulatory up and down like a sea-surface or the asphalt pavement of a New Orleans street. On looking at it still closer with a microscope you would see that each little undulation was wrinkled with a host of other still smaller undulations of the same kind; and each of these in turn under a still more powerful microscope would shiver into still smaller undulations, and so

on forever. But the curve is meanwhile one, precisely given by its definition.

So too the indefinitely fine subdivision of the physical world by the physicist does not militate against its unity, which he is compelled to reconstruct in thought. Accordingly we may hold confidently that the spiritual universe is a coexistence of many in one, and you who like mathematics may find a much clearer, more beautiful and more convincing analogy in an algebraic equation connecting $a, b, c, d \dots x, y, z \dots$, holding them all clasped together in a mental unity, while respecting the individuality of each one. Nay, more, you know that you can often solve such an equation, that is, you can express one symbol, one of the magnitudes, in terms of all the others, and even when you cannot solve the equation, that is due only to the inadequacy of your mathematics, you may still think of and deal with the equation as if it were solved. When it is thus solved, the original equational relation is not changed, it is the same as before, but it now consists in declaring that x (for instance) equals some expression involving all the other symbols in some definite combination. Thus the one symbol x , so expressed, through the other symbols, is the equivalent of the whole original equation, certainly a striking illustration of the identity of one with all.

So, then, by this long and toilsome path we reach this conception of the universe, of the spiritual universe, the original whereof the physical universe is each man's construct or picture, constructed or painted *according to each man's ability* as an artist. This spiritual world we think of as *one*, as a garment of life and thought and feeling and will, a garment woven without seam from top to bottom. *Woven* did I say? Nay, not so. Goethe does indeed put these noble lines into the mouth of the Earth-Spirit:

"Through Time's whirring loom so the shuttle I drive
And weave of the Godhead the garment alive."

But the living vestment of Deity is not woven, the image is imperfect. As the shuttle flies back and forth it lays the threads side by side, and no matter how close, they are still distinct, like the lines of a diffraction grating. But the living vesture of the Deity is not thus woven, there are no threads, however close, side by side. The garment of the Godhead is a *continuum*. It is like a line, which is not made up of points no matter how dense you may crowd the points together.

It is very tempting to enlarge upon this beautiful and wonderful notion of a continuum, but the time is short and concise subtlety might repel you. It is enough for the present to know that the straight line between two points A and B is a *continuum*, as containing not very many points compacted, but *all* positions that a point would need to take in passing straight from A to B without making any jumps whatever. Such is the continuum, one of the most important of all exact human concepts. As some such continuum we conceive spirit to be, not of course as a line nor as a surface, nor the like; these space- and time-continua are only the constructs that image or symbolize the activities of the spirit-continuum.

As it is once for all our nature to think all things in symbols, especially the deepest things, even as Goethe has said: "The deepest can be said in symbols only" (*Das Tiefste lässt sich nur symbolisch sagen*), it may be well to have some sense-image of the spirit as thus conceived. The sea-surface or a vast spherical flag may partially serve the purpose, a sea-surface heaving now in the light of consciousness, now in the dark of subconsciousness, a flag sunlit here and there in its swells and elsewhere shaded in endless degrees, iridescent as the rainbow, and gleaming

and glooming beyond the day and the night. But the flag and the sea-surface are both continuous and unrent, one and indivisible. You have doubtless seen a very ordinary flag floating lazily from the mast of an anchored ship, while the smooth face of the water swayed in a thousand oscillating mirrors below; and you have noticed how the flag was reflected in a thousand distorted and fragmentary images in the waters beneath; the fragments were distinct and a great multitude, but the flag was one. So in the world-image of the spirit we behold millions and decillions of separate forms, the stars and skies and earth and ocean and stones and trees and men; and again, though the images are countless, the spirit that is imaged is one.

It is this unity of the spirit that lies at the basis of all history, of all life, of all science, of all morality. It is because all thought is ultimately one, that we can have a doctrine of logic; because life is one, we can classify and develop a biology; because all soul is one we can have an ethics, both a theory and a practice of morality. In fact, all morality rests upon sympathy, as Adam Smith so deeply divined, and as Sutherland has so clearly illustrated. But sympathy and love, which are the regnant facts of social life, are only forms and specializations of unity, of oneness with our fellows. Behold then the reconciliation of egoism and altruism, of selfishness and unselfishness. The great logical advantage of the egoist has long been felt and was set forth by Plato with tremendous energy in the first books of the Republic. The young logician excites the utmost admiration of Socrates, who feels that it is impossible to confute him without going back exceeding far into ultimate questions. Indeed, he is irrefutable so long as we retain the ordinary notion of self. It is only by an immense expansion of this concept that we gain a coign of logical vantage. Altruism can overcome egoism only by ingurgitation, by swallowing it alive. By this process alone the

antagonism is removed. Yourself is in truth your only object of interest or obligation, but only yourself in its largest and only proper sense. But this largest sense extends your self throughout the world, even as the complete definition of the wavelet must extend the wavelet over the whole sphere. You cannot wrong your neighbor without wronging yourself, for behold your neighbour is an aspect of your own universal self.

Now the logic of the situation admits of no escape from these conclusions, but it is one thing to know and it is quite another to *feel*. Logical conviction may be attained and yet leave us cold and lifeless. The head may be converted and the heart remain unmoved. It is for the *feeling* of Universal Unity, the consciousness of the cosmic Self, the enkindling, ennobling, enlightening, inspiring sense of the world-soul, of pan-psychic selfhood that I plead to-night. To be sure, the development, the birth, the growth of any such sense is not the affair of a day, of a year, of a century, or even of a millennium. It is the growth of myriads of years, it is the child of everlasting time. But this need in no way surprise us. How long has any and every sense, by which we construct the world and depict the spirit, been in growing? Did all your remote ancestors have such glorious orbs of light as those wherewith you build up about you the wide roof of the heaven, and the steadfast footstool of the earth? Could the Ninth Symphony have been heard by your forest-ranging forebears or their own progenitors that huddled in the lap of the sea? Nay, your ancestors, that is you yourself at that early dawn, had no specific organs of sight or hearing; you had only a more or less sensitive surface with perhaps here and there a spot of especial tenderness. Neither had you any definite sense of beauty or duty or truth or right. All of these you had then only as infinitesimal germs, now they adorn you as the diadem of your being. So too the world-sense, the

consciousness of your universal selfhood, exists with you as only the feeblest spark, but the breath of time shall fan it into heaven-ascending flame.

Some, though, may question whether there is any such sense at all, however nascent. None the less, the proof of the fact is overwhelming, the indications are numberless and unequivocal. No one can look far back upon the vista of the vanished years and doubt that the moral sense, the feeling of obligation, has been growing steadily through all that undistinguished lapse of ages. We need not go back to the *amœba* in this exploration. We may stop at our ancestors of only a few thousand or even hundred years ago, and we shall find there only the feeblest sense of brotherhood, extending only to the family or at most to the tribe. Within that narrow circle there was a sense of duty, of right, but not beyond; the stranger was the enemy, to whom nothing was due. But now we recognize not only our duties to all men but also our obligations to the dumb brutes of the field. We organize societies for the prevention of cruelty to animals, and there are at least some in whom buds the feeling of obligation to the plants. Meanwhile we continue not only to extensify but also to intensify the feeling of obligation, which is a budding sense of our life as not merely narrowly individual. No matter how much your views may vary in the present war, you must unreservedly admire the immeasurable spontaneity with which the attacked countries have leaped to the defense of the national life in danger; even the English, that most insulated and individualistic of the great peoples, have at length roused themselves to intense national consciousness, and now rallying throughout the length and breadth of their earth-wide empire, they present a seamless and continuous front to the foe. Contrast herewith the state of the world ten thousand years ago, when the largest people would hardly measure up now to our smallest, when the bulk of the population

consisted of vagrant groups of a few hundred or perhaps thousands, and the immense strides of human consciousness toward solidarity must become evident. Consider also the great international movements that meet us on every hand, the universal congresses that gather more and more frequently in our great cosmopolitan cities, above all consider Social Democracy, beyond doubt the most impressive of recent political phenomena, and it seems impossible to mistake the indications that we may now behold the faint purpling over all the tree of human life, which betokens the putting forth of a new and glorious foliage, the faint streakings of the dawn of a broader and brighter day.

Some one may say all this is but the progress of civilization. Perhaps; but what is civilization? May we not now perceive it in a clearer light as the history of the birth and growth of the world-consciousness, the progressive reconciliation of the Many and the One? There are many other aspects of this matter that deserve presentation, but I have chosen only a few and these perhaps not the most impressive. Hastening on now we must not fail to note that this burgeoning sense of worldhood has already come to premonitory recognition in the consciousness of many of the noblest sons of earth. Naught else indeed inspired the great Stoic idea of universal humanity, of the world as one living being, of our citizenship in heaven. The same high note is heard as an overtone all through the dissertations of Epictetus and the meditations of the noble Emperor Aurelius (after whom our own city of New Orleans is named). It is the same great thought that inspired Giordano Bruno and upheld his spirit unbowed even at the stake. It is the same that animated the illustrious Spinoza, the God-intoxicated Jew of Amsterdam, of whom alone among men Schleiermacher could use these words: "Offer with me reverentially a lock of hair to the manes of the holy but proscribed Spinoza. The Divine Spirit transfused him,

the Infinite was his beginning and his end, the Universe his only and everlasting love. Into this eternal world he mirrored himself and saw how he was its noblest mirror. Full of religion was he and full of a holy spirit, and therefore he stands alone and unrivaled, master in his art, but exalted above profane society, without disciples, without even citizenship."

Yet, though without disciples, it was the spark of his spirit that enkindled the greatest minds of Germany, such as Lessing and Herder and Schiller, and chief of all Goethe, in whom we find the sense of oneness with the world the liveliest of all. It would be easy to quote by the hour in proof hereof, but the time is nigh out. Consider only a few of the Xenions of Goethe and Schiller (so beautifully translated and published of late by Dr. Paul Carus), such as,

"Strive on much as thou mayest, thou standest alone there forever
Until Nature the Strong knitteth thee unto the whole."

And again:

"Let none equal another, yet every one equal the Highest!
How can that be? Let each one be complete in himself."

or this from Faust:

"How each to All its being gives!
One in the other works and lives."

If now we pass on in haste to Wordsworth, the poet-child of Spinoza, we shall find that this thought of the oneness of man with the world has transfused all his writings and often uplifted an otherwise unsoaring nature to the highest pinnacles of poesy, as when he declares,

"And I have felt
A presence that disturbs me with the joy
Of elevated thoughts; a sense sublime
Of something far more deeply interfused,
Whose dwelling is the light of setting suns,
And the round ocean, and the living air,
And the blue sky, and in the mind of man:

A motion and a spirit, that impels
All thinking things, all objects of all thoughts,
And rolls through all things."

Such illustrations might be multiplied almost without end, and they show clearly enough that we are here dealing with a profound reality. It is the same nascent consciousness, the quickening and awakening sense of world-oneness, of the divine eternal unity of the All, that not only informs our science, and grounds our morality, and directs our world-politics and all the collective processes of our civilization, but also inspires the oracles of our most philosophic and deep-thoughted poets.

And does any one believe that such a process as we have thus detected can stop now and here or anywhere short of its far distant, its ever unattainable, but yet ever more and more nearly approachable goal? Surely not. It must go on and on forever; the faint purple flush must deepen into richer and richer bloom. Nothing is more absurd than to imagine that the dawning consciousness of the world has more than begun to open its eyes; it is yet but a babe in arms, peeping out upon the world in inarticulate wonder. We cannot indeed foretell the course of its growth, we cannot trace out its way beforehand, it may rush out into the most unexpected paths. But one may be sure it will grow and perhaps at an astounding rate. No one beholding some ascidian ancestor of man ten million years ago could have foretold its descendant with eyes and ears that organize universes of light and color and of melody and harmony, and with still more refined senses of the true and the beautiful and the good that build up unending palaces of exact thought, and colossal fabrics of social and political polity, and far-shining temples of plastic art, and star-y-pointing pyramids of song. Verily the step seems longer by far from such remote ancestry to Goethe or Wordsworth or the average man of to-day than from him to the over-

man of myriad years to come, who will clasp the universe to his heart in the nuptial rapture of a consciousness divine.

And now finally we may touch the inmost nerve of the whole matter. In the minds of every one of you perhaps has arisen the question, "But what has all this to do with death?"—the all-important matter, death, which, Seneca says, is the fairest invention of nature? Much every way, as we shall now see. It was August Weismann, the greatest continuator of Darwin, who in his essays on heredity called emphatic attention to a native immortality of the elementary life-form, the cell. When the single-celled organism grows to a certain size it splits in two, and each of the cells goes on living and growing as before; and so on, just as long as the outer conditions of life are present. If the cell dies, it is from some form of accident, and not because it has run its life-course.* The reason of the splitting in two, the so-called spontaneous fission, is to gain greater nourishing surface with the same volume, for two cells of a given shape and containing together a certain volume have a greater surface than one cell of the same shape and the same total volume—an extremely important principle on which we cannot dwell. In the interest of better nutrition cells have kept on dividing and gradually have become specialized in their functions. These specialized cells constitute the body and by becoming specialists have lost their inborn immortality. Meantime the continuous germ-plasm, as Weismann calls it, lives on and grows unceasing through the ages.

Such *very* briefly is the great biologist's doctrine. He, of course, is speaking and very properly speaking of the physical organism solely. We have learned not to disparage this organism in the least, rather to revere it, but at the same time to understand it, as not a thing in itself,

* More recent observations would seem to amend the contention of Weismann.

but as a construct of spirit, as a sign, a symbol, a spatial image of a long series of soul-experience. Well, then, for us the physiologic process called the death of the body is a process taking place not in the world of spirit, of soul-experience, but in the world of the *symbols of that experience*. When the body B dies it does not mean that the corresponding spirit S dies, for there is no meaning in the words "a spirit dies"; neither does it mean that a spirit S has forsaken a body B in which it has been dwelling. The notion that a spirit dwells in a body is a very ancient, very venerable notion, to be treated with great respect; but it is not correct, it is an old-world form outworn. No spirit dwells in any body. Your own body and all the world you see is the construct or outward symbol, which you form at every instant, of your own experience; the bodies of your friends are the signs or images of other spirits with which you are at every instant related. If then your friend dies, the meaning is not that the corresponding symbolized spirit dies, by no means, but only that a certain aspect of your own experience is no longer representable under the image or symbol of your friend's body. For mind you, that friend's body was a construct of your own experience, it was a way of representing another spirit with which you were in the intimate relation called friendship.

But you ask, if this spirit-friend is no longer constructible by me under the form of a body, does it not mean that *some* profound change has taken place in that spirit or in my relation with it? Yes, so much seems to be indicated, but not more. That spirit has changed profoundly its relation to you and its other fellows, but it has not died, for death is a term that has meaning only as applied to physical constructs formed by spirits and corresponding to spirits, but not as applied to spirits themselves.

This fact comes out clearly only when we bear constantly in mind the nature of spirit as a continuum and as

a unit. The death, the dissolution, the ceasing to be of such a continuous unit seem quite unthinkable, it would be nothing more nor less than the extinction, the annihilation of the universe, of all that is.

And now at last we come to the final question of the individual conscious existence. We cannot argue but must merely assume that consciousness is the highest stage, yet known or developed, of spirit activity, and that self-consciousness is the highest stage of consciousness. It may sound strange, yet it seems to be the greatest general achievement of the human spirit, that which marks it off most distinctly from all other spirits mounting upward through the spires of form, to be able to say, "It is I." Toward this self-consciousness we may behold the soul struggling through all the ages of the past. But now that this pinnacle is attained, is the onward and upward march to stop? By no means! The path still leads on higher and higher. "Hills peep o'er hills, and Alps on Alps arise." As men we have reached the consciousness of ourselves as individuals, but only as individuals, only in apparent isolation and insulation, as of things in the physical world. In such insulation and isolation we are finite and bounded in time as things are finite and bounded being separated in space.

And precisely herein lies the key and significance of our mortality. It is the symbol of the insulation and isolation of the individual spirit that has attained or is attaining a consciousness and even a selfconsciousness, but has not yet attained a universal consciousness. It is the mark of a spirit that can say "It is I" and "I am Some," but not yet "I am All." Such a spirit that has not yet risen to World-self consciousness, but feels itself as only one among many and not yet as one that permeates, transfuses, unifies, and comprehends all the Many, such a spirit must objectify, externalize, and construct both itself and all its fellows as

finite, separate, individualized images, which we call bodies bounded in space and bounded in time, and death is the sign or symbol of this latter definition. But the spirit that rises inexpressibly higher, soaring as on eagle wings above and beyond self-consciousness, mounting aloft to the glittering peaks of World-consciousness divine, that spirit leaves death behind.

A mystic or religionist might say, that soul pillows itself upon the breast of God, but we use not here the language of mysticism or religion. We shape our words to fit the soberer doctrines of development, of the gradual unfolding of the higher forms of life, of the continuous exaltation of psychic experience, through all the endless grades of soul-activity, ever upward and upward to the highest self-consciousness of man. And here not only do we find it logically impossible to stop, but we have found that the general direction of spirit growth as it now shows itself among men is steadily set along the whole front of progress toward the enlargement and, we might say, the solidarification of the individual into a general consciousness. We have seen that under this sign the great historical movements, whether of science or art or politics or of social, industrial or commercial enterprise, take on new meaning and are stamped with the signet of cosmic significance. We have seen also that the choicest spirits both of ancient and of modern times have foreboded the movement of which we speak, have foreseen its goal, and have flung themselves gladly into its current, as it were into the drift of the stars.

Yea, too, they have felt, though unable to justify the feeling, that on this path alone was it possible to seek for triumph over the last enemy, death. Says Goethe:

"Art thou affrighted at death? and yearnest for life everlasting?
Live in the whole! When thou long hast departed, it stays."

Similarly the deepest-thoughted of recent poets, George Meredith:

"Our life is but a little holding, lent
 To do a mighty labor; we are one
 With heaven and the stars when it is spent
 To serve God's aim; else die we with the sun."

But you will readily recognize the oracles of both these seers as dubious and at best only half correct; for neither has any inkling of the scientific and philosophic truth that his words darkly adumbrate. Similarly Tennyson tells us, "the individual withers, and the world is more and more."* But the truth they miss is that cosmic history is the process of unfolding, of growing, a psychic experience that passes on up to consciousness and to self-consciousness and does not stop there but expands and ascends ever wider and higher to universal self-consciousness, to the realization of the world-selfhood, the identity of the individual with the universal, a consciousness that transcends death, because it removes the bonds and the bars of which death is the sign. There is nothing Utopian, nothing visionary in the prospect here set forth; it is in line, as we have seen, with all the surest teachings of the austerest science. A hundred illustrations lie at hand, but only one have you patience to hear. When a one-celled organism splits in two, we must suppose the physical fact images some psychic process of too low an order for us to name, something *most distantly* akin to a feeling, to the mother-instinct of a bird or a dam that flutters in agony about her brood or defends her offspring with her own life. Perhaps it is thence a still farther cry to the intense love of the human mother, who loses her very being in her child and finds herself again therein and hardly less in her grand-children and even in remoter descendants.

Now as this lofty triumphant feeling of love is an absolutely uninterrupted outgrowth from the nameless sub-sub-feeling in the single cell, unless we make the impossible

* Especially notable in this connection is the allegory of Mr. Herbert Trench, *Apollo and the Seaman*.

supposition that history is to call a halt in its forward march and henceforth retire or spin round in a circle, it must be that this feeling will grow as the ages roll on, into higher and higher super-feelings that shall identify the life of its descendants, that shall expand and intensify the parent consciousness and the parent love unendingly through all generations to come. Such is only one of a million paths along which the enlarging consciousness pursues its steady and unceasing march toward the infinite and immortal world-consciousness which is its heavenly goal. Even as a wave of the sea issuing from a pebble thrown into it spreads wider and wider till it compasses the whole sphere and gathers itself up in the opposite pole.

"Reflection," says the Dhammapada, "is the path of immortality; thoughtlessness is the path of death." We must amend the wisdom of the Indian sage. It is consciousness that is the path not so much of immortality as of eternity; not mere narrow self-consciousness, but the consciousness of the larger Self that radiates over the Whole and sees and feels that it is itself the world and that its fellows are each of equal right the world. Herein lies no contradiction, for the modern doctrine of the infinite, grounded by Bolzano and developed by Cantor, Dedekind, Keyser and others, shows clearly how the parts of an infinite may each equal the whole. Such then is the path to immortality, the way to eternal life. Not indeed a narrow path, but the wide-expanding sweep of advancing consciousness, which flashes upon us here as science and there as art and yonder as democracy and liberty and equality and justice and culture and morality and self-sacrifice and virtue and truth and love and everywhere as philosophy, the guide of life. All of these, by no means excluding the lower but no less essential aspects of trade and commerce and industry and wealth and amusement and social enjoyment, all are but manifold phases of the brightening, ex-

panding, ascending individual consciousness that more and more will burst all bounds, above, below, and uplift itself to the Universal and Eternal Whole.

Of course there are many objections you could urge, not many perhaps that have not already been pondered. But these would require the introduction of a new order of notions, for which there is now no time. Enough that a rational interpretation of cosmic history opens before our eyes an increasing prospect for humanity, a vista that broadens and brightens unto perfect day.

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