

Scientist: In the Beginning Was the Word

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Photo date and location unknown

There is great confusion in the world today. But behind all this, many people are starting to ask questions, really wanting to know what is going on in the world. Because it is such a rational age, an age which places such great stress on science and technology, many people want to be convinced by scientific proof not just emotional answers or blind faith.

If we go to the Bible it says, "Ever since the creation of the world His invisible nature, namely, His eternal power and deity, has been clearly perceived in the things that have been made, so they are without excuse." But the existence of God is not taken for granted and throughout history people have failed to recognize their Creator. The happy thing is that the more people rely on scientific proof, the more shaky their position of disbelief is because science is piling up more and more evidence to show that there is some kind of First Cause or Intelligent Source. They don't always call it God, though some have gone so far as to lead directly to that origin.

One of the most basic questions which needs to be answered by science and religion is: Where does matter come from? That goes back to the question of where do we come from? We are matter partly; what is the relationship between mind and matter?

Raw Materials

Man has traditionally held the belief that the universe is constructed like a building: Nature starts with raw materials and combines them in different ways to fashion each natural structure. Man has had different theories about this. Originally we thought there were four basic elements: fire, earth, air, and water. Then, we discovered that there were some 103 chemical elements which we thought were the basic elements. These basic elements are made up of atoms and eventually we found that even these atoms were made up of particles.

Stars are seen as a collection of molecules, galaxies are made up of collections of stars, and the cosmos is made up of a whole collection of galaxies. But still scientists are not able to answer the very basic question of what does nature use for raw material. They are still asking: With what does everything start? A number of physicists have come up with a very radical idea on finding this very basic unit of matter. They decided that it doesn't exist. In other words, they say, the chair in which you are sitting is not made up of a collection of atoms or atomic particles but is made up of fundamental laws. Protons and neutrons have been broken down into particles and sub-particles; physicists are now talking about quarks, a new

kind of particle. Many scientists say that all we need is more energy and more time to find out how these can be broken down.

But another group of theoretical physicists feels that it would be impossible to prove that any particle could not be broken down into more and more particles. So they decided ultimately the world is constructed of principles rather than from units of matter. It's not universally accepted, but it is established as a valid theory. One of these physicists named Allen D. Allen wrote, "Theoretical physicists seem well on their way to agreeing with the Gospel of St. John that 'In the beginning was the Word.'

Mind and Matter

That's a very interesting conclusion because all throughout history man has never really understood the relationship between mind and matter. You can go right back to the beginnings of philosophy. Plato and Aristotle, for example, regarded material and idea as completely separate entities, not related in any causal way. This view has prevailed throughout most of history. Thomas Aquinas established the traditional Christian view that the first cause is God but material was made by God from nothing. His concept was of a God who was a purely spiritual being with no material content at all and no relationship to matter. This left unsolved one question, how can material be made from spirit? If God had no potential in Him to create matter, then where does matter come from?

As we leave theology and go to Descartes' empiricism and that whole train of thought, we see that Descartes set up the same kind of dualism, regarding mind and matter as completely different, completely independent of each other, having nothing to do with each other. But in that case, there's no possibility of a relationship between the two of them. Hegel also regarded God as pure spirit or reason and matter as a completely different element not at all part of God. But he also left the unsolved question, if matter does not come from God, then what is the source of material?

Moving to more contemporary times, Karl Marx believed that spirit or mind is a secondary element derived from matter. Since he believed that nature itself or material itself originally contained the basic laws, he opposed the concept that anything like reason was acting upon matter, on nature.

Difference of Degree

These theories, as we've seen, are being disproven by modern science. Instead, science is corroborating the Principle explanation of the relationship between mind and matter. Unification Principle says that the difference between sung sang and hyung sang, mind and matter, is not a difference of essence but rather a difference of degree. Mind and material were not created by God but are original attributes of the Original Being or original attributes of God. In other words, they are not created by God but are part of God, so matter can act upon mind and mind can act upon matter and there can be a direct give-and-take relationship between them.

The Logos, Principle says, is not God Himself, but one of His attributes along with reason and matter. Furthermore, reason and matter are not completely different but rather relative elements with common features. The natural world came about through give-and-take action between the sung sang and the hyung sang. This is different from previous philosophies, but we can see that this is the direction that science is heading in today.

A Living Organism

There's a new theory kicking around that is another piece of evidence piling up for the existence of an Intelligent Source or First Cause behind the phenomena of the natural world. Conventional scientific wisdom holds that the earth's environment conditions life; that is, we are changed because of our environment, which determines which species survive and which species die out. There's a British scientist by the name of James Lovelock who some years ago was looking at satellite photographs of earth when it occurred to him that the earth's atmosphere looked "like the shell of a snail -- part of a living organism." From this, Lovelock formulated a new theory of the relationship between living things and the world around them. He suggests that the living things themselves control their environment in such a way as to ensure their survival.

In other words, the forms of life themselves change the chemical composition of the atmosphere in order to keep the temperature of the earth's surface within the limits that will sustain life. By the laws of chemistry, all the nitrogen and oxygen in the atmosphere should have broken down and become nitrate ion in the sea. Obviously this hasn't happened, so oxygen must be maintained by biological processes. He gives an example of one biological process which helps to maintain the atmosphere: bugs produce methane gas and this gas helps transfer hydrogen from the earth's surface to the stratosphere in sufficient quantities to maintain the right concentration of oxygen in the lower atmosphere. So, the bugs themselves are helping to create the right atmosphere for them to exist.

From these bits of evidence, Lovelock came up with the hypothesis that living matter, the air, the oceans, and the land are all part of a gigantic system which seems to "exhibit the behavior of a single organism—even a living creature." This is more proof that the universe is not just a creation of chance and accident throughout geological history, but the creation of a Source with a very clear plan in mind.

Fields of Life

The most exciting evidence for me, though, is a book called *Fields of Life* by Dr. Harold Burr, a professor of anatomy at Yale School of Medicine. About 40 years ago, he started asking some very interesting questions. Did you know that the cells in your face are constantly being replaced every six months? If you meet a friend on the street whom you haven't seen for six months you still recognize him, but actually every cell in his face is different. Why? He speculated that every living system has an electro-dynamic field or field of life. This field acts like a jello mold -- when you pour jello into a mold it takes on whatever shape the mold has. These fields act like that, they determine the shape of whatever is within them.

You can detect these fields by measuring the difference in voltage between two points that are on or close to the surface. This is a very sensitive measurement that couldn't be made until very recently because the instruments have to be extremely sensitive to measure very minute differences. Showing that there are electrical properties in living matter is not so different; electro-cardiograms and electro-encephalographs have proven that living matter does have electrical properties.

Up until his ideas, however, science had no underlying theories about why this is true. They just said that nature was a collection of moving particles kind of all jumbled together. Burr felt that cells are not just a conglomeration of chemicals but that they are actually an integrated system. And he wanted to know why they remained constant despite all their internal changes.

Give Wholeness

Burr's hypothesis was that these life fields, or L-fields as he calls them, are what give wholeness, organization, and continuity -- they direct all growth and development of cells. He did extensive tests to show that every living system has these fields. Just a couple of examples: He did a test on the ovulation of women and found that the fields detect when a woman is going to ovulate just a fraction of a second before it could be registered by physical means -- in other words, electrical activity indicating the existence of the field was picked up before the actual moment of ovulation. With polyps and mice (polyps are invertebrate animals related to jellyfish) he found that electrical activity would rise as the animals developed from infancy to their maturity, and then the electrical activity would taper off as the animals declined towards death. This showed a relationship between growth and electrical properties.

One of his colleagues said that growth and development of an embryo seemed to be the result of some kind of factor sitting on top of the embryo during its entire development to give it direction.

Burr felt that this constant factor was the L-field. He went on to studies of man, and found state of mind is reflected in the L-fields. He did experiments with psychiatric patients to begin with, and he could detect differences in the electrical activities of patients who were considered relatively well and those who were severely disturbed. He also did studies of people under hypnosis showing that the electrical activities changed according to their state of mind. These are all short-term projects and Burr wanted to test the fields over a long period of time, so he tested a tree because a tree stays in one place (unlike an animal) and in one fixed environment for a long period. Over a period of 30 years or so, it was found that the fields reacted to solar and lunar rhythms and to sun spots.

Provide Direction

So, fields are not just something mysterious going on around us; they are measurable. Is this behavior simply the result of chemistry? Chemistry is too changeable, Burr felt. There is too much constancy in living systems. As Burr said, "It's as though in every living system, there's some factor which makes acorns grow into oak trees and which makes a maize seed grow into a corn stalk--there's some constant factor behind the pattern of activities."

The chemicals of the cells are like gas in a car. They provide the energy but the electrical properties of the fields are what provide the direction. There are so many different combinations possible between carbon, oxygen, hydrogen, and nitrogen which are the four basic elements in living matter. The L-fields determine their position and movement, they give direction to the cell; when it comes into being it will have certain characteristics so that you will look like what you looked like six months ago.

Fields compel an acorn to grow into an oak tree or a maize seed to grow into a corn stalk. Anything that compels growth and development in an organized way is irrefutable evidence of law and order, Burr says. But because the L-fields were influenced by greater fields, he went on to say that these fields were subject

to higher and higher authorities, from simple to more complex, ultimately to an "infinite, ultimate authority" as he termed it, in other words to God. For example, the field of each cell in your body is affected by the field of the entire organ, and then the field of your body, your body by the field of your immediate environment, then you're influenced by fields in the whole solar system and the whole universe.

He pointed out that you and I can't exist without these fields and we are subject to natural laws because this is a highly organized universe of law and order. Since the universe is in constant motion, from the motions of the atom to the motions of the galaxies, we couldn't even exist for a fraction of a millisecond without these forces, without these laws controlling our lives, giving direction. So we are definitely products of design and Burr says that it's difficult to think of any apparatus that exists that's not the product of the mind of a designer.

A Designer

Since the universe exhibits design, it must be the product of a Designer. Universe means uni -- one. He says that the universe is a unit set up and maintained by electrical fields which are the creation and instrument of our Designer. Man is part of this design, not an accidental conglomeration of chaotic parts. This concept gives meaning to the universe and shows that we have direction in our lives. From this he went on to say that design and organization imply not only direction but purpose.

The findings of Burr and other scientists completely contradict the position of materialism. For example, communists say that direction comes from the necessity of principle, it's inherent in the principle. Cause A will only produce cause B. If matter is undetermined, if matter has no purpose of its own, how is it possible for it to become determined, that is, to become subject to natural law. There's an inconsistency in the communist viewpoint.

In the contrasting view, Unification Thought looks upon all the laws of the natural world as necessary because they were prepared beforehand for the realization of a definite purpose--to realize our cosmic purpose. Not only on an individual level but every part of the universe has a purpose and this is why laws were created, to enable them to fulfill that purpose.

If we understand what's going on in our universe, it gives us a much greater appreciation for it. We can feel closer to God when we see in everything that He is working. When you see His Principle at work around you it makes you more aware of the intricacies even in a leaf or a flower, in every minute part. Reverend Moon, in one of his talks, gives the example of the human face: without any kind of purpose or direction behind it how would the eye know that it would need eyelids to keep the eyes' moisture from drying in the wind. There has to be a Designer, a Creator.

Our Purpose

From the very beginning of the creation to today there has been such order and such complexity in the universe that you realize when you think about it that there just has to be as much order and pattern in our own lives today. Our day-to-day life has just as much order in it, just as much guidance from that Source as the universe displays, because we're part of the universe. God is acting on a very cosmic scale, providing direction for the universe, and he's also providing direction for our own lives. In everything that happens we can see a reason behind it if we look for it; even experiences that may seem very difficult at the time, when we look back at them after they are over we can see that there is often a lesson to be gained from the experience. We can realize that there is a guiding force directing our daily lives.

If we recognize that man's true value is being here with purpose, then we want to find out also the way we can find and fulfill ourselves -- we want to find the highest possible purpose to live our lives for. The way you can affect the most people and do the most good in this, world is to serve mankind, to serve God. Then you're serving the highest possible purpose and this is the way we can truly fulfill the purpose for which God created us.