Our current theories of physics have great mechanical usefulness. In contrast to this is the fact they don't make sense. Since the acceptance of Einstein's theory, this failing has been interpreted as the consequence of the environmentally limited development of human intelligence. For many scientists this determination is warmly embraced. It has allowed intriguing theories proposing odd natures to come to the fore. For Einstein such a realization was liberating. It meant freedom from the confines of our earthly experiences.

We could leave our underdeveloped intelligence behind and follow the trail of surrealistic theory as far as mathematics and empirical evidence would carry us. If useful equations, supported by empirical evidence, said the universe was skewered, then he could believe it was so. For him, the use of the new theoretical physics gave and required the opportunity to develop a new way of thinking.

He followed the pattern he thought he saw in empirical evidence. Einstein knowingly decided to form equations that would skewer a theoretical universe. He defined the concept of space-time by the use of mathematical transforms. In other words, it was not derived directly from the fundamentals. Transforms do not represent theoretically safe mathematics. They are forced equations. They force a relationship to be formed between empirical evidence and a theoretical interpretation. His transforms are the Lorentz transforms. The necessity for forcing useful theoretical results is a warning sign of lack of understanding.

This transform trap that ensnared Einstein is the same one that ensnared Lorentz. Lorentz took known empirical evidence and used transform equations to develop a connection to his own conception of how the universe works. His conception was faulty and is not accepted. However, he was the first to achieve the Lorentz transforms. They did not prove he was correct and they do not prove Einstein was correct. Transforms actually can never prove anything. They are always mathematical tools specifically designed to fit whatever the designer wishes them to fit.

Lorentz's use of his transforms led to the prediction of the variation of both particle size and time. In a sense he invented particle-time (he called it local-time) as the predecessor of space-time. For Lorentz an electron could shrink in size in the direction of motion. His transforms are mathematical equations that do make predictions consistent with empirical evidence. Even though his equations were successful, his theory is not accepted as correct.

Einstein expanded the application of Lorentz's transforms from a description of particle size to a description of space, even to the whole universe. For Einstein it wasn't the size of the particle alone that was shrinking, but instead it was space itself and anything contained within it. His expanded application of Lorentz's transforms provided a mathematical description of space-time. When Einstein introduced space-time, he moved us beyond the point where we could use picture substitutes to represent such a thing.
Then quantum physics, again through Einstein, gave us two coexisting but mutually exclusive representations of our existence. We cannot make sense of the universe in only one form of interpretation. So, we must alternately choose to interpret physical existence in one form or the other. This division is called wave-particle duality. It is theoretically retained in efforts to develop a unified theory even though wave-particle duality and unity are mutually exclusive.

Actually we were well along on our new way of thinking even before Einstein propelled us into a universe of four or more dimensions. It began when physics theory began. We went beyond our senses at least with the introduction of Newton's law of gravity and the beginning of field theory. Then the development of electromagnetic field theory propelled us to another leap beyond our sense. It declared that one field could create another dissimilar field. We can only imagine this remarkably useful revelation in the same manner in which we think of magic.

Theory is composed from a belief in incomprehensible mechanical natures. Physicists attempt to find universal unity by accepting divisions in theory and interpreting their solutions as new dimensions in the structure of the universe. We can only relate to three dimensions. All unverifiable added-on dimensions can be attributed to the acceptance of field theory. The use of field theory is an admission we don't understand what we are doing.

In addition, the practice of putting names on physical phenomena is often an impediment to furthering our understanding of them. Too often we take comfort in our own words. Words are useless symbols unless they draw forth meaning from inside our minds. Words such as inflated and precipitated are used to describe the development of the early universe. These words do not convey fundamental understanding. Instead, the ideas they represent are accepted as if they are mysterious, marvelous phantoms.

Unity cannot be the phantom of the universe. Unity must exist always in the entire universe. The first step toward unity is to reduce the need for field theory to one primary cause of force. We probably have to accept that we will never understand the one primary cause for existence. However, we should not allow ourselves to add more unexplainable primary causes just because we do not begin with an understanding of the nature of real unity. The second step is to recognize the severe artificial limitation we impose upon our understanding of this one primary cause by interpreting it only in the mechanical sense. In order to free ourselves, we must imagine intelligence first and mechanics second.

Our universe has order that we describe in part as physics and in part as life. So far as we can determine, the laws of nature underlying each of these are identical. They share the same source of order. There must be meaning for our existence because there is order in the universe. It is not possible for order to even be identified as such without a reason already being known. To have a reason is to understand a meaning for the recognized order.

In so far as we are concerned observers, all we can know that exists is information and intelligence. We comprehend everything through our property of life called awareness. Beyond this the nature of the universe is only hypothesized. To describe our reality in this manner may appear to attack our physical reality. It can seem to say we are only phantasms. It can feel as if our reality is reduced to exceedingly less than what we observe it to be.

This is definitely not the case. Look at yourself and also at the universe. In this act you have communicated with yourself and the universe has communicated with you. The universe is sending information that you can comprehend. Understand that you and the rest of the universe are two parts of the cause of intelligence and life. The universe gave birth to you. It doesn't get
more real than this. The question of creation is a question of intelligence. Where did it come from?

The use of the concept of intelligent communication may seem uncomfortable and the concept of force clearer. However, which is more comfortable to say about our response to observing the universe? First, the universe exerted a force on us and something about us changed its velocity. Or second, the universe communicated with us and we understood its meaning. The concept of force is a product of a mechanical interpretation for the operation of the universe. There is much more to the universe than pushing and pulling things around. There is awareness. Awareness is the product of intelligence. It is the ability to comprehend meaning in new knowledge.

It is self-evident, though not always obvious, that new knowledge can have no meaning unless we already know how to interpret it. It is also self-evident, though not always obvious, that we can understand the universe. We can understand it because we have the intelligence necessary to discern its meaning. We have to have it. There is nowhere else for it to be. It cannot come from mathematics, because mathematics is mechanical. Mathematics is a rigid system of logic that takes the place of counting. The purpose of counting and the meaning to be drawn from counting are beyond the logic of mathematics.

What this means for physics is that it was a mistake to have believed those mathematical formulas that told us the universe has a form which is incomprehensible to our intelligence. It was logically seductive to conclude that our confined development of life on this planet has left us with intelligence inadequate to understand the universe. It was easier to invent unexplainable mysterious answers. The acceptance of unexplainable answers leaves us without explanations. This practice makes matters easier for the theorist. However, its benefits are short lived. We cannot build understanding upon lack of understanding. It is our nature to desire understanding no matter what are the challenges. We desire to understand the universe. Our capacity to understand is linked to and arose from the nature of the universe.

We work together to learn to understand this nature. Collectively we are capable of understanding all about the universe with the possible exception of the one primary cause. All of our intelligence is contained within us when we are born. What we receive from our environment is only data in the form of photons interacting with subatomic particles. These increments of data come to us in immense numbers at the speed of light from an immense number of scrambled sources. The result of their relentless bombardment is that we understand the universe. Not all at once, but logical step by logical step.

Our ability, or even an insect's ability, to analyze hoards of always changing, almost random data coming to us at the speed of light is demonstration that something magnificent is occurring within our minds. What this means is our conscious mind is in communication with a subconscious mind that already knows what to do. It also means the universe is in communication with our subconscious minds. The universe sends us information for which we must already know the meaning. Our intelligence contains the meaning of the universe. Universal intelligence is our intelligence.