

How Do You Know You Know?



Send him mail.

“Food for Thought” is an original column appearing every other Tuesday at Everything-Voluntary.com, by Norman Imberman. Norman is a retired podiatrist who loves playing piano, writing music, lawn bowling, bridge, reading, classical music, going to movies, plays, concerts and traveling. He is not a member of any social network, nor does he plan on becoming one. Archived columns can be found [here](#). FFT-only RSS feed available [here](#).

It has been said that one cannot utilize logic or science to solve the world’s most devastating problems. Such a belief is true if people cling to the false beliefs and superstitions of the past with unremitting tenacity and refuse to acknowledge the following:

1. Man is an individual, and as such it must be recognized that he must function as an end unto himself, not as a means to the ends of others.
2. To function as an individual, man must be free to contract (meet, socialize, transact, make friendships, become romantically involved, worship) with whom he chooses. Only the individuals involved can determine the terms of contracts.
3. Freedom for each individual is a desirable and possible goal.
4. To develop the technology to make freedom possible, it is necessary to utilize those very same tools that have allowed man to progress in other fields. Those tools will be discussed in this presentation. The solutions are not germane to this discussion. However, it is of utmost importance that those same tools be utilized to solve our social and political problems.

The line of resistance repeats itself like a haunting theme in the questions and assertions made by most of the doubters. It is the same *leitmotif* that has plagued the progress of man since the dawn of civilization. Unfortunately, such mysticism is still prevalent, thus placing a seemingly immovable obstacle in the path of freeing man from his bondage. The questions and assertions are expressed as follows:

1. What is truth anyway? Isn’t what is true for one person, false for another?
2. Haven’t there been scientific theories in the past, which in the light of further knowledge, have been proven to be wrong?
3. Maybe there are many other realities of which we are unaware?
4. You can’t apply science to human action and interaction.

Before I can discuss the above assertions it is first necessary to discuss the concepts entitled “contradiction” and “inconsistency”. There have been many circumstances where I have assumed that my partner in a discussion understood these concepts but in the final analysis my assumption was incorrect. Therefore, the ground rules for rational discussion must begin with these concepts—inconsistency and contradiction.

Inconsistency is the maintenance of different and irreconcilable positions on the same issue. *Contradiction* is the outright denial or negation of a given assertion by the pronouncement of a second assertion making it *impossible* for both of them to be true. By definition a *contradiction* proves that something is *impossible*. If two assertions about the same thing are shown to be opposite, then both claims cannot be true at the same time. It should be clear then that to recognize a contradiction in one’s thinking is *proof of an error*. Contradictions can exist in one’s mind but they cannot exist in reality. To attempt to utilize a contradiction in order to attain a goal will result in failure, either in the short run or the long run.

Without one’s uncompromising commitment to these concepts there can be no understanding, no communication and no intellectual honesty between people. Intellectual honesty is a prerequisite to rational discussion but more importantly, it is a prerequisite for clear thinking and self-esteem of the individual. If, in a discussion, you determine that your opponent believes that contradictions do exist in reality and are not proof of an error, it is impossible for you to have a rational discussion with him. Stop immediately and walk away for it will only bring you frustration. You might as well be speaking different languages. A person who is intellectually honest displays the following behavior:

1. He does not play devil’s advocate.
2. He understands that every issue has an underlying principle supporting it.
3. Once he agrees on a principle or truth, he does not arbitrarily disagree when that same principle is invoked in the discussion, simply because it demonstrates his error on an issue or the conclusion is emotionally painful. Almost all revolutionary new ideas that were correct were emotionally painful to accept. The honest person will look into revolutionary concepts with an open mind no matter how absurd the concept *feels*. He can reject it only if he uses the same reasoning process outlined in this article.

Each person in the discussion must be able to generalize, to think in terms of basic principles and to apply those principles in all cases, since that is what a principle represents. Without the ability and desire to generalize, one must be led by the hand each time one encounters a new problem. One has to be shown how each solution is derived from its basic concepts, step by step, to its final conclusion. Those who cannot or will not generalize, finds it very difficult to come to many conclusions with confidence. He is an intellectual and psychological child who distrusts his ability to comprehend reality. Such a

person must then rely on others to think for him or must rely on mysticism. Mysticism, *in its widest sense*, has led to most of history's horrendous injustices. It is not just religious beliefs, but conclusions based upon feelings and *a priori* conclusions that fall into the realm of mysticism. Relying on the minds of others and mysticism leads to a mind confused by the many different opinions it encounters.

This article is geared toward educating the reader as to the nature of knowledge and rationality so that perhaps he too can participate in the solutions to our most urgent problems. With the aforementioned as background I'll proceed to deal with the topic at hand.

A definition is made up of words. Originally the words given for each concept had to be invented by someone. But the audio-visual symbols (words) are simply representations of concepts or things that do have a basis in reality. Stated another way, the words that are used had to have some referent in reality or else what would the words be referring to? All concepts, and the words chosen for those concepts, start with what is observable through the five senses. A person devoid of all of his five senses can know nothing. Even Helen Keller possessed the sense of touch so that she could learn. A concept acquired through the five senses is called an ostensible concept, or *definition*. (Blue is an ostensible concept because in order to originally define it one could only point to it). Existence is an ostensible concept because one also has to point to it in order to define it. In addition, in order to attempt to deny existence, one would have to use the concept of existence in his denial, which is a *contradiction*, which as indicated previously, is *indicative of an error*. All newer concepts are constructed by building from the ostensible concepts, which can be considered as building blocks to construct one's house of concepts. One can call the lowest ostensible concepts a concept of the first order. Each concept above that basic one can be called a concept of the *n*th order. All further concepts must be structured upon antecedent concepts, all the way back to the observable.

With this in mind there are some very important absolutes about a valid and useful definition. A definition cannot contradict any antecedents upon which it depends and it must be internally consistent. That means it cannot contradict itself. If it does it is indicative of an error.

The simplest definition of "true" is "that which is observable." but it needs further clarification. Such a definition means:

1. observable to the five senses AND
2. it must be able to be tested for truth by repeated observations AND
3. one must be able to apply the definition of truth to an aspect of reality and achieve a successful result. This is extremely important, for it brings the concept of "purpose" into the picture.

For example, if all observers see a stick bend in water, it is at first glance perfectly logical to assert “all objects bend when placed under water.” However, if you touch the stick while it is submerged, it feels straight. Here your sense of touch comes into play as another one of your senses. Which sense do you trust? Further investigation is necessary. Upon further analysis, man learns about the nature of light and can determine that the stick does not bend and furthermore can explain the phenomenon of the visual effect of the bending stick.

Now let’s apply “purpose” to the discussion. If one were to accept as true that objects bend when submerged, one should be able to build ships that are bent so that the water will bend them back into a straight alignment once launched. None of us would care to cross the Atlantic on a ship built on such a principle. The *purpose* of gaining the knowledge concerning the refraction of light, and ship building in this example, is to utilize the knowledge as a tool for constructing a ship.

Another tool for establishing knowledge is called the *sylogism*. A conclusion, in order to be considered correct must be based upon true premises and a valid thought process. The word “true” has already been discussed. If we study the sylogism we find another way of developing truth. A valid conclusion is one that logically follows from the statements. The conclusion is actually a tautology, which means that it is actually a combination of the statements stated in another way. It is a substitution of equal things. Youngsters study this in high school geometry when they learn “things equal to equal things are equal to each other”. The study of geometry is not just a mathematical endeavor. It teaches how to use one’s mind in a rational manner.

What is now relevant is that once one comes to a correct conclusion by this sylogistic method, that same conclusion can then be treated as a new truth. It is as true as the original truth from which it has been derived. One may call this kind of truth a truth of the *n*th order, as opposed to a truth of the first order, established through the five senses. For example, the following is a sylogism:

1. Liberty U. only allows Americans to attend the college (Verifiable)
2. John goes to Liberty U. (Verifiable)
3. Therefore, John is an American

One does not have to observe John or ask him if he is an American. The sylogism tells us. Of course, John could have lied or falsified his papers when he enrolled in Liberty U. But if he did, it means that statement #1 was false, which would make the conclusion incorrect. But assuming that statements 1 and 2 were verified, the conclusion remains true. At this point we can now use the above conclusion in another sylogism as its first statement, as follows:

1. John is American (already established as true in the above syllogism)
2. All Americans have birth certificates (Assume this to be true)
3. Therefore, John has a birth certificate

The purpose of a syllogism is to come to correct conclusions or truths or absolutes. It does not deal with relative relationships. It cannot do so. For example:

1. Some Americans have birth certificates
2. John is an American
3. Therefore the only conclusion that can be derived from the first two premises are that John may or may not have a birth certificate

This conclusion is the only possible one. It gives us no useful information since we could have concluded the same thing without the syllogism. The purpose of science is to establish truths and absolutes about the real world so as to expand one's knowledge. Knowledge is the most fundamental tool available to man in order to obtain his most precious goals in life, namely peace, freedom and prosperity. It is the tool of all tools. The misapplication or the non-application of these tools can only result in disaster for the human race.

When a math teacher points out in Euclidian geometry that "things equal to equal things are equal to each other" or an economist points out that "as the money supply increases, so does the general price level" or "one cannot get out of debt by borrowing more" the math teacher and the economist are utilizing the same general thought process. When a sociology professor teaches that theft is defined as the taking of someone else's property without their permission and points out that the "redistribution of wealth" by a government is the same act as stealing, a rational thought process is being invoke. The syllogism is as follows:

1. Theft is the taking of property without the permission of the owner
2. The redistribution of wealth by government is the taking of property without the permission of the owner (ask the owner)
3. Therefore, the redistribution of wealth by government is theft

The Scientific Method is another tool by which man expands his knowledge. It is structured as follows:

1. observation (data gathering)
2. hypothesis formation (making an unproven generalization)
3. extrapolation (prediction in a new area)
4. observation (for corroboration)

Once corroboration is established by many successful applications, one calls it a theory. Once it is called a theory, one can use it as a truth in a syllogism or as a premise in the application of the Scientific Method to derive a more advanced theory.

To recapitulate, there are basic methods to establish truth:

1. through observation and all that it entails
2. use of the syllogism
3. use of the scientific method

The astute observer will notice that they are all variations of the same theme; the same thought processes, but it all begins with the five senses.

One might ask, "Haven't there been theories in the past which, in light of further knowledge have been proven to be false?" The answer is emphatically "no" since a theory is a proven hypothesis which has been corroborated by successful application. There have been *hypotheses* that were proven to be incorrect and therefore never made it to the highly esteemed level of a *theory* and never had any utility. For example, Aristotle's Law of Falling Bodies was an untested hypothesis that was accepted as true for 2,000 years. It stated that in a vacuum, heavy objects fall at a faster rate than lighter objects. Nobody questioned it, just like most people do not question many other superstitions that pervade the mass hysteria of society. People accepted it because Aristotle said it was true. Once it was put through the mechanism of the scientific method it was proven to be false.

Newton's Law of Gravitation and Motion are examples of true theories because they satisfied the test of the Scientific Method and as final proof, had utility. Einstein's Theories of Relativity went beyond Newton but did not invalidate Newton's theories. In fact, Newton's Laws are just a special case of Relativity Theory. We do not say that Einstein proved Newton wrong. If we thought that way we would have to deny the existence of refrigerators, airplanes, automobiles, rockets, penicillin, x-rays and the successful prediction of eclipses.

The position that "there may be other realities" is a common one today, especially with the onslaught of the popular beliefs in astrology and reincarnation. Knowledge starts with observables through the five senses and deals with these observables in a specific manner. To postulate knowledge starting with un-observables and dealing with un-observables (another reality) is to demonstrate that one does not understand the nature of knowledge and that one has not understood the concepts that have been previously discussed here. If one still says, "but what if there is another reality anyway," one is implying that there is some knowledge to gain from it. All one can do is postulate it. If one were to be *consistent* in his behavior concerning the possibility that there is another reality, his behavior would be such that he would be diagnosed as a schizophrenic. Such a person would have to be

out of touch with the only useful reality.

If I were to tell a student that two angles that are equal to a third angle are equal to each other, and explain why it is true and explain the concepts that can be extrapolated from them, the student might become curious and ask further questions that would lead me to teach him more geometry which could lead him to a career in architecture. However, if the student told me that his dead aunt is presently standing before us and I do not see her, what can I possibly do with that information? Of what use is it to me? I cannot claim it as my "knowledge"! He nor I can use it as a basic concept on which to build a hierarchy of knowledge for ourselves. The student cannot even claim it as knowledge for himself, since it does not meet the criteria of what constitutes knowledge. Of course he can claim it as his knowledge in his reality but it is as if nothing were said. It has no meaning. Furthermore, if the student were given an order by his dead aunt to fly an airplane into an office building full of people she despised or to donate his heart to a stranger who needed a heart transplant, it would be an act of insanity to comply with such orders.

There are only 3 possibilities of explanation behind the claim that one's dead aunt is present, when only the claimant sees her. He is lying, he is kidding or he is actually seeing a simile of the dead aunt. If it is the latter case, further investigation becomes necessary. It is premature to come to the conclusion that such a manifestation is clear evidence that "another reality" exists and the aunt is trying to make contact. Why do most people who have such extraordinary experiences automatically jump to the most unlikely explanation? Why isn't the hallucination explanation more acceptable? Hallucinations are real. They are *actually seen* by those who claim to see them. People do experience them globally. They have powerful affects upon those who experience them. They are perfectly natural phenomenon that can be explained as one of the faculties of the human mind. Explaining an hallucination as a *normal* but *unusual* functioning process of the human mind does not make the experience any less important to the viewer, does it? Why is there a need to explain it any other way or in terms of "some other realm?"

The position that it is impossible to apply science to human action and interaction is an understandable one if one thinks of science in a very narrow and limited sense. Scientific thought is simply the name given to rational analysis. It utilizes the scientific method to solve the problems of the universe with respect to Man. It discovers truths, absolutes and natural laws and integrates them so that man can conquer and understand his environment. Once one understands the nature of science in its widest sense, (as I have attempted to explain here) one should see that to say that science cannot be applied to the social and political realm is to say that the problems of man are not part of the universe; that human beings are not part of the natural world; that there are no natural laws or principles pertaining to man; that man has no nature. To exist having no nature is a contradiction in terms. Anything that has no nature has no existence.

What one usually means by such a statement is that *the person making the statement* cannot successfully apply rational analysis to solve social and political problems and therefore it must be impossible for anyone else to succeed at it. What gall! Such was the attitude of those people who said that it was impossible for man to fly or travel to the moon or sail around the world before it was an accomplished fact.

A variation of the statement that you can't apply science to human action is the claim that "people are emotional, neurotic, and irrational and therefore they don't behave rationally and morally; in fact they refuse to behave that way; they are not interested in these ideas; all they care about is their whims, hopes, desires and money." This argument is difficult to respond to but I shall try.

First of all, it would be far better for the person making that statement to stop concerning himself with the behavior of those significant others who behave irrationally and start working on his own self improvement and think about and integrate the ideas expostulated here. In such a way he can set an example for others to follow. If the rational and morally acting person can profit from such behavior and others can see the profitability in similar behavior, a better world will result.

Our present social calamity is simply a disease. It has symptoms (witness the present decay) and it has a cause, like all diseases. It is man's task to discover the cause of this disease in order to effect its prevention. You will find that any disease, for which no cause has been discovered, has no consistent cure. In fact the only "cure" for a disease is *prevention*. We would all prefer not to contract a disease at all rather than contract it and then be treated for it. Polio and smallpox are a good example. None of the treatments for these diseases were consistently or predictably successful for centuries. However, once the cause was discovered, the prevention was innovated and the diseases were eliminated from those people who followed the prevention technology. To be consistent, the person who does not want to look at the possibility that our social problems can be solved through science would have to refuse to take the polio or smallpox vaccine because it cannot cure the people who already have it or because some irrational people refuse to take the vaccine. Of course, such a position is a confirmation of one's own irrationality.

Neurosis and irrationality too are social diseases as much as polio is a disease. In most cases the cure is simply better education, which the present State cannot furnish to the population. (That is a topic for another article). Jonas Salk and Edward Jenner respectively, did not discover a cure for polio and smallpox. They did even better. They discovered the prevention. Many clichés are incorrect but there is one that is fitting here, "an ounce of prevention is worth a pound of cure." If one wishes to cure our social problems, the same tools as outlined above must be utilized, in spite of the neuroses and irrationality of many people. Remember, the majority of the people in Europe during the time of the Inquisition believed that "the plague was caused by witches and warlocks consorting with the devil."

That certainly was a form of neurosis and irrationality, squared. How is it that we no longer burn witches to cure disease in spite of the neurosis and irrationality that still runs rampant in our world? Perhaps, in spite of the neurosis and irrationality in the world, we can also eliminate war, poverty, homelessness, economic depression, inflation, crime and slavery. It can only be accomplished using those same tools—the tools outlined in this article.

This discussion has demonstrated only a fraction of the subject of epistemology (How do you know what you know?) but it is a starting point for the intellectually curious to pursue. In addition, the article did not delve into the specific steps required to solve many of the world's calamitous problems since that requires an entire book on the subject in conjunction with the dissemination of the information in a classroom setting. That information is available to those who are interested. Just ask me for referrals.