Nature of Social Science

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Abstract—In the history of philosophy of social science, there were two different dominant approaches in making sense of social science. The first approach is dubbed as humanist which claims that social life cannot adequately be studied scientifically while the second approach is dubbed as naturalist which claims that social life can be adequately studied scientifically using the methods of natural science. The problem with these two approaches is that each claims to be the only right approach. As a result, an adequate philosophy of social science is found wanting.

This paper seeks to address that problem by trying to develop an adequate philosophy of social science in making sense of the following three important questions which neither the two approaches of humanism nor naturalism is capable of answering because of their assumptions. The three important questions are: First; what is the relationship between interpretation and explanation in social science? Second; what is the nature of social scientific theory? And third; what is the role of critique in social science?

After giving sense to those three important questions, the paper concluded that there are truths found in the two approaches. The paper also ends in an attitude of optimism about the future of social science whether the phenomenon of singularity, which means humans and machine may combine, will happen or not in the near future.

Keywords—humanist, naturalist, social ontology, critique, singularity

1. Introduction

Science in the term "social science" generated hot debate in the history of philosophy of science. To have a better understanding of the nature of social science, the term "science" should first be clarified. But then, defining 'what science is' is very difficult since there are various scientists in various disciplines using various methods. Also, an encompassing historical definition of science escapes us because in each period what counts as science is different. But for Malcolm Williams, science can be seen as the ensemble of knowledge and practices that best reflect and operationalize a critical attitude to the discovery of the world at that moment in

Fernando M. Lopena Jr., MERVE, MPR University of the Assumption Philippines time. Under that rubric, the very worst natural "science" would not be science, but much of the better social science would be (2000, 26). Amidst all the complexities in the term "science," understanding what science is, is important basically for 2 reasons. First, science possesses enormous "rhetorical authority" in contemporary society. It is even seen as "king". In the credibility stakes it has beaten out global icons, politicians, and even God. To assert that "x has been scientifically proven" carries more compulsion to belief than any pronouncement to the contrary by Michael Jordan, Barack Obama, or even the Pope. Second, science's rhetorical authority is deserved! There are very good reasons why we should accept its claims to knowledge. It has a well-established track record of being a good way to find things out about the way the world works. (Potter 2000, 5 & 7)

The term science in "social science" is very important since it can spell the difference in funding for social research. So what is social science? What are the disciplines included in the term "social sciences"? The first question is a characteristically philosophical question, examining the assumptions and presuppositions of an area of human activity. The notion of social science is not as clear-cut as might be first imagined. The second question seems easy to answer, that is, to give a list of would-be social sciences. Sociology and social anthropology would inevitably be on it, as would such subjects as politics and economics. History has been debated upon if it is really a social science but since it studies the interactions of humans in society although it confines itself to the past, I think it is a social science. Psychology also has been debated upon if it is a social science since it concentrates on the individual rather than on his or her place in the wider group. Most people would accept it as a science but would wonder about its qualifications as a social one. On the other hand, theology has also been described sometimes as a science and on occasions even claimed to be "the queen of the sciences". If we will have the assumption that "social" qualifies "science" in the same way that "physical" or "natural" do, then I think theology would be out of the picture for science since its function lies in studying something that transcends human experience. (Trigg 2001, 1-2)

There has already been considerable disagreement over whether the social sciences should follow the methods of natural sciences and share their assumptions. Are they to uncover the laws governing human behavior and explain its causes? This is to assume that the social world is indistinguishable from the natural world in important respects and may even be reducible to it. Many philosophers point out that the social world is constituted by the meanings and purposes of rational agents. The function of a social science is then to interpret and render intelligible rather than to invoke causes. People are different from physical objects and must be



understood differently. This approach has been dubbed "humanist", as opposed to the "naturalist" approach of those taking natural science as a model. It has been alleged that each side focuses on part of the truth. For instance two writers about the social sciences say:

"These sciences are *social*, which is to say that the phenomena they study are intentional phenomena, and so must be identified in terms of their meanings. Secondly, these sciences are *sciences*, in the sense that they try to develop systematic theories to explain the underlying causal interactions among phenomena of a widely divergent sort. Because they each fasten on only one of these features, humanism and naturalism fail to provide an adequate account of social science." (Trigg 2001, 2-3)

So, the questions now are "what is really the nature of social science?" "How can we have an adequate philosophy of social science?" When I say "philosophy" in philosophy of social science, I mean trying to answer the deep questions underlying social science. Those are the main questions that this paper will try to shed light upon.

п. Statement of the Problem

To shed light upon the question "What would an adequate philosophy of social science look like?" this paper will try to answer questions which neither the two positions of naturalism nor humanism is capable of answering. The "naturalist" view holds that social science involves no essential differences from the natural sciences, and the "humanist" view holds that the social life cannot adequately be studied "scientifically". The questions are:

- 1. What is the relationship between interpretation and explanation in social science?
- 2. What is the nature of social scientific theory?
- 3. What is the role of critique in social science?

III. Body

1. What is the relationship between interpretation and explanation in social science?

To answer this question, I will use the model of Martin Hollis in his book "The Philosophy of Social Science" with a bit of modification which is as follows:

Table I

	Interpretation	Explanation
	(humanism)	(naturalism)
Holism	Games	Systems
Individualism	Actors	Agents

At the top of this model are the 2 views on the nature of social science which are first the humanist view which focuses on interpretation and the naturalist view which focuses on explanation. At the left side of the model are the words Holism and Individualism. Holism refers to an approach which

accounts for individual agents by appeal to some larger whole. In other words, in holism we can say that the structure determines the action (top-down). On the other hand, individualism refers to an approach which accounts for structures by appeal to individual agents. In other words, in individualism we can say that the action determines structure (bottom-up). The term 'game' under 'Interpretation' refers specifically to the rules of a game. The rules of a game not only regulate how it is played but, more importantly, define or constitute the game itself. Moves in a game have meaning only within the rules. The game absorbs the players and if players only do what is socially expected of them, then we can also explain and predict their behaviors just like in the naturalist tradition. The term actor under 'Interpretation' refers to the players constructing the games of social life through their purposes and the meanings that they attach to their actions. The term system under 'Explanation' means a complex whole (economic, legal, political structures, etc.) that explains and predicts the actions of individuals. The term agent under 'Explanation' means that the actions of individuals explain and predict the whole history of society.

In this model, I want first to say that Holism and Individualism are just like 2 sides of the same coin. In my perspective, they constitute a single whole. We cannot really say one is correct and the other is not. Society influences us and with our own unique nature, we also in a way influence society. We cannot really accurately say the degrees of influence but I think it will be different for everyone.

Under the humanist view which focuses on 'interpretation', we should remove the line that separates 'games' and actors. To make my point clear here, I want to use an analogy in the form of the game I love most, chess. There are only 2 players in the game of chess. Each player has 16 pieces which is composed of 8 pawns, 2 rooks, 2 knights, 2 bishops, a Queen and a King. Every piece can only move in particular way and the goal of the game is to kill the king of the opposing team in any strategy. The actions or moves in the game will only have meaning within the rules. A move of a knight in the game can mean trying to gain central position or to advance an attack or to sacrifice within the context of the game. Although the knight cannot move in any direction it likes because in the game, it can only move in an "L" shape, still it can create its own history under the conditions of the game. In the same way, the actions that we do will only have meaning within the context of our society. For example, the act of getting the hands of elders to our forehead in the Filipino context means respect to elders. There are also expected roles that we should do like the roles expected in being a man or a woman. Although we cannot get away with the context of a society, we also shape it in return as actors in varying degrees by the intentions or purposes we put in our actions. So in a way, there is also a causal relationship in the humanist view of social science but I think the causal relationship from the actors to the game is a very weak one.

Under the naturalist view which focuses on 'explanation', we should also remove the line that separates systems and agents. Indeed the structures of our society have a great impact



to our behavior but they are not sufficient condition for the explanation and prediction of the actions of individuals. On the other hand, studying the laws of nature of individual man as Mill would put it is not also a sufficient condition to explain and predict the whole history of society. There are just so many factors to consider in between. Studying the social world is very much different in studying the natural world. People must be understood differently and we should not treat them like things to be studied. But then, I think it is important to emphasize that there is influence coming from structures towards our actions and our actions towards structures.

Now that the line between games-actors under the humanist view and the line between systems-agents under the naturalist view are removed, an important question arise which is: Can or should we also remove the vertical line that separates 'Interpretation' and 'Explanation'? I think the answer is not 'we can' but rather "we should" to have a correct understanding of the nature of social science. Although both interpretation and explanation should be done, I think the first thing to do is interpretation before explanation. Whatever will be the results of interpretation will have significant impact on explanation. For example, I remember a movie entitled "The 3 Idiots" where one of the characters there hanged himself to die in the school dormitory where he was studying engineering. The act of hanging oneself to die can be interpreted in 2 ways. The first one is it is suicide because he was the one responsible for his death. With this interpretation, the causal explanation can be because of social disintegration or deep depression or he already felt hopeless. The 2nd interpretation was proposed by the main protagonist of the movie named Rancho who told his Professor in the movie whom he thinks is one big factor for the death of his schoolmate. He proposed that it is not suicide that caused the death of his schoolmate but rather it was murder. With this interpretation, the causal explanation will be different. The explanation can be because of the unreasonable pressures that the school imposes on its students or the lack of consideration and sensitivity of the professors. With this relationship of Interpretation and Explanation, it is very important to have a good interpretation for us to have good starting point for a good explanation. So if the interpretation is already wrong, the explanation will also be wrong. So an important question should be addressed, that is, "What are the criteria for a good interpretation and for a good explanation?" In the book "Introductory Readings in the Philosophy of Science" where Klemke and company are the editors, it was stated there that good interpretation is one which demonstrates the coherence which an initially unintelligible act, rule, or belief has in terms of the whole of which it is a part. But then in this idea, there is an assumption that the beliefs, practices, and actions which one encounters are congruent with one another as they are explicable which doesn't always happen in social life. So a good interpretation should be able to take into account the possible irrationality and the possible nonrationality aside from rendering intelligible the act, rule, or belief in terms of the whole of which it is a part (1998, 183). On the other hand, the criteria for a good explanation I think should have the necessary and/or sufficient conditions or

events which produced the phenomena in question. I have this hunch that another criterion for a good explanation is always to have in mind an "x-factor" that would account for the action. What I mean by "x-factor" is something that is beyond the ability of man to see as the cause of something especially in the social world. Deterministic causal explanations do not seem to be possible in the social world and maybe also in much of the physical world. Social world at best may only be probabilistic (Williams 2000, 68).

2. What is the nature of social scientific theory?

To answer this question, I will use a model taken from the article of Margaret S. Archer entitled "Social Theory and the Analysis of Society" in the book edited by Tim May and Malcolm Williams entitled "Knowing the Social World," which is as follows:

Table II

Social Ontology ≡ Explanatory Methodology ≡ Practical Social Theory (SO) (EM) (PST)

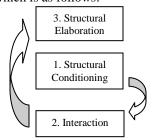
This model is based on three premises which are (1) 'all knowledge is conceptually formed' which maintains that some concepts are better than others for portraying reality and that the nature of social reality itself imposes limits on its conceptualization; (2) 'society is an open system' which implies abandoning total predictive laws but not to throw away explanation of why things are so and not otherwise at any given place and time; (3) regularities are important but more important is the generative mechanisms which produce them because if these can be identified, the systematic effects they do produce and also the contingencies which intervene to mask them or even to suspend their powers will be accounted.

The 3 given elements in the model (SO, EM, PST) have mutual connections. Where the relationship between SO and EM is concerned, the connection consists in maintaining that what is held to exist must exert an influence upon how it should be explained. I relate SO to 'Interpretation'. As I've mentioned in my answer to the 1st question, whatever our interpretation to something will have significant impact to our explanation. That's why, we really need to understand the mechanism of interpretation under SO. Interpretation starts on how we observe something. But then, observation is theoryladen which means that observation is never neutral because our observation is always shaped by our prior experience, background habits/beliefs, theoretical assumptions, and expectations. I think this is what is meant by the 1st premise of the model, that is, 'all knowledge is conceptually formed'. To add complication to the mechanism of interpretation, the objects of our observation are not just physical things but mainly the social world where human beings are participants who have consciousness. With these complications in mind, I can understand the humanist view that social life cannot adequately be studied scientifically. But then, we have to take into consideration that there is a social reality and our interpretation at times can be correct (at least partially in the



sense that I think we can never have complete account of anything especially in the social world).

So the Social Ontology (SO) endorsed does play a powerful regulatory role to the Explanatory Methodology (EM) for the basic reason that it conceptualizes reality in certain terms, thus identifying what there is to be explained. On the other hand, the shaping of Practical Social Theories (PSTs) is demanding great knowledge, study, or insight. The nature of different social ontologies and their associated methods of explanation are manifestly stronger at a particular level of PST or with specific time spans. Indeed, after 'Interpretation' and 'Explanation,' there can be a formulation of a theory. So it follows that if we will have a wrong interpretation, we will have a wrong theory. But then we have to know that the relationship between SO and PST is one of reciprocal regulation (feedback). That's why we should not simply gather up the fruits (the PST findings) which stem from different ontological assumptions as transmitted through their cognate explanatory methodologies. Since it all starts on Social Ontology (SO), we need to have a clear understanding on the nature of social reality. To illustrate the nature of social reality, I will again use a model taken from the article of Margaret S. Archer entitled "Social Theory and the Analysis of Society" in the book edited by Tim May and Malcolm Williams entitled "Knowing the Social World," with a bit of modification which is as follows:



The model begins with the important premise that social reality which constitutes both 'individual' and 'social structures' do not have primacy over the other in the sense that either one is the ultimate constituent of society. We should see the interplay between them and at the same time their own irreducible emergent properties, possessed of relative autonomy, pro-existence and causal efficacy. In other words, there is what we can call the inseparable mutual constitution of the 'individual' and 'social structure' or to use the term in the 1st question, 'agent' and 'system.' This we can call analytical dualism because the 2 elements are interdependent but necessarily examined dualistically because the irreducibility of their properties entails investigation of their interplay. With this in mind, let us now proceed to the model.

The model begins with structural conditioning. In here, the systemic properties are viewed as the sum total consequences of past actions. They exert causal influence upon subsequent interaction and they do this by shaping the situations in which later generations of agents find themselves. The effects of past actions can be constraining or facilitating influences upon agents. Agents will have to deal with that.

The next part of the model is social interaction which is structurally conditioned but never structurally determined since agents possess their own irreducible emergent powers. I want to emphasize that. It is because if we are structurally determined, then we have no freedom anymore. We are just structurally conditioned which means that there are just influences no matter how strong they are that can be transcended in a sense. The influences can take in the form of frustrating or rewarding contexts for different groups of agents depending upon the social positions they occupy. But then as emphasized already, these are just conditioning in that they force no one but simply set a price to whatever actions that we will do. That's why we have what we call 'criminals,' 'deviants,' 'sinners,' etc. proposed by society. On the other hand, since conditioning is not determinism, the middle element of the cycle recognizes the promotive creativity of interest groups and individuals to incorporate their capacity for innovative responses in the face of contextual constraints.

The last part of the model is structural elaboration which is the result of social interaction that is interpreted as being a largely unintended consequence. It is because the combination of previous structural properties and the emergent powers of agents will result differently in different contexts. Oftentimes, it is observed that the result is what no one sought or wanted. In here we can see the 2nd premise of the 1st model of the 2nd question which is 'society is an open system' which refers to the non-predictability of change in open systems. The end point and the whole point of examining any particular cycle is that we will then have provided an analytical history of emergence of the problematic properties under investigation. The last part of the model which is 'structural elaboration' also signals the start of another cycle. It is because the elaborated structure constitutes new conditional influences upon subsequent interaction, and the concepts and theories we employ to deal with this new cycle may well have to alter in order to cope with the transformation which our subject matter has undergone. That's why I shaped the model into a spiral to propose the idea that the cycle never ends and the chance that progress really is happening. So with this, we can say that the nature of social reality is transitivity which in my understanding is that society is always effecting transition or passage from one place, action, or condition to another. In other words, society is always changing. It is always in motion. So in essence, theories should always be transformed to capture the radical and unpredictable reshaping of society which is referred to as morphogenesis which means society has no inbuilt preferred state but is shaped and reshaped over time, assuming unpredictable forms.

With these 2 models in mind, I think an important question that needs an answer is "how can we know if a social theory is accurate at a given place and time?" Before trying to give an answer to this important question, I want first to clarify the meaning of theory because it can be used in many senses. Since we are dealing with the social world here, I want to use a definition of theory coming from a sociology textbook which is, "A theory is a statement that organizes a set of concepts in a meaningful way by explaining the relationship between



them." The widely accepted criteria for what counts as a good scientific theory are extensive, fecund or fruitful, predictive and explanatory, simplicity, plasticity, coherence, and quantitative (Boersema 2009, 99-102). I want to interpret the last criterion of a good scientific theory as something that can be falsified. Going back to the question, "How can we know if a social theory is accurate at a given place and time?" I want to use as an example the famous sociological theory of Emile Durkheim on egoistic suicide. His work on "Suicide" was done in 1897 and his sociological theory on egoistic suicide can be stated as, "A higher degree of individualism in a social group causes a higher rate of suicide in that group." 'Individualism' is a variable which means there is less integration in society and it favors free action by the individual. To test if this theory is correct, we need to state the empirical statement/s that can be derived from the theoretical statement. After stating the empirical statement/s, we can test it/them if it/they is/are true through observation. For simplicity, let us call the theory "A" and an empirical consequence "B" and the symbol ≡ for "implies." Then we have the 2 logical situations:

Situation I Situation II $A \equiv B$ $A \equiv B$ B false B true

A false A more credible

If "B" as the empirical statement is "Protestants in France will have higher suicide rates than Catholics in France," then in situation I where it is false, the theory is automatically false also. On the other hand in situation II where "B" is true, then we have the conclusion that "A" which is the theory is more credible. But then this is a fallacy of affirming the consequent because even by intuition, we can feel the logical incompleteness of situation II because there can be a lot of other possible explanations for B. It can happen that there is a higher suicide rate of French Protestants because of their occupations or by the lesser emphasis on the sin of suicide in Protestant theology and so forth. So there should be other way to test if the theory is correct. We can call this other way "Multiple Tests of Theories" by adding derivatives to the theory and testing them if they are true to make the theory substantially more credible. The other derivatives aside from the one we have already mentioned which we will designate as B₁ are "Protestant countries will have higher suicide rates than Catholic countries" as B2, and "Protestant regions of Germany will have higher suicide rates than Catholic regions" as B₃. Assuming all these derivatives are true, then we have the following situation:

Situation III $A \equiv B_1, B_2, B_3$ $\underline{B_1, B_2, B_3} \text{ all true}$ A substantially more credible

With this situation we can conclude that the multiple test of a theory is more convincing than a single test but then again, it is not sufficient to say that the theory is already correct. So again, we need other way to test if the theory is truly correct. Another way is we will add a "Surprise Value" by having another derivative which is different like "Men with children have a lower suicide rate than bachelors and men without children." Assuming this is true again, then we have the following situation:

Situation IV $A \equiv B_1, B_2, B_3$ B_1, B_2, B_3 different/all true A much more credible

In this situation, the theory has implied different kinds of empirical statements as one about religion and one about marital status. And since the theory has stood up under a tougher test, it became much more credible than it was under weaker tests. But then again, the conditions set are still not sufficient to say without doubt that the theory is correct. This will lead us now to the "Fundamental Criterion of a Strong Test of Theory" which is about considering alternative theories which might be explanations of various phenome Bafinse the world. To illustrate this, we have the following situation:

 $A \equiv B$

Situation V A or (C,D,E,...,Q,R,S,...) $A \equiv B_1$ $(C,E,...,Q,S,...) \equiv B_1$ $D,R \equiv \text{not-B}_1$ $\underline{B_1 \text{ true}}$

D,R false (by classical logic)
A or (C,E,...Q,S...)
A more credible
(but also C,E,...Q,S... more credible)

In this situation, it is seen that there can be alternative theories that can explain the empirical statement and they should be expressed. In this instance, our empirical statement which is "Protestants in France will have higher suicide rates than Catholics in France" can be explained other than the theory of egoistic suicide of Durkheim like a kind of mental illness that led them to commit suicide. An important idea here is that as the number of similar tests to the theory increases, the number of alternative theories each new test eliminates becomes much smaller. Also by having two very different consequences of our theory, more alternative theories will be eliminated until we will be closer and closer to the correct social theories. (Stinchcombe 1968, 15-22)

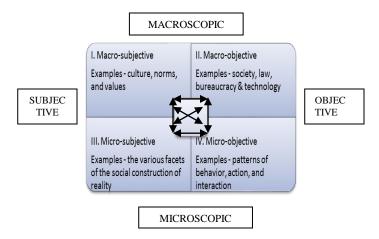
It is very important to state that the social ontology in the social theory of Durkheim on egoistic suicide is that it is "Collectivist" which insists that social structure is the ultimate constituent of social life. This means that for him, structure determines the action of individuals (top-down). We have already stated that part of the nature of social reality is that



there is an interplay between 'Individual' and 'Social Structure' in the sense that neither one holds primacy over the other. Both influence one another but they each have their own irreducible properties. Beginning with a wrong social ontology, we can already say that there is already something wrong with the social theory that he proposed. But then in elaborating how to test a social theory through accounting if the empirical statements are true through observation, I want to show that social theories exist although there are so many complexities involved in attaining the accurate social theory at a particular time and place. First, observation is theory-laden. Second, human beings who are participants in the study of the social world are all unique. We need to take into account their context and their intentions/purposes in their actions. Third, we need also to take into account the presuppositions of a given social theory. Amidst all these complexities but by knowing the nature of social reality and the problems involved in attaining an accurate depiction of the social world, I can say that social scientific theory is tentative in the sense that it is always dependent in a particular time and place since social reality is always in motion.

3. What is the role of critique in social science?

Critique is the critical analysis of something and in this paper, that something is the nature of social science. The humanist and the naturalist models cannot appreciate the question because of their assumptions. First, the humanist model which focuses on 'interpretation' has this assumption that the acts, practices, and beliefs encountered are coherent or in other words, rational at some level and understandable in its own terms. Secondly, the naturalist model which focuses on 'explanation' has this assumption that the social science involves no essential differences from the natural sciences. In other words, it assumes that the methodology used in natural sciences can also be used to the human sciences. But then, the question should be appreciated for us at least to be closer to an accurate depiction of social reality (if it is really not possible to have accurate depiction). To give an answer to the question, I will use a model taken from the book of George Ritzer entitled "Contemporary Sociological Theory" having in mind the nature of social reality and the nature of social scientific theory already proposed in the 2nd question. The model is identified as the "Major Levels of Social Reality" which is as follows:



In this model, there are 2 continua namely the

macroscopic-microscopic continuum (vertical line) and the subjective-objective continuum (horizontal line). In the macroscopic-microscopic continuum, we have the simple idea that social phenomena vary greatly in size. At the macro end of the continuum are such large-scale phenomena like the examples stated in level 1 (macro-subjective) and level 2 (macro-objective) of the model. At the micro end are the individual actors and their thoughts and actions (level 3 & 4). In between are a wide range of groups, collectivities, social classes, and organizations. On the other hand in the subjectiveobjective continuum, we have the idea that social phenomena have non-material and material existence. In the subjective social phenomena which exist solely in the realm of ideas, we have the following as the examples; mental processes, social construction of reality, norms, values, and many elements of culture (level 1/macro & level 3/micro). In the objective social phenomena which have a real and material existence, we have the following as the examples; actors, action, interaction, bureaucratic structures, and law (level 2/macro & level 4/micro). The problem with this subjective-objective continuum is that there are many phenomena in the middle that have both subjective and objective elements (examples are the family and the work world). A very important part of the model is what can be seen in the middle where the arrows point to all directions which mean that all the so-called levels of social reality influence one another in different degrees. Also, I want to emphasize that this model is just one among the many models that social scientists developed to deal with social reality. In reality, we can say that the social world is not really divided into levels. It is best viewed as an enormous variety of social phenomena that are involved in continuing interaction and change. It is really extremely difficult but not impossible to get a handle on such a large number of wideranging and mutually interpenetrating social phenomena. That's why models just like the one I've chosen to use here are developed for purposes of dealing with the complexities of the social world. With these things in mind, I think the role of critique in the social sciences is the crucial one. The role of critique is to help us get to the possible closest thing to reality (social reality). So without critique, we will just be in the "world of shadows" to use an idea from Plato.



To give an example, I want to quote Albert Einstein. In one of my readings in the past, Einstein was asked what he thinks is the most important question a human being faces. His answer was, "Is the universe friendly or not"? If the answer to this question is yes, then the person will most probably interpret everything around him in a good way like if he is having a hardship, he may interpret it as a blessing in disguise. On the other hand, if the answer to the question is no, then the person will most probably interpret everything around him in a bad way like if there is a hardship, he may interpret it as a punishment for the sins that he has committed. The answer to the question is what I want to call one of our core beliefs as human beings. It is like the character of "theory-laden" of our observation. It serves as a lens to how we view life. This is in the micro-subjective level of social reality. Now, this core belief didn't come from nowhere. It came from the complex interconnection of it to the other levels of social reality (microobjective, macro-subjective, & macro-objective). It can happen that this core belief can change through time because of the dynamic nature of social reality. Maybe one of the most important factors for this change in core belief is because of a great tragedy that happened in his family like his parents and siblings were all massacred. Because of the change in core belief, it can happen that he will become a criminal or a very bad person. Becoming a criminal can be the result of many things not only because his family was massacred like being addicted to war games in computer, addiction to movies with violence and sex (macro-objective), being involved in drugs (micro-objective), and being a member of a fraternity who praises violent behaviors (macro-subjective). Once a criminal doesn't mean being a criminal forever. An ex-criminal can be the next President of a country because of the unpredictability of the social life. My point in giving this example is that critique is very important to be able to be aware and if possible try to account for some changes in a person or to society in general influenced by complex factors.

An important implication in being aware of the complex influences of the different levels of social reality to a social phenomenon as a role of critique is being able to account for irrational and non-rational social phenomena which unfortunately are quite common. Examples of irrational phenomena are neurotic behaviors like compulsive handwashing, violent prejudicial behavior toward minority groups, recurring self-destructive patterns of social interaction, and so forth. Also, it happens that a person's selfunderstanding is mistaken and if we will just try to know how a person understands himself in formulating a social theory, then the theory will be wrong. And this can also happen in the societal level where the society misunderstands itself (wants vs. needs) and formulate a law. In cases of selfmisunderstandings, the social scientist attempts to explain such irrational phenomena by treating the actor's beliefs and desires as keys for something else that constitutes the actors' actual reason for acting, or the real need which they are trying to fill. For example, according to Rousseau, people desire wealth but what they really want is social distinction and money is just an expression of social distinction in certain societies. Also, Becker argues that people pursue sexual romance and contact because sex is a key for everlasting life but what they really want is to overcome the fear of their own death. To explain what causes people to mistake some purpose or object (wealth & sex) for what they really want (social distinction & eternal life), we can have Freud's notion of sublimation and repression. So with these examples, we can see how important it is to engage in a critique in which one lays bare the ways in which the ideas people have of themselves mask the social reality which their behavior creates, and in which one tries to demonstrate that the coherence of the relevant behavior occurs at a level so deep that it is beyond the capacity of the actors to appreciate it given the conceptual and emotional responses open to them. In doing this, the social scientist will have to make use of concepts and conceptual distinctions which in a basic way go beyond those operative in the social life which is being studied (Klemke et al. (eds), 1998, 184-186).

Another important thing is that in our use of the model of levels of social reality to critique social phenomena, we should avoid at all costs the simple identification of a theory or a theorist with specific levels of social reality. Although it is true that a social theory tends to focus on a given level or levels of social reality, it often is an injustice to simply equate the breadth of a work with one or more levels. Also, it is important to remember that the use of levels of social reality to analyze any theory or theorist tends to break up the wholeness, the integrity, and the internal consistency of the work. Although the levels are useful for understanding a theory and comparing it to others, one must take pains to deal with the interrelationship among levels and with the theoretical totality of the work of an individual or a school (Ritzer 1988, 400).

iv. Conclusion

Social science is very important. Since we are living in a society (no one is exempted), we need to know how society works. There would be no 'society' without 'us' and there is no 'us' without 'society'. We should always know the interplay. I am not sure if our society now is better than the past society. I am not sure if society really progresses. I am not sure of the right criteria to say that a society progresses or not. But one thing is sure, that is, if the nature of social reality presented here is right, then society is always in a state of transformation. It always changes. It is always in motion. That's why, social scientific theory in my understanding is just applicable in a particular context, that is, at a particular time and place. To know if a social theory is correct, we need to know the empirical statements derived and to do critique by using the model of the levels of social reality.

We need to know that social science is very complex. There are many problems encountered like observation being theory-laden, there are subjective elements in the object of study, and the social world is a combination of many different complicated elements. Because we are dealing with the social world, there are even things in the social world that cannot be expressed. They just "are". That's why sometimes honestly, I am facing the temptation in believing the humanist model, that



is, social life cannot adequately be studied "scientifically". But then, in trying to have an integral view, I know that there are 'many' objective elements in the social world and we can begin with these in trying to attain science in the social world. One thing that I relearned here is that we should never ever jump to conclusions especially in the social world. No matter how sure we are to something, we should always entertain the thought that we could be wrong especially since the social world is dynamic.

After doing this paper, I am optimistic to the future of social science. As the nature of social reality implied, society is always being shaped into something. There will always be something new. That's why theories should always be transformed to capture the something 'new'. Although we may not have the ability as humans to capture the whole social reality, I want to believe that we are becoming more intelligent as time goes by. I want to end with my thoughts on the talk of David Chalmers entitled "The Singularity: A Philosophical Analysis" at De La Salle University – Manila and its possible implication on social science in the future.

In my understanding, David Chalmers is proposing the idea that there's a very strong possibility that there will be AI++ in the future (absent defeaters). AI++ means that there will be intelligence far greater than human level in the future. And the path to AI is very possible because of the trends that are happening right now in our society. Technology is fastupdating. What is latest today will be old in just a few months. In an issue of a "TIME" magazine that I've read, it is even stated there that AI (Artificial Intelligence) will most probably happen in the year 2045. The author of that article in the magazine I've read is very convinced of his theory. If this will be true, in a post-singular world, it is very possible that humans will upload and enhance themselves through technical means to be equal in intelligence to these AI's. Actually, in the magazine it is even stated there that we can have the power to be immortal if the theory will push through in the future. Honestly, I do not know if this is something good or bad in the future. The nature of intelligence of this possible AI's is still unknown. There will be entirely new "being". I am thinking that in this future, maybe it is very possible with superhuman intelligence, we can have the ability to have an accurate depiction of the social world. The problems of the complexities of the social world can be solved. That is something to look forward to.

Even if there would be defeaters and the post-singular world will not be realized, I am still optimistic that social science will continue to get better as time passes by.

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About Author:



["We are structurally conditioned and not structurally determined. This implies that the middle of the life cycle where we are thrown as human beings recognizes the promotive creativity of interest groups and individuals to incorporate their capacity for innovative responses in the face of contextual constraints."]

