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Logicism of New Realism (1922)[1]

The discussion in this essay focuses on the so-called New Realist logicism in the most recent Anglo-American philosophy. As such, logicism (*lunli zhuyi* 論理主義) most certainly is not confined solely to the school of New Realism. Instead, it has to be recognized that, in Western philosophy, logicism not only represents one of its major factions, but also one of its traditional schools (*zhengzong* 正宗), a representative of which we could also consider Kant. At this point in the discussion, I shall first give a contrastive enumeration of the special features of logicism. In his expositions on Western philosophy, Zhang Junmai (張君勱) claimed that the former can be divided into two major schools: while the first school bases itself in life (*shenghuo* 生活), the second takes thought (*sixiang* 思想) as its starting point. I believe that, although no such completely strict distinction can be drawn between them, one can always say that there still exists such an opposition of two parallel systems of thought. I propose that these systems contrast each other in the following manner:

1 Zhang Dongsun 張東蓀. "Xin shizai lun de lunli zhuyi" 新實在論的論理主義 (Logicism of New Realism). *Dongfang zazhi* 東方雜志, 19(17), 15-34.

System A	**System B**
Logicism	*Psychologism*
Philosophy of thought	*Philosophy of life*
Stressing general form	*Stressing particular content*
Transcendentalism	*Empiricism*
Advocating rational knowledge	*Opposing rational knowledge*

Although this contrast does not exhaust all options, by using it one might still be able to understand the essential nature of logicism. Speaking about the contemporary schools of thought, those which belong to the latter category (System B) are (1) the school of pragmatism (*weiyong zhuyi* 惟用主義), (2) Henri Bergson (Bogesen 柏格森), (3) Rudolf Eucken (Woyikeng 倭伊鏗) and others, while the former category (System A) consists mainly of the ranks of German successors of Kant's philosophy, and as such is naturally rather wide-spread and active. This latter current includes members of the so-called Southwest German School [of Neo-Kantian philosophy] such as Windelband (Wendeerban 文得爾班) and Rickert (Likate 黎卡特), members of the Marburg school such as Natorp (拿托潑) and Cohen (Keheng 柯亨), as well as Husserl (Husaier 呼塞爾) who gave rise to an independent philosophical option. As far as the Anglo-American world is concerned, the followers of this school include only the members of the New Realist school. In this essay I intend to focus my discussion solely on the logicist aspects of New Realism – as regards New Realism as a whole, I shall perhaps discuss it in another text. In addition to a general description of its content, I also intend to present a criticism [of its main tenets]. And what was my motive for writing such an article? I wrote it because, recently, I became very interested in researching German Neo-Kantian philosophy. It came to my attention that Husserl has already been lecturing in England. I anticipate that in the Anglo-Saxon world Rickert's philosophy is bound to occupy a position of influence akin to that of Bergson. Aside from Bergson, the modern philosopher I respect the most is Rickert. But to introduce this philosophical current to China is not an easy task at all, mainly because deriving from logicism, the attitude that investigation of thought equals the investigation of the universe had never existed in the East. On the other hand, because, for several thousand years, the Chinese had been imperceptibly influenced by Buddhist philosophy, the task of introducing Schopenhauer, Nietzsche and Bergson was not so difficult at all. Since, after all, Eastern thought and the Anglo-American empiricist school do have some degree of interrelatedness, it is also rather difficult to get a grasp of the transcendentalist ideal(s). Therefore, instead of proceeding

from introducing Rickert's philosophy I shall rather set off by making a brief introduction from the perspective of the scientist notion of New Realism. There are two reasons for this: 1.) Because Bertrand Russell, the champion of New Realism, recently visited China, many people were able to attend his lectures. Which is also why a discussion about philosophy may attract much attention. Moreover, because to a certain extent many people have already been introduced to his philosophy, it may even be expected that they will be able to understand what I have to say. 2.) Because scientism is the basis of New Realism, by describing it one is more or less able to avoid implicating the abstruse realms of philosophy, which makes it easier for the people to understand. In addition to these two reasons, there also exists another, which is that, according to my view, New Realist logicism appears not to be as thorough as in the philosophical faction affiliated with Rickert. Therefore, I must set out by giving a preliminary account of this not so thorough [form of logicism]. Since my idea behind writing the present discussion was to present a prequel to my future introduction of Rickert's philosophy, as regards my plans to synthesize Bergson with Rickert, for now, this will have to wait for another day. Because this nevertheless is a great undertaking – fusing together the philosophy of life and philosophy of thought indeed is a heroic undertaking, although I do aspire to succeed in my endeavour, I am still quite afraid that my vital force will be inadequate for me to fulfil these ambitions. The original intent of this exposition was to deliver preliminary indications about this point. As to whether my elucidations are adequate and appropriate, I cannot rely solely on my self-confidence in this regard, and shall instead openly await everyone's criticisms. Lately, the number of people studying philosophy is increasing day by day. Apart from the growing number of various introductions, we will be naturally also able to see a gradual increase in the creation [of philosophical content]. Moreover, without the sufficient introduction [of Western philosophy], such philosophical production would be less likely to take place. This is why production and introduction are intertwined with each other. In order to inspire researchers, I prefer to advocate a form of introduction which often engages in criticism, blending one's creativity into the introduction bit by bit, which is the most apposite manner of raising the spirit of the scholar. One is naturally reluctant to say that we are able to deliver such [philosophical] creation; however, on the other hand, it is also unlikely that to carry out criticism would also be beyond our capabilities. If we want to give a thorough exposition on this philosophical current of logicism, then, naturally we cannot do so without giving a detailed exposition on the essence of Kant's theory. At present, however, our main focus resides on New Realism, which is why I intend to start with an exposition on Russell's

philosophy, mainly because Russell visited China. Nonetheless, even though in the one year of his stay in China he delivered a great number of lectures, I am afraid that not only do no students actually understand where the spirit of his philosophy really resides, but also that this is probably still not thoroughly understood by all my colleagues who are engaged in research into [Western] philosophy. While I do not dare to claim that I already understand Russell's philosophy, I can say that my understanding does not contain any misunderstandings. As such, I hope that I will be able to shed some light on this self-professed understanding of mine.

Russell refers to his own philosophy as both Logical Atomism (*lunli de yuanzilun* 論理的原子論) as well as Neutral Monism (*zhongli de yiyuanlun* 中立的一元論). What exactly is Logical Atomism? I am afraid that its definition is rather complicated! For now, I will have to divide this expression into two separate parts: one is "logical" and the other is "atomism". First, I shall explain the concept "logical". In so doing I cannot but to expound on the key points of the second lecture in Russell's famous work *Scientific Method in Philosophy.*[2] This book has already been translated by Wang Xinggong (王星拱). Although I have always greatly admired Wang's erudition, I am afraid that his translation of Russell's book is excessively unmethodical. (Since this article does not focus on criticizing Wang Xinggong's translation, I shall not raise specific examples from his text, but the manner of his translation can be quite easily recognized already in the first sentence, where Wang writes "every school of philosophy" (*gepai zhexue* 各派哲學) while in the original text there was only the word "philosophy" and there was no mention of "every school"; there is also his translation of the title of Bradley's book *Appearance and Reality,* which he translated as "*Maosi yu shizai* 貌似與實在". The use of expression *maosi* 貌似 in this context is extremely inappropriate. Wang further translated both Hegel's and Haeckel's name as Hege'er 赫格爾, which clearly causes the reader to think that these two were in fact the same person.) Consequently, in the present discussion I shall not quote from Wang's translation of Russell but instead offer a more precise version.

The second lecture in the abovementioned book is entitled "Logic as the Essence of Philosophy", which can be summarized in the following extract:

> In every proposition (*tiyan* 提言) and in every inference there is, besides the particular subject-matter concerned, a certain form, a way in which

2 Ed. Zhang refers to the collection of lectures originally published under the title *Our Knowledge of the External World – As a Field for Scientific Method in Philosophy* in 1914. Wang Xinggong's translation of the work from 1922 bore the abbreviated title *Scientific Method in Philosophy* (*Zhexue zhong zhi kexue fangfa* 哲學中之科學方法).

the constituents of the proposition or inference are put together. If I say, "Socrates is mortal," "Jones is angry," "The sun is hot," there is something in common in these three cases, something indicated by the word "is" (*shi* 是). What is in common is the form of the proposition, not an actual constituent. If I say a number of things about Socrates – that he was an Athenian, that he married Xantippe, that he drank the hemlock – there is a common constituent, namely Socrates, in all the propositions I enunciate, but they have diverse forms. If, on the other hand, I take any one of these propositions and replace its constituents, one at a time, by other constituents, the form remains constant, but no constituent remains. Take (say) the series of propositions, "Socrates drank the hemlock," "Coleridge drank the hemlock," "Coleridge drank opium," "Coleridge ate opium." The form remains unchanged throughout this series, but all the constituents are altered. Thus form is not another constituent, but is the way the constituents are put together. It is forms, in this sense, that are the proper object of philosophical logic.

It is obvious that the knowledge of logical forms is something quite different from knowledge of existing things (*xiancun de wujian* 現存的物件). The form of "Socrates drank the hemlock" is not an existing thing like Socrates or the hemlock, nor does it even have that close relation to existing things that drinking has. It is something altogether more abstract and remote. We might understand all the separate words of a sentence without understanding the sentence: if a sentence is long and complicated, this is apt to happen. In such a case we have knowledge of the constituents, but not of the form. We may also have knowledge of the form without having knowledge of the constituents. If I say, "Rorarius drank the hemlock," those among you who have never heard of Rorarius (supposing there are any) will understand the form, without having knowledge of all the constituents. In order to understand a sentence, it is necessary to have knowledge both of the constituents and of the particular instance of the form. It is in this way that a sentence conveys information, since it tells us that certain known objects are related according to a certain known form. Thus some kind of knowledge of logical forms, though with most people it is not explicit, is involved in all understanding of discourse. It is the business of philosophical logic to extract this knowledge from its concrete integuments, and to render it explicit and simple.

In all inference, form alone is essential: the particular subject-matter is irrelevant except as securing the truth of the premises. This is one reason

> for the great importance of logical form. When I say, "Socrates was a man, all men are mortal, therefore Socrates was mortal," the connection of premises and conclusion does not in any way depend upon its being Socrates and man and morality that I am mentioning. The general form of the inference may be expressed in some such words as: "If a thing has a certain property, and whatever has this property has a certain other property, then the thing in question also has that other property." Here no particular things or properties are mentioned: the proposition is absolutely general. All inferences, when stated fully, are instances of propositions having this kind of generality. If they seem to depend upon the subject-matter otherwise than as regards the truth of the premisses, that is because the premisses have not all explicitly stated. In logic, it is a waste of time to deal with inferences concerning particular cases: we deal throughout with completely general and purely formal implications (*hanyi* 涵義), leaving it to other sciences to discover when the hypotheses are verified and when they are not.[3]

The above excerpt can be found between pages 42 and 44 of the abovementioned book. On page 56 Russell goes on to state that:

> The above conclusion, of which we had an instance in the case of the inductive principle, is important, since it affords a refutation of the older empiricists. They believed that all our knowledge is derived from the senses and dependent upon them. We see that, if this view is to be maintained, we must refuse to admit that we know any general propositions. It is perfectly possible logically that this should be the case, but it does not appear to be so in fact, and indeed no one would dream of maintaining such a view except a theorist at the last extremity. We must therefore admit that there is general knowledge not derived from sense, and that some of this knowledge is not obtained by inference but is primitive.
>
> Such general knowledge is to be found in logic. Whether there is any such knowledge not derived from logic, I do not know; but in logic, at any rate, we have such knowledge. It will be remembered that we excluded from pure logic such propositions as, "Socrates is a man, all men are mortal, therefore Socrates is mortal," because Socrates and man and mortal are empirical terms, only to be understood through particular experience. The corresponding proposition in pure logic is: "If anything has a certain property, and whatever has this property has a certain other

3 Ed. Bertrand Russell (1914). *Our Knowledge of the External World – As a Field of Scientific Method in Philosophy*. London: George Allen & Unwin Ltd., 52-54.

property, then the thing in question had the other property." This proposition is absolutely general: it applies to all things and all properties. And it is quite self-evident. Thus in such propositions of pure logic we have the self-evident general propositions of which we were in search.

A proposition such as "If Socrates is a man, and all men are mortal, then Socrates is mortal," is true in virtue of its form alone. Its truth, in this hypothetical form, does not depend upon whether Socrates actually is a man, nor upon whether in fact all men are mortal; thus it is equally true when we substitute other terms for "Socrates" and "man" and "mortal". The general truth of which it is an instance is purely formal, and belongs to logic. Since this general truth does not mention any particular thing, or even any particular quality or relation, it is wholly independent of the accidental facts of the existent world, and can be known, theoretically, without any experience of particular things or their qualities and relations.

Logic, we may say, consists of two parts. The first part investigates what propositions are and what forms they may have; this part enumerated the different kinds of atomic propositions, of molecular propositions, of general propositions, and so on. The second part consists of certain supremely general propositions, which assert the truth of all propositions of certain forms. This second part merges into pure mathematics, whose propositions all turn out, on analysis, to be such general formal truths. The first part, which merely enumerates forms, is the more difficult, and philosophically the more important; and it is the recent progress in this first part, more than anything else, that has rendered a truly scientific discussion of many philosophical problems possible.[4]

Thus, in this place we can see what Russell advocates, which I shall try to explain in a simple manner. He believes that the each of the following propositions, (1) "Li Yuanhong is the president," (2) "The president is elected," (3) Election is a legal form of voting," and (4) "To vote is the right of the people" contains different key constituents, while the only universal thing conjoining these propositions is the copula (*xici* 繫辭) "is". Therefore, logic does not research the essential components of propositions – thus for example whether voting is the right of the people is studied by legal studies, but only questions the purity of the form "A is A". This kind of pure logic can be completely expressed by using symbols. "A is A" can, for example, also be expressed as "A=A". Consequently, Russell maintains that the subject-predicate form of old

4 Ed. Ibid., 66-67.

formal logic is inadequate, because in this way one can only express the qualities of things and not the relations between them. On the other hand, mathematical symbols, such as the expressions A < B and C < D, in his view can express relations. That is to say, he proposes that logical form ought to express relations. This school of pure logic reduces the universal form of thought down to symbols, which is why it is also referred to as "symbolic logic" (*fuhao de lunli* 符號的論理). Regarding the question why Russell maintains this view, no other explanations need to be added. In his book *English and American Philosophy since 1800* [ed. Arthur] Rogers (Luojisi 洛機斯) described the gist of Russell's theory in the following way:

> Now the common belief is that there is one real "thing" which the observer may view from different standpoints, each of these revealing to him a different "appearance" of the thing; for Russell's theory, on the contrary, the appearances are the sole facts that are real, and the thing is only that whole system of appearances of which each "aspect" of a thing is a member. A thing can thus be defined as the entire class of its appearances, including not only those appearances that are actual sense data (*ganjue zhangben* 感覺張本) to someone, but the *sensibilia* (*keganxing* 可感性), or possible sense data, which represent the appearances that *would* arise were a certain kind of observer in a certain relation to the object. These appearances are not in common space, … Each observer had only his own private space, and no place in the private world of one observer is identical with a place in the private world of another observer; the common space is, again, a logical construction from these private spaces.[5]

Rogers' commentary has already more or less completely described Russell's theory, but let us though take another look at Russell's own explanation:

> The final substance of the universe can neither be a material thing (*wu* 物), nor can it be the mind (*xin* 心), it is only the event (*shi* 事) … In universe nothing is more real than the temporary thing (*dongxi* 東西). … For example, when I lift this pencil, everyone can see it. Although what each of you see does slightly differ from each other, there still exist the same rules [for how something is seen]. In fact, pencil is an event, comprised of hundreds or thousands of perceived appearances. But what is seen is not limited to the human being, whatever is projected on a ceiling or a wall by a camera is also included therein.

5 Ed. Arthur K. Rogers (1922). *English and American Philosophy since 1800*. New York: The Macmillan Company, 435-6.

> The scope of "events" is very wide. Revolution, for example, is also an event. In physics, an "elementary event" (*jiben shi* 基本事) (also called an "event-point" (*shiduan* 事端)) denotes an event which cannot be further divided [into smaller events]. If this concept is applied in explaining matter, one can learn that a physical object consists of various different events. Let us take a table; after observing, touching, and moving it around I can then combine these sense events and turn them into a table. … But because in movement this table still conforms to the laws of dynamics, this still is the same table. Now, if the chair beside it would not conform to the any fixed laws, then it would not be possible to consider it together with the table as a part of it. When a symphony is performed, for instance, it constitutes a harmonic synthesis of various tones, which appear to one's ear as if they were only one single [flow of music]. A table is the same. Moreover, akin to symphony it is also a harmony of different segments, it also follows fixed laws. In the case of the table, however, these are linked together by logical method, in the same manner as a symphony is a harmony of tones, regulated with the help of an artistic method.[6]

Now I shall give a further summary of Russell's theory. In my opinion, he maintains that there are two worlds: one is the [the world of] sense data, a temporary world, and the other is [the world of] logical entities (*lunli de shiti* 論理的實體), which is permanent. Even though the world of logical entities is derived from the world of sense data, it still is a true world. He further maintains that sense data are non-material and non-rational and also both materially and rationally neutral. The logical entities are also neutral things, non-material and non-mental but also both material and mental. For example, consider a table in front of our eyes. Russell does not believe that the table is a concrete object (*shiwu* 實物) but merely a logical being (*lunli de cunzai* 論理的存在) inferred from innumerable "perspectives" (*guanxiang* 觀相). In other words, this table does not "exist" (*you* 有) factually but only logically. But the perspectives are not limited to humanity endowed with consciousness (*renshi zuoyong* 認識作用), an image of the table caught by a camera also counts as a perspective. For that purpose, a wide variety of new terms have been created in Russell's school of New Realism, such as *sensa* (*sensum*) and *qualia* (*qualium*) and so on, all in order to eliminate the antiquated *sensation quality*, which was weighted too heavily toward psychological subjectivity. Instead, he adopted Einstein's principle of relativity,

6 Ed. These are probably Zhang's own notes from Russell's lectures on the "Problems of Philosophy" (Zhexue wenti 哲學問題) delivered in 1921 in Beijing.

maintaining a relativity of time and space. Every single sense datum has got its own private space and time and has not just incidentally occurred within the common space-time. Russell's specious argument did not reside in his world of sense data, but in his world of logical being, because Russell attempted to merge these two worlds into one. In this regard, we must necessarily be aware that, even though the members of the school of New Realism keep considering themselves as realists, their realism is still also a logical realism. In other words, their theories and their so-called naive realism (*cupu de shizailun* 粗樸的實在論) are not necessarily identical. Naive realism presupposes that the table we saw yesterday is the same as the table we see today. In other words, in the external world there is only one single table, which we have seen yesterday, and which we also see today. Concurrently, we can also infer that there exists the possibility that we will see the same table tomorrow. Russell, on the other hand, does not agree with that. He thinks that that the table we saw yesterday and that which we have seen today are identical only in the logical space, because independent entities are all logical constructs. Therefore, we can say that in reality it is only a set of sense data, namely our sensations yesterday and today (seeing, touching, etc.) of the table. Aside from that, no entity exists, and the reason why it makes up an entity lies completely in logic. Yet sensation is not subjective at all, because sensation is pure experience (*chuncui jingyan* 純粹經驗) and precedes any divisions between subjective and objective. Thus, there exist two reasons why such teaching can be called realism:

1.) Undividedness of sense data into subjective and objective.

2.) Universality of logic.

Speaking about the first point, although we could use various terms, such as "sense data", "pure experience" or "pure perception", I believe that the most suitable expression which can be used to explain the undividedness of subjective and objective, and to distinguish what had not yet arisen, is the word "that". Although this word can be translated as *ci* 此, which is opposite to *bi* 彼, this is still an inappropriate translation. Consequently, I shall make use of the word *zhe* 这, in order to stay above the opposition between *ci* and *bi*. *Zhe* is the opposite to "what?", which I will translate as *he* 何. Therefore, I claim that this sort of philosophy is defined over two different worlds: One is the world of "that" and the other is the world of "what?" These two worlds are merged into one whole; namely, "that" is the material of the world and "what?" is its form. In other words, pure experience is the source material from which the world of logical form is constructed.

Since we have completed our brief account of Russell's main views, now we must also review the philosophical approach of the American New Realists. By and large, American New Realism agrees with Russell – though there also exist quite a few differences between them. Since at the present I am unable to focus exclusively on New Realism, it is only natural that I shall not describe it in its entirety, but instead deliver only an account on those points which are related to logicism. Apart from a book entitled *The New Realism* co-written by a few scholars,[7] the representative works of American New Realism also include [Edwin] Holt's *The Concept of Consciousness* and [Edward Gleason] Spaulding's *The New Rationalism*. As Holt wrote:

> Our starting-point, then, is not a world in which all is knowledge, but in which some part is knowledge, nor yet a world in which all is experience, as in Avenarius; our point of departure is a world of pure being.[8]

> Briefly to sum up, then, this sketch of what mathematical logic is; we have found that its subject-matter is systems of being (*shiyou* 實有) or, as they are often called, universes of discourse. Any system of being, if it is a coherent of true system, arises from a certain Given (*yi shezhe* 一設者) consisting of terms and propositions, which generate of their own motion all further terms and propositions that are in the system. The Given together with these latter are the system. The act by which the thinking mind explores those parts of the system that ensue from the Given is called deduction by logical necessity, or simply deduction.[9]

Spaulding also stated:

> The Realism which is accepted, defended, and explained in this book is one that is based on logical and metaphysical doctrines that are directly opposed to the logic and metaphysics of the Aristotelian tradition. The logic is one that has long been used in the development of modern science, but that has only recently been formulated as the logic of series (*xilie* 系列), or as the science of order (*zhixu zhi xue* 秩序之學), and that can be designated broadly as non-Aristotelian. The metaphysics is one that denies the universality of causation and of substance, and that emphasizes relations. On this basis it is found that the knowing situation is of such a character that the knowing process neither causally affects,

7 Ed. Edwin B. Holt et al. (1912). *The New Realism – Cooperative Studies in Philosophy*. New York: The Macmillan Company.

8 Ed. Edwin B. Holt (1914). *The Concept of Consciousness*. London: George Allen & Company Ltd., 86.

9 Ed. Ibid., 16.

> modifies, or creates that which is known, nor demands an underlying entity to mediate the relationship between knowing and its object. For this reason the position is called Realism.
>
> Rather, it is a Realism which insists also on the factuality and knowableness of entities that are neither physical nor mental, not "individual" in the usual sense of this term as meaning spatially and temporally particularized. All such entities may be called "subsistents" (*zhenyou* 真有) to distinguish them from the temporally and perhaps also spatially particularized "existents" (*cunzai* 存在). They include what are frequently called "universals" (*pubian* 普遍), and also "ideals" (*lixiang* 理想) such as justice, and still other entities, such as numbers, and the ideal systems of mechanics. This Realism is one which holds that the realm of such subsistents, as entities that are both knowable and yet independent of being known, is even more varied and extensive than the realm of existential entities.[10]

The above excerpts are Holt's and Spaulding's explanations of New Realism, but in order to find their notion of logicism, we have to look elsewhere in their work:

1. The new logic is opposed both to the psychologizing tendency, and to the pragmatic. The standpoint of the new logic is, that logical principles are present in entities, i.e., that they are objective. Toward them one takes the attitude of empirical procedure and of discovery. …
2. The old logic is a logic of substance (*zhi* 質) and qualities (*xing* 性) … The new logic is, in contrast, one in which these concepts, even if they are not given up entirely, play a minor part, and the concept of "relation" plays the major role.
3. The new logic emphasizes relational propositions, exemplified by "*A* is less than *B*."
4. The new logic consists largely of those principles which are discovered by the analysis of series. This means, again, that the new logic recognizes many types of relations which the old logic quite ignores. … Some of the most important types of these relations are the following: (i) Asymmetrical relations, …, e.g. *a<b,* precludes *b<a.* (ii) Transitive relations: e.g., *a<b, b<c* implies, *a<c*. Asymmetrical and transitive relations are recognised by the new logic as subsisting between individuals as well as between classes. … (iii) Correlating relations, e.g., between the men of a regiment and

10 Ed. Edward G. Spaulding (1918). *The New Rationalism.* New York: Henry Holt and Company, 10-11.

their guns, where one and only one specific gun is assigned to each man. … (iv) Functional relations … The entities that are functionally related are variables, and a variable is a series. …

5. The new logic solves the problems of "infinity" (*wuxian* 無限) and "continuity" (*lianxu* 連續) through its recognition of this principle of limits (*youxian* 有限) …
6. The new logic recognizes and uses the principles, that most wholes are of that type in which the parts are related non-additively to constitute the whole. This allows for different kinds of part in the same whole, each set of parts being related in perhaps a specifically different non-additive manner. (Translator's note: this means that the whole is not larger than its parts.)[11]
7. It results that one and the same whole may belong to different universes of discourse – to one, by virtue of one kind of part, to another, by virtue of another kind. Accordingly those characteristics of a whole that are relational result of one kind of part are not deducible from those that are the relational result of another kind.
8. The old logic accepts the principles of the inconceivability of the opposite (*xiangfan* 相反) and of self-evidence (*ziming* 自明) as norms of absolute truth; the new logic looks askance at these tests, and sets up propositions only as "postulates" (*shezhun* 設準) from which to develop consequences.[12]

For the most part, the New Realists notion of new logic is as stated above. In order to further confirm this, we will take another look at Russell's work *Scientific Method in Philosophy*:

> Traditional logic (*jiu lunli* 舊論理), since it holds that all propositions have the subject-predicate form, is unable to admit the reality of relations: all relations, it maintains, must be reduced to properties (*xingzhi* 性質) of the apparently related terms. There are many ways of refuting this opinion; one of the easiest is derived from the consideration of what are called "asymmetrical" relations. In order to explain this, I will first explain two independent ways of classifying relations.
>
> Some relations, when they hold between A and B, also hold between B and A. … If the colour A is unlike the colour of B, then the colour of B is unlike the colour of A. Relations of this sort are called symmetrical.
>
> All relations that are not symmetrical are called non-symmetrical. Thus

11 Ed. Original note by Zhang Dongsun.

12 Ed. Spaulding 1918, 173-5.

> "brother" is non-symmetrical, because, if A is a brother of B, it may happen that B is a sister of A.
>
> A relation is called asymmetrical when, it if hold between A and B, it never holds between B and A.
>
> Classification into symmetrical, asymmetrical and merely non-symmetrical relations is the first of the two classifications we had to consider. The second is into transitive (*chuandi de* 傳遞的), intransitive (*fei chuandi de* 非傳遞的), and merely non-transitive (*fan chuandi de* 反傳遞的) relations.
>
> A relation is said to be transitive, if, whenever it holds between A and B and also between B and C, it holds between A and C. … [Many] transitive relations [are] asymmetrical, but many transitive relations are symmetrical…
>
> A relation is said to be non-transitive whenever it is not transitive. Thus "brother" is non-transitive, because a brother of one's brother may be oneself. All kinds of dissimilarity are non-transitive.
>
> A relation is said to be intransitive when, if A has the relation to B, and B to C, A never has it to C. Thus "father" is intransitive.[13]

If we take a closer look at the above few excerpts, we can see that the chief object of New Realism is the notion of "relation", and this the New Realists attach utmost importance to this. They have coined a variety of terms to discuss this issue, also including the word *relatum* (*relata*), that is "relatedness" (*guanxizhe* 關係者). They claim that traditional logic only studies quality (性) and substance (質), expressing them in the object-predicate form. It also turns all relations into properties (*xingzhi* 性質). Thus, for example, the new logic maintains that "A is larger than B" is the relation between A and B, while the traditional logic considered it to be a property of A. As a matter of fact, they have changed all properties into relations. Here, we are bound to study whether it is actually possible to transform properties into relations. In my view, most properties can be turned into relations. Thus, for example, the statement "Socrates is an Athenian" does not convey a special property of Socrates, but rather a relation between Socrates and Athens (i.e. that he was born there). This is a rather obvious example. Another would be the proposition "Roses are red," which can also be understood through general relations. Because "red [colour]" is a concept, and not only one rose is red. This proposition reveals a necessary relation between roses and the colour red,

13 Ed. Russell 1914, 56-8.

which, expressed formally, equals A=B. Why do we need relations to explain the properties of objects? It is because in the universe no object is autonomous. In other words, there is no object which would not have any relations with any other object. Therefore, determining the properties of an object is nothing other than an pointing out that the object is set within some kind of relationship. Although in New Realism there also exists the term "independence" (*buyi* 不依), the meaning of this is not that there are no relations between this object and all other objects. It rather says that, even though a thing is related to external things, its existence does not depend upon these relations, because these can change. Let us take an example of a painting; although by hanging on the wall it has a relation with the wall, we still cannot say that it would not exist if it had not hung on that wall, because the same painting could also be placed on a table. Observed from this perspective, a most properties are in fact relations.

However, the New Realists still have an important point on the concept of "relation", namely that they consider consciousness (*renshi zuoyong* 認識作用) to be a special kind of relation. For example, if I see a table, a relation between me and the table is generated. Because they called this "the relational theory of consciousness" (*renshi zhi guanxi shuo* 認識之關係說), Montague (Mengtaigou 孟泰苟) claimed that consciousness is a special relation which subsists amid living beings and substance. (*The New Realism* 1912, 47). Perry (Peilai 陪萊) claims that "internalism" (*neizai lun* 內在論) advocates that the difference between knowledge and things, and the separation between mind and body, are only [manifestations of] the difference between relation and function, and not a difference of content. All in order to amend the old-fashioned dualism (*liangyuan lun* 兩元論) (*Present Philosophical Tendencies*, 312).[14] This is the quintessence of what they advocate. Since knowledge is only a kind of relation, the relatedness (*guanxi zhe*) does not depend on relations; this is their "theory of independence". In my opinion, this kind of theory is very near to common sense, because it is common sense to maintain that my seeing a table gives rise to a relationship between me and the table, i.e. the act of "seeing" (*kan* 看), by virtue of which a relation between me and the table ensues. When I do not see the table, then, although there [currently] is no relationship between me and the table, the latter still exists, because I will still be able to see it tomorrow. Since New Realists claim that objects exist independently from human cognition, they also claim that the

14 Ed. Ralph B. Perry. *Present Philosophical Tendencies: A Critical Survey of Naturalism, Idealism, Pragmatism, and Realism Together with a Synopsis of the Philosophy of William James*. New York: Longmans, Green and Co.

world is not entirely known, and that knowledge only covers a part of the world; and that the object of cognition can be changed through its being known. From this it follows that they oppose solipsistic idealism (*weiwu de guannian lun* 唯我的觀念論) (i.e. *Esse est percipi* (*cunzai jishi beijue* 存在即是被覺)), as well as the notion of pragmatist rationalism (*weiyong de lixiang lun* 唯用的理想論) (i.e. positing that knowledge has got a creative function). What they do maintain is that objects cannot be influenced by knowledge; in this point of view they can be called extreme realists. If knowledge, however, is the relationship between the knower and the known, then what is known and the knower together create the relatedness of the relation. Relatedness must thus be external to the relation. Which is why this theory is called the "theory of relational externality" (*guanxi zhi waizaixing* 關係之外在性).

Now, at this point in the discussion, we have come to the realization that the New Realists theory of relations is founded solely on pluralism. If such a plural universe had not been presupposed beforehand, the theory of relations would not hold. Therefore, what Spaulding calls "logical pluralism" (*lunli de duoyuanlun* 論理的多元論) has got the very same meaning as what Russell calls "logical atomism". But what is this thing they call pluralism? In this regard, Russell clearly said that pluralism does not only denote sense data, but also logical form. This exactly is what we refer to as New Realist logicism. They spoke about simple elements (particulars) (*chunyuan* 純元) and complex elements (particulars) (*fuyuan* 複元). Perry also wrote: "Physical and psychical complexes have in common not only sensible qualities, but also certain more fundamental formal relationships, such as implication, order, causation, time, and the like."[15] It is at this point that we shall engage in criticism.

I believe that one cannot determine whether New Realism can be established without also taking under consideration its logicism. In other words, if new logicism does not stand New Realism falls as well. Their logic is merely relational form(s); they recognize not only the reality of relatedness but also the reality of existence of relations. The relatedness is neither psychological (mental) not material, and can be called an "event point" (*shiduan* 事端). Because relations are not pure consciousness, they are also non-mental and immaterial, and can be called "form". Logic is exactly these universal forms. According to this kind of explanation, what they call logical form has also got a slightly transcendental overtone, because they maintain that the form is independent from cognition, which means that it exists even if it is not known. Thus, the characteristics of New Realism can be arranged in the following order:

15 Ed. Ibid., 310.

1. New Realism advocates that the universe is plural. In plurality there exist multiple relations. Since the universality of this kind of relations is not psychological construction, New Realism is a form of logicism and not psychologism.
2. New Realism claims that these forms of relations are not entirely within cognition. This means that they exist even if there is no cognition. Consequently, New Realism is a form of transcendentalism and not empiricism.
3. New Realism maintains that consciousness is just one kind of relation, originally a relation is not universal or necessary, but constitutes only a part of the whole universe. Therefore, New Realism is not a philosophy which takes thought as its starting point. They do not believe that researching ideas enables one to pry into the mysteries of the universe.
4. New Realism stresses form and not content. Obviously, it is not a philosophy that would derive from life as its starting point, because New Realists believe that the universe is self-caused (*zicheng* 自成 "self-become/created") and not created. Moreover, the so-called self-causation is diverse and not simple. (For example, Russell used the principle of the law of relativity which treats time as the fourth spatial dimension, as a result of which every single coordinate axis constitutes a world; since coordinate axes can be infinite, they can include innumerable worlds, each having its own time-space. This is what is considered to be a plural universe.)
5. New Realism claims that objects of cognition are concrete objects and not only appearances of things. Therefore, New Realists respect rational knowledge. Yet, on the other hand, they still believe that reality is not completely encompassed within knowledge and that there still exist unknown things. Consequently, their reverence for rational knowledge is not as thorough. Besides, they also think that the various kinds of logical laws are not the absolute truth, but only established norms. Which is why they do not esteem the ideal (*lixiang* 理想).

We can understand a greater part of New Realism based on what was said above. It is not that there never existed some minor differences between different authors – Spaulding, for example, does not agree with the relational theory of mind but advocates a "dimensional theory" (*duxi shuo* 度系說), but in comparison with the major agreements between them these minor differences are completely negligible and thus do not require further discussion. Moreover, based on what was noted above, I believe that New Realism is incomplete. In what ways? I shall start with relations. A relation, which has been separated from relatedness, simply cannot exist. But since

relatedness can also constitute a separate relation (i.e. one that is not limited to this kind of relation), obviously it cannot be claimed that relatedness is absolutely independent. Since relatedness cannot exist independent from any relation, then the real simply is not limited to relatedness, the so-called "particular" (*yuan* 元) of the plural (*duoyuan* 多元) [existence], while the form linking together relations is also real. In other words: what is real is not only the particular, which constitutes the substance of the universe, but also the "form" (*xingshi* 形式) as the framework of the universe. However, I have some doubts with regard to the following [issue]: Let's say that now here is a table, and that we identify it as a table is based entirely on our judgment. What is called judgment is a "that" of any new simple experience placed into the previous complex system of experience, which is consequently turned into "what?" So, after we have looked at the table, we say that the table still is a table and still exists here. This statement cannot be asserted. Because, according to Russell, we can say that the table is only one perspective, and today's perspective is not bound to be necessarily identical with the one from tomorrow. Therefore, we can only say that the "that" of table still exists. As regards the question whether it will again change into "what?", this then cannot be asserted without any further cognition. If, for example, we say: Li Guang (李廣) shot two arrows into the stone; the first time the stone resembled a tiger, [which is why the arrow was able to] pierce through it, whereas the second time Li recognized it as stone and the arrow was not able to penetrate it. Because the world of "what" is a completely known world, and knowing is judgement. If we say "A is A", the second A includes an A opposite to "not A" or the meaning of "A" in A, B, C, D. If A did not contain "not A" or "B, C and D," then A would not be established in the first place. Therefore, distinguishing and judging is what Hegel called "concepts used in particularities." Based on that, the realist philosophy can be naturally applied to the world of "that". But we cannot differentiate between "that" and "what?" There is no "that" which does not change into "what?" Consequently, we can say that in fact there only exists the world of "what?". Since there is only this world, the prerequisites to know this world are constituted entirely of differentiation and judgements, otherwise there would only be chaos and ignorance. At the centre of our research are not randomly established "relations" but rather the mysterious "judgments", for relations still have to be subjected to judgment. In other words, relations are formed and made from judgments themselves. If we accept this point, we can see that our problem is not any more the form of relations, but only the nature of judging. In other words, what exactly are judgments? Thus, again there exist two theories: the first one being psychologism and the other logicism. Psychologism maintains

that judgments are experiences in re-cognition. And according to behaviourist psychology and current research into the response (*fanying* 反應), judging is just a kind of habit, one gained from experience. In contrast, the logicist viewpoint derives from the pure form of "A is A". It further maintains that the expression "A is A" represents the internal development of thought *per se*. In other words, it is the thought's self-development (*zizhan* 自展). Heinrich Rickert focuses on this and is also one of the foremost proponents of this notion, which he terms transcendental psychology.

New Realism maintains that relations come before judgments, and this is not to say that there are judgments about cognition, but rather that before that there first exist relations within the sphere of the unknown (which does not refer to something which cannot be known but something which is still unknown). This is what I am not entirely satisfied with. While I also believe that rejecting logicism when it comes to dealing with judgments and adopting psychologism instead is even less satisfying. Therefore, unlike Neo-Kantian logicism, the New Realist logicism is incomplete, because Neo-Kantian logicism is a logicism of thought (*sixiang* 思想), whereas the New Realist one is an external[ist] logicism.

The idealist (*lixiang*) logicism posits that logical form developed from the internal aspects of the thought *per se*. The externalist logicism, on the other hand, maintains that logical form is formed after relations that exist between the external objects, which are such that they exist even if they are not known. Moreover, I also maintain that by only recognizing external relations and discarding ideas, logical form is definitely unable to explain what kind of thing is logic. Logic is to be able to explain (i.e. to explain it by means of external relations) the complex form "A is greater from B," "B is greater from C," and "therefore A is greater from C", deriving from the pure form "A is A." While, at the same time, logic still cannot explain the simple form of "A is A". Hence the essence of logic necessarily still remains unintelligible. Therefore, I think that the investigation on what is logic can be concentrated around this single point. Because the explanations of New Realism have never touched upon this critical point, it is not a thorough form of logicism.

Furthermore, according to my view, New Realism maintains that the function of conscious mind is a special new relation. This is equivalent to the clandestine negation of modern pure empiricism. This pure empiricism maintains that the world is only experience and that nothing exists outside of experience, while the basis of all experience is pure experience. What is pure experience? It is the bare notion of "that", which I have mentioned

above. It is the sole state (although it is already incorrect to call it a "state") of simplicity, which exists before the separation between subjective and objective, and before any differentiating judgment has arisen. New Realism opposes this theory in a tacit way. Naturally, its views are rather close to common sense when it proposes the existence of the knower and that which is known. Not only do the knower and the known form a special relation, but also the function of knowing is regarded as being able to differentiate the relations between objects. With this kind of spirit it will clearly be possible to liberate philosophy from [the constraints of] epistemology. (This aspect is discussed in a chapter of the book *The New Realism* written by Marvin (馬文).) New Realists further believe that the conscious mind is not real substance. What is called mind is just some kind of a centre (*zhongxin* 中心). In other words, it is a centre which creates relations with everything that surrounds it. Living beings (i.e. conscious) in the natural world are like the stars in heaven, moreover they are like a few lights suspended in the sky. This is also why Russell said:

> Subjectivity [is] a characteristic of mental phenomena… We there decided that those particulars (*yuan* 元) which constitute the physical world can be collected into sets in two ways, one of which makes a bundle of all those particulars that are appearances of a given thing from different places, while the other makes the bundle of all those particulars which are appearances of different things from a given place. A bundle of this latter sort, at a given time, is called a "perspective" (*guanxiang* 觀相); taken through a period of time, it is called a "biography" (*xingji* 行級). Subjectivity is the characteristic of perspectives and biographies, the characteristic of giving the view of the world from a certain place.[16]

Hence, we can understand that the reason why they advocate this view is that they basically do not recognize the notion of "mind" as a real entity, assuming that the mind is just a function. If we ask them why this is the case, they would surely answer that the burden of answering this question is the responsibility of modern psychology, especially behaviourism. But it is fairly obvious to me that at this point they would already have abandoned logicism for psychologism.

Husserl's "The Method of Pure Phenomenology" speaks about how philosophy ought to abandon all standpoints (*lichang* 立場). It further claims that the main task of philosophy is to make non-standpoint its main standpoint. If we

16 Ed. Bertrand Russell (1921). *The Analysis of Mind*. London: George Allen & Unwin Ltd., 295-6.

are to follow Husserl's theory, we can most certainly say that New Realism is a non-philosophy, because it first establishes a standpoint using both science and common sense, in the way that these are applied to support the resulting lofty skyscraper. In other words: New Realism can be regarded as a scientific worldview because it is established on three kinds of basic sciences: physics, mathematics (i.e. symbolic logic) and behaviourist psychology. In my opinion, what New Realists call logical form is rather a kind of physical rule, and what is called New Realism is in fact a rather deformed form of materialism. In this group's midst, apart from the sophistic character of Russell, there is also the so-called American school, which is relatively close to the concept of common sense – beside their use of behaviourist psychology and extreme functionalist psychology, they also maintain that the mind does not exist and that in reality there is no collusion between thought and being (*shiyou* 實有). What they call new logic (*xin lunlixue* 新論理學) is still a riddle, because they still have not explained how there can ever be such a thing as new logic. They have also never explained what exactly is "logical priority" (*lunli de xiantianxing* 論理的先天性). If we genuinely want to research these questions, we must first engage with Rickert's school of philosophy.

Finally, after the outline and criticism of main ideas of New Realism provided above, I also need to make one unrelated note: [it is currently the case that] the contemporary American and British philosophers look down on German schools of philosophy. This view cannot be blindly followed here in China. Dewey, Santayana (Sangdaiyena 桑代耶那), and others all despise the German schools, while German philosophy has also been greatly smeared in the introduction of the recently published book *The Group Mind* (*Jituan xinli* 集團心理) written by [William] McDougall, a British psychologist from Harvard. I think that this sort of behaviour ought not to be emulated by the Chinese people. We cannot do without opening our eyes and conducting thorough comparisons [between Western philosophies], while at the same time we must not confine ourselves within our national borders.

(*Translated by Jan Vrhovski*)