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General Economics

Human Action, a Treatise on Economics, by Ludwig von Mises

Yale University Press, New Haven, Connecticut ($10)

In this comprehensive volume (nearly 900 large pages of small type) the distinguished author has presented the results of a lifetime of study, a work that deserves careful analysis. Its principal merit, in our opinion, is not found in the conclusions, pleasing as they may be to proponents of economic freedom, nor in the criticism of "welfare" economics, valid as such criticism may be; rather do we find the book's principal merit in its frank statement of the author's method, his assumption as to what constitutes knowledge in the economic field, and his procedures based on that assumption. Primarily for this reason, Dr. von Mises' treatise illustrates the principal weaknesses of economics as it is written about and widely taught today. As evidence of the urgent need for reconstruction in economics, this book perhaps is without a peer.

Lest these comments be misinterpreted as disparagement of the author or belittlement of his efforts, we assure readers that such is not our intent. We consider this volume one of the outstanding and representative works in the field. Dr. von Mises was professor of economics at the University of Vienna for a full quarter century. Subsequently, for 16 years prior to World War II, he was Professor of International Economic Relations at the Graduate Institute of International Studies in Geneva. More recently he has been a visiting professor at the Graduate School of Business Administration, New York University. Thus for more than a half century, Dr. von Mises has taught and written in his chosen field. His writings indicate that his scholarly ability and the breadth and depth of his work in the field are equaled by the corresponding qualifications of few living men.

In this brief review, we shall not have room for an adequate discussion of the author's comments on recent economic developments. With much of his criticism of specific policies and proposals, particularly those that constitute a revival of "mercantilism" as practiced in France during Colbert's time nearly three centuries ago, we agree; and with his conclusion that many of the proposals for economic planning are one-way routes to socialism or communism, we likewise agree. However, much of our criticism of these recent developments would be on grounds that underlie, as it were, von Mises' criticisms; in short, we doubt the validity and usefulness of much that he criticizes on the same basic grounds that we question his own work. We hope to clarify these basic grounds for our doubts in the paragraphs that follow.

We begin with a question, the answer to which is basic to economics as well as to all other fields of inquiry. What is knowledge? The only satisfactory answer that we have found is, to use Dewey and Bentley's phraseology, the knowing and the known.[1] In short, the only referent (thing referred to) that we can find for the word symbol "knowledge" is the integrated knowing and the known.

We are not prepared at this writing (any more than Dewey and Bentley apparently were in 1949) to urge that the symbol "knowledge" can now be safely used to specify (or scientifically name) anything. But we do feel reasonably sure that, if the symbol "knowledge" is found satisfactory for scientific discourse, whatever it refers to will have this characteristic: the knower's "knowledge" will enable him to predict and control, predict what will occur under certain circumstances and in the light of that prediction to control (or adjust) in some degree either man's behavior or the external environment, or both. Facilitation of prediction and control is an essential characteristic of "knowledge" in what seems to be the emerging modern scientific usage of this word symbol.

We turn now to von Mises' usage of economic "knowledge." The clearest summary statement seems to be that on page 858, which is as follows:

"What assigns economics its peculiar and unique position in the orbit both of pure knowledge and of the practical utilization of knowledge is the fact that its particular theorems are not open to any verification or falsification on the ground of experience. * * * It can never, as has been pointed out, prove or disprove any particular theorem * * * The ultimate yardstick of an economic theorem's correctness or incorrectness is solely reason unaided by experience."

Additional light on von Mises' answer to the question,

[1]John Dewey and Arthur F. Bentley, *Knowing and the Known,* Beacon Press, Boston, 1949, particularly pages 296 and 297, from which the following is quoted: "Knowledge: In current employment this word is too wide and vague to be a *name* of anything in particular. The butterfly 'knows' how to mate; presumably without learning; the dog 'knows' its master through learning; man 'knows' through learning how to do an immense number of things in the way of arts or abilities; he also 'knows' physics, and 'knows' mathematics; he knows *that, what,* and *how.* * * * The issues that must be faced before the firm use is gained are: Does the word 'knowledge' indicate something the organism possesses or produces? Or does it indicate something the organism confronts or with which it comes into contact? Can either of these viewpoints be coherently maintained? If not, what change in preliminary description must be sought?

"*Knowings:* Organic phases of transactionally observed behaviors. Here considered is the familiar central range of namings-knowings.

"*Knowns:* Environmental phases of transactionally observed behaviors."

what is (economic) knowledge? is provided by the following:

"It is impossible for the human mind to conceive logical relations at variance with the logical structure of our mind." (page 25)

"For the comprehension of action [including economic behavior] there is but one scheme of interpretation and analysis available, namely, that provided by the cognition and analysis of our own purposeful behavior." That is, introspection. (page 26)

"The human mind is not a tabula rasa on which the external events write their own history. It is equipped with a set of tools for grasping reality. Man acquired these tools, i.e., the logical structure of his mind, in the course of his evolution from an amoeba to his present state. But these tools are logically prior to any experience." (page 35)

"However, the sciences of human action differ radically from the natural sciences. All authors eager to construct an epistemological system of the sciences of human action according to the pattern of the natural sciences err lamentably.

"The real thing which is the subject matter of praxeology, human action, stems from the same source as human reasoning. * * * The theorems attained by correct praxeological reasoning are not only perfectly certain and incontestable, like the correct mathematical theorems. They refer, moreover with the full rigidity of their apodictic certainty and incontestability to the reality of action as it appears in life and history. Praxeology conveys exact and precise knowledge of real things." (page 39)

"Praxeology is not concerned with the changing content of acting, but with its pure form and its categorial structure. The study of the accidental and environmental features of human action is the task of history." (page 47)

"Economics is not, as ignorant positivists repeat again and again, backward because it is not 'quantitative.' It is not quantitative and does not measure because there are no constants. Statistical figures referring to economic events are historical data." (page 56)

"Such problems do not allow any treatment other than understanding." (page 57)

"All that is needed for the deduction of all praxeological theorems is knowledge of the essence of human action. * * * We must bethink ourselves and reflect upon the structure of human action. Like logic and mathematics, praxeological knowledge is in us; it does not come from without." (page 64)

"The fundamental logical relations and the categories of thought and action are the ultimate sources of all human knowledge." (page 86)

We have quoted at length in order to minimize the risk that presenting material out of its context might misrepresent the author's views. How does Dr. von Mises' answer to the question, what is knowledge, compare with the answer that seems to be emerging from the latest studies of man's knowing behavior?

Perhaps a brief review of what men have considered their procedures of knowing up to the present time will help to place Dr. von Mises' answer. In an interesting article, Dr. Edwin Loeb[2] has suggested that the historical sequence of the procedures of knowing used by man has included in chronological order, magic, proverbs, deductive reasoning such as Plato's, Aristotle's observing, classifying, and syllogizing, and finally the method of modern science. Fortunately, we of today have the benefit not only of Dewey and Bentley's extensive researches but also of Joseph Ratner's excellent summary of their work together with some additional contributions of his own. His succinct statement of the Greek development merits quotation in full.[3]

"The plain historical matter of fact is that the Pythagoreans, the mathematicians, were, with respect to the development of Greek science and philosophy, on the ground floor. They were the most closely knit Brotherhood of Scientists-Philosophers of the Greek world; Plato's *Academy* was nothing more than their Athenian home, after being driven out of Croton in Sicily and elsewhere. The only comparable society of scientists were the physicians, organized by Hippocrates and they came later. Only superficial reading of history backwards (making Greek philosophers and scientists into sheepish 'scholastic doctors' and Aristotle into the Church, the omnipotent shepherd of the sheep) can yield the conclusion that Aristotle deflected the course of Greek scientific thought out of 'relating mathematical notions to the facts of nature' into the halfway house of 'classifying' those facts. Rather must the case have been that the Greek mathematical development, as a procedure of investigating nature, quickly reached an impasse and Aristotle's logic was the only way out. And for this there is conclusive proof."

For some reason, there is widespread misunderstanding of what Aristotle did. Perhaps because so much emphasis has been placed on the development of his logic, the fact that he was a keen and indefatigable observer of the things he found in nature has been overlooked. Thwarted in the attempt to apply the mathematics of his time to reality as he saw it, Aristotle turned to classification of the proportions and relations of shapes and sizes as he found them. And Aristotelian logic is an outgrowth of those efforts.

Subsequently, for the hundreds of years of the dark ages, magic and proverbs again were the principal keys to what was considered knowledge. Whether one classifies revelation as a separate method of knowing or includes it under the general classification of magic may depend on his religious preferences or lack of them. In any event, the Greek contributions, both Plato's idealism and Aristotle's system of logic, apparently were lost to Europe until rediscovered and put to use again by the medieval scholastics.

At this point, it is important to appreciate that "The main objective controlling all Greek inquiry, scientific as well as philosophic, was what Dewey has again illuminatingly and accurately called 'the quest for certainty'."[4] The aim was to know eternal and immutable reality, that which is forever unchanging, and that once known is known forever after with absolute certainty. Under such circumstances, even aside from the difficulties attendant upon coping with measurement of change, it is not surprising that change was considered ephemeral,

[2]Edwin Loeb, "The Function of Proverbs in the Intellectual Development of Primitive People," *The Scientific Monthly*, February 1952.

[3]Joseph Ratner, *Intelligence in the Modern World, John Dewey's Philosophy*, The Modern Library, New York 1939, page 101. To readers who find our brief quotation an invitation to further reading, we strongly recommend Dr. Ratner's 240-page introduction. It should help anyone to understand the situation today of economics (the study) as well as that of philosophy.

[4]*Ibid.*, page 19.

too complex for knowing, and perhaps inferior as a subject of investigation in that it could offer no contribution to true knowledge.

But some 300 years ago Galileo introduced and established a new *method*, that of measuring change and studying the relations between changes, in short, experimentation. This new method was revolutionary in that it both destroyed one system and started another. Precisely what were the significant aspects of the new method? To summarize, they were the quantitive measurement of change and study of the relations between or among changes.

The new method was broader in scope than the chemists' test-tube experiments in his laboratory, although these were included in the new method. Those observers of the new method who have argued that it is applicable only to the things that can be put into a test tube, or into a laboratory at least, overlook the significant aspects of the new method. The celestial bodies have never been brought into the astronomers' laboratories, nor do the astronomers either initiate or control the changes that occur in celestial space; but the new method has been applied to that as well as other fields with outstanding success. We suggest that the significant aspects of experiment in the modern sense of that much abused word are measurement of change and study of the relationships between or among changes.

Although Galileo and those who followed him in applying the new method demonstrated its value by the results obtained, they too, at least the earlier ones, retained the Greek objective, the quest for certainty, as the goal of their research. Newton, for example, was satisfied that he, by better methods, had pushed aside the curtain of change and found behind it the indivisible and indestructible atom and the immutable and unchanging laws of gravitation, etc. He and others were at first ready to assert the superiority of their laws over any recalcitrant facts. If any facts did not accord with the new theories, so much the worse for the facts.

Finally, however, the scientific scandal of facts at variance with theory became acknowledged. Again Dr. Ratner's description is enlightening.[5]

"That the Newtonian reign should ever come to an end was simply inconceivable to Newtonians. The basic structure of the Newtonian system was eternal and immutable. * * *

"What happened to the 'eternal basic structure' of Newtonianism, to its immutable cosmological framework reputedly riveted 'scientifically' to the three absolute pillars of Space, Time and Matter by eternally true and eternally enduring, non-corrodible struts and bolts of pure mathematics, everyone knows. * * * By establishing the forthright and uncompromising procedure of giving to experimental findings [measurement of change] first the authority to determine the meanings of mathematical-physical concepts and then the final authority to control their development and formulation in all respects relevant to the science of nature, Einstein accomplished in *scientific practice* the full enstatement of *experimentalism*. The verified success of Einstein's reversal of the Newtonian policy has demonstrated beyond all doubt and with a precision science alone is capable of, that for three hundred years Newtonianism had literally upset the true relation between experimental findings and theoretical (mathematical) formulations. It had been living methodologically upside down."

Thus we come to the viewpoint of the modern scientist today. In his search for knowledge, he has abandoned the Greek objective, the quest for certainty. The theorist and the laboratorian have been made inseparable partners in the scientific transaction, and above all, theory both controls and is controlled by a study of relationships between and among changes and definitely and finally is controlled by measurement of change.

Where does Dr. von Mises' understanding of knowing and method fit in the historical succession? Evidently, he has not abandoned the Greek ideal, the quest for certainty; on the contrary, he is convinced that he has succeeded where so many others have failed and in spite of the fact that modern men seeking knowledge no longer consider his objective a reasonable goal.

Dr. von Mises denies not once but several times that his theories can ever be disproved by the facts. This point of view represents a leap backward to Platonic idealism or one of its subsequent offspring in various disguises. Theories thus derived are medieval scholasticism, albeit on a par with much that is taught as economic knowledge today.

There is even ground for alleging that some aspects of the earnest Doctor's methods are even farther out of date and have their roots millions of years ago. What else are his assertions about "conception and understanding" if not an acceptance of revelation as a road to knowledge?

Dr. von Mises' conception of the mind and its function in his search for knowledge may be compared with "Reason pure of all influence from prior habit is fiction."[6] Also of interest in this connection is the following. "Many who think themselves scientifically emancipated and who freely advertise the soul for a superstition, perpetuate a false opinion of what knows, that is, of a separate knower. * * * by dismissing psychology as irrelevant to knowledge and logic, they think to conceal the psychological monster they have conjured up."[7]

Like the Greeks, Dr. von Mises disparages change, "Praxeology is not concerned with the changing content of acting, but with its pure form and its categorical structure." No one who appreciates the long struggle of man toward more adequate knowing would criticize Aristotle greatly for his adoption of a similar viewpoint 2,000 years ago, but, after all, that *was* 2,000 years ago; surely economists can do better than seek light on their subject from a beacon that was extinguished by the Galilean revolution in the 17th century. In this connection, Dr. Ratner again is helpful, as follows.[8] "Modern scientists, however, began by taking precisely the world of change as their subject for scientific study, and to help them on their way, they introduced the method of experimentation which is no less and no other than a method whereby the natural changes going on can be further increased and complicated in manifold ways by changes deliberately made. From the Greek point of view (and in this case, *not* excepting any Greek), this is confounding confusion, science gone insane. But as events have fully demonstrated, it is science really come

[5]*Ibid.*, pages 108 and 109.

[6]John Dewey, *Human Nature and Conduct*, Modern Library, New York, 1922, page 31.

[7]*Ibid.*, pages 176 and 177.

[8]Ratner, *op. cit.*, page 52.

to its senses, and intelligence come into its own."

As for von Mises' assertion that economists must rely on "cognition and analysis of our own purposeful behavior," this is the thoroughly discredited mode of knowing by introspection. Moreover, how can even the method of introspection be used if the knowledge praxeology provides is "a priori," is "not subject to verification or falsification on the ground of experience and facts?" If we find neither experience nor facts when we "analyze our own purposeful behavior," do we find anything at all?

Dr. von Mises differentiates the natural sciences from what he calls the a priori sciences including praxeology, which he considers the basis for his economics. This, too, is an outmoded distinction, although many, perhaps most, economists agree with von Mises' views. As for such differentiation, Dr. Ratner comments as follows:[9] "Why is it that in the technical fields of science, the revolution in *method* initiated by Galileo has already been substantially completed, has, in our time, carried through its last fundamental reform, whereas in other fields, including fields as intellectual as philosophy and logic, the revolution is just about now seriously getting under way? The easy answer is to invoke a distinction between 'natural' sciences and 'social' sciences * * * . The 'distinction' simply repeats, as an explanation, the fact to be explained. * * * there is a difference in the development of scientific investigation of the natural and the social *because* the former is 'natural' and the latter 'social.'

"The backwardness of philosophy, logic and all social inquiries does not explain the *forwardness* of the natural sciences. It simply exposes and emphasizes the need for an explanation. * * * Let it be granted, for the sake of argument, that the natural sciences are *now* beyond the reach of influence or connection with social institutions, forces and all that goes with the latter. It is an undeniable fact of modern history—let alone of all human history—that they were not *always* there. Hence the more you conceive the social to be retarding or inherently inimical to the development of science, the more must the 'natural' sciences have been able to overcome in reaching their present estate. In so far as the 'natural' sciences are *now* distinguished and distinguishable from the 'social' sciences it is a *distinction* they have achieved; it is a *result*, not a gift ('something given' or a 'datum'); it is a *consequence*, not a cause. The invocation of the 'distinction' between 'natural' and 'social' *subject-matters* to explain the differences between 'natural' and 'social' *sciences* doesn't even explain the differences away. It just leaves them precisely where and as it *finds* them.

"A philosophy or logic of science cannot, without being foolish, take refuge in a 'distinction' in subject-matter to explain the advance of the natural sciences in modern times. And the more the 'distinction' is asserted to be *in rerum natura* as a ground for the explanation the greater the folly of the philosophy or logic becomes."

The Budding Scientist

But the careful reader of von Mises' treatise will encounter at least one specific example where the influence of modern scientific method seemingly has overcome the author's best intentions. On page 547 et seq, he discusses inflation and business cycles, and on page 798 in criticizing various theories of the business cycle, he emphasizes certain facts of economic life and their relationships. He points out that both production and prices increase during a boom, a development that obviously would be impossible ordinarily without credit expansion. To summarize, he asserts in effect that any theory failing to include the part that credit expansion must play is discredited by the facts.

Now it seems obvious that prices are quite precise measures of the ratios at which some goods exchange for purchasing media or for other goods. Therefore, price rises are measures of change in such exchange relationships. Moreover, any assertion that production has increased implies more or less accurate measurement of the change alleged to have occurred. So also with the expansion of bank credit; it can be known only through measurement stated in terms of the additional amounts of purchasing media involved. Here are the significant aspects, for science, of what is widely called experiment, namely, measurement of change and study of the relationships between or among the changes.[10]

And if we turn to another passage, we find what von Mises thinks of such proceedings. "Those economists who want to substitute 'quantitative economics' for what they call 'qualitative economics' are utterly mistaken. There are, in the field of economics, no constant relations, and consequently no measurement is possible." (page 55) In such disparaging terms does the author dispose of the statistical laboratorians who provide the test that he insists all theories of the business cycle, including his own, must meet.

We think it to von Mises' credit that he cannot resist the temptation to be a modern economic scientist. Far from considering this an inconsistency that should make him the butt of ridicule, we regard this particular inconsistency as one of his outstanding achievements. If only his fellow economists could similarly break the bonds with the past that shackle them, the science of economics probably would advance much farther much faster.

Conclusion

Finally, we repeat that Dr. von Mises' treatise seems to us an outstanding contribution. He has boldly attempted to explain the assumptions and preconceptions on which his work is based, a task that few economists have had the ability or perhaps the courage to undertake. Unfortunately, he has but lightly touched on many semantic problems, particularly that of specification (scientific naming or use of word symbols) but few economists have troubled seriously about definitions in recent years. A few decades ago, the situation was different; nearly every textbook began with attempts to define the terms to be used. But, like many philosophers, the economists have all but given up this aspect of their task, apparently in the hopeless conviction that semantic confusion is a small price to pay for the retention of old and familiar methods.

Therefore, we believe that Dr. von Mises may have contributed far more than he had previously realized to the needed reconstruction in economics. The first task in reconstruction always is the demolition and removal of the structure that must be replaced. That task, we believe, he has facilitated.

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[9] *Ibid.*, pages 69, 70, and 71.

[10] True, the scope of the experiment is much larger than that of the chemist's experiment in a test tube, but it is on an exceedingly small scale in comparison with the scope of an astronomer's measurements. In the aspects significant for science, and therefore for knowing in the modern sense, this is the essence of experiment.