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The Goal and Methods of Economic Theory

1. The Ultimate Goal of Economic Theory

If we want to evaluate a procedure for accomplishing a goal, we must start by identifying the goal we aim to achieve. I take it that the goal of economics, as a first approximation, is to evaluate arguments for and against the use of government coercive power to intervene in the market economy. In other words, it is to help determine the effects of using government power for all recommended actions beyond the basic establishment, enforcement, and maintenance of a private property and free enterprise system. The starting point is to construct an image of the market economy in the absence of intervention. Such an economy has never existed, it is unlikely that it could exist, and most people probably would not want it anyway. However, the only way to judge the arguments in favor of or against intervention is to build an image of an economy in which there is no intervention, introduce an intervention, and then try to determine whether its effects correspond to those that are favored by the interventionist arguments. The main purpose of this essay is to elucidate the praxeological method of building such an image. The actual evaluation of arguments is beyond its scope.

Economics as conceived here is a branch of the theory of chosen human behavior, or praxeology. The aim of this essay is to describe the nature of praxeological economics and to elaborate on its goal and procedure.

Praxeology and Economics

Praxeology can be defined broadly and narrowly. In the broadest definition, it is the theory of human action and interaction. In this definition, economics (economic theory) is one branch of praxeology. Thus praxeology is broader than economics. It encompasses other branches besides economic theory, although to date other branches have not developed. In the narrowest definition, praxeology is the theory of action devoid of any specific environ-

ment, either social or material. In this definition, praxeology is the study of all that can be logically deduced from the simple idea that " a human being acts. We derive narrow praxeological theory by exploring all that is implicit in this idea. For example, we can derive the propositions that the human being possesses the concepts of means and ends, time, and uncertainty.

Methods

The methods of the science of non-chosen behavior have no evident bounds. This is not so with the science of chosen behavior. The methods of this science must be derived fully from the assumptions that each actor has an independent will and that one distinctly human actor can, in some measure, put himself in the shoes of other actors and, as a result, understand and predict, within limits, the choices that the other actors will make. The scientists of non-chosen human behavior, the scientists of non-human behavior, and material scientists can also make this assumption. The physicist may decide that he is mostly likely to be able to devise means of describing, explaining, predicting or controlling the matter he studies by assuming that it makes choices and even that it tries to predict the choices that he assumes other matter makes. As unreasonable as it may seem to make such an assumption, this approach is not ruled out. However, the scientist of distinctly human action is restricted. Because he attends exclusively to distinctly human action, he cannot assume that the individuals he studies do *not* choose. His images of distinctly human interaction assume that everyone is a chooser and that everyone can predict others' choices in some measure.

All praxeological images of economic interaction are partly unrealistic. We know from our experience and intuition that behavior is partly non-chosen. Because the praxeologist and economist focuses exclusively on chosen behavior, their images cannot possibly represent the whole of reality.

In order to achieve the goal of evaluating arguments for and against intervention, economists must employ the sciences of non-chosen behavior and praxeology together. This does not in any way compromise the deduction that praxeology and praxeological economics are sciences that are distinct from the sciences of non-chosen behavior and thymology. Indeed, a good case can be made that praxeological economics is the most important of the sciences that must be used to achieve the goal. The case is based on

our observation of *progress* and its causes. Progress refers to what economists regard as a rise in the standard of living of the masses from the point of view of the individuals who comprise the masses.[1] The study of economics began when some observers recognized the progress that occurred under the conditions of the property system and free enterprise.

Progress appears mainly due to chosen behavior. The greatest discoveries and inventions and the bringing to market of their products were not chance responses to stimuli or the manifestation of a biological imperative. Our ability to differentiate between chosen and non-chosen actions and our knowledge of history and current events informs us that they were the work of minds that made choices. To understand progress requires praxeology.

To describe the historical conditions under which actors act, economists make assumptions about the institutional situation. And to incorporate the sciences of non-chosen behavior, economists must make assumptions about what the non-chosen behavior is and when it will manifest itself. It may be realistic to assume that some human beings do not choose and that some of the behavior of all human beings is not chosen. But these applications do not in any way compromise the praxeological nature of economic theory. The elaboration of praxeological economics requires us to assume that everyone is a chooser all of the time. It is only when we apply this economic theory – or, perhaps more correctly, this *pure* economic theory – that we introduce assumptions about institutions and non-choice.

2. The Procedure For Building Economic Theory

Unfathomable Complexity

Complexity as used in praxeology refers to the limits of the human mind in its effort to understand other human beings and their actions. When we fully contemplate the task of building an image of the pure market economy, we recognize that it contains a degree of complexity that is unfathomable. There are many specialized individuals each of whom can build images of the interaction of each other. In other words, each of these individuals can try to understand the actions that others are likely to undertake.

To state this symbolically, when A studies the actions of B, C...N; he recognizes (1) that B may be studying the actions of C, D,...N; that C may be studying the actions of B, D...N; and so on; and (2) that in their studies, B, C,...N may know and take account of the fact that A and others are studying their actions. Finally, each person may know and employ the most advanced methods of study.

So far we have discussed complexity and the intersubjectivity of images that people employ in their study of economic interaction. Now we must add that subjects differ in their cognitive faculties and that they may know this.[1] Some subjects are more competent than others in understanding the actions of different categories of cohorts. Also, subjects of equal competence may differ in the assumptions and hypotheses they make in their efforts to understand other subjects' actions and in the identities of the particular individuals and the aspects of their actions they study. These differences are not constant. Not only do they change in ways that are partly unpredictable to ordinary observers, individuals may have the capacity to independently narrow and widen them. Some individuals know this and try to take it into account. But individuals differ in their willingness and ability to do this. Finally, individuals in the market economy specialize in the study of different classes of actors and actions.

Unless we feel justified in taking an elitist stance, we must assume that subjects may build images of economic interaction that are at least as broad, complex, or precise as the images of interaction that we ourselves, as economists, build.[2] In other words, we must assume that the subjects are capable of acquiring the same type of understanding of the actions and understandings of each other and of us that we, in the role of economists, claim to be able to acquire of them. Indeed the subjects may be superior to us. When we study the actions of businesspeople, for example, we must assume that they may use the same methods to study consumers, resource-suppliers and other businesspeople that we use in economics. Furthermore, a

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[1]Cognitive faculties are discussed more fully in Chapter Twelve.

[2]Praxeology, when practiced according to the principles of subjectivism can be regarded as a revolution against elitism.(Gunning 1990: 23-24) Mises discusses the elitist view in a different context in his introductory essay on praxeology.(1933: 33)

businessperson may study the images of the understandings and actions that we, as economists, have built.[3]

The difference between the economist and ordinary actors in the market economy is this. Ordinary actors, whose goal is to acquire and consume goods, typically find it to their advantage to focus their studies on only a small number of all the actors in the market economy and only on particular aspects of the economic actions of those actors. In other words, they typically specialize. They study economic interaction from the viewpoint of a specialized resource supplier or producer. The goal of the economist is to evaluate interventionist arguments. To do this, he must ordinarily study a large number of specialized actors simultaneously.

Given the complexity of the problem of building images of individuals' understandings of others' actions, it is evident that we cannot realistically expect to make detailed descriptions of interaction under the conditions of the market economy. If the population is large, there are millions or billions of individual, interdependent, specialized, intersubjective understandings of actions. We could never know all of these understandings. The idea that one mind could, at any single time, contain a complete image of the separate actions of millions of other minds is contradictory.[4]

The Subjectivist Stance

The economist aims to understand economic interaction under the conditions of the market economy by putting herself in the shoes of each of the actors. We call this the subjectivist stance. In spite of taking this stance, we optimistically presume that we can render human action more intelligible than otherwise. In Chapter Eleven, we describe the subjectivist stance further and we discuss the implications of taking it.

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[3]The truth of these observations seems evident from experience and intuition. However, it is bolstered by studies in the thymological field of cognitive development. We discuss this field in Chapter Twelve.

[4]The point at issue here is similar to one of the arguments supporting the proposition that detailed central economic planning is logically impossible. The idea that a central economic plan can duplicate the plans of the separate individuals in a free enterprise system is unreasonable.

The economist adopts a subjectivist stance toward economic interaction because she appreciates the differences among actors. She takes it for granted that, under the conditions of the market economy, actors have incentives to discover their own and others' wants, abilities and knowledge. But she also knows that she herself is an actor with a separate will. Recognizing that others also have a separate will, she knows that she will always be uncertain about her subjects' wants, abilities and knowledge. She assumes that actors in the market economy are similarly uncertain about each other. Adopting the subjectivist stance implies that uncertainty will play a substantial role in economists' descriptions of economic interaction.

A Five Step Procedure

If we cannot hope to build an image of the pure market economy that contains the intersubjective understandings of the millions of specialized actors, what kind of images can we build and of what use can they be? The answer is twofold. First, we can build simpler images that show what we judge to be the main characteristics of interaction under market economy conditions. Second, we can build images of examples of interaction that we judge to be necessary to evaluate particular arguments for or against intervention. Thus we build simple images and give examples in order to evaluate policy arguments.

More specifically, we follow a five-step procedure. First, we identify and clarify the properties of action in general. To do this, we begin as praxeologists. Second, we must associate these properties with the conditions of the market economy. These conditions correspond to specific "functions" that economists have traditionally called "economic." The most fundamental are resource-supply, production, consumption, and saving. The next three steps have the goal of showing how the properties of action cause these functions to be performed under the conditions of the pure market economy.

Because of the enormous complexity of economic interaction in the market economy, we begin by trying to capture all of the distinctly human action in a single role. We use the term "entrepreneur" to refer to this role.[5] Thus, the third step consists of defining entrepre-

[5]In this we follow Frederick B. Hawley (1907), Davenport (1914), Knight (1921), and Mises. See Chapter Thirteen.

neurship and identifying its abstract properties. This amounts to showing how the abstract properties of action would be manifest.

The fourth step is to build a series of images of economic interaction, beginning with one in which all economic activity is directed by ¡§pure entrepreneurs.¡¨ The pure entrepreneur is defined as an appraiser of resources, a decision-making employer and producer of a specific good (undertaker), and a bearer of all the uncertainty connected with the employment of the resources and the production, sale, and consumption of the good. Following this image, depending on our specific interest, we separate the pure entrepreneur role into parts, such as the middleman, the employer, the credit intermediary, the guarantor, the resource supplying entrepreneur, and the consuming entrepreneur. We also may conceive of entrepreneurs who produce different goods and resources and who perform various parts of the total entrepreneur role.

Even if we build very complex images, we cannot hope to capture economic interaction in its entirety. As a result, we must supplement our simple abstract images with examples that are relevant to our subject of interest. Thus, giving examples and, before that, choosing which examples to give is the fifth step. We also use examples to deduce the laws of economic theory by means of ceteris paribus assumptions.

We now describe each step in greater detail.

Identifying the Properties of Action by Means of the Counterfactual Method

The counterfactual method is the method we use to conceptualize the particular characteristics of a phenomenon. We isolate a specific characteristic by contrasting an image of the phenomenon that contains both the characteristic we aim to conceptualize and the other characteristics with an image that contains only the other characteristics. Although the method is used throughout praxeology and economics, its most fundamental use is to identify and define the properties of action. To use the counterfactual method, we contrast an image of a being that we claim does not act with one that we claim does. We try to build three different kinds of images: (1) an image of a distinctly human being who does not have unsatisfied ends or who lacks the means to satisfy her ends, (2) an image of a distinctly human being who leads a timeless existence, and (3) an image of a distinctly human being who does not experience uncer-

tainty. Because our efforts fail – i.e., because we cannot conceive of a distinctly human being who lacks means and ends, a sense of time, or a sense of uncertainty – we conclude that we know a priori that ends and means, a subjective sense of time, and uncertainty are properties of action. Chapter Four describes this method and shows how it helps us identify these properties.

We use the term counterfactual method because we use counterfactual images. We also use the method to elucidate entrepreneurship in the market economy.[6]

Identifying the Essential Economic Functions

Economics is not concerned with all distinctly human action. It focuses on ends that can only be satisfied by the consumption of goods that actors buy in markets. *Consumption* – the behavior of consuming consumers' goods – is the proximate means. The more distant means is *production* – the behavior of producing consumers' goods and resources. Resources have been defined traditionally as material goods and actions that can be employed by an actor to produce consumers' good and other resources. Praxeological economic, however, focuses on actions. From this angle, a producer does not buy materials to help him produce; he buys the legal right to use, or command, the actions the effectiveness of which requires the materials. Possessing a legal right to use implies the legal right to command the actions of others who, but for the presence of the producer's rights would use the materials themselves.

For production to occur, the legal rights to command the use of resources must be owned by a producer. He may initially own them or he may acquire them through exchange for money. We say that producers employ resources that are acquired in exchange for money (or which, if they are not acquired through exchange but initially owned, *could* be exchanged for money.) To represent the fact that resources may be used to produce consumers' goods for the nearer or more distant future, we recognize the behavior of *saving*. To save means to *not* employ resources to produce consumers' goods to satisfy wants at the earliest possible time. More

[6]Another way to use the method is to explore how a phenomenon changes when a particular non-essential characteristic is added or removed. The so-called comparative static method in economics is an example. We may ask how the discovery of a new good or method of production would affect market economy interaction.

completely, economics has traditionally been concerned with what we can call the consumption of goods produced by and purchased from others, the production of goods with resources that are bought from others or which could be sold to others, and the supply of resources that have alternative market uses. In this book, we call the supply of resources, production, consumption and saving the *economic functions*.[7] We employ the concept of function in economics to refer to the phenomena in which economists are interested. For a more complete discussion of functionalism that is similar to the approach adopted here, see Mayer 1928 [1994]: 48-51.

Defining Entrepreneurship and Identifying It's Abstract Properties

In economics, we define *entrepreneurship* as the distinctly human element that both stands in contrast to and causes, by means of choice, the economic functions to be performed. We identify the necessary properties of entrepreneurship by considering two ideas simultaneously. The first is distinctly human action and its necessary properties, which we have already identified by applying the counterfactual method to the isolated actor. The second is the repeating robot economy (RRE).[8] In the RRE, the basic functions of supplying resources, producing goods, consuming, and saving are performed by robots, who do not act. The performance consists of routine behavior that is repeated according to algorithms. We identify the properties of entrepreneurship by contrasting the RRE with

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[7]The concept of an economic function was explained in *Human Action* on pages 251-252. Mises identified five economic functions: entrepreneurship, capitalist-financing, supplying land, supplying labor, and consuming goods. In this book, we modify Mises' presentation in three ways. First, we omit all reference to entrepreneurship as a function on the grounds that the economic functions represent behavior that stands in contrast to entrepreneurship. Second, we substitute the term "saver" for capitalist. Saver is more descriptive than capitalist. Moreover, Mises also uses the term " capitalist" to refer to an entrepreneur (1966: 253). Third, the author has substituted the term "resource supplier" for landowner and worker. There are reasons relating to the definition of the property system and free enterprise to separate human from non-human resources. We shall discuss these in Chapter Eight. But our simple images need not make this separation. In addition, to distinguish a landowner function may help promote the non-praxeological claim that capital is a distinct factor of production (see Chapter Four).

[8]This idea is due to Mises (1966: 247-249), who used the term evenly rotating economy albeit ambiguously. Mises's use is discussed further in Chapter Thirteen.

what we know intuitively about how the properties of action could cause characteristics like those that we assume are present in the evenly rotating economy to come into being and change. We put ourselves in the positions of the robots of the RRE and ask how our behavior could come to be performed and change through our distinctly human action. In other words, we define entrepreneurship by *contrasting* the image of a robot economy with what we know about how normal human beings would come to perform the functions under market economy conditions. Just as contrasting the isolated actor with a being that cannot act helps us identify the properties of action, contrasting the action of many individuals under pure market economy conditions with the behavior of function-performing robots helps us identify the characteristics of entrepreneurship. In an earlier statement, I called this procedure for identifying the properties of entrepreneurship the *method of contrasting images of functions* (Gunning 1990: 57-8). It is simply the application of the counterfactual method, as described above, to economic interaction. By means of this method we identify (1) appraising resources, (2) undertaking, and (3) uncertainty bearing as the necessary properties.

Building Images

Once we have identified the characteristics of entrepreneurship, we are in a position to build images of economic interaction under the conditions of the pure market economy. We begin with the *pure entrepreneur economy* (PEE). In this economy, we imagine that the characteristics of action are performed entirely by a "class" of *pure entrepreneurs*. A pure entrepreneur does not consume or save. His role in production is to appraise and employ resources, to undertake a production activity, and to bear uncertainty. The pure entrepreneur economy contains (1) passive, robot resource suppliers, producers, and consumer-savers and (2) active, distinctly human pure entrepreneurs. All production is controlled by the members of the class of pure entrepreneurs.[9] The PEE enables us to describe various

[9]This procedure is similar to that used by Israel Kirzner (1973: 41-43; 72), albeit in a different context. Kirzner (1992: 98-99) defends the procedure as an analytical device that is necessary in " order to understand the entrepreneur-driven market process." The procedure may have first developed in the work of Davenport (1914), who conceived of entrepreneurship as, among other things, an agency responsible for assigning, through the

general characteristics that have traditionally been associated with the market economy in their simplest form. Specifically, it enables us to describe competition, consumer sovereignty, and the uses of price signals as conveyors of information.

We build additional images of economies, depending upon which characteristics we want to elucidate and which problems we want to deal with.[10] To describe specialization and competition in the production of consumers' goods, we can divide the entrepreneurs into sub-classes based on the consumers' good that we assume each is specialized in causing to be produced. To describe specialization in producing goods of different orders in a structure of production, we can divide pure entrepreneurs into classes based on which order of goods they specialize in producing. We can elucidate middleman activity, the supply of guaranty, and agency by creating sub-classes of entrepreneurs who specialize in these activities. We can introduce credit intermediation and banking entrepreneurs to deal, respectively, with credit middleman activity and money creation. We can introduce employee and employer entrepreneurs to help us understand the employment compact. Finally, we can introduce technical or interactive relationships among different entrepreneurs in order to help comprehend economic organization and changes in it, such as mergers and inter-entrepreneur agreements.

The number of economies that we can create in order to help us understand economic interaction is indefinite. The ones we actually do create depends on the interventionist argument we aim to evaluate. Chapter Nine introduces some of the most basic economies.

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mental act of capitalization, prices to all resources.(Gunning 1998)

[10]We are referring here not to problems associated with evaluating a particular policy argument but to the "patterns of human action in their purity" insofar as these relate to the science of economics. Mises wrote:

> [The goal of our science] is the comprehension of the universal, and its procedure is formal and axiomatic. It views action and the conditions under which action takes place not in their concrete form, as we encounter them in everyday life, nor in their actual setting, as we view them in each of the science of nature and of history, but as formal constructions that enable us to grasp action in their purity. (Mises 1981(EP): 13)

When we write of grasping pure economic interaction in its purity in this book, we are referring to action under the conditions specified in the assumptions of the pure market economy. We discuss the part of the method that we must follow to deal with the problems of evaluating a particular policy below.

Giving Examples of Entrepreneurship

The last step is to give examples of entrepreneurship. To give an example of entrepreneurship, we imagine a starting point at which, given our assumptions, all future behavior is determined completely by an imaginary, fully synchronized set of individual plans. All that remains is for the behavioral plans to be carried out. As a result, there is no motivation for action. In other words, although there are individuals who possess the potential for acting in the entrepreneur role, they recognize no unexploited opportunities to profit. Next we introduce a motivation to act in the form of a want or an ability to satisfy a want that is not accounted for in the plans that we assume to exist at the starting point. Assuming that everything else stays the same, we make assumptions about the appraisals, undertaking, and uncertainty-bearing that all of the relevant actors would need to carry out in order to reach a new imaginary, fully synchronized set of future behavioral plans. In other words, we try to conceive of the fully synchronized set of individual plans that would have to exist for the newly-introduced want or ability to be synchronized with the other wants and abilities such that no further motivation to act would exist. This set is the ending point. We end this step with a contrast between the *behavior* that we assume will lead to the endpoint and a reference to real entrepreneur *action*, which is beyond our ability to completely comprehend and specify. We point out that the image that we build in order to describe the behavior needed to reach the endpoint does not, and cannot, fully and accurately depict the breadth and depth of entrepreneurship. The images of economies discussed in the fourth step are invaluable aids in giving examples, since they help us simplify the complex of economic interaction.

Part of the process of giving examples of entrepreneurship involves proceeding from a state in which entrepreneurs' plans are not synchronized to a final state in which they are synchronized. Israel Kirzner (1992) has attached the label "market process" to the set of actions that are performed on the way toward equilibrium. To the extent that the examples in this kind of market process analysis employ a concept of entrepreneurship that includes appraisement, undertaking, and uncertainty-bearing and to the extent that they are open-ended in the sense that they emphasize entrepreneurial imagination, inventiveness and creativity – which they do not always do – they are a part of the procedure described here.

Evaluating Arguments Relating to Intervention

As mentioned above, the ultimate goal of economics is to evaluate arguments relating to intervention in the market economy. Such arguments take the following form: Under a particular set of circumstances, if certain laws prevail, individuals will cause more, less, or the same amount of what ordinary people call wealth to be produced and acquired by particular individuals than if different laws prevail. To evaluate such arguments, we must first discover whether the circumstances assumed in them actually exist or can exist. If for a particular argument, the circumstances do not and cannot exist, we may end our evaluation by pointing out that the argument is irrelevant to the real conditions of the world.

If the circumstances assumed in an argument do exist, our second task is to evaluate the images of economic interaction that are contained in the argument in light of our understanding of the market economy. To do this, we must present hypotheses about entrepreneur action under the circumstances in relation to hypotheses about such action in the absence of the intervention. We ask: how will entrepreneurship act differently under the circumstances assumed in the intervention compared with the circumstances assumed if there is no intervention? It follows that when we evaluate arguments relating to intervention, we do so by giving examples of entrepreneurship. Our examples are designed to represent reality, insofar as this is possible, given the complexity of the circumstances under which the intervention will be put into effect. We aim to convince the proponent or opponent of an intervention that our image is realistic enough to be relevant to the argument' s evaluation. From this point of view, the evaluations of arguments presented in praxeological economics are founded in realism. We use the images to comprehend reality and we must build them by using realistic assumptions.

Of course, the use of praxeological economics to evaluate arguments is premised on the assumption that the conditions referred to in the arguments involve entrepreneurial action. If we have reason to believe that the conditions only involve non-chosen action or non-economic action, examples of entrepreneurship will be irrelevant.

3. Summary: The Meaning of Economic Theory

Economic theory consists of constructing an image of the pure market economy that is relevant to the task of evaluating arguments relating to intervention. We cannot expect to construct a complete image of the market economy because of its complexity. However, we can construct images that are suited to the task of evaluating arguments. To do this, we must follow four steps. First we must identify the properties of action. Second we must associate these properties with specific economic functions, which are derived from the traditional subject matter of economics. Third, due to complexity, we must elucidate distinctly human action in the market economy by constructing increasingly complex images of entrepreneurship. Fourth, to assure that our examples are relevant to real economic interaction, we must give examples. Since our ultimate goal is to evaluate arguments relating to intervention, our examples should be relevant to those arguments.

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