The Online Library of Liberty

A Project Of Liberty Fund, Inc.

Leonard P. Liggio, *Literature of Liberty, Winter 1982*, vol. 5, No. 4 [1982]



The Online Library Of Liberty

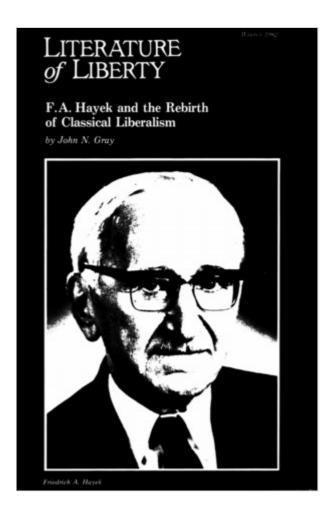
This E-Book (PDF format) is published by Liberty Fund, Inc., a private, non-profit, educational foundation established in 1960 to encourage study of the ideal of a society of free and responsible individuals. 2010 is the 50th anniversary year of the founding of Liberty Fund.

It is part of the Online Library of Liberty web site http://oll.libertyfund.org, which was established in 2004 in order to further the educational goals of Liberty Fund, Inc. To find out more about the author or title, to use the site's powerful search engine, to see other titles in other formats (HTML, facsimile PDF), or to make use of the hundreds of essays, educational aids, and study guides, please visit the OLL web site. This title is also part of the Portable Library of Liberty DVD which contains over 1,000 books, audio material, and quotes about liberty and power, and is available free of charge upon request.

The cuneiform inscription that appears in the logo and serves as a design element in all Liberty Fund books and web sites is the earliest-known written appearance of the word "freedom" (amagi), or "liberty." It is taken from a clay document written about 2300 B.C. in the Sumerian city-state of Lagash, in present day Iraq.

To find out more about Liberty Fund, Inc., or the Online Library of Liberty Project, please contact the Director at oll@libertyfund.org.

LIBERTY FUND, INC. 8335 Allison Pointe Trail, Suite 300 Indianapolis, Indiana 46250-1684



Edition Used:

Literature of Liberty: A Review of Contemporary Liberal Thought was published first by the Cato Institute (1978-1979) and later by the Institute for Humane Studies (1980-1982) under the editorial direction of Leonard P. Liggio.

Editor: Leonard P. Liggio

About This Title:

Literature of Liberty: A Review of Contemporary Liberal Thought was published first by the Cato Institute (1978-1979) and later by the Institute for Humane Studies (1980-1982) under the editorial direction of Leonard P. Liggio. It consisted of a lengthy bibliographical essays, editorials, and many shorter reviews of books and journal articles. There were 5 volumes and 20 issues. This issue contains a lengthy bibliographical essay by John Gray on "F.A. Hayek and the Rebirth of Classical Liberalism".

About Liberty Fund:

Liberty Fund, Inc. is a private, educational foundation established to encourage the study of the ideal of a society of free and responsible individuals.

Copyright Information:

This work is copyrighted by the Institute for Humane Studies, George Mason University, Fairfax, Virginia, and is put online with their permission.

Fair Use Statement:

This material is put online to further the educational goals of Liberty Fund, Inc. Unless otherwise stated in the Copyright Information section above, this material may be used freely for educational and academic purposes. It may not be used in any way for profit.

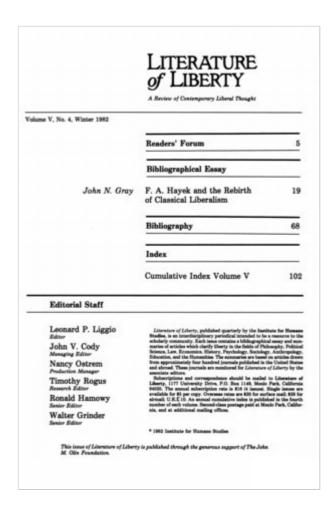


Table Of Contents

Editorial Staff

Editorial

Readers' Forum: Order Defined In the Process of Its Emergence. a Note

Stimulated By Reading Norman Barry, "the Tradition of Spontaneous Order"

Bibliographical Essay: John Gray, F. A. Hayek and the Rebirth of Classical Liberalism

<u>Introduction: the Revival of Interest In Hayek—a Unified Research Program In Hayek's Writings?</u>

The Unity and Coherence of Hayek's Writings: Conception of Mind & Unity of Knowledge

Overview of Topics Covered In This Essay

Hayek's General Philosophy—the Kantian Heritage

Hayek As a Skeptical Kantian

Three Influences On Hayek's Skeptical Kantianism: Mach, Popper, and Wittgenstein

1. Ernst Mach and Metaphysical Neutrality

2. Karl Popper: the Growth of Knowledge

3. Wittgenstein & Hayek

Hayek On Knowledge and Mind: Implications For Social Theory

Hayek's Kantian Philosophy of Mind

Hayek's Philosophy of Mind & His Social Theory: Beyond Kantianism

The Idea of a Spontaneous Social Order

The Application of Spontaneous Order In Economic Life: the Catallaxy

The Catallactic Order, Practical Knowledge, and the Calculation Debate

Havek's Refinements of the Misesian Calculation Debate

Theory and Method In Economic Science

Prediction Vs. 'complex Phenomena'

Hayek's Opposition to Apriori Science

Popperian 'conjectures & Refutations'

Some Applications of Hayek's Methodological Views: Keynes, Friedman, and Shackle On Economic Policy

Hayek Contra Constructivism & Social Engineering

Hayek Contra Keynes

Hayek Contra Friedman

Hayek and Shackle

<u>Hayek's Constitution of Liberty: Ethical Basis of the Juridical Framework of</u> Individual Liberty

Clarifying Hayek's Moral Theory

Hume's Influence On Hayek's Social Philosophy

Hayek's Utilitarianism & Liberty

Justice, Liberty, and the Rule of Law In Hayek's Constitution of Liberty

Criticisms of Hayek's Universalizable 'rule of Law'

Meeting Objections to the Universalizability Test

Kantian Universalizability & Liberal Justice

Some Criticism of Hayek's System of Ideas: Buchanan and Oakeshott

James Buchanan On Hayek

Michael Oakeshott On Hayek

Hayek's Variant of Classical Liberalism: a Fusing of Libertarian &

Traditionalistic Ideals?

Hayek's Voluntaristic Traditionalism: a Market In Traditions

Conclusion: Hayek's Research Program & Classical Liberalism

Footnote

Bibliography of Friedrich A. Hayek

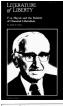
Books

Pamphlets

Books Edited Or Introduced

Articles In Journals, Newspapers, Or Collections of Essays

Works About Or Relevant to Friedrich A. Hayek





Editorial Staff

Leonard P. Liggio *Editor*

John V. Cody *Managing Editor*

Nancy Ostrem Production Manager

Timothy Rogus *Research Editor*

Ronald Hamowy Senior Editor

Walter Grinder Senior Editor

John E. Bailey, III *Rome, Georgia*

Randy Barnett *Chicago, Illinois*

William Beach *University of Missouri*

Donald Bogie Georgetown University

Samuel Bostaph *University of Dallas*

M. E. Bradford *University of Dallas*

Alfred Cuzan University of West Florida

Douglas Den Uyl *Marquette University*

Edward C. Facey *Hillsdale College*

John N. Gray

Jesus College, Oxford University

Malcolm Greenhill Oxford University

M. E. Grenander *SUNY at Albany*

John Hagel Larkspur, California

Jack High University of California, Los Angeles

Tibor Machan Reason Foundation, Santa Barbara

William Marina
Florida Atlantic University

Gerald O'Driscoll
New York University

Lyla O'Driscoll
New York Council for the Humanities

David O'Mahony University College, Cork, Ireland

Ellen Frankel Paul Hoover Institution

Jeffrey Paul Bowling Green, Ohio

Joseph R. Peden

Baruch College,

City University of New York

Tommy Rogers Jackson, Mississippi

Timothy Rogus *Chicago, Illinois*

John T. Sanders
Rochester Institute of Technology

Danny Shapiro
University of Minnesota

Sudha Shenoy University of Newcastle, New South Wales

Bruce Shortt
Stanford University

Joseph Stromberg *University of Florida*

David Suits Rochester Institute of Technology

Karen Vaughn
George Mason University

Alan Waterman Trenton State College

Editorial

The recognition of the insuperable limits to his knowledge ought indeed to teach the student of society a lesson in humility which should guard him against becoming an accomplice in men's fatal striving to control society—a striving which makes him not only a tyrant over his fellows, but which may well make him the destroyer of a civilization which no brain has designed but which has grown from the free efforts of millions of individuals.

Friedrich A. Hayek

("The Pretence of Knowledge," Nobel Memorial Lecture, December 11, 1974)

It is, of course, supremely easy to ridicule Adam Smith's famous "invisible hand"—which leads man "to promote an end which was no part of his intention." But it is an error not very different from this anthropomorphism to assume that the existing economic system serves a definite function only in so far as its institutions have been deliberately willed by individuals. This is probably the *last* remnant of that primitive attitude which made us invest with a human mind everything that moved and changed in a way adapted to perpetuate itself or its kind. In the natural sciences, we have gradually ceased to do so and have learned that the interaction of different tendencies may produce what we call an order, without any mind of our own kind regulating it. But we still refuse to recognise that the spontaneous interplay of the actions of individuals may produce something which is not the deliberate object of their actions but an organism in which every part performs a necessary function for the continuance of the whole, without any human mind having devised it.

Friedrich A. Hayek

("The Trend of Economic Thinking," Inaugural lecture delivered at the London School of Economics, March 1, 1933)

Is this all so very different
From what Lao-Tzu says
In his fifty-seventh poem?:
If I keep from meddling with people
They take care of themselves,
If I keep from commanding people,
They behave themselves,
If I keep from imposing on people,
They become themselves.

Friedrich A. Hayek

(Original epilogue to "The Principles of a Liberal Social Order," delivered at the Tokyo meeting of the Mont Pelerin Society, September, 1966)

Throughout F.A. Hayek's encyclopedic writings, we frequently hear a characteristically 'Hayekian' leitmotif sounding in either major or minor key: his belief in spontaneous ordering—through decentralized, free individual action—of social, legal, and economic institutions in contradistinction to the Cartesian and statist "error of constructivism," the belief that centralized control, planning, and coercion are required to coordinate economic and social activities. This theme animates his early psychological study *The Sensory Order* (B-10) (which Hayek first drafted as a student paper in 1919–1920). In a recent interview Hayek commented on this book which examines the way we order and process the welter of information that comes through our senses. This sensory ordering process is a system too complicated to be understood in detail, but in general terms it is "the conception of the spontaneous formation of an order, the formation of extremely complex structures."

The same notion of spontaneous order appears as a unifying thread in Hayek's economic, political, and legal thought. Looking back at economics in his Nobel Prize speech (1974), from the perspective of 75 years, Hayek discerned the origins of the tragic series of depressions, monetary destabilizations, inflations, and stagflations in the primitive belief of the need for governmental planning, the non-spontaneous disordering of the natural market forces of individual choices. In this speech his first citation is significantly to his 1942 essay "Scientism and the Study of Society," (which eventually became one chapter of *The Counter-Revolution of Science*, 1952) in which he excoriated the "scientistic attitude," which attempted to order and engineer society and economics by erroneously emulating in the social sciences the mechanistic methodology of the physical sciences.

Hayek's unsuccessful attempts to overcome the Keynesian irrationalism in economic policy during the 1930s led him during the early 1940s to add to his economic analysis an integrated political theory that echoed spontaneous order. Such works as The Road to Serfdom (1944), The Constitution of Liberty (1960), the trilogy Law, Legislation and Liberty (1973, 1976, 1979), and the forthcoming The Fatal Conceit (1983) stressed the continuity between economic and political liberty and warned of the "fatal conceit" of scientistic non-spontaneous attitudes in the rise of "constructivism," the attempt to politically construct a social, economic order. A strong antidote against succumbing to the political and economic variants of nonspontaneous planning or constructivism was a deep knowledge of political and especially economic history (see "History and Politics" in Capitalism and the Historians, 1954). Likewise in legal theory dealing with the 'rule of law,' echoing the insights of Bruno Leoni's Freedom and the Law (1961), Hayek would distinguish between irrational constructivism of legislation as opposed to the naturally evolved code of customs embodied in humane values and laws (see The Political Ideal of the Rule of Law, 1955, and the trilogy Law, Legislation and Liberty). Hayek's 1960 monumental Constitution of Liberty would weave together the legal, historical, political, and economic dimensions of the freedoms implied in a spontaneous-order social science methodology.

Our readers attention is called to a new, lively department in *Literature of Liberty*, our *Readers' Forum*, which will contain both invited and uninvited comments on our bibliographical essays and summaries. This month's *Forum*, befitting this Hayek

issue, focuses on Norman Barry's essay, "The Tradition of Spontaneous Order" [*Literature of Liberty* 5 (Summer 1982).]

This issue of our journal, by reason of John Gray's lengthy essay on Hayek and the comprehensive Hayek bibliography will not contain our usual summary department. This department will return in the next issue of *Literature of Liberty*. We encourage our readers to send in their comments on our recent essays and features. 1983 inaugurates our sixth year of publication and promises new and exciting additions to the usual departments in *Literature of Liberty*.

Readers' Forum

ORDER DEFINED IN THE PROCESS OF ITS EMERGENCE?

?A note stimulated by reading Norman Barry, "The Tradition of Spontaneous Order," Literature of Liberty, V (Summer 1982), 7–58.

Norman Barry states, at one point in his essay, that the patterns of spontaneous order "appear to be a product of some omniscient designing mind" (p. 8). Almost everyone who has tried to explain the central principle of elementary economics has, at one time or another, made some similar statement. In making such statements, however, even the proponents-advocates of spontaneous order may have, inadvertently, "given the game away," and, at the same time, made their didactic task more difficult.

I want to argue that the "order" of the market emerges *only* from the *process* of voluntary exchange among the participating individuals. The "order" is, itself, defined as the outcome of the *process* that generates it. The "it," the allocation-distribution result, does not, and cannot, exist independently of the trading process. Absent this process, there is and can be no "order."

What, then, does Barry mean (and others who make similar statements), when the order generated by market interaction is made comparable to that order which might emerge from an omniscient, designing single mind? If pushed on this question, economists would say that if the designer could somehow know the utility functions of all participants, along with the constraints, such a mind could, by fiat, duplicate precisely the results that would emerge from the process of market adjustment. By implication, individuals are presumed to carry around with them fully-determined utility functions, and, in the market, they act always to maximize utilities subject to the constraints they confront. As I have noted elsewhere, however, in this presumed setting, there is no genuine choice behavior on the part of anyone. In this model of market process, the relative efficiency of institutional arrangements allowing for spontaneous adjustment stems solely from the *informational* aspects.

This emphasis is misleading. Individuals do not act so as to maximize utilities described in *independently-existing functions*. They confront genuine choices, and the sequence of decisions taken may be conceptualized, *ex post* (after the choices), in terms of "as if" functions that are maximized. But these "as if" functions are, themselves, generated in the choosing process, not separately from such process. If viewed in this perspective, there is no means by which even the most idealized omniscient designer could duplicate the results of voluntary interchange. The potential participants *do not know until they enter the process* what their own choices will be. From this it follows that it is *logically impossible* for an omniscient designer to know, unless, of course, we are to preclude individual freedom of will.

The point I seek to make in this note is at the same time simple and subtle. It reduces to the distinction between *endstate* and *process* criteria, between consequentialist and nonconsequentialist, *teleological* and *deontological* principles. Although they may not agree with my argument, philosophers should recognize and understand the distinction more readily than economists. In economics, even among many of those who remain strong advocates of market and market-like organization, the "efficiency" that such market arrangements produce is independently conceptualized. Market arrangements then become "means," which may or may not be relatively best. Until and unless this teleological element is fully exorcised from basic economic theory, economists are likely to remain confused and their discourse confusing.

James M. Buchanan

Center for the Study of Public Choice George Mason University (after 1983)

SPONTANEOUS ORDERS: DETERMINISTIC OR NONDETERMINISTIC?

[I]f there is nothing unforeseen, no invention or creation in the universe, time is useless... For time is here deprived of efficacy, and if it *does* nothing, it *is* nothing.

Henri Bergson1

There are two forms of spontaneous order theories which I wish to distinguish in this brief note: those that relate to the *origin* of an aggregate structure and those that involve the *function* of the structure. The common element present in all theories of the first type is the claim that some overall social patterns or institutions are caused by a myriad of decentralized actions that do not aim at their establishment. Theories of the second type, however, disregard the origin of the pattern and seek, instead, to explain *why it continues* in existence. These functional theories recompose the structure in terms of the purposes it serves for the individual. Presumably, these will explain why the individual actions that give rise to the aggregate structure will themselves endure and hence why their product endures.

The claim I shall make is simply this: theories of spontaneous order, whether of the first (origin) or second (function) variety, cannot be deterministic if they are to explain economic or social processes over time.

Suppose, for example, we were to adopt the position that the causal link between decentralized actions and social structures or orders is deterministic. Then, on this assumption, certain initial conditions (actions 1...n) in conjunction with a theoretical law would yield with logical necessity the structure we want to explain. This rigid link between initial conditions and result is radical mechanism. Such explanations cannot tell the story of how orders can arise in the course of time. Instead, they can only provide a logical or static recomposition of an already-arisen order. For if the connection between cause and effect is deterministic then time literally adds nothing. Thus the aggregate structure should have already existed from day one but it did not. By the principle of causality, then, time must add something. This something is the

future decisions and choices of the many acting individuals. Since these decisions cannot be predicted by those who will make them, 4 we cannot model the individuals as foreseeing the emergent order. Hence genuine uncertainty or "surprise" must be part of any methodological individualistic story of the origin of social institutions.

Spontaneous order theories of the functionalist variety sometimes claim that the function which an institution serves provides a logically sufficient explanation of why it continues to exist. This claim is just the inversion of radical mechanism or, simply, radical finalism. 5 Instead of temporally antecedent events rigidly determining current institutions, we postulate that future functions determine (or explain) them. Since individuals act on the basis of their anticipations, it is only the future (anticipated) functions of institutions that could possibly be relevant. Such functionalist theories cannot, however, be evolutionary in the true sense. 6 This is because the complete set of sufficient conditions that maintain an order are created in the evolutionary process itself.7 Time must add something. In this case, what it adds is a change in individual knowledge and the anticipation of a possibly better way of achieving one's purposes. Thus, "order [is] defined in the process of its emergence." 8 In retrospect, when the complete set of causes in known (at least in principle) we might find it useful to construct a model of evolutionary process as aiming at some determinate function. Nevertheless, this model is only a heuristic delusion and may well lead us astray if we are not extremely careful. *Exante*, (in advance) any truly evolutionary process is itself a part of the ultimate outcome.

The general conclusion that can be drawn from these arguments is that theories of spontaneous order (and, *a fortiori*, of equilibrium) must be pattern explanations. The conjunction of statements about initial actions and a law explains the overall pattern or class of existing institutions rather than any specific institution. Similarly, functional theories can rationalize the class of possible structures that will serve a particular function rather than 'postdict' the optimal structure. As John von Neumann and Oskar Morgenstern have said, "[T]he complete answer to any specific problem consists not in finding a solution, but in determining the set of all solutions." 10

Notes

This note was stimulated by Norman Barry's thought-provoking article, "The Tradition of Spontaneous Order," *Literature of Liberty*, 5 (Summer, 1982): 7–58. I am indebted to the Scaife and Earhart Foundations for support of my research and to Mr. Bruce Majors (Graduate Department of Philosphy, Catholic University of America) for able research assistance. Elaboration of some of the themes in this note will appear in G. P. O'Driscoll, Jr. and M. J. Rizzo, *The Economics of Time and Ignorance* (Oxford: Basil Blackwell, forthcoming in 1983).

Mario J. Rizzo

Department of Economics New York University

"SPONTANEOUS ORDER"—A COMPLEX IDEA

Norman Barry's richly erudite essay on the "tradition of spontaneous order" could, I believe, have provided even more valuable historical insight with the help of a simple yet highly significant distinction (somehow not articulated in the essay.) Barry sees the idea of spontaneous order as consisting in the view "that most of those things of general benefit in a social system are the product of spontaneous forces that are beyond the direct control of man." What is not made clear in Barry's paper, however, is the circumstance that this idea is itself made up of *two* quite distinct and separate ideas—each of which is, in a way, entitled to its own (admittedly not entirely separate) history.

Consider the position of *critics* of the idea of spontaneous order. Such critics may deny the validity of the idea on either (or both) of two quite distinct sets of grounds. (So that the affirmation of the idea of spontaneous order presumes the refutation of both grounds.) First, critics may argue that, in the absence of the "direct control of man," social phenomena emerge in entirely haphazard, unsystematic fashion. For example, it may be held that the results produced by a free market exhibit no orderliness whatsoever, benign or otherwise. Second, it may be argued that, although analysis of decentralized, non-controlled, freely interacting systems may indeed demonstrate the spontaneous emergence of regularities, these regularities must, nonetheless, be judged as carrying implications for society that are the oppostie of benign. Conversely, therefore, to uphold the idea of spontaneous order means to uphold two ideas: (1) the idea that permitting spontaneous social forces to work themselves out results in systematic, rather than in random or chaotic results; (2) the idea that the normative character of these systematic results can hardly be judged as other than socially beneficial. Clearly this second idea could have little scope without acknowledgement of the first. But, on the other hand, acceptance of the first idea carries with it, of itself, no commitment to the second.

Ludwig von Mises, in fact, saw the great contribution of the classical economists in a manner not depending on the second idea at all. This contribution consisted, Mises wrote, in the demonstration that "there prevails" in the course of social events, "a regularity of phenomena to which man must adjust his actions if he wishes to succeed." (Human Action, 1949, p. 2). What separated the great classical economists from their predecessors was that the latter (because they "were fully convinced that there was in the course of social events no such regularity and invariance of phenomena as had already been found in the operation of human reasoning and in the sequence of natural phenomena") believed "that man could organize society as he wished." This discovery of the inherent regularities that emerge spontaneously from free society interaction represented the major scientific breakthrough in the history of social understanding. To be sure many of the exponents of this discovery recognized, in addition, the *benign* character of these regularities. But many (one thinks perhaps of Marx, Pigou, Keynes) have questioned the social desirability of at least some aspects of these accepted regularities. Thus the ranks of those skeptical of the idea of spontaneous economic order have been swelled, in the past, not only by historicist or institutionalist critics of the possibility of economic theory as such, but also by

economic theorists who have claimed, correctly or otherwise, to perceive theory as showing the systematic emergence of social *im*moralities or social *im*efficiencies.

In tracing the history of the idea of spontaneous order, therefore, it would appear of value to trace through the development of *each* of these two separable components of the complex idea of spontaneous order. Precisely because the separate components have often appeared together in integrated form, it would be useful to trace the separable traditions from which they have emerged over the centuries.

It will be noticed that Barry does take pains (pp. 11–12) to distinguish two distinct senses of "spontaneous order." One refers to "a complex aggregate structure which is formed out of the uncoerced action of individuals." The second refers to "the *evolutionary growth* of laws and customs through a...'survival of the fittest' process" (with this second kind of undesigned process quite possibly producing dead-ends the escape from which might be held to call for massive centralized control.) Barry's distinction certainly presupposes the possibility, at least, of articulating the distinction offered in this note. Our argument here, however, is that Barry's superb historical survey could have offered an even richer yield if it were presented with explicit attention to the historical antecendents of this latter distinction itself.

Israel M. Kirzner

New York University

ON "THE TRADITION OF SPONTANEOUS ORDER"

Norman Barry (*Literature of Liberty* 5, Summer 1982) has hinted at a crucial problem in Hayek's evolutionary theory of spontaneous orders. Hayek claims that "all progress must be based on tradition," but, Barry points out, this would seem to lead to a conclusion uncomfortable for libertarian ideology:

The difficulty with Hayek's analysis is that social evolution does not necessarily culminate in the classical liberalism that he so clearly favors: there are many non-liberal institutions which have indeed survived... Yet if we are intellectually tied to tradition, and if our 'reason' is too fragile an instrument to recommend satisfactory alternatives, how are we to evaluate critically that statist and anti-individualist order of society which seems to have as much claim to be a product of evolution as any other structure? (p. 46)

How indeed?

The difficulty with the way Barry puts the question is that it seems to misconstrue the purpose of theories of social evolution. Even if we agree with Hayek that cultures evolve as the unintended and largely unconscious consequences of human action, that carries with it no necessary implication about how one should morally evaluate a society or a social practice. A scientific theory about how societies do in fact evolve cannot be taken as a basis for ethical judgment without some very carefully thought-out intervening steps. Furthermore, to say that "all progress must be based on

tradition" is not also to say that we cannot imagine or work toward whatever idea of progress we adopt. Indeed, it may only be possible to effect social change by starting from a firm basis in tradition, but that says nothing about the moral worth of tradition from which we start.

The hidden premise in Hayek's work, and the source of Barry's criticism, is the idea that evolution somehow must progress toward "the good." Yet if evolution is a process in which the fittest survive, what are we to make of the fact that some very unpleasant societies have survived? Hayek's way out of that trap is to implicitly limit evolution toward "the good" to that which evolves spontaneously as humans search to discover rules of just behavior rather than to design them, while bad change is the product of "constructivist rationalism." Thus Hayek gives us a way of judging different societies, but he does not gives us a scientific explanation of why spontaneous orders often seem to lose out in the evolutionary struggle to more constructed societies. To reply, as some of my colleagues do, that constructivist change can only win via use of force really begs the question. Force is as much a means to achieve ends at the disposal of human beings as is persuasion and exchange. A theory of cultural evolution must be able to explain the change that has in fact occured apart from any judgments about good or bad change. Hence the question remains: why do some cultures thrive and prosper while others wither and die? Even more to the point, is there a natural selection process at work for human culture analogous to the natural selection process hypothesized for the biological world?

Hayek does want to incorporate a theory of natural selection into his evolutionary theory. For Hayek, cultures are successful because they evolve in a way that economizes on the amount of articulated knowledge necessary for an individual to function in that society. Those cultures survive which incorporate in their customs and rules of behavior practices which unbeknownst to individuals in that culture are important to their survival. While that seems a useful starting place for a theory of natural selection among cultures, we still have no theory about how cultural practices arise, and what kinds are "naturally selected." Answers to both questions are crucial to the development of a full theory of cultural evolution. They are also crucial if we want to have any chance of changing the less than satisfactory society in which we live today.

This is not the place to attempt to develop a theory of natural selection in cultural evolution. Instead I would like to raise some questions that such a theory would have to address to be complete.

First of all, how do cultural practices and institutions originate? While we can agree with Hayek that spontaneous orders arise from the unintended consequences of human action, one imagines that the originating actions must have been intentional in some sense. Humans act because they believe their actions have consequences. What is the relationship between intended outcomes and unintended consequences? To what extent are the expected results of various actions realized, and what differentiates intentional acts that fulfill expectations from those that do not? Are there *no* institutions that are the product of conscious design? In other words, what is the role

of human intentions in the establishment of rules, customs, institutions, and political organizations?

Second, and equally important, if there is a natural selection process in cultural evolution, what is it that gets selected? In biological evolution, success is defined as survival of a trait in the gene pool or survival of a particular species. By what criterion are successful cultures selected? Some might argue that success of a culture is demonstrated by numbers of individuals surviving in a society—a population count. But then, what demographic characteristics describe a "larger" population? Would a population with a large number of births and high infant mortality be considered more successful than one with fewer births and more children surviving to adulthood? Both kinds of societies exist today. Which is more successful? Or would a large, relatively young population with a short life span for any one individual be considered more successful than a smaller population where individuals live longer productive lives?

Consider another possible criterion for describing a successful society: the ability of a society to command resources. This seems to be the implicit criterion used by economists when they speak of successful societies. If this is truly what "nature" selects for among cultures, than small wealthy cultures should always be observed to win out over potentially larger but poorer cultures. But then why do poor cultures coexist with wealthy ones, and why do poorer cultures sometimes survive (and even defeat) very wealthy ones? Success at commanding material resources might be a viable criterion to use as a basis for a theory of natural selection, but if so, the full implications of the theory have yet to be worked out.

Part of the problem with both these suggested criteria of natural selection is that the level of analysis is wrong. We fall into the habit of thinking of societies and political units rising and falling, winning and losing, when it would be a great deal more fruitful to think of specific ideas or specific practices as the substance of cultures and cultural change. In other words, a good theory, I believe, would disaggregate the societies into the various ideas and practices of which they are composed and view the ideas and practices as the units that "nature" selects. This is not inconsistent with Hayek's work; he refers to human imitation as the transmission mechanism for cultural evolution in the same sense that genes are the transmission mechanism for biological evolution. What humans imitate are ideas and actions, and in so far as specific actions can be explained as ideas put into practice, it is ideas that arise, get imitated, and either survive in the 'idea pool' or get discarded.

If we are willing to think of ideas as the units of cultural evolution, a whole host of interesting possibilities present themselves.

For instance, how do new ideas and combinations of ideas arise, and why do some ideas appeal to individuals enough to be "imitated" or believed while others do not? Are there different criteria that individuals apply for selecting among ideas? If we start from the premise that individuals choose (in some sense) the ideas they believe, one can then take the next step of assuming they choose ideas to fulfill purposes. But what criteria do individuals apply to choose among competing ideas? The criteria may vary depending on the nature of the idea. For example, technical ideas that explain

how to do something to achieve a specific end are "selected" if they actually work. They are subject to a reality test that allows people to weed out useless ideas rather quickly, and hence one would expect to observe progress in technical knowledge. Moral ideas have a less obvious purpose and a very nebulous reality test; there is no easy way to discover whether they "work" or not. Hence, progress in moral knowledge might be as difficult to define as it is to observe. In either case, however, the "natural selection" process is a process of human selection among humanly inspired ideas. And the survival of the fittest becomes a survival of ideas that human beings *believe* are the fittest for their purposes.

On a more aggregated level, groups of individuals or societies have as a unifying force a common set of ideas, an ideology, that is a composite of many smaller sets of ideas that may or may not be consistent with each other. Survival of the group may depend on adherence to some of those ideas but not others, but since they are all accepted by the group as a bundle, there may be no way that individuals can determine which are crucial; the valuable traditions are bundled with the irrelevant. This is consistent with Hayek's view of the value of tradition. By developing a theory of cultural evolution based on the idea as the cultural analogue of the gene in biology, however, we might be able to develop a theory to help us "unbundle" the ideas inherent in a tradition in a way that will make progress toward the libertarian ideal possible.

A theory of spontaneous order is a first step, but only a first step, to understanding the process of cultural change.

Karen I. Vaughn

George Mason University

COMMENT ON "THE TRADITION OF SPONTANEOUS ORDER"

Norman Barry's essay is extremely valuable in at least three respects:

- 1.it describes the evolution of thought about spontaneous orders;
- 2.it contrasts various versions of rationalist and anti-rationalist libertarianism; and
- 3.it subjects Hayek's theory to a number of revealing checks for consistency

In my comments, I shall focus on the second and third of these aspects. In particular, I shall criticize and supplement the answers Barry gives to the following two questions: What is the role of reason in Hayek's theory of the evolution of legal order? And: What is Hayek's normative criterion in evaluating a legal order?

According to Barry, Hayek's "extreme anti-rationalism" (p. 46)... "is so distrustful of reason that it instructs us to submit blindly to a flow of events over which we can have little control" (p. 52). It is easy to find passages in Hayek's writings, especially in his later ones, which, taken by themselves, seem to support this interpretation.

However, they have to be seen in the context. Remember, for example, what Hayek wrote, after his devastating attack on rationalist constructivism, in *The Constitution of Liberty*:

The reader will probably wonder by now what role there remains to be played by reason in the ordering of social affairs... We have certainly not meant to imply... that reason has no important positive task. Reason undoubtedly is man's most precious possession. Our argument is intended to show merely that it is not all powerful... What we have attempted is a defense of reason against its abuse by those who do not understand the conditions of its effective functioning and continuous growth... What we must learn to understand is...that all our efforts to improve things must operate within a working whole which we cannot entirely control...None of these conclusions are arguments against the use of reason, but only arguments against such uses as require any exclusive and coercive powers of government. (pp. 69–70)

Hayek is not generally distrustful of reason but he is not explicit about the positive role which reason can play in the evolution and improvement of the legal order. We are mainly told what reason cannot do and must not try to do, and that reason is not a sufficient or necessary condition for progress to occur. But Hayek does not deny that reason affects the evolution of social orders:

Our issue may now be pointed by asking whether...human civilization is the product of human reason, or whether...we should regard human reason as the product of civilization... Nobody will deny that the two phenomena constantly interact. ("Kinds of Rationalism," in: *Studies in Philosophy, Politics and Economics*, p. 186)

After all, human reasoning is nothing but the application of learnt rules to new circumstances and in new combinations.

For Hayek, the distinguishing characteristic of a spontaneous order is not that each or most of its rules have never deliberately been adopted but that it is the result of a gradual and decentralized evolution:

While the rules on which a spontaneous order rests may also be of spontaneous origin, this need not always be the case... It is possible that an order which would still have to be described as spontaneous rests on rules which are entirely the result of deliberate design. (*Law, Legislation and Liberty*, Vol. 1, pp.45–46)

Even more, Hayek calls for deliberate attempts to improve our rules of just conduct:

Their gradual perfection will require the deliberate efforts of judges (or others learned in the law) who will improve the existing system by laying down new rules. Indeed, law as we know it could never have fully developed without such efforts of judges, or even the occasional intervention of a legislator to extricate it from the dead ends into which the gradual evolution may lead it, or to deal with altogether new problems. (*Law, Legislation and Liberty*, Vol. 1, p. 100)

Hayek certainly does not "instruct us to submit blindly to (the) flow of events" as Barry suggests. But the reason for Barry's misunderstanding is a general difficulty in

interpreting Hayek: he is not careful to qualify his statements in the immediate context. Hayek is a writer on the offensive who rarely guards against misunderstanding and potential charges of inconsistency. He trusts that the reader will give him the benefit of the doubt and interpret separate statements of his as mutual qualifications rather than as contradictions.

Barry raises the important question whether the same process of spontaneous evolution can be thought to apply to economic processes under a system of legal rules and to the development of the legal rules themselves. I would answer that individual behavior and customary or contractual arrangements in production and exchange can be viewed as a private decentralized affair; however, an enforceable legal order is a collective or public good. Since Hayek tends to neglect this distinction, it seems reasonable to assume that he envisages the same type of evolutionary process for both economic practices and legal rules: a process that is driven by the interaction of human reason and random events and guided by imitation and procreation of the successful. Human reason proposes, the survival test disposes. Since legal rules cannot be tried by an individual on his own, they must at first be tested in voluntary small-group experiments:

Voluntary rules...allow for gradual and experimental change. The existence of individuals and groups simultaneously observing partially different rules provides the opportunity for the selection of the more effective ones. (*The Constitution of Liberty*, p. 63)

What we wish to stress...is...the importance of the existence of numerous voluntary associations, not only for the particular purposes of those who share some common interest, but even for public purposes in the true sense. (*Law, Legislation and Liberty*, Vol. 2, p. 151)

We therefore arrive at an implicitly contractarian explanation of the legal order 1: not constructivistic or holistic contractarianism à la Rousseau but evolutionary or piecemeal contractarianism.

In contrast, Hayek's ultimate *normative* criterion for evaluating a legal order is not contractarian (this distinguishes him from James M. Buchanan, for example). Nor is it true that Hayek regards the results of evolutionary, undesigned processes as necessarily good (as Barry seems to believe; pp. 12, 45–46). For Hayek, evolutionary and decentralized procedure is expressly not a sufficient but "merely" one necessary condition of progress (*Law, Legislation and Liberty*, Vol. 3, p. 168). Another necessary condition is that the chances of anyone selected at random are maximized:

Since rules of just conduct can affect only the chances of success of the efforts of men, the aim in altering or developing them should be to improve as much as possible the chances of anyone selected at random. (*Law, Legislation and Liberty*, Vol. 2, pp. 129–30)

Indeed, this maximization criterion seems to be a logically sufficient normative criterion which delegates the evolutionary (as well as any contractarian) principle to the status of auxiliary test, an operational indicator.

Hayek's maximization criterion is a probabilistic version of rule utilitarianism. It allows for the existence of risk (as did Bentham) and the need for rules (as did John Stuart Mill). Curiously enough, Hayek rejects utilitarianism at large in his more recent writings. In the mid-sixties, he had still called David Hume's moral philosophy a "legitimate form" of utilitarianism ("Kinds of Rationalism" in *Studies in Philosophy*, p. 88). Like any brand of consequentialist ethics, probabilistic rule utilitarianism requires the use of human reason—even if it is of the non-constructivistic type.

Notes

Roland Vaubel

Institut für Weltwirtschaft University of Kiel

NORMAN BARRY: THE TRADITION OF SPONTANEOUS ORDER

Norman Barry's bibliographical essay, 'The Tradition of Spontaneous Order' was both erudite and stimulating, and it will be an important source for all who work in this area in the future. In reading it, however, I was struck by certain obvious (but inevitable) gaps—most notable among which were Burke, and Savigny and the German historical school. It also provoked a few reactions, some of which I describe, briefly, below.

1. Interventionism And The Breakdown Of Spontaneous Order In Smith And In Hayek

1.1 Smith, Virtue And Commercial Society

Barry quoted Adam Smith on the 'fatal dissolution that awaits every state and constitution whatever,' 1 but he made no more of it than to say that 'the explanation of spontaneous order in the non-economic sphere may slip unintentionally into a kind of determinism.' But the 'fatal dissolution' theme in fact goes with the concern about the 'inadequacies' of a commercial system, and the misgivings about its impact on civic virtue, that Barry discusses in connection with both Ferguson and Smith. It is all, I think, most plausibly understood as the tail-end of the 'civic humanist' tradition, stemming from the works of Polybius and Machiavelli, and then influential in the work of many other figures in the history of political thought. 2

The civic humanist tradition included the theme of the cyclical development of constitutional orders, and of each 'good' constitutional form in time becoming

corrupt, and declining into its corresponding 'bad' form; but where there is a possibility that this corruption, and thus the decline, might be halted through the actions of a 'statesman.' This theme, it seems to me, is both echoed and transformed not only in Smith and Ferguson's depictions of the disadvantages of commercial society, but also in the interventionism that Smith produces in response, 3 much of which may, I think, be seen as an attempt to safeguard virtue in the face of the corrupting influences of commercial society.

1.2 Hayek And The Self-Destruction Of A Free Society

Barry rightly emphasizes Hayek's concern about the breakdown of a cosmos under the impact of interventionism. What is not, perhaps, adequately stressed is the way in which a free society could, on Hayek's account, be expected to break down of its own accord. For Hayek, following Mandeville and Hume, emphasizes that a free society depends, crucially, for its functioning, on arrangements (including both the market itself and the legal order appropriate to it) some features of which will strike the individual members of that society as unfair or undersirable. If they could understand how these mechanisms function, Hayek thinks, they would see that all is for the best. But Hayek, here following the Scottish Historical School, takes a realistically skeptical view about the role of human reason in society. In Hayek's view, the individual's compliance with these institutions was earlier archived through the influence of custom and uncritically accepted religious belief. But the power of these has, Hayek thinks, been weakened by the development of the market order itself—which, indeed, could be described as having created the social preconditions for the possible practice of Hayek's *false* individualism.

Hayek believes that, for a free society to flourish—or even for it to continue in existence—individuals must take up an attitude of 'humility' toward the various social forces and processes which they do not understand, but which play a positive role in a free society. But how, on Hayek's account, is it possible for them to know which are the forces etc. before which they should be humble? Hayek certainly does not advocate a *general* attitude of the passive acceptance of existing arrangements, and, in some areas, he is all in favor of innovation and change. But how is the individual member of society supposed to tell which elements of his heritage are to be conserved and which overthrown? Here, Hayek seems to oscillate between a view which plays up the role of ideas in society and the possibility of a rational understanding of how society functions (at least for the 'intellectual'), and a view which emphasizes the role of the customary, the traditional and the tacit. It is difficult to see how any resolution of this problem can be offered within the compass of Hayek's work, and I think that it is a more general problem for libertarianism, too.

2. Methodology Vs. Political Economy In Hayek

In his discussion on Hayek on 'The Free Exchange System,' Barry mentions the way in which "in the work of G.L.S. Shackle and Ludwig Lachmann...the spontaneous emergence of *order* may only be a chance phenomenon;" and he suggests that "In Hayek's early work on the theory of market process... The assumption was that a

catallaxy was leading towards equilibrium rather than being moved away by endogenous factors." 6

These ideas are crucial to Hayek's work—for just consider to what extent, in his political writings, he rests his case on claims about what the market order will deliver. Barry tells us that "there are certain identifiable causal factors at work which bring about this equilibriating tendency, namely competition and entrepreneurship." But do they actually do the trick, and can one *show* that a market order will do what Hayek requires of it on the basis of his views about the methodological foundations of economics? This seems to me very much an open question, and one that it is a matter of some urgency for the friends of liberty to answer.

3. Menger Vs. Hayek On Spontaneous Order

Barry has, importantly, drawn attention to Menger as a theorist of spontaneous order (as well as of methodology and economics), and he has also pointed to the distinctive character of Menger's views here. 8 Menger, one might say, stands between Savigny and the radical individualist. He appreciates the historical school's emphasis on the undesigned character of law, but he thinks little of their theoretical explanations of it, and, while dismissing the 'pragmatism' of the radical individualists, 9 he demands that our heritage from the past be submitted to critical scrutiny.

In describing these views, Barry takes pains to contrast them with those of Hayek. But is this correct? For while, certainly, in some of Hayek's writings he seems to speak as if the deliverances of various 'evolutionary' processes should simply be uncritically accepted, this can be matched by passages in which he demands that inherited legal institutions should be rationally appraised to see if they do, indeed, comply with the requirements of a (classical) liberal order. As these latter ideas are found notably in some of Hayek's earlier writings, it might be tempting to suggest that there is a development in Hayek's views here. But the two themes occur sufficiently often in writings of the same period, or even in the same works, for it to be unavoidable, I think, for us to admit that Hayek emphasizes both rational criticism and evolutionary themes at once. And his plans for radical constitutional reform—emphasized in some of his most recent writings—rule out the possibility that, in his later work, reason becomes collapsed into 'evolutionary' social developments. 10

It would seem to me, rather, that we must accept that both of these themes are there (at least in parallel—as was also the case in Menger 11), and I would suggest that, despite their differences on many other points, our best hope of an overall interpretation might be to follow up Hayek's references to Popper's critical rationalism, which does offer us a promise that traditionalism and the demand for rational critical scrutiny may be combined. 12

Notes

Jeremy Shearmur

Dept. of Government University of Manchester England

COMMENTS ON "THE TRADITION OF SPONTANEOUS ORDER"

Norman Barry's article "The Tradition of Spontaneous Order" (*Literature of Liberty*, Summer, 1982) seems to me a most perceptive analysis: it is easily the best survey of its topic which has appeared.

There are, however, one or two points at which I should be inclined to portray matters differently from Barry. Before presenting these, however, I should emphasize that these do not detract from my admiration of Barry's essay.

First, if a spontaneous order is defined as one that is not planned by a single mind but, rather one that emerges from the coordinated actions of the actors in a social system, it is not evident why only *individuals* can form such an order. Suppose, contrary to methodological individualism, that there are emergent laws for societies composed of more than a few individuals, which cannot in principle be reduced to the actions (planned or unplanned) of the individuals who compose that society. Why would the existence of such laws preclude the existence of spontaneous orders derived from individual actions in just the manner Barry sets out? I am not sure whether my last remark involves any difference of opinion with Barry. He says, "It is a major contention of the theory of spontaneous order that the aggregate structure it investigates are the outcomes of the actions of *individuals*," (pp. 8–9). This does not claim that the spontaneous order tradition rejects all social laws not conforming to the requirements of methodological individualism: it is only that spontaneous orders must be reducible to individuals' actions. Without criticizing methodological individualism, I would question whether the truth of spontaneous order theories rests on the truth of that methodology.

Another point, raised by Barry's excellent discussion of Carl Menger, is whether the results which have arisen from a spontaneous order can also come about as the result of consciously planned action. Menger, whose explanation of the origin of money is a paradigm case of spontaneous order held, according to Barry, that money need not arise by the spontaneous process he described: "Against the rationalist explantion [that money arose by specific agreement] Menger argues that, although money can and has come about in this way, the institution can be accounted for by natural processes." (p. 32) There is an interesting contrast here with Ludwig von Mises who in *The Theory of Money and Credit* and *Human Action* maintains that money *must* arise by a spontaneous process. Also, Hayek wants to say not only that production can be coordinated spontaneously by the market but that a centrally directed economy is incapable of such coordination.

The question then arises, does one want to make it a requirement of a spontaneous order theory that the order which has arisen spontaneously could not have done so otherwise? If one does, in what sense of "could not"? Must it be logically impossible? And, if one does not impose such a requirement, must one at least hold that a particular result is much more likely to have emerged spontaneously than otherwise?

Raising this question involves no dissent from Barry's analysis. But at one point he does seem to me to be in error. He distinguishes two sorts of explanations of social structure that involve no reference to conscious design. "One version shows how institutions and practices can *emerge* in a casual-genetic manner while the other shows how they in fact *survive*." (p. 11) As an example of what he has in mind, Barry contrasts a market system, governed by the price mechanism, with the evolution of a legal system, in which "it is not obviously the case that there is an equivalent mechanism to produce that legal and political order which is required for the coordination of individual order." (p. 11)

I fail to see why Barry thinks that evolutionary model doesn't provide a mechanism for the emergence of spontaneous order. In the example of the evolution of legal systems, the argument is that societies with legal systems which succeed in coordinating individual actions will, other things being equal, have a greater chance at survival than societies without such systems. Granted that some societies have better coordinated legal systems than others at the start; differential survival explains why the systems present in these societies will spread.

The mechanism here seems quite analogous to the price system, in which firms which fail to produce what the consumers demand (or at least do so to a lesser extent than others) tend to fail by the wayside. The emergence of a market order where one does not exist, is also a process that takes time.

Perhaps Barry's argument, though, is that for the case of the legal system, one hasn't been given explanation of the way in which the legal system that eventually triumphs has arisen. (Just as in biological evolution the mechanism of natural selection doesn't explain the emergence of genetic variance.) This is perfectly true, but, once more, how is this case different for the price system. The process of market coordination does not explain the original pricing and output decisions of the firms in an economy. It explains, rather, why firms which have made the "right" decisions supplant those which have not.

Barry is of course right that the legal system that emerges through "survival of the fittest" may not be conducive to classical liberalism (or at least one needs some argument to show that there must be such a correspondence. One possibility is that since market economies tend to survive better than non-market societies, which cannot coordinate the knowledge in society, a legal system conducive to market order will have a significant evolutionary advantage.) But this does not show that there isn't a mechanism for the emergence of a legal order (I'm not clear whether Barry intends to deny this in his discussion on pp. 11–12).

Finally, Barry successfully avoids a frequent error about the relation of spontaneous orders to ethics. He says, "There is, of course, implicit in all the writers in this tradition the notion of an ethical payoff: that is, we are likely to enjoy beneficial consequences by cultivating spontaneous mechanisms and by treating the claims of an unaided reason with some skepticism." (p. 11) The argument, in other words, is that spontaneous orders lead to better results: it isn't that a spontaneous order is, as such, ethically superior to planned order.

This may seem obvious, yet I have heard it argued that if the minimal state of Robert Nozick's *Anarchy, State, and Utopia* arose through a non-spontaneous process (e.g. people agreeing to cut down an existing state) its moral validity would be placed in question. It isn't at any rate obvious why a conscious agreement is morally inferior to a spontaneous order. It might be said that with a spontaneous order, at least one knows that the actions of the constituent individuals haven't been coerced. But this is wrong: why can't coerced actions be the subject of invisible-hand explanations? And agreements, on the other side, can be entirely voluntary. Barry evidently disagrees with the first part of this, as he apparently (p. 11) makes it a requirement of a spontaneous order that it operate on uncoerced actions. But he gives no reason for this.

In conclusion, Professor Barry is to be congratulated for his outstanding article. To readers of his previous works, the excellence of the present essay will come as no surprise.

David Gordon

Los Angeles



Bibliographical Essay

F. A. Hayek And The Rebirth Of Classical Liberalism

John Gray

Jesus College, Oxford

Introduction: The Revival Of Interest In Hayek—A Unified Research Program In Hayek's Writings?

In the recent revival of public and scholarly interest in the values of limited government and the market order, no one has been more centrally significant than Friedrich A. Hayek. His works have figured as a constant point of reference in the discussions both of the libertarian and conservative theories of the market economy; they have also provided a focal point of attack for interventionist and collectivist critics of the market. Hayek's return to such a pivotal position in intellectual life is remarkable when we recall that for several decades his work was subjected to neglect and obscurity. It was not until 1974 at the age of 75 that he was belatedly acknowledged by being awarded the Nobel Memorial Prize in Economic Science. During the three decades after 1945, when certain Keynesian ideas seemed to have been vindicated by the prevailing government policies of economic interventionism, Hayek may have seemed an intransigent and isolated figure, whose chief importance was that of an indefatigable critic of the spirit of the age. It was, however, during these very same years, in which he turned from economic theory to political thought, that Hayek made his greatest contributions thus far to the formulation of a public philosophy, including most notably his Constitution of Liberty (1960), surely the most powerful and profound defense of individual freedom in our time. It is noteworthy that, in the revival of interest in Hayek's work, his contributions to political philosophy have attracted as much interest as have his works in economic theory.

The Unity And Coherence Of Hayek's Writings: Conception Of Mind & Unity Of Knowledge

In all of this revival of scholarly interest, however, Hayek's work has rarely been viewed as a whole. In fact, it has often been suggested that what we find in his writings is a series of unconnected episodes, in which questions are addressed in a variety of disciplines on a number of disparate historical occasions, rather then a coherent research program implemented over the years. Even Hayek's friends have sometimes discerned important tensions and conflicts in his writings, leading them to argue that his work encompasses methodological and political positions which are in the last resort incompatible. Against this view, to which I once subscribed myself, I want now to submit that Hayek's work does indeed disclose a coherent system of ideas. Hayek's system of ideas may not perhaps be wholly stable, but in this system positions covering a range of academic disciplines are in fact informed and unified by a small number of fundamental philosophical conceptions. Identifying these basic philosophical positions, and showing how they infuse his entire work, is the chief aim of this review of Hayek's work. It will not be my argument that Hayek's system lacks difficulties or internal tensions. I will try, however, to show that his work is given a cohesive and unitary character by the claims in theory of knowledge and in theoretical psychology which inform and govern his contributions to many specific debates.

My strategy in this survey of Hayek's work is to seek the unifying wellspring of his thought in his conception of the mind and in his account of the nature and limits of human knowledge. My argument will be that Hayek's general philosophy—a highly distinctive development of post-Kantian critical philosophy—informs and shapes his contributions to a variety of academic disciplines (jurisprudence and social philosophy as much as economic theory and the history of ideas), and Hayek's philosophy does so in ways that have been persistently neglected or misunderstood. In particular, Hayek's account of the structure of the mind, of the nature and limits of human knowledge, and of the use and abuse of reason in human life pervades his writings down to their last details, and gives to his work over the years and across many disciplinary boundaries the character of a coherent system. We can see the structure of Hayek's system of ideas and we can realize its capacity to yield an integrated view of man and society only when we have adequately specified its philosophical foundations. It is only once we have grasped these philosophical foundations of his thought, again, that we may fully appreciate his originality as a thinker and the measure of his achievement as a social theorist.

Overview Of Topics Covered In This Essay

I begin my survey by examining briefly the chief claims Hayek makes in his centrally important but sadly neglected treatise in theoretical psychology, *The Sensory Order* (1952), where he most systematically and explicitly develops his account of the mind and of human knowledge. Having set out the principal features of Hayek's view of the mind and of the forms of human knowledge, I shall try to show how these conceptions inform his account of a spontaneous order in society, and how they condition his distinction between 'economy' and 'catallaxy,' his elaboration of the argument about economic calculation under socialism, and his distinctive position as to the appropriate theory and methods for economics. I proceed then to examine how Hayek applies his general philosophy to the relations of individual liberty with the rule of law. In the course of this survey I will canvass some of the most important criticisms of Hayek's system, concentrating particularly on the claim that his conception of a spontaneous order in society is unclear, and his use of it objectionable. It is often argued that, when taken in conjunction with its twin idea of cultural evolution by the natural selection of rival social practices, the idea of spontaneous social order has a conservative rather than any liberal or libertarian implication, since it appears to entail blind submission to the result of any unplanned social process. Against this criticism, which expresses the common view that Hayek's political thought is an unstable compound of conservative or traditionalist and liberal or libertarian elements, I will argue that the idea of spontaneous social order in Hayek's work is best seen as a value-free explanatory notion and that invoking this idea illuminates rather than undermines the bases for the commitment to liberty. 1a

In developing my argument by way of an examination of the criticisms of a number of writers in opposed intellectual traditions—Michael Oakeshott, James Buchanan, and Irving Kristol, for example—I will conclude that Hayek's chief achievement is in his reviving the intellectual tradition of classical liberalism of which varied strands in contemporary conservatism and libertarianism are quarreling offspring. In the course of this survey I will, also, identify three principal achievements of Hayek's social philosophy: (1) his demonstration of the import for social theory of an erroneous Cartesian theory of the mind and the role of this theory in inspiring modern attempts at the rational design of social life; (2) his theory of the liberal order, which is a synthesis of the theories of justice of Immanuel Kant (1724–1804) and David Hume (1711–1776) with a devastating critique of contemporary conceptions of distributive justice; and (3) his proposal for a resolution of a central difficulty of classical liberal theory in the intriguing ideas of a market in traditions.

The upshot of my assessment of Hayek's thought will be that, whereas his critics have identified ambiguities, tensions, and unclarities in some of his formulations, the interest and appeal of his system remains unimpeached. Despite (or even because of) its problematic aspects, Hayek's system of ideas remains a powerful and compelling research program—in my own opinion, the most promising we have at our disposal—for classical liberal social philosophy.

Hayek's General Philosophy—The Kantian Heritage

The entirety of Hayek's work—and, above all, his work in epistemology, psychology, ethics, and the theory of law—is informed by a distinctively Kantian approach. In its most fundamental aspect, Hayek's thought is Kantian in its denial of our capacity to know things as they are or this world as it is. It is in his denial that we can know things as they are, and in his insistence that the order we find in our experiences, including even our sensory experiences, is the product of the creative activity of our minds rather than a reality given to us by the world, that Hayek's Kantianism consists. It follows from this skeptical Kantian standpoint that the task of philosophy cannot be that of uncovering the necessary characters of things. The keynote of critical philosophy, after all, is the impossibility of our attaining any external or transcendental standpoint on human thought from which we could develop a conception of the world that is wholly uncontaminated by human experiences or interest. We find Kant's own writings—above all the Critique of Pure Reason (1781)—a case against the possibility of speculative metaphysics which Hayek himself has always taken to be devastating and conclusive. It is a fundamental conviction of Hayek's, and one that he has in common with all those who stand in the tradition of post-Kantian critical philosophy, that we cannot so step out of our human point of view as to attain a presuppositionless perspective on the world as a whole and as it is in itself. The traditional aspiration of western philosophy—to develop a speculative metaphysics in terms of which human thought may be justified and reformed—must accordingly be abandoned. The task of philosophy, for Hayek as for Kant, is not the construction of any metaphysical system, but the investigation of the limits of reason. It is a reflexive rather than a constructive inquiry, since all criticism—in ethics as much as in science—must in the end be immanent criticism. In philosophy as in life, Hayek avers, we must take much for granted, or else we will never get started.

Hayek's uncompromisingly skeptical Kantianism is strongly evidenced in *The Sensory Order* (see Hayek bibliography, B-10). There Hayek disavows any concern as to "how things really are in the world," affirming that "...a question like 'what is X?' has meaning only within a given order, and...within this limit it must always refer to the relation of one particular event to other events belonging to the same order." 1b Above all, the distinction between appearance and reality, which Hayek sees as best avoided in scientific discourse, 2 is not to be identified with the distinction between the mental or sensory order and the physical or material order. The aim of scientific investigation is not, then, for Hayek, the discovery behind the veil of appearance of the natures or essences of things in themselves, for, with Kant and against Aristotelian essentialism, he stigmatizes the notion of essence or absolute reality as useless or harmful in science and in philosophy. The aim of science can only be the development of a system of categories or principles, in the end organized wholly deductively, which is adequate to the experience it seeks to order. 3

Hayek As A Skeptical Kantian

Hayek is a Kantian, then, in disavowing in science or in philosophy any Aristotelian method of seeking the essences or natures of things. We cannot know how things are in the world, but only how our mind itself organizes the jumble of its experiences. He is Kantian, again, in repudiating the belief, common to empiricists and positivists such as David Hume and Ernst Mach, that there is available to us a ground of elementary sensory impressions, untainted by conceptual thought, which can serve as the foundation for the house of human knowledge. Against this empiricist dogma, Hayek is emphatic that everything in the sensory order is abstract, conceptual and theoryladen in character: "It will be the central thesis of the theory to be outlined that it is not merely a part but the whole of sensory qualities which is...an 'interpretation' based on the experience of the individual or the race. The conception of an original pure core of sensation which is merely modified by experience is an entirely unnecessary fiction." 4 Again, he tells us that "the elimination of the hypothetical 'pure' or 'primary' core of sensation, supposed not to be due to earlier experience, but either to involve some direct communication of properties of the external objects, or to constitute irreducible mental atoms or elements, disposes of various philosophical puzzles which arise from the lack of meaning of these hypotheses." 5 The map or model we form of the world, in Hayek's view, is in no important respect grounded in a basis of sheer sense-data, themselves supposed to be incorrigible. Rather, the picture we form of the world emerges straight from our interaction with the world, and it is always abstract in selecting some among the infinite aspects which the world contains, most of which we are bound to pass by as without interest to us.

Three Influences On Hayek's Skeptical Kantianism: Mach, Popper, And Wittgenstein

Hayek's theory of knowledge is Kantian, we have seen, in affirming that the order we find in the world is given to it by the organizing structure of our own mind and in claiming that even sensory experiences are suffused with the ordering concepts of the human mind. His view of the mind, then, is Kantian in that it accords a very great measure of creative power to the mind, which is neither a receptacle for the passive absorption of fugitive sensations, nor yet a mirror in which the world's necessities are reflected.

1. Ernst Mach And Metaphysical Neutrality

There are a number of influences on Hayek, however, which give his Kantianism a profoundly distinctive and original aspect. The first of these influences is the work of Ernst Mach (1838–1916), the positivist philosopher whose ideas dominated much of Austro-German intellectual life in the decades of Hayek's youth. Hayek's debts to Mach are not so much in the theory of knowledge, as in the attitude both take to certain traditional metaphysical questions. I have observed already that Hayek dissented radically from the Humean and Machian belief that human knowledge could be reconstructed on the basis of elementary sensory impressions, and throughout his writings Hayek has always repudiated as incoherent or unworkable the reductionist projects of phenomenalism in the theory of perception and behaviorism in the philosophy of mind. In these areas of philosophy, then, Hayek's work has been strongly antipathetic to distinctively positivistic ambitions for a unified science. At the same time, while never endorsing the dogma of the Vienna Circle that metaphysical utterances are literally nonsensical, Hayek has often voiced the view that many traditional metaphysical questions express "phantom-problems."

In both *The Sensory Order* and later in *The Constitution of Liberty*, Hayek affirms that the age-old controversy about the freedom of the will embodies such a phantomproblem.6 Hayek's 'compatibilist' standpoint in respect of freedom of the will—his belief that the casual determination of human actions is fully compatible with ascribing responsibility to human agents for what they do—is analogous with his stance on the mind-body question. In both controversies Havek is concerned to deny any ultimate dualism in metaphysics or ontology, while at the same time insisting that a dualism in our practical thought and in scientific method is unavoidable for us. Thus he says of the relations of the mental and the physical domains that "While our theory leads us to deny any ultimate dualism of the forces governing the realms of the mind and that of the physical world respectively, it forces us at the same time to recognize that for practical purposes we shall always have to adopt a dualistic view." And Hayek concludes his study of the foundations of theoretical psychology in *The* Sensory Order with the claim that "to us mind must remain forever a realm of its own, which we can know only through directly experiencing it, but which we shall never be able to fully explain or to 'reduce' to something else."8

Hayek's thought has a Machian positivist aspect, then, not in the theories of mind or perception, but in its attitude to traditional metaphysical questions, which is dissolutionist and deflationary. There is yet another link with positivism. Notwithstanding Hayek's opposition to any sort of reductionism, whether sensationalist or physicalist, he seems to be a monist in ontology, averring that "mind is thus the order prevailing in a particular part of the physical universe—that part of it which is ourselves." Hayek may seem here to be qualifying or withdrawing from that stance of metaphysical neutrality which in Machian spirit he commends, but this appearance may be delusive. There is much to suggest that, when Hayek denies any ultimate dualism in the nature of things, he is not lapsing into an idiom of essences or natural kinds, but simply observing—much in the fashion of the American pragmatist

philosopher, W. V. Quine—that nothing in our experience compels us to adopt ideas of mental or physical substance. 10 Though Hayek has not to my knowledge ever pronounced explicitly on the question, the whole tenor of his thought inclines to a Quinean pragmatist view of ontological commitments. In his skeptical and pragmatist attitude to ultimate questions in metaphysics and ontology, Hayek lines up with many positivists rather than with Kantian critical philosophy—though positivists themselves sometimes claim, with some justification, to be treading a Kantian path.

2. Karl Popper: The Growth Of Knowledge

A second influence on Hayek's general philosophy which gives it a distinctive temper is the thought of his friend, Karl Popper (b. 1902). I mean here, not Popper's hypothetico-deductive account of scientific method, which there is evidence that Hayek held prior to his meeting with Popper, 11 nor yet Popper's proposal (which Hayek was soon to accept) that falsifiability rather than verifiability should be adopted as a criterion of demarcation between the scientific and the non-scientific. Again, Hayek has under Popper's influence come to make an important distinction between types of rationalism, 12 such that "critical rationalism" is commended and "constructivistic rationalism" condemned. But this is not what I have in mind. I refer rather to certain striking affinities between Hayek's view of the growth of knowledge and that adumbrated in Popper's later writings on "evolutionary epistemology." As early as the manuscript which later became *The Sensory Order* (published in 1952, but composed in the twenties). Hayek made it clear that the principles of classification embodied in the nervous system were not for him fixed data; experience constantly forced reclassification on us. In his later writings, Hayek is explicit that the human mind is itself an evolutionary product and that its structure is therefore variable and not constant. The structural principles or fundamental categories which our minds contain ought not, then, to be interpreted in Cartesian fashion as universal and necessary axioms, reflecting the natural necessities of the world, but rather as constituting evolutionary adaptations of the human organism to the world that it inhabits.

The striking similarity between Popper's later views, and those expounded by Hayek in *The Sensory Order*, is shown by Popper's own application of the evolutionist standpoint in epistemology to the theory of perception:

...if we start from a critical commonsense realism...then we shall take man as one of the animals, and human knowledge as essentially almost as fallible as animal knowledge. We shall suppose the animal senses to have evolved from primitive beginnings; and we shall look therefore on our own sense, essentially, as part of a decoding mechanism—a mechanism which decodes, more or less successfully, the encoded information about the world which manages to reach us by sensory means. 13

J.W.N. Watkins' comment on this view is as apposite in the respect of Hayek as it is of Popper:

Kant saw very clearly that the empiricist account of sense experience creates and cannot solve the problem of how the *manifold* and very various data which reach a man's mind from his various senses get unified into a coherent experience.

Kant's solution consisted, essentially, in leaving the old quasimechanistic account of sense-organs intact, and endowing the mind with a powerful set of organizing categories—free, universal and necessary—which unify and structure what would otherwise be a mad jumble.

Popper's evolutionist view modifies Kant's view at both ends: interpretative principles lose their fixed and necessary character, and sense organs lose their merely causal and mechanistic character. 14

Hayek's account of sense perception anticipates Popper's later views in a most striking fashion, because in both sensation is conceived as a decoding mechanism, which transmits to us in a highly abstract fashion information about our external environment. Again, both Hayek and Popper share the skeptical Kantian view that the order we find in the world is given to it by the creative activity of our own minds: as Hayek himself puts it uncompromisingly in *The Sensory Order*, "The fact that the world which we know seems wholly an orderly world may thus be merely a result of the method by which we perceive it." 15 One difference between Hayek and Popper is in the fact that, at any rate in his published work to date, Hayek has not followed Popper in his ontological speculations about a world of abstract or virtual entities or intelligibles. 16a

3. Wittgenstein & Hayek

A third influence on Hayek's thought which gives his view of knowledge and the mind a very distinctive character is that of his relative, Ludwig Wittgenstein (1899-1951).16b This influence runs deep, and is seen not only in the style and presentation of *The Sensory Order*, which parallels in an obvious way that of Wittgenstein's *Tractatus*, but in many areas of Hayek's system of ideas. It is shown, for example, in Hayek's recurrent interest in the way in which the language in which we speak shapes our thoughts and forms our picture of the world. In fact, Hayek's interest in language, and in a critique of language, predates Wittgenstein's work, inasmuch as he had an early preoccupation with the work of Fritz Mauthner, the now almost forgotten philosopher of radical nominalism whom Wittgenstein mentions (somewhat dismissively) in the *Tractatus*.17 There are, however, many evidences that Wittgenstein's work reinforced Hayek's conviction that the study of language is a necessary precondition of the study of human thought, and an indispensable prophylactic to the principal disorders of the intellect. Examples which may be adduced are Hayek's studies of the confusion of language in political thought 18 and, most obviously, perhaps, of his emphasis on the role of social rules in the transmission of practical knowledge.

It is on this last point that one of the most distinctive features of Hayek's Kantianism, its pragmatist aspect, is clearest. 19a Of course there is a recognition in Kant himself that knowledge requires judgment, a special faculty, the *Urteilskraft*, which cannot be given any complete or adequate specification in propositional terms, and whose exercise is necessary for the application of any rule. In the sense that we must exercise this faculty of judgment even before we can apply a rule, it is action which is at the root of our very knowledge itself. Hayek's concern is not with this ultimate dependency of rule following upon judgment—which the later Wittgenstein, perhaps following Kant, emphasizes—but rather with the way that knowledge of all sorts, but especially social knowledge, is embodied in rules. Our perceptual processes, indeed all our processes of thought, are governed by rules which we do not normally articulate, which in some cases are necessarily beyond articulation by us, but which we rely upon for the efficiency of all our action in the world. Indeed, it is not too much to say that, for Hayek (notwithstanding his stress on the abstract or conceptual character of our sensory knowledge) all our knowledge is at bottom practical or tacit knowledge: it consists, not in propositions or theories, but in habits and dispositions to act in a rule-governed fashion. There is here an interesting parallel with Popper's view, which sees even our sense organs as being themselves embodied theories. 19b

There is much in Hayek's writings to suggest that he takes what Gilbert Ryle calls "knowing how," 20 what Michael Polanyi calls tacit knowing, 21 what Michael Oakeshott 22 calls the traditional knowledge, to be the wellspring of all our knowledge. It is in this sense—in holding the stuff of knowledge to be at bottom practical—that Hayek may be said to subscribe to a thesis of the primacy of practice in the constitution of human knowledge. It is not indeed that Hayek disparages the

enterprise of theory-building, but he sees the theoretical reconstruction of our practical knowledge as necessarily incomplete in its achievements.

Why is this? Hayek argues that, not only human social life, but the life of the mind itself is governed by rules, some of which cannot be specified at all. Note that Hayek does not contend merely that we cannot in fact specify all the rules which govern both social and intellectual life: he argues that there must of necessity be an insuperable limit beyond which we are unable to specify the rules by which our lives are governed. As he puts it:

So far our argument has rested solely on the uncontestable assumption that we are not in fact able to specify all the rules which govern our perceptions and actions. We still have to consider the question whether it is conceivable that we should ever be in a position discursively to describe all (or at least any one we like) of these rules, or whether mental activity must always be guided by some rules which we are in principle not able to specify.

If it should turn out that it is basically impossible to state or communicate all the rules which govern our actions, including our communications and explicit statements, this would imply an inherent limitation of our possible explicit knowledge and, in particular, the impossibility of ever fully explaining a mind of the complexity or our own.

Hayek goes on to observe of the inability of the human mind reflexively to grasp the most basic rules which govern its operations that "this would follow from what I understand to Georg Cantor's theorem in the theory of sets according to which in any system of classification there are always more classes than things to be classified, which presumably implies that no system of classes can contain itself." Again, he remarks that "it would thus appear that Gödel's theorem is but a special case of a more general principle applying to all conscious and particularly all rational processes, namely the principle that among their determinants there must always be some rules which cannot be stated or even be conscious." Hayek concludes this development of themes first explored in his *Sensory Order* with the fascinating suggestion that conscious thought must be presumed to be governed by "rules which cannot in turn be conscious—by a "supraconscious mechanism," or, as Hayek prefers sometimes to call it, a "metaconscious mechanism"—"which operates on the contents of consciousness but which cannot itself be conscious."23

The third source of influence on Hayek's skeptical Kantianism, which I have ascribed primarily to the work of his relative Wittgenstein, plainly comprehends other influences as well. Hayek cites Ryle in support of his observations that "know how' consists in the capacity to act according to rules which we may be able to discover but which we need not be able to state in order to obey them," and glosses the point with reference to Michael Polanyi. 24 Here the insight is that all articulated or propositional knowledge arises out of tacit or practical knowledge, the knowledge of how to do things, which must be taken as fundamental. Nothing is said in Ryle or Polanyi thus far about rule-governedness as a distinctive mark of human (and, it may well be, not only human but also animal) intelligent behavior.

It is for the insight that practical knowledge is transmitted mimetically through the absorption of social rules that we need to turn to Wittgenstein, from whom Hayek may have taken it. (There are, to be sure, contrasts between Hayek's view of rulegoverned behavior and Wittgenstein's, particularly in regard to the skepticism about rule-following expressed in Wittgenstein's On Certainty and the dependency of social rules upon forms of life, stressed in Wittgenstein but not discussed by Hayek; but these contrasts need not concern us here.) What is original and novel in Hayek's account, and (so far as I know) is nowhere to be found in Wittgenstein, is his account, firstly, of the hierarchy of rules in perception and action, with the most fundamental rules being meta-conscious rules beyond the possibility of identification and articulation; and, secondly, Hayek's systematic exploration of the selection of these rules in a process of evolutionary adaptation. 25 According to Hayek, in other words, the rules of action and of perception by which both intellectual and social life are governed are in the first place stratified or ordered in a hierarchy, with the most fundamental rules (which shape the basic categories of our understanding) always eluding conscious articulation. But secondly, all of these rules, including even the most fundamental of them are products of a process of evolutionary selection, by which they may be further altered or eliminated. Systems of rules conferring successful behavior are adopted by others without conscious reflection. It is this disposition to emulate or copy successful behaviors which explains the cultural evolution of which Hayek speaks, and which (though he recognizes its primitive beginnings in the social lives of animals) Hayek regards as the distinguishing mark of human life.

Hayek On Knowledge And Mind: Implications For Social Theory

Hayek's Kantian Philosophy Of Mind

I began by nothing the striking Kantian attributes of Hayek's epistemology and philosophy of mind—aspects which Hayek himself does not stress, perhaps because he conceives the formative influence of Kantian philosophy on his thought to be self-evident. As he puts it himself in a footnote to his discussion in a recent volume of the government of conscious intellectual life by super-conscious abstract rules: "I did not mention...the obvious relation of all this to Kant's conception of the categories that govern our thinking—which I took rather for granted."26

Hayek's Kantianism is seen, first in his repudiation of the empiricist view that knowledge may be constructed from a basis of raw sensory data and, second, in his uncompromising assertion of the view that the order we find in the world is a product of the creative activity of the human mind (rather than a recognition of natural necessity). His Kantian view is distinctive in that it anticipates Popper in affirming that our mental frameworks by which we categorize the world are neither universal nor invariant, but alterable in an evolutionary fashion; his Kantian view also follows Wittgenstein in grasping the role of social rules in the transmission of practical knowledge. Hayek's Kantian view is original, finally, in recognizing a hierarchy in the rules that govern our perceptions and actions, and in insisting that the most fundamental of these rules are "super-conscious" and beyond any possibility of specification or articulation.

Hayek's Philosophy Of Mind & His Social Theory: Beyond Kantianism

Hayek himself is emphatic that these insights in the theories of mind and knowledge have the largest consequences for social theory. The inaccessability to reflexive inquiry of the rules that govern conscious thought entails the bankruptcy of the Cartesian rationalist project and implies that the human mind can never fully understand itself, still less can it ever be governed by any process of conscious thought. The considerations adduced earlier, then, establish *the autonomy of the mind*, without ever endorsing any mentalistic thesis of mind's independence of the material order. Where Hayek deviates from Descartes' conception of mind, however, is not primarily in his denying ontological independence to mind, but in his demonstration that complete intellectual self-understanding is an impossibility.

Hayek's conception of mind is a notion whose implications for social theory are even more radical than are those of Hayek's Kantianism. It is the chief burden of the latter, let us recall, that no external or transcendental standpoint on human thought is achievable, in terms of which it may be supported or reformed. In social theory, this Kantian perspective implies the impossibility of any Archimedean point from which a synoptic view can be gained of society as a whole and in terms of of which social life may be understood and, it may be, redesigned. As Hayek puts it trenchantly: "Particular aspects of a culture can be critically examined only within the context of that culture. We can never reduce a system of rules or all values as a whole to a purposive construction, but must always stop with our criticism of something that has no better grounds for existence than that it is the accepted basis of the particular tradition." This is a useful statement, since it brings out the Kantian implication for social theory: that all criticism of social life must be immanent criticism, just as in all philosophy inquiry can only be reflexive and never transcendental.

Hayek goes beyond Kantianism, however, in his recognition that, just as in the theory of mind we must break off when we come to the region of unknowable ultimate rules, so in social theory we come to a stop with the basic constitutive traditions of social life. These latter, like Wittgenstein's forms of life, cannot be the objects of further criticism, since they are at the terminus of criticism and justification: they are simply given to us, and must be accepted by us. But this is not to say that these traditions are unchanging, nor that we cannot understand how it is that they do change.

In social theory, Hayek's devastating critique of Cartesian rationalism entails that, whatever else it might be, social order cannot be the product of a directing intelligence. It is not just that too many concrete details of social life would always escape such an intelligence, which could never, therefore, know enough. Nor (though we are nearer the nub of the matter here) is it that society is not a static object of knowledge which could survive unchanged the investigations of such an intelligence. No, the impossibility of total social planning does not rest for Hayek on such Popperian considerations, 28 or, at any rate, not primarily on them.

Such an impossibility of central social planning rests, firstly, on the primordially practical character of most of the knowledge on which social life depends. Such knowledge cannot be concentrated in a single brain, natural or mechanical, not because it is very complicated, but rather because it is embodied in habits and dispositions and governs our conduct via rules which are often inarticulable. But, secondly, the impossibility of total social planning arises from the fact that, since we are all of us governed by rules of which we have no knowledge, even the directing intelligence itself would be subject to such government. It is naive and almost incoherent 29 to suppose that a society could lift itself up by its bootstraps and reconstruct itself, in part at least because the idea that any individual mind—or any collectivity of selected minds—could do that, is no less absurd.

The Idea Of A Spontaneous Social Order

If the order we discover in society is in no important respect the product of a directing intelligence, and if the human mind itself is a product of cultural evolution, then it follows that social order cannot be the product of anything resembling conscious control or rational design. As Hayek puts it:

The errors of constructivist rationalism are closely connected with Cartesian dualism, that is, with the conception of an independently existing mind substance which stands outside the cosmos of nature and which enabled man, endowed with such a mind from the beginning, to design the institutions of society and culture among which he lives...The conception of an already fully developed mind designing the institutions which made life possible is contrary to all we know about the evolution of man. 30

The master error of Cartesian rationalism31 lies in its anthropomorphic transposition of mentalist categories to social processes. But a Cartesian rationalist view of mind cannot explain even the order of mind itself. Hayek himself makes this point when he remarks on "the difference between an order which is brought about by the direction of a central organ such as the brain, and the formation of an order determined by the regularity of the actions towards each other of the elements of a structure." He goes on:

Michael Polanyi has usefully described this distinction as that between a monocentric and a polycentric order. The first point which it is in this connection important to note is that the brain of an organism which acts as the directing centre for the organism is in turn a polycentric order, that is, that its actions are determined by the relation and mutual adjustment to each other of the elements of which it consists. 32

Hayek states his conception of social theory, and of the central importance in it of undesigned or spontaneous orders, programmatically and with unsurpassable lucidity:

It is evident that this interplay of the rules of conduct of the individuals with the actions of other individuals and the external circumstances in producing an overall order may be a highly complex affair. The whole task of social theory consists in little else but an effort to reconstruct the overall orders which are thus formed...It will also be clear that such a distinct theory of social structures can provide only an explanation of certain general and highly abstract features of the different types of structures...Of theories of this type economic theory, the theory of the market order of free human societies, is so far the only one which has been developed over a long period...33

Because it is undesigned and not the product of conscious reflection, the spontaneous order that emerges of itself in social life can cope with the radical ignorance we all share of the countless facts on knowledge of which society depends. This is to say, to begin with, that a spontaneous social order can utilize *fragmented knowledge*, knowledge dispersed among millions of people, in a way a holistically planned order (if such there could be) cannot. "This structure of human activities" as Hayek puts it

"consistently adapts itself, and functions through adapting itself, to millions of facts which in their entirety are not known to everybody. The significance of this process is most obvious and was at first stressed in the economic field."34 It is to say, also, that a spontaneous social order can use the practical knowledge preserved in men's habits and dispositions and that society always depends on such practical knowledge and cannot do without it.

Examples abound in Hayek's writings of spontaneous orders apart from the market order. The thesis of spontaneous order is stated at its broadest when Hayek says of Bernard Mandeville (1670–1733) that "for the first time [he] developed all the classical paradigmata of the spontaneous growth of orderly social structures: of law and morals, of language, the market and money, and also the growth of technological knowledge."35 Note that whereas Hayek acknowledges that spontaneous order emerges in natural processes—it may be observed, he tells us, not only in the population biology of animal species, but in the formation of crystals and even galaxies36—it is the role of spontaneous order in human society that Hayek is most concerned to stress. For applying what Hayek illuminatingly terms "the twin ideas of evolution and of the spontaneous formation of an order"37 to the study of human society enables us to transcend the view, inherited from Greek, and, above all, from Sophist philosophy, that all social phenomena can be comprehended within the crude dichotomy of the natural (physis) and the conventional (nomos). Hayek wishes to focus attention on the third domain of social phenomena and objects, neither instinctual in origin nor yet the result of conscious contrivance or purposive construction, the domain of evolved and self-regulating social structures. It is the emergence of such self-regulating structures in society via the natural selection of rules of action and perception that is systematically neglected in much current sociology (though not, it may be noted, in the writings of Herbert Spencer, 38 one of sociology's founding fathers). It is because he thinks that the sociobiologists view social order as being a mixture of instinctive behavior and conscious control, and so neglect the cultural selection of systems of rules, that Hayek has subjected this recent strain of speculation to a sharp criticism. 39 It may be noted, finally, that Hayek's repudiation of the Sophistic natureconvention dichotomy sets him in opposition to Popper and his talk of the critical dualism of facts and decisions and brings him close to the Wittgensteinian philosopher, Peter Winch, for whom the distinction is essentially misconceived.40

The Application Of Spontaneous Order In Economic Life: The Catallaxy

The central claim of Hayek's philosophy, as we have expounded it so far, is that knowledge is, at its base, at once practical and abstract. It is abstract inasmuch as even sensory perception gives us a model of our environment which is highly selective and picks out only certain classes of events, and it is practical inasmuch as most knowledge is irretrievably stored or embodied in rules of action and perception. These rules, in turn, are in Hayek's conception the subject of continuing natural selection in cultural competition. The mechanism of this selection, best described in Hayek's fascinating "Notes on the Evolution of Systems of Rules of Conduct," 41 is in the emulation by others of rules which secure successful behavior. It is by a mimetic contagion that rules conferring success—where success means, in the last resort, the growth of human numbers 42 —come to supplant those rules which are maladapted to the environment. Finally, the convergence of many rule-following creatures on a single system of rules creates those social objects—language, money, markets, the law—which are the paradigms of spontaneous social order.

It is a general implication of this conception that, since social order is not a purposive construction, it will not in general serve any specific purpose. Social order facilitates the achievement of human purposes: taken in itself, it must be seen as having no purpose. Just as human actions acquire their meaning by occurring in a framework that can itself have no meaning, 43 so social order will allow for the achievement of human purposes only to the extent that it is itself purposeless. Nowhere has this general implication of Hayek's conception been so neglected as in economic life. In the history and theory of science, to be sure, where the idea of spontaneous order was (as Hayek acknowledges) put to work by Michael Polanyi, false conceptions were spawned by the erroneous notion that scientific progress could be planned, whereas, on the contrary, any limitation of scientific inquiry to the contents of explicit or theoretical knowledge would inevitably stifle further progress. 44 In economics, however, the canard that order is the result of conscious control had more fateful consequences. It supported the illusion that the whole realm of human exchange was to be understood after the fashion of a household or an hierarchical organization, with limited and commensurable purposes ranked in order of agreed importance.

This confusion of a genuine hierarchical 'economy'—such as that of an army, a school or a business corporation—with the whole realm of social exchange, the catallaxy, informs many aspects of welfare economics and motivates its interventionist projects via the fiction of a total social product. This confusion between 'catallaxy' and 'economy' is, at bottom, the result of an inability to acknowledge that the order which is the product of conscious direction—the order of a management hierarchy in a business corporation, for example—itself always depends upon a larger spontaneous order. The demand that the domain of human exchange taken as a whole should be subject to purposive planning is, therefore, the demand that social life be reconstructed in the character of a factory, an army, or a

business corporation—in the character, in other words, of an authoritarian organization. Apart from the fateful consequences for individual liberty that implementing such a demand inexorably entails, it springs in great measure from an inability or unwillingness to grasp how in the market process itself there is a constant tendency to self-regulation by spontaneous order. When it is unhampered, the process of exchange between competitive firms itself yields a coordination of men's activities more intricate and balanced than any that could be enforced (or even conceived) by a central planner.

The Catallactic Order, Practical Knowledge, And The Calculation Debate

The relevance of these considerations to Hayek's contributions to the question of the allocation of resources in a socialist economic order is central, but often neglected. It is, of course, widely recognized 45 that one of Hayek's principal contributions in economic theory is the refinement of the thesis of his teacher, Ludwig von Mises (1881–1973), that the attempt to supplant market relations by public planning cannot avoid yielding calculational chaos. Hayek's account of the mechanism whereby this occurs has, however, some entirely distinctive and original features. For Hayek is at great pains to point out that the dispersed knowledge which brings about a tendency to equilibrium in economic life and so facilitates an integration of different plans of life, is precisely not theoretical or technical knowledge, but practical knowledge of concrete situations—"knowledge of people, of local conditions, and of special circumstances." As Hayek puts it: "The skipper who earns his living from using otherwise empty or half-filled journeys of tramp-steamers, or the estate agent whose whole knowledge is almost exclusively one of temporary opportunities, or the arbitrageur who gains from local differences of commodity prices—are all performing eminently useful functions based on special knowledge of circumstances of the fleeting moment not known to others." Hayek goes on the comment: "It is a curious fact that this sort of knowledge should today be regarded with a kind of contempt and that anyone who by such knowledge gains an advantage over somebody better equipped with theoretical or technical knowledge is thought to have acted almost disreputably."46 The "problem of the division of knowledge," which Hayek describes as "the really central problem of economics as a social science," 47 is therefore not just a problem of specific data, articulable in explicit terms, being dispersed in millions of heads: it is the far more fundamental problem of the practical knowledge on which economic life depends being embodied in skills and habits, which change as society changes and which are rarely expressible in theoretical or technical terms.

One way of putting Hayek's point, a way we owe to Israel Kirzner rather than to Hayek himself but which is wholly compatible with all that Hayek has said on these questions, is to remark as follows: if men's economic activities really do show a tendency to coordinate with one another, this is due in large part to the activity of *entrepreneurship*. The neglect of the entrepreneur in much standard economic theorizing, the inability to grasp his functions in the market process, may be accounted for in part by reference to Hayek's description above of the sort of knowledge used by the entrepreneur. As Kirzner puts it, "Ultimately, then, the kind of 'knowledge' required for entrepreneurship is 'knowing' where to look for 'knowledge' rather than knowledge of substantive market information." 48 It is hard to avoid the impression that the entrepreneurial knowledge of which Kirzner speaks here is precisely that practical or dispositional knowledge which Hayek describes.

It is the neglect of how all economic life depends on this practical knowledge which allowed the brilliant but, in this respect, fatally misguided Joseph Schumpeter

(1883–1950) to put a whole generation of economists on the wrong track, when he stated in his Capitalism, Socialism and Democracy (1942) that the problem of calculation under socialism was essentially solved.49 It is the neglect of the same truth that Hayek expounded which explains the inevitable failure in Soviet-style economies of attempts to simulate market processes in computer modeling. All such efforts are bound to fail, if only because the practical knowledge of which Hayek speaks cannot be programmed into a mechanical device. They are bound to fail, also, because they neglect the knowledge-gathering role of market pricing. Here we must recall that, according to Hayek, knowledge is dispersed throughout society and, further, it is embodied in habits and dispositions of countless men and women. The knowledge yielded by market pricing is knowledge which all men can use, but which none of them would possess in the absence of the market process; in a sense, the knowledge embodied or expressed in the market price is systemic or holistic knowledge, knowledge unknown and unknowable to any of the elements of the market system, but given to them all by the operation of the system itself. No sort of market simulation or shadow pricing can rival the operation of the market order itself in producing this knowledge, because only the actual operation of the market itself can draw on the fund of practical knowledge which market participants exploit in the their activities.

Hayek's Refinements Of The Misesian Calculation Debate

Three further points may be worth noting in respect of Hayek's refinements of the Misesian calculation debate. First, when Hayek speaks of economic calculations under socialism as a practical impossibility, he is not identifying specific obstacles in the way of the socialist enterprise which might someday be removed. Socialist planning could supplant market processes only if practical knowledge could be replaced by theoretical or technical knowledge at the level of society as a whole—and that is a supposition which is barely conceivable. The kind of omniscience demanded of a socialist planner could be possessed only by a single mind, entirely self-aware, existing in an unchanging environment—a supposition so bizarre that we realize we have moved from any imaginable social world to a metaphysical fantasy in which men and women have disappeared altogether, and all that remain are Leibnizian monads, featureless and unhistorical ciphers.

Fortunately, such a transformation is possible, if at all, only as a thought-experiment. In practice, all supposedly socialist economies depend upon precisely that practical knowledge of which Hayek speaks, and which though dispersed through society is transmitted via the price mechanism. It is widely acknowledged that socialist economies depend crucially in their planning policies on price data gleaned from historic and world markets. Less often recognized, and dealt with in detail only, so far as I know, in Paul Craig Roberts' important *Alienation in the Soviet Economy*, 50 is that planning policies in socialist economies are only shadows cast by market processes distorted by episodes of authoritarian intervention. The consequence of the Hayekian and Polanyian critiques of socialist planning is not inefficiency of such planning but rather its impossibility: we cannot analyze the "socialist" economies of the world properly, unless we penetrate the ideological veil they secrete themselves behind, and examine the mixture of market processes with command structures which is all that can ever exist in such a complex society.

The third and final implication of Hayek's contribution to the calculation question is his clear statement of the truth that the impossibility of socialism is an epistemological impossibility. It is not a question of motivation or volition, of the egoism or limited sympathies of men and women, but of the inability of any social order in which the market is suppressed or distorted to utilize effectively the practical knowledge possessed by its citizens. Calculational chaos would ensue, and a barbarization of social life result, from the attempt to socialize production, even if men possessed only altruistic and conformist motives. For, in the absence of the signals transmitted via the price mechanism, they would be at a loss how to direct their activities for the social good, and the common stock of practical knowledge would begin to decay. Only the inventiveness of human beings as expressed in the emergence of black and gray markets could then prevent a speedy regression to the subsistence economy. The impossibility of socialism, then, derives from its neglect of the epistemological functions of market institutions and processes. Hayek's argument here is the most important application of his fundamental insight into the epistemological role of social institutions—an insight I will need to take up again in

the context of certain similarities between Hayek's conception of liberty under law and Robert Nozick's meta-utopian framework.

Theory And Method In Economic Science

Prediction Vs. 'Complex Phenomena'

Hayek's conception of knowledge, when taken in conjunction with the idea of a spontaneous social order, has important implications for the proper method for the practice of social science. To begin with, Hayek's affirmation of "the primacy of the abstract" in all human knowledge means that social science is always a theory-laden activity and can never aspire to an exhaustive description of concrete social facts. More, the predictive aspirations of social science must be qualified: not even the most developed of the social sciences, economics, can ever do more than predict the occurrence of general classes of events. Indeed, in his strong emphasis on the primacy of the abstract, Hayek goes so far as to question the adequacy of the nomothetic or nomological model of science (i.e. exact prediction through 'laws'), including social science. At least in respect of complex phenomena, all science can aim at is an "explanation of the principle," or the recognition of a pattern—"the explanation not of the individual events but merely of the appearance of certain patterns or orders. Whether we call these mere explanations of the principle or mere pattern predictions or higher level theories does not matter." 51 Such recognitions of orders or pattern predictions are, Hayek observes, fully theoretical claims, testable and falsifiable: but they correspond badly with the usual cause-effect structure of nomothetic or lawgoverned explanation.

In his most important later statement on these questions, "The Theory of Complex Phenomena," [bibliography, A-109], Hayek tells us that, because social life is made up of complex phenomena, "economic theory is confined to describing kinds of patterns which will appear if certain general conditions are satisfied, but can rarely if ever derive from this knowledge any predictions of specific phenomena." 52 If we ask why it is that social phenomena are complex phenomena, part of the reason at any rate lies in what Hayek earlier characterized 53 as the subjectivity of the data of the social sciences: social objects are not like natural objects whose properties are highly invariant relatively to our beliefs and perceptions; rather, social objects are in large measure actually constituted by our beliefs and judgments. Social phenomena are non-physical, and Hayek has stated that "Non-physical phenomena are more complex because we call physical phenomena what can be described by relatively simple formulae." 54 And, because of the subjectivity of its data, social life always eludes such simple formulae.

Hayek's Opposition To Apriori Science

A number of points may be made briefly about Hayek's conception of method in social and economic theory. First, whereas he follows his great teachers in the Austrian tradition in emphasizing the subjective aspects of social phenomena, Hayek's methodology of social and economic science does not belong to that Austrian tradition in which social theory is conceived as an enterprise yielding apodictic truths. Specifically—contrary to T. W. Hutchinson, who periodizes Hayek's work into an Austrian praxeological and a post-Austrian Popperian period, and also contrary to Norman P. Barry who sees both trends running right through Hayek's writings—Hayek never accepted the Misesian conception of a praxeological science of human action which would take as its point of departure a few axioms about the distinctive features of purposeful behavior over time. In the Introduction to Collectivist Economic Planning [E-5, 1935] and elsewhere in his early writings, Hayek had (as Hutchinson notes) insisted that economics yields "general laws,' that is, 'inherent necessities determined by the permanent nature of the constituent elements.""55 As Hutchinson himself acknowledges in passing, however, such laws or necessities function in Hayek's writings as postulates (rather than as axioms), and they continue to do so even in his later writings, in which (as I have already noted) a suspicion of the nomothetic paradigm of social science is expressed. It is clear from the context of the quotations cited by Hutchinson that, in speaking of the general laws or inherent necessities of social and economic life, Hayek meant to controvert the excessive voluntarism of historicism, which insinuates that social life contains no unalterable necessities of any sort, rather than to embrace the view that there can be an apriori science of society or human action. To this extent Barry is right in his observation that, "there is a basic continuity in Hayek's writings on methodology." 56 Certainly there seems little substance in a periodization of Havek's methodological writings by reference to the supposedly Popperian paper of 1937 on "Economics and Knowledge" (A-34).

At the same time, there seems little warrant for Barry's claim that throughout his work Hayek tries "to combine two rather different philosophies of social science; the Austrian praxeological school with its subjectivism and rejection of testability in favour of axiomatic reasoning, and the hypothetico-deductive approach of contemporary science with its emphasis on falsifiability and empirical content." 57 For there is no evidence, so far as I know, that Hayek ever endorsed the Misesian conception of an axiomatic or apriori science of human action grounded in apodictic certainties. Again, as we have seen, Hayek's view that the social sciences are throughout deductive in form antedates Popper's influence and is evidenced in the Introduction to *Collectivist Economic Planning* [E-5, 1935].

Popperian 'Conjectures & Refutations'

Hayek's real debts to Popper are, I think, different from those attributed to him by Hutchinson and Barry. It is not that Hayek under Popper's influence abandoned an apodictic-deductive method that was endorsed (in different versions, Kantian and Aristotelian) by Mises and Menger, but rather that he came to adopt Popper's proposal that falsifiability be treated as a demarcation criterion of science from non-science. 58 Again, Hayek follows Popper in abandoning his earlier Austrian conviction that there is a radical dualism of method as between natural and social science: this conviction, he tells us, depended on an erroneous conception of method in the natural sciences: as a result of what Popper has taught him, Hayek says, "the differences between the two groups of disciplines has thereby been greatly narrowed." 59 Hayek's debts to Popper are, then, in his seeing that it is the falsifiability of an hypothesis rather than its verifiability which makes it testable and empirical, and, secondly, in his acknowledging the unity of method in all the sciences, natural and social, where this method is seen clearly to be hypothetico-deductive.

Even in these Popperian influences, it is to be noted, there are differences of emphasis from Popper himself. Hayek anticipates Lakatos in perceiving that the theoretical sciences may contain a "hard core" of hypotheses, well-confirmed and valuable in promoting understanding of the phenomena under investigation, which are highly resistant to testing and refutation. 60 And Hayek explicitly states that in some fields Popper's ideas of maximum empirical content and falsifiability may be inappropriate:

It is undoubtedly a drawback to have to work with theories which can be refuted only by statements of a high degree of complexity, because anything below that degree of complexity is on that ground alone permitted by our theory. Yet it is still possible that in some fields the more generic theories are the more useful ones...Where only the most general patterns can be observed in a considerable number of instances, the endeavour to become more 'scientific' by further narrowing down our formulae may well be a waste of effort...61

In general, then, it seems fair to hold that Hayek acknowledges that the proper method in social and economic studies, as elsewhere, is the hypothetico-deductive method of conjectures and refutations set out by Popper. On the other hand, he continues to recognize that in respect of complex phenomena such as are found in the social studies, testability may be a somewhat high level and protracted process, and the ideal of high empirical content captured in a nomothetic framework—a demanding and sometimes unattainable ideal.

Some Applications Of Hayek's Methodological Views: Keynes, Friedman, And Shackle On Economic Policy

Hayek's view that we can at best attain abstract models of social processes, whereas the concrete details of social life will always largely elude theoretical formulation, has large and radical implications in the field of public policy. In brief, it entails that the object of public policy should be confined to the design or reform of institutions within which unknown individuals make and execute their own, largely unpredictable plans of life. In a free society, in fact, whereas there may be a legal policy in respect of economic institutions, there cannot be such a thing as economic policy as it is presently understood, for adherence to the rule of law precludes anything resembling macroeconomic management. Here I do not wish to take up this point, which I will consider later, but rather to spell out the connection between Hayek's methodological views and his belief that most, if not all economic policy as practiced in the postwar world has had a self-defeating effect.

Hayek Contra Constructivism & Social Engineering

We have seen that, for Hayek, the most we can hope for in understanding social life is that we will recognize recurring patterns. Hayek goes on to observe:

Predictions of a pattern are...both testable and valuable. Since the theory tells us under which general conditions a pattern of this sort will form itself, it will enable us to create such conditions and to observe whether a pattern of the kind predicted will appear. And since the theory tells us that this pattern assures a maximisation of output in a certain sense, it also enables us to create the general conditions which will assure such a maximisation, though we are ignorant of many of the particular circumstances which will determine the pattern that will appear.62

Hayek's view stands in sharp opposition to any idea of a policy science or a political technology aimed at producing specific desired effects. Such a policy science demands the impossible of its practitioners, a detailed knowledge of a changing and complex order in society. Even Popper's conception of "piecemeal social engineering," Hayek tells us, "suggests to me too much a technological problem of reconstruction on the basis of the total knowledge of the physical facts, while the essential point about the practical improvement is an experimental attempt to improve the functioning of some part without a full comprehension of the structure of the whole." Indeed Hayek's central point is that understanding the primacy of the abstract in human knowledge means that we must altogether renounce the modern ideal of consciously controlling social life: a better ideal is that of *cultivating* the general conditions in which beneficial results may be expected to emerge.

Hayek's critique of the constructivistic or engineering approach to social life parallels in an intriguing way that of Michael Oakeshott and of the Wittgensteinian philosopher Rush Rhees. Consider Oakeshott's statement: "The assimilation of politics to engineering is, indeed, what may be called the myth of rationalist politics." 64 Or Rhee's observation (made in criticism of Popper): "There is nothing about human societies which makes it reasonable to speak of the application of engineering to them. Even the most important 'problems of production' are not problems in engineering." 65 The conception of social life which talk of social engineering expresses is at fault not only because it presupposes an agreement on goals or ends which nowhere exists but also because it promotes the illusion that political life may become subject to a sort of technical or theoretical control.

Hayek Contra Keynes

These general views illuminate much of the rationale of Hayek's opposition not only to Keynesian policies of macroeconomic demand management but also to Friedmanite monetarism. Of course, in the great debates of the Thirties, Hayek had argued forcefully that Keynes in no way provided a general theory of economic discoordination. Again, Hayek always argued that the policies Keynes suggested, depending as they did for their success upon institutional and psychological irrationalities which their very operation would undermine, were bound over the longer run to be self-defeating. In particular, Hayek maintained that Keynesian policies of deficit financing depended for their success upon a widespread money illusion which the policies themselves could not help but erode. Hayek's further objection to Keynesian policies is that, in part because they depend on a defective understanding of the business cycle (which is seen as expressing itself in aggregative variations in total economic activity rather than in a discoordination of relative price structures brought about by a governmental distortion of the structure of interest rates) Keynesian policy-makers, because of their holistic and aggregative bias, find it hard to avoid committing a sort of fallacy of conceptual realism: statistical artefacts or logical fictions are allowed to blot out the subtle and complex relationships which make up the real economy.

Now there is plainly much in Hayek's subtle account of the business cycle, and in his contributions to capital theory, which is difficult and disputable, and to comment on such questions is in any case beyond my expertise. Quite apart from its technical details, however, it is clear that Hayek's critique of Keynesian policies is of a piece with his emphasis on the primacy of the abstract and with his insight into the indispensability of conventions for the orderly conduct of social life. Policies of macroeconomic demand management ask more in the way of concrete knowledge of the real relationships which govern the economy than any administrator could conceivably acquire, and their operation is in the longer run self-defeating. More generally, Hayek's challenge to Keynesian theory is a demand that Keynesians specify in detail the mechanisms whereby an unhampered market could be expected to develop severe discoordination. Only if such mechanisms could be clearly described and (crucially) given a plausible historical application, would a serious challenge to Hayek's own Austrian view—in which it is governmental intervention in the economy which is principally responsible for discoordination—enter the realm of critical debate

Hayek Contra Friedman

In respect to Friedman's proposals for monetary regulation by a fixed rule, Hayek has argued that in a modern democracy no governmental or quasi-governmental agency can preserve the independence of action essential if such a monetary rule is to be operated consistently. More fundamentally, such a policy of adopting a fixed rule in the supply of money is opposed by Hayek on methodological grounds. Such a policy calls for an exactitude in modeling and measuring economic life, and an unambiguity in the definition of money, which it is beyond our powers to attain. Hayek's own objection to Friedman's monetarist proposals is, then, most substantially that money is not the sort of social object that we can define precisely or control comprehensively; Hayek has even suggested that, in recognition of the elusiveness of the monetary phenomenon, we should treat "money" as an adjectival expression, 66 applicable to indefinitely many distinct and disparate instruments. Hayek's proposals in this area clearly open up technical questions in monetary theory which I am unqualified to adjudicate. It seems clear, though, that Hayek's proposal favoring currency competition by the private issuance of money would be found objectionable by Friedmanites (who would argue that Hayek exaggerates the effect such competition would have in preventing currency debasement) and by advocates of the classical gold standard. It is clear, nonetheless, that in arguing for the establishment of a monetary catallaxy Hayek has illuminated questions both in monetary theory and in political economy which had hitherto gone largely neglected, but which it is critical that supporters of the market order now examine.

Hayek And Shackle

One objection to Hayek's view may be worth addressing at this point. There is much in Hayek's account of the business cycle, as in his more general account of spontaneous social order, to suggest that he believes economic discoordination results always from institutional factors, so that at any rate large-scale disequilibrium would be impossible in a catallaxy of wholly unhampered markets. Against this view, Hayek's brilliant and largely neglected pupil, G.L.S. Shackle, has argued 67 that the subjectivity of expectations must infect the market process with an ineradicable tendency to disequilibrium. It must be allowed that, if we accept Hayek's view of equilibrium as a process in which men's plans are coordinated by trial and error over time, there can be nothing apodictically certain about this process: conceivably, under some conditions of uncertainty in which hither to reliable expectations are repeatedly confounded, large scale discoordination could occur in the market process.

Three counter-observations are in order, however. First, nothing in Shackle's argument tells against the point, defensible both on theoretical grounds and as an historical interpretation, that in practice by far the most destabilizing factor in the market process is provided by governmental intervention. Secondly, and relatedly, it is unclear that the kind of disequilibrium of which Shackle speaks—disequilibrium generated by divergency in subjective expectations—could amount to anything resembling the classical business cycle, which is more plausibly accounted for in Austrian and Hayekian terms as a consequence of governmental intervention in the interest rate structure.

And thirdly, it is unclear that Shackle's argument shows the presence in the market process of any *tendency to disequilibrium*. What we have in the market process is admittedly a 'kaleidic' world, in which expectations, tastes, and beliefs constantly and unpredictably mutate. Yet, providing market adaptation is unhampered, what we can expect from the market process is an uninterrupted series of monetary equilibrium tendencies, each of them asymptotic—never quite reaching equilibrium—and each of them soon overtaken by its successor. In this kaleidic world there may well be no apodictic certainty that we shall never face large-scale, endogenous discoordination, but we are nevertheless on safe ground in preferring that the self-regulating tendencies of the process be accorded unhampered freedom and that governmental intervention be recognized as the major disruptive factor in the market process. We are on safe ground, then, in discerning in the tendency to equilibrium in the market process the formation of spontaneous order in the economic realm.

Hayek's Constitution Of Liberty: Ethical Basis Of The Juridical Framework Of Individual Liberty

Clarifying Hayek's Moral Theory

Given that we recognize governmental intervention to be the greatest subverter of spontaneous order in the realm of economic exchange, what legal framework is to be adopted for the regulation of economic life? Here we come to one of the most fascinating and controversial of Hayek's contributions to social philosophy, his account of individual liberty under the rule of law. Before we can address ourselves to some of the problems surrounding Hayek's contribution to philosophical jurisprudence, however, a few words must be said about Hayek's moral theory, since few aspects of Hayek's work are so often misunderstood. Hayek has been characterized as a moral relativist, an exponent of evolutionary ethics and, less implausibly but nonetheless incorrectly, as a rule-utilitarian. Let us see if we can dissipate the confusion.

In the first place, moral life for Hayek is itself a manifestation of spontaneous order. Like language and law, morality emerged undesigned from the life of men with one another: it is so much bound up with human life, indeed, as to be partly constitutive of it. The maxims of morality, then, in no way presuppose an authority, human or divine, from which they emanate, and they antedate the institutions of the state. But, secondly, the detailed content of the moral conventions which spring up unplanned in society is not immutable or invariant. Moral conventions change, often slowly and almost inperceptibly, in accordance with the needs and circumstances of the men who subscribe to them. Moral conventions must (or Hayek's account of them) be seen as part of the evolving social order itself.

Now at this point it is likely that a charge of ethical relativism or evolutionism will at once be levelled against Hayek, but there is little substance to such criticisms. He has gone out of his way to distinguish his standpoint from any sort of evolutionary ethics. As he put it in his *Constitution of Liberty*:

It is a fact which we must recognize that even what we regard as good or beautiful is changeable—if not in any recognizable manner that would entitle us to take a relativistic position, then in the sense that in many respects we do not know what will appear as good or beautiful to another generation... It is not only in his knowledge, but also in his aims and values, that man is the creature of his civilization; in the last resort, it is the relevance of these individual wishes to the perpetuation of the group or the species that will determine whether they persist or change. It is, of course, a mistake to believe that we can draw conclusions about what our values ought to be simply because we realize that they are a product of evolution. But we cannot reasonably doubt that these values are created and altered by the same evolutionary forces that have produced our intelligence. 68

Hayek's argument here, then, is manifestly not that we can invoke the trend of social evolution as a standard for the resolution of moral dilemmas, but rather that we are bound to recognize in our current moral conventions the outcome of an evolutionary process. Admittedly, inasmuch as nothing in the detailed content of our moral conventions is unchanging or unalterable, this means that we are compelled to abandon the idea that they have about them any character of universality or fixity, but this is a long way from any doctrine of moral relativism. As Hayek observes in his remarks on the ambiguity of relativism:

...our present values exist only as the elements of a particular cultural tradition and are significant only for some more or less long phase of evolution—whether this phase includes some of our pre-human ancestors or is confined to certain periods of human civilization. We have no more ground to ascribe to them eternal existence than to human race itself. There is thus one possible sense in which we may legitimately regard human values as relative and speak of the probability of their further evolution.

But it is a far cry from this general insight to the claims of the ethical, cultural or historical relativists or of evolutionary ethics. To put it crudely, while we know that all these values are relative to something, we do not know to what they are relative. We may be able to indicate the general class of circumstances which have made them what they are, but we do not know the particular conditions to which the values we hold are due, or what our values would be if those circumstances had been different. Most of the illegitimate conclusions are the result of erroneous interpretation of the theory of evolution as the empirical establishment of a trend. Once we recognize that it gives us no more than a scheme of explanation which might be sufficient to explain particular phenomena *if* we knew all the facts which have operated in the course of history, it becomes evident that the claims of the various kinds of relativists (and of evolutionary ethics) are unfounded.69

Hume's Influence On Hayek's Social Philosophy

Hayek does not, then subscribe to any sort of ethical relativism or evolutionism, but it is not altogether clear from these statements if he thinks humanity's changing moral conventions have in fact any invariant core or constant content. In order to consider this last question, and to attain a better general understanding of Hayek's conception of morality, we need to look at his debts to David Hume, whose influence upon Hayek's moral and political philosophy is ubiquitous and profound.

Hayek follows Hume in supposing that, in virtue of certain general facts about the human predicament, the moral conventions which spring up spontaneously among men all have certain features in common or (in other words) exhibit some shared principles. Among the general facts that Hume mentions in his *Treatise*, and which Hayek cites in "The Legal and Political Philosophy of David Hume" (in B-13), are men's limited generosity and intellectual imperfection and the unalterable scarcity of the means of satisfying human needs. As Hayek puts it succinctly: "It is thus the nature of the(se) circumstances, what Hume calls 'the necessity of human society,' that gives rise to the 'three fundamental laws of nature': those of 'the stability of possessions, of its transference by consent, and of the performance of promises." And Hayek glosses this passage with a fuller citation from Hume's *Treatise*: "Though the rules of justice be *artificial*, they are not *arbitrary*. Nor is the expression improper to call them *Laws of Nature*; if by natural we understand what is common to any species, or even if we confine it to mean what is inseparable from the species." 70

Hume's three rules of justice or laws of nature, then, give a constant content to Hayek's conception of an evolving morality. They frame what the distinguished Oxford jurist, H. L. A. Hart, was illuminatingly to call "the minimum content of natural law."71 The justification of these fundamental rules of justice, and of the detailed and changing content of the less permanent elements of morality, is (in Hayek's view as in Hume's)that they form indispensable conditions for the promotion of human welfare. There is in Hayek as in Hume, accordingly, a fundamental utilitarian committment in their theories of morality. It is a very indirect utilitarianism that they espouse, however, more akin to that of the late nineteenth-century Cambridge moralist Henry Sidgwick72 (1838–1900) than it is to Jeremy Bentham or John Stuart Mill. The utilitarian component of Hayek's conception of morality is indirect in that it is never supposed by him that we ought or could invoke a utilitarian principle in order to settle practical questions: for, given the great partiality and fallibility of our understanding, we are in general better advised to follow the code of behavior accepted in our own society. That code can, in turn, Hayek believes, never properly be the subject of a rationalist reconstruction in Benthamite fashion, but only reformed piecemeal and slowly. In repudiating the claims that utilitarian principles can govern specific actions and that utility may yield new social rules, Hayek shows himself to be an *indirect or system utilitarian*, for whom the proper role of utility is not prescriptive or practical but rather as a standard of evaluation for the assessment of whole systems of rules.

Hayek's Utilitarianism & Liberty

Again however, Hayek's utilitarian outlook is distinctive in that he explicitly repudiates any hedonistic conception of the content of utility itself. 73 How, then, does he understand utilitarian welfare? Just how are we to assess different systems of rules in regard to their welfare-promoting effects? Here Hayek comes close to modern preference utilitarianism, but gives that view an original formulation, in arguing that the test of any system of rules is whether it maximizes an anonymous individual's chance of achieving his unknown purposes. 74 In Hayek's conception, we are not bound to accept the historical body of social rules just as we find it: it may be reformed in order to improve the chances of the unknown man's achieving his goals. It will be seen that this is a maximizing conception, but not one that represents utility as a sort of neutral stuff, a container of intrinsic value whose magnitude may vary. Indeed, in taking as the point of comparison an hypothesized unknown individual, Hayek's conception (as he recognizes 75) parallels John Rawls' model of rational choice behind a veil of ignorance as presented in Rawls' Theory of Justice.

Mention of Rawls' contractarian derivation of principles of justice at once raises the question of how Hayek's indirect or system utilitarian argument is supposed to ground the rules of justice he defends, and, in particular, how Hayek's defense of the priority of liberty squares with his utilitarian outlook.

Several observations are apposite here. First, Hayek undoubtedly follows Hume in believing that, because they constitute an indispensable condition for the promotion of general welfare, the rules of justice are bound to take priority over any specific claim to welfare. Again, it is to be noted that Hume's second rule of justice, the transference of property by consent, itself frames a protected domain and so promotes individual liberty. Finally, Hayek argues forcefully that, if individuals are to be free to use their own knowledge and resources to best advantage, they must do so in a context of known and predictable rules governed by law. It is in a framework of liberty under the rule of law, Hayek contends, that justice and general welfare are both served. Indeed, under the rule of law, justice and the general welfare are convergent and not conflicting goals or values.

Justice, Liberty, And The Rule Of Law In Hayek's Constitution Of Liberty

These claims regarding the relations between justice, liberty, and the rule of law encompass the most controversial and the most often attacked portion of Hayek's social philosophy. Common to all criticisms of it is the objection that Hayek expects too much of the rule of law itself, which is only one of the virtues a legal order may display, and a rather abstract notion at that. Among classical liberals and libertarians, this objection has acquired a more specific character. It has been argued 76 that upholding the rule of law cannot by itself protect liberty or secure justice, for these values will be promoted only if the individual rights are respected. Hayek's theory is at the very least radically incomplete, according to these critics, inasmuch as his conception of the rule of law will have the classical liberal implications he expects of it, only if it incorporates a conception of individual rights, which he seems explicitly to disavow. All these liberals and libertarians fasten upon Hayek's use of a Kantian test of universalizability to argue that such a test is almost without substance, in that highly oppressive and discriminatory laws will survive it, so long as their framers are ingenious enough to avoid mentioning particular groups or named individuals in them. The upshot of this criticism is that, in virtue of the absence in his theory of any strong conception of moral rights, Hayek is constrained to demand more of the largely formal test of universalizability than it can possibly deliver, and so to conflate the ideal of the rule of law with other political goods and virtues.

Criticisms Of Hayek's Universalizable 'Rule Of Law'

This fundamental criticism of Hayek, stated powerfully by Hamowy 77 and Raz 78 and endorsed in eariler writings of my own, 79 now seems to me to express an impoverished and mistaken view of the nature and role of Kantian universalizability in Hayek's philosophical jurisprudence. It embodies the error that, in Hayek or indeed in Kant, universalizability is a wholly formal test.

In his "Principles of a Liberal Social Order," (A-115, in B-13) Hayek tells us: "The test of the justice of a rule is usually (since Kant) described as that if its 'universalizability,' i.e. of the possibility of willing that rules should be applied to all instances that correspond to the conditions stated in it (the 'categorical imperative')."80 As an historical gloss, Hayek observes that:

It is sometimes suggested that Kant developed his theory of the *Rechtstaat* by applying to public affairs his conception of the categorical imperative. It was probably the other way round, and Kant developed his theory of the categorical imperative by applying to morals the concept of the rule of law which he found ready made (in the writings of Hume).81

Hayek's own argument, that applying Kantian universalizability to the maxims that make up the legal order yields liberal principles of justice which confer maximum equal freedom upon all, has been found wanting by nearly all his critics and interpreters. Thus Raz quotes Hayek as follows:

"The conception of freedom under the law that is the chief concern of this book rests on the contention that when we obey laws, in the sense of general abstract rules laid down irrespective of their application to us, we are not subject to another man's will and are therefore free. It is because the judge who applies them has no choice in drawing the conclusions that follow from the existing body of rules and the particular facts of the case, that it can be said that laws and not men rule... As a true law should not name any particulars, so it should especially not single out any specific persons or group of persons."

Raz comments on this passage: "Then, aware of the absurdity to which this passage leads, he modifies his line, still trying to present the rule of law as the supreme guarantee of freedom..." <u>82</u>

Similarly, discussing Hayek's criteria that laws should not mention proper names and that the distinctions which the law makes be supported both within and without the group which is the subject of legislation, Hamowy comments:

That no proper name be mentioned in a law does not protect against particular persons or groups being either harassed by laws which discriminate against them or granted privileges denied the rest of the population. A prohibition of this sort on the form laws may take is a specious guarantee of legal equality, since it is always possible to

contrive a set of descriptive terms which will apply exclusively to a person or group without recourse to proper names...83

How are these standard objections to be rebutted?

Meeting Objections To The Universalizability Test

We must first of all note that, even in Kant and in Kantian writers other than Hayek, such as R.M. Hare and John Rawls, the test of universalizability does far more than rule out reference to particular persons or special groups. The test of universalizability does indeed, in the first instance, impose a demand of *consistency* as between similar cases, and in that sense imposes a merely formal requirement of non-discrimination. This is the first stage or element of universalization, the irrelevance of numerical differences. But the next stage of universalization is that of asking whether one can assent to the maxim being assessed coming to govern the conduct of other towards oneself: this is the demand of *impartiality* between agents, the demand that one put oneself in the other man's place. And this element or implication of universalizability leads on to a third, that we be impartial as between the preferences of others, regardless of our own tastes or ideals of life—a requirement of moral neutrality. I do not need to ask here exactly how these elements of universalizability are related to one another, to ask (most obviously) if the second is entailed by the first in any logically inexorable way, or similarly the third by the second. It is enough to note that there is a powerful Kantian tradition according to which strong implications do link the three phases of universalization, and that this is a tradition to which Hayek himself has always subscribed.84

Applying the full test of universalizability to the maxims that go towards making a legal order, we find that, not only are references to particulars ruled out, but the maxims must be impartial in respect of the interests of all concerned, and they must be neutral in respect of their tastes or ideals of life. If it be once allowed that the test of universalizability may be fleshed out in this fashion, it will be seen as a more full-blooded standard of criticism than is ordinarily allowed, and Hayek's heavy reliance on it will seem less misplaced. For, when construed in this fashion, the universalizability test will rule out (for example) most if not all policies of economic intervention as prejudicial to the interests of some and will fell all policies of legal moralism. Two large classes of liberal policy, supposedly allowable under an Hayekian rule of law, thus turn out to be prohibited by it.

Hayek himself is explicit that the test of universalizability means more than the sheerly formal absence of reference to particulars. As he puts it:

The test of the justice of a rule is usually (since Kant) described as that of its 'universalizability,' i.e. of the possibility of willing that the rules should be applied to all instances that correspond to the conditions stated in it (the 'categorical imperative'). What this amounts to is that in applying it to any concrete circumstances it will not conflict with any other accepted rules. The test is thus in the last resort one of the compatibility or non-contradictoriness of the whole system of rules, not merely in a logical sense but in the sense that the system of actions which the rules permit will not lead to conflict.85

The maxims tested by the principle of universalizability, then, must be integrated into a system of nonconflictable or (in Leibniz' terminology) compossible rules, before any of them can be said to have survived the test.

Again, the compatibility between the several rules is not one that holds in any possible world, but rather that which obtains in the world in which we live. It is here that Hayek draws heavily on Hume's account of the fundamental laws of justice, which he thinks to be, not merely compatible with, but in a large measure the inspiration for Kant's political philosophy. 86 As I have already observed, the practical content of the basic rules of justice is given in Hume by anthropological claims, by claims of general fact about the human circumstance. It is by interpreting the demands of universalizability in the framework of the permanent necessities of human social life that we derive Hume's three laws of natural justice.

Kantian Universalizability & Liberal Justice

Note again that, in Hume, as in Hayek, the laws of justice are commended as being the indispensable condition for the promotion of general welfare, i.e. their ultimate justification is utilitarian. But in order to achieve this result, neither Hayek nor Hume need offer any argument in favor of our adopting a Principle of Utility. Rather, very much in the spirit of R.M. Hare's Kantian reconstruction of utilitarian ethics, <u>87</u> Hayek's claim is that an impartial concern for the general welfare is itself one of the demands of universalizability. A utilitarian concern for general welfare is yielded by the Kantian method itself and is not superadded to it afterwards. Hayek's thesis, like Hume's, is that a clear view of the circumstances of human life shows justice to be the primary condition needed to promote general welfare. But, like Hare and Kant, he thinks concern for both justice and the general welfare to be dictated by universalizability itself.

Hayek's argument, then, is that the maxims of liberal justice are yielded by applying the Kantian universalizability test to the principles of the legal order. As he puts it:

It will be noticed that only purpose-independent ('formal') rules pass this (Kantian) test because, as rules which have originally been developed in small purpose-connected groups ('organizations') are progressively extended to larger and larger groups and finally universalized to apply to the relations between any members of an Open Society who have no concrete purposes in common and merely submit to the same abstract rules, they will in the process have to shed all reference to particular purposes.88

Again, in listing the essential points of his conception of justice Hayek asserts:

...a) that justice can be meaningfully attributed only to human actions and not to any state of affairs as such without reference to the question whether it has been, or could have been, deliberately brought about by somebody; b) that the rules of justice have essentially the nature of prohibitions, or, in other words, that injustice is really the primary concept and the aim of rules of just conduct is to prevent unjust action; c) that the injustice to be prevented is the infringement of the protected domain of one's fellow men, a domain which is to be ascertained by means of these rules of justice; and d) that these rules of just conduct which are in themselves negative can be developed by consistently applying to whatever such rules a society has inherited the equally negative test of universal applicability—a test which, in the last resort, is nothing less than the self-consistency of the actions which these rules allow if applied to the circumstances of the real world.89

There seem to be several elements, then, in Hayek's contention that applying the Kantian test to the legal framework yields a liberal order. First, though he does not explicitly distinguish the three stages or phases of universalization I mentioned earlier, he is clear that the universalizability test is not only formal, and that it comprehends the requirement that the scheme of activities it permits in the real world

would be conflict-free. Second, at any rate in a society whose members have few if any common purposes, law must have a largely formal character, stipulating terms under which men may pursue their self-chosen activities rather than enjoining any specific activities on them; in the term Hayek adopts from Oakeshott, 90 the form of legal rule appropriate to such an abstract or open society is "nomocratic" rather than "teleocratic," purpose-neutral rather than purpose-dependent. Third, in a society whose members lack common purposes or common concrete knowledge, only abstract rules conferring a protected domain on each can qualify as rules facilitating a conflictfree pattern of activities. This means that the conditions of our abstract or open society will themselves compel adoption of a rule conferring just claims to liberty and private property—which Hayek rightly sees and indissolubly linked—once these conditions are treated as the appropriate background for the Kantian test.

One crucially important implication of this last point, noted in all of Hayek's political writings over the last twenty years but spelled out most systematically in the second volume of his recent trilogy, *Law, Legislation and Liberty*, is that the rules of justice which survive the Kantian test can prescribe justice only in the procedures and never in end-states. As Hayek puts it, explicating Hume: "There can be no rules for rewarding merit, or no rules of distributive justice, because there are no circumstances which may not affect merit, while rules always single out some circumstances as the only relevant ones."91

This pattern of argument is an important and striking one, worth examining in detail on its merits, and not capable of being dismissed as prima facie unworkable. One important point may be worth canvassing, however. Hayek argues that once the legal framework has been reformed in Kantian fashion, it must of necessity be one that maximizes liberty. Hamowy goes so far as to assert that Hayek *defines* liberty as conformity with the rule of law. 92 Now, whereas not every aspect of Hayek's treatment of freedom and coercion is clear or defensible, 93 it seems a misinterpretation to say that he ever *defines* freedom as consisting solely in conformity with the rule of law. Rather, he takes such conformity to be a necessary condition of a free order. His thesis is that applying the Kantian test to the legal order will of itself yield a maxim according equal freedom to all men. 94 So it is not that the rule of law contains freedom as part of its definition, but rather that a freedom-maximizing rule is unavoidably yielded by it. In other terms, we may say that, whereas moral rights do not come into Hayek's theory as primordial moral facts, the right to a protected domain is yielded by his conception as a theorem of it.

If Hayek is right that his method shows the unacceptability of contemporary patterned conceptions of justice, for example, and if, as I think, he has shown that only procedural justice can be squared with the liberal maxim demanding equal freedom of action, then we can begin to see the measure of his achievement. Certainly, his Kantian derivation of equal freedom deserves close and sympathetic scrutiny, and it cannot be assumed without argument that Hayek's system cannot protect individual rights or claims to justice simply because such rights do not enter the system at a fundamental level. For the most original and striking claim of Hayek's legal and political philosophy, which in this respect may be regarded as a synthesis of the theories of justice of Hume and Kant, is that applying the rational test of

universalizability to the conditions of our world must of necessity yield a system of rules in which a protected domain of individual liberty is secured.

Some Criticism Of Hayek's System Of Ideas: Buchanan And Oakeshott

In regard to his theory of justice, the criticisms we have surveyed appear to be premature, or at least inconclusive. We have yet to consider a much more fundamental criticism of Hayek's system, directed against it by thinkers in very different traditions, which attends to the highly ambigous role in Hayek's theory of the idea of spontaneous order.

James Buchanan On Hayek

One of the clearest and deepest statements of some of the difficulties in Hayek's use of spontaneous order arguments may be found in James M. Buchanan's writings. In an important paper, 95 Buchanan observes that, in Hayek's later writings we find:

the extension of the principle of spontaneous order, in its *normative* function, to the emergence of institutional structure itself. As applied to the market economy, that which emerges is defined by its very emergence to be that which is efficient. And this result implies, in its turn, a policy of nonintervention, properly so. There is no need, indeed there is no possibility, of evaluating the efficiency of observed outcomes independently of the process; there exists no external criterion that allows efficiency to be defined in objectively measurable dimensions. If this logic is extended to the structure of institutions (including law) that have emerged in some historical evolutionary process, the implication seems clear that that set which we observe necessarily embodies institutional or structural 'efficiency.' From this it follows, as before, that a policy of nonintervention in the process of emergence is dictated. There is no room left for the political economist, or for anyone else, who seeks to reform social structures, to *change* laws and rules, with an aim of security instead of efficiency in the large...Any 'constructively rational' interferences with the 'rational' processes of history are, therefore, to be avoided.

Buchanan's criticism, then, is that Hayek's apparent extension of spontaneous order or evolutionary arguments from the market processes to institutional structures is bound to disable the tasks of criticism and reform. We are left with no leverage in Hayek's account which might be used against the outcomes of the historical process. Instead, it seems, we are bound to entrust ourselves to all the vagaries of mankind's random walk in historical space.

In an earlier critique, 96 Buchanan noted perceptively the phenomenon of "spontaneous disorder"—the emergence of patterns of activity that thwart the purposes and damage the interests of all who participate in them. Such "spontaneous disorder" is, after all, the core of the idea of the Prisoner's Dilemma, which has been explored imaginatively in Buchanan's writing in its political and constitutional applications. The neglect in Hayek's political work in English of any treatment of the problem this Dilemma poses for his system invites the attempt to accommodate these fundamental objections.

It is clear, however, that as it stands Hayek's conception of spontaneous order needs revision or at least refinement. Buchanan's identification of certain states of affairs as manifesting spontaneous disorder suggests the question whether the idea of spontaneous order in Hayek is a value-free explanatory notion or else a moral notion of some sort. If the former—as Hayek's examples of spontaneous order in nature suggest—then spontaneous order really functions as a cipher for invisible hand explanations of the sort brilliantly discussed by Robert Nozick in his *Anarchy, State, and Utopia.*97

We might then be compelled to regard the growth of interventionism and of the welfare state, and even certain aspects of the functioning of totalitarian regimes, as exemplifying spontaneous order inasmuch as we might be able to explain these social phenomena as the unintended outcomes of human action. If, on the other hand, spontaneous orders are taken as embodying positive moral values—if, that is to say, the idea of a maleficient or destructive spontaneous order is repudiated as incoherent—then it seems clear that Hayek requires a far bolder moral theory than any he has advanced thus far. In particular, such a moral theory would need to bridge the gap between evaluative and descriptive language which is a feature of modern moral philosophy, and in this and other respects it would need to come much closer to natural law ethics than Hayek has ever himself done.

Buchanan's critique is decisive, then, in compelling Hayek to clarify the idea of spontaneous order as being either a moral notion, which might plausibly be embedded only in some variant of natural law ethics, or else as a value-free explanatory concept whose political uses must then be made more explicit than Hayek has heretofore done.

Buchanan's critique is important, again, in disclosing that Hayek's attitude to rationalism is ambivalent and unstable. If we adopt the latter view of spontaneous order as a value-free explanatory idea, its uses in political argument depend upon two kinds of considerations. First, they must invoke a political ethics, which arguably is given by Hayek's synthesis of Hume with Kant. More problematically, however, the use of an explanatory idea of spontaneous order in political argument presupposes that we have a genuine theoretical or synoptic knowledge of social life of just the sort that Hayek occasionally suggests is impossible. This is to say that, if we are to make use of the idea of spontaneous social order in framing or reforming social institutions so as to make best use of society's spontaneous forces, we need to invoke a theoretical model of social structure and social process which gives some assurance as to the outcome of our reforms. To this extent, contrary to some of Hayek's recommendations but in line with a part of his recent practice, we cannot avoid adopting a critical rationalist stance toward our inherited institutions and the historical process. This is true, whether we accept Hayek's own effort at a political ethics, or Buchanan's neo-Hobbesian contractarian constitutionalism.

Michael Oakeshott On Hayek

These cited points are reinforced if we consider Michael Oakeshott's attitude to Hayek's work. 98 Oakeshott is a more intrepid traditionalist than Hayek in that Oakeshott claims that we cannot in the end do anything but accept the traditions which we inherit in our society. Certainly, we cannot appraise our traditions by reference to any transcendental standard of reason or justice, since such standards (in Oakeshott's view) necessarily turn out to be abridgements of our traditions themselves. Like Hayek, then, Oakeshott maintains that all moral or political criticism must be immanent criticism, but, unlike Hayek, he denies that there is any inherent or evolutionary tendency for the development of traditional practices to converge on liberal institutions. For this reason Oakeshott would insist that his conception of civil association or nomocracy—upon which, as we have already seen, Hayek draws in his conception of the juridical framework of the liberal order—is a description of a strand of practice in the modern European state and has no necessary application beyond the cultural milieu in which it came to birth. Oakeshott would accordingly repudiate the implicit universalism of Hayek's argument for the liberal order.

To some extent, of course, Hayek concedes that there cannot be universal scope for liberal principles when he allows that the Great or Open Society is itself an evolutionary emergence from rude beginnings. Where he differs from Oakeshott is in affirming that the Great or Open Society in which liberal principles are uniquely appropriate represents the future of all mankind. In this respect, Hayek continues to subscribe to an Enlightenment doctrine of universal human progress which Oakeshott has abandoned. I do not mean that Hayek has ever endorsed the belief that historical change is governed by a law of progressive development, but rather that he seems to take for granted (what surely is most disputable) that the unhampered natural selection of rival practices and traditions will result in a general convergence on liberal society.

Hayek's Variant Of Classical Liberalism: A Fusing Of Libertarian & Traditionalistic Ideals?

A contrast of Hayek's thought with that of Oakeshott revives one of the commonest criticisms of Hayek's work, namely, that it straddles incompatible conservative and libertarian standpoints. The upshot of my discussion thus far may support this standard criticism in that it suggests that Hayek's system is poised uneasily between the constructivist (but not uncritical) rationalism of a Buchanan and the out-and-out traditionalism of an Oakeshott.

At the same time, however, elements of Hayek's conception of social evolution via the competitive selection of rival traditions may provide a point of convergence, if not of fusion, for some libertarian and conservative concerns. One central argument in contemporary neo-conservatism, after all, is in the claim that the stability of the free society depends upon its containing strong supportive traditions. Modern neo-conservatives such as Irving Kristol and Daniel Bell take up the doubts expressed by writers of the Scottish Enlightenment such as Smith and Ferguson about the effect on society's moral traditions of the workings of the commercial marketplace itself. A major difficulty in the neo-conservative analysis is the lack of any very convincing prognosis: if free markets have corrosive effects in respect of the moral traditions which support them, so that capitalism institutions contain cultural contradictions which make them over the long run self-destroying, what is to be done?

This is an especially hard question if we recognize (as some of the neo-conservatives themselves sometimes fail to do) that merely capturing positions of power in the apparatus of the contemporary democratic state affords no longrun security for the market order

Hayek's Voluntaristic Traditionalism: A Market In Traditions

There is in Hayek's work an argument for voluntaristic traditionalism which goes some way toward answering this question. Hayek sees that the principal cause of the erosion of definitive moral traditions in advanced societies is not so much the market itself, but rather interventionist policies sponsored by governments. Often with the support of business, governments have contributed to the erosion of moral traditions by their educational, housing, and welfare policies. Hayek's argument for a voluntaristic traditionalism distinguishes him from neo-conservatives, firstly in that he would argue that it is government interventionism which causes much of the contemporary moral malaise and because he would not seek to use government power to prop up faltering traditions. Rather, he seeks to establish something like a market in traditions, in the hope that the traditions which would emerge from an unhampered social life would be most congenial to the stability of the market order itself. In his argument for a competitive and voluntaristic traditionalism, Hayek plainly treats particular traditional communities as filter devices for social practices of the sort Robert Nozick discusses in his fascinating and profound account of the framework of utopia.99

It cannot be said unequivocably that Hayek's libertarian traditionalism answers the most profoundly disturbing doubts of the neo-conservatives. In particular, Hayek's advocacy of procedural justice, with the role of chance in distributing incomes being recognized clearly, 100 confronts the difficulty that the moral defense of capitalism has chiefly been conducted by reference to the notion of desert. By comparison with this traditional defense, Hayek's apologia for the market order may be, as Kristol observes, "nihilistic." 101

Against this criticism Hayek may justifiably maintain that there is a sheer conflict between traditional sentiments of desert and merit and any clear-sighted defense of the market order—a conflict which the neo-conservative endorsement of the market order does nothing to resolve.

Kristol's criticism of Hayek has other, and perhaps profounder aspects, however. Hayek recognizes that contemporary moral sentiment is by no means uniformly, or even generally, favorable to the market order, and, both in his writings on Mandeville 102 and elsewhere, Hayek has implicitly acknowledged that the spontaneous growth of moral norms may not, in fact, yield results congenial to a stable market order. At the same time, Hayek continues to advocate a strong form of moral conventionalism, resisting the claims of those who see modern morality as in need of radical reform. There is thus a tension, perhaps irresolvable in terms of Hayek's system, between his Mandevillian moral iconoclasm and his moral conservatism.

Conclusion: Hayek's Research Program & Classical Liberalism

In his argument for a voluntaristic traditionalism, Hayek (as we have seen) answers some of the concerns of contemporary conservatives. His argument for a market in traditions may be vulnerable to criticism, inasmuch as the growth of anti-market ethics over the past centuries seems to belie his expectation that natural selection of moral traditions will filter out those unfriendly to the market process. In recognition of this, Hayek would in consistency be compelled to adopt, in respect of moral convention, a more "rationalist" stance than he usually recommends. He would need to undertake a systematic criticism of modern morality in regard to its viability as part of an ongoing market order. In so doing, he would be resuming the task undertaken by those moderate rationalists, Bernard Mandeville and David Hume, whom Hayek rightly sees as the fountainheads of classical liberalism. Even if his own system of ideas should prove unstable, it recalls to us the insights of the great classical liberals, and intimates the most powerful research program in classical liberal political philosophy. And, in recalling that intellectual tradition from what had sometimes seemed an irrecoverable oblivion, Hayek's work is a hopeful augury for an uncertain future. 103

Footnote

For full citations of books and articles mentioned in these notes, see the following bibliography. References to Hayek's works are cited by title or by alphabetic letter followed by numbers to identify books (B-), articles (A-), edited works (E-), and pamphlets (P-). See the following Hayek bibliography for more information. References to books or articles about Hayek and related matters are found in the last section of the bibliography



BIBLIOGRAPHY OF FRIEDRICH A. HAYEK

The following bibliography of the writings by and about Friedrich A. Hayek was compiled near the end of 1982 by John Cody assisted by Nancy Ostrem. We gratefully acknowledge the helpful suggestions of Kurt R. Leube (Editor-in-chief of the International Carl Menger Library, Vienna), Prof. Albert H. Zlabinger of Jacksonville University (and co-editor with Kurt Leube of Philosophia Verlag), Prof. Paul Michelson of Huntington College, Paul Varnell of Chicago, and members of the Institute for Humane Studies staff, including Leonard P. Liggio, Walter Grinder, and John Blundell

While aiming to be the most comprehensive, accurate, and up-to-date listing of Hayekian scholarship yet assembled, this bibliography—owing to the prolific and dispersed nature of the materials involved—must unavoidably contain errors, incomplete citations, and omissions. Among the omissions are a great many of Hayek's voluminous letters-to-editors, short notes or comments, interviews (including tape recordings, video-cassettes, and films), and book reviews. Such journals as the *Schriften des Vereins für Sozialpolitik, Jährbucher für Nationalökonomie und Statistik, Zeitschrift für Volkswirtschaft und Sozialpolitik* (after 1927 superseded by *Zeitschrift für Nationalökonomie*), and *Economica* contain many items not listed in this edition of the bibliography. Many additional bibliographical items by or about Hayek came to our attention only after our typesetting deadline precluded further citations. To remedy our omissions and to emend our in-accuracies for a possible subsequent publication of an enlarged Hayek bibliography we welcome our readers' comments and assistance.

Earlier bibliographical orientations to Hayek's writings that proved helpful in creating the present Bibliography are:

Erich Streissler, Gottfried Haberler, Friedrich A. Lutz, and Fritz Machlup, eds. "Bibliography of the Writings of Friedrich A. von Hayek," in *Roads to Freedom: Essays in Honour of Friedrich A. von Hayek.* London: Routledge & Kegan Paul, 1969, pp. 309–315.

Walter Eucken Institut. "Bibliographie der Schriften von F.A. von Hayek." ["Bibliography of the Writings of F.A. von Hayek."] in Freiburger Studien. Gesammelte Aufsätze von F.A. Hayek. Tübingen: J.C.B. Mohr/Paul Siebeck (Wirtschaftswissenschaftliche und wirtschaftsrechtliche Untersuchungen 5), 1969, pp. 279–284.

Fritz Machlup, "Friedrich von Hayek's Contribution to Economics." *The Swedish Journal of Economics* 76 (December 1974): 498–531.

——. "Hayek's Contribution to Economics," in *Essays on Hayek*. Edited by Fritz Machlup. Foreward by Milton Friedman. New York: New York University Press, 1976, pp. 13–39. [Machlup's 1974 and his updated 1976 bibliographical essays are

indispensable guides to Hayek's writings through the mid-1970s. Adhering to the fourfold classification system of Hayek's writings laid out in the Streissler 1969 *Roads to Freedom*, Hayek "Bibliography," Machlup devised an alphabetical and numerical identification code for easy reference to Hayek's books (B-), pamphlets (P-), edited or introduced books (E-), and articles in learned journals or collections of essays (A-).]

——. Würdigung der Werke von Friedrich August von Hayek. Translated by Kurt R. Leube. Tübingen: Walter Eucken Institut (Vorträge und Aufsätze 62), 1977, pp. 63–75. [This "Assessment of the Works of Friedrich August von Hayek is the German translation of the preceding Machlup Bibliography of Hayek.]

Leube, Kurt R. "Anhang: Bibliographie der Schriften von F.A. von Hayek," ["Appendix: Bibliography of the Writings of F.A. von Hayek"] in: F.A. von Hayek. *Geldtheorie und Konjunkturtheorie*. Reprint of the first edition (Vienna, 1929; see B-1). Salzburg: Philosophia Verlag, 1976. pp. 148–160. This is identical to Leube's Hayek Bibliography in: Friedrich A. von Hayek. *Individualismus und wirtschaftliche Ordnung*. Reprint of the first German edition (Erlenbach-Zurich, 1952; see B-7). Salzburg: Philosophia Verlag, 1976, pp. 345–357.

——. "Ausgewählte Bibliographie der Arbeiten F.A. Hayeks zu verwandten Problemkreisen" ["Selected Bibliography of the Works of F.A. Hayek to Related Problem Areas"], in the German reprint of the first edition (Vienna, 1931; see B-2) of *Preise und Produktion*. Vienna: Philosophia Verlag, 1976, pp. 13–18.

Books

B-1 *Geldtheorie und Konjunkturtheorie*. (Beitrage zur Konjunkturforschung, herausgegeben vom Österreichisches Institut für Konjunkturforschung, No. 1). Vienna and Leipzig: Hölder-Pichler-Tempsky, 1929/2, xii, 147 pp. (England 1933, Japan 1935, Spain 1936.) Translated into English by N. Kaldor and H. M. Croome with an "Introduction to the Series, Library of Money and Banking History" by Lionel an "Introduction to the Series, Library of Money and Banking History" by Lionel Robbins as *Monetary Theory and the Trade Cycle*. London: Jonathan Cape, 1933, 244 pp. American edition, New York: Harcourt Brace & Co., 1933. Reprinted New York: Augustus M. Kelley, 1966. The German first edition of *Geldtheorie* is described as "Contributions to Trade Cycle Research, published by The Austrian Institute for Trade Cycle Research, No. 1." This Institute was founded by Ludwig von Mises, and Hayek was its Director from 1927–1931.)

See also foreward and bibliography to the 2nd German edition by Kurt R. Leube, "Vorwort und Bibliographie zur Weiderauflage F. A. Hayek: *Geldtheorie und Konjunkturtheorie*." Salzburg: (W. Neugebauer) Philosophia Verlag, 1976. [Hayek's *Geldtheorie* (1929) together with its English translation (1933) is an expanded version of the paper (A-7a) delivered at a meeting of the Verein für Sozialpolitik, held in Zurich, in September 1928 (See A-7a with annotations). Hayek cites earlier studies as the foundations for his *Geldtheorie*: A-2a, A-6, A-7a, A-9a, A-13. Hayek presents, from the Austrian School perspective, a critical assessment of rival theories on the cause of trade cycle. He argues that the cause of all significant trade cycle fluctuations are monetary interventions which distort relative price relationships.].

B-2 *Prices and Production*. (Studies in Economics and Political Science, edited by the director of the London School of Economics and Political Sciences. No. 107 in the series of Monographs by writers connected with the London School of Economics and Political Science.) London: Routledge & Sons, 1931/2, xv, 112 pp. 2nd revised and enlarged edition, London: Routledge & Kegan Paul, 1935/9, also 1967 edition, xiv, 162 pp. American edition, New York: Macmillan, 1932. German edition. *Preise und Produktion*. Vienna, 1931/2, also 1976 edition. (Japan 1934, China [Taipei] 1966, France 1975).

See also the selected bibliography to the 2nd German edition: Kurt R. Leube, "Ausgewählte Bibliographie zur Wiederauflage F. A. Hayek: *Preise und Produktion*." Philosophia Verlag, 1976.

[The 1st edition of *Prices* (1931) literally reproduced Hayek's four lectures on industrial fluctuations presented at the University of London (LSE) during the session 1930–1931. The "Preface to the Second Edition" of *Prices* (1935) states how Hayek developed Austrian capital theory following the four lectures. These developments were contained in the 2nd edition and prepared for by A-11a, A-12, A-13, A-14, A-21, A-22, A-23, A-24a, as well as by the first German edition of *Preise* (1931), the English version (B-1), and A-9a. Economist Sudha R. Shenoy, in an unpublished

manuscript, has done a detailed comparative analysis of the differences between the 1931 and 1935 editions of *Prices*.]

B-3 *Monetary Nationalism and International Stability*. Geneva, 1937; London: Longmans, Green (The Graduate Institute of International Studies, Geneva, Publication Number 18), 1937, xiv, 94 pp. Reprinted New York: Augustus M. Kelley, 1964, 1971, 1974.

[Revised version of five lectures delivered at the *Institute Universitaire de Hautes Études Internationales* at Geneva. Hayek surveys the consequence of alternative monetary arrangements, such as gold vs. paper currency and flexible vs. fixed exchange rates.]

B-4 *Profits, Interest and Investment: and Other Essays on The Theory on Industrial Fluctuations.* London: Routledge & Kegan Paul, 1939/3, viii, 266 pp., also 1969 edition. Reprinted New York: Augustus M. Kelley, 1969, 1970; Clifton, New Jersey: Augustus M. Kelley, 1975.

[Collection of essays, mostly reprints or revised versions of earlier essays, which are attempts "to improve and develop the outline of a Theory of Industrial Fluctuations contained in" B-1 and B-2. The first chapter, "Profits, Interest and Investment" is new; the other chapters are revisions of A-37a, A-27a, A-26, A-19, A-21, A-14, A-9a. Hayek's essays defend the Austrian School's theory of the trade cycle. He argues that monetary interventions cause far-ranging economic distortions that bring about malinvestment and unemployment.]

B-5 *The Pure Theory of Capital*. London: Routledge & Kegan Paul, 1941/2 (also 1950 edition); Chicago: University of Chicago Press, 1941 (also 1950, 1952 and 1975 editions); xxxi, 454 pp. (Spain 1946, Japan 1951 and 1952).

[Growing out of Hayek's concern for the causes of the trade cycle or industrial fluctuations, this work deals with capital, interest, and time components in the structure of production.]

B-6 *The Road to Serfdom*. London: George Routledge & Sons, 1944/1945/20 (also 1969 edition); Chicago: University of Chicago Press, 1944/1945/20 (also 1969 edition), 250 pp. (Sweden 1944; France 1945; German version 1945: *Der Weg zur Knechtschaft*. Zurich 1945/3 (also 1952 edition); the German translation by Eva Röpke is available in paperback from Deutscher Taschenbuch Verlag (Munich, 1976); Denmark, Portugal, and Spain 1946; Netherlands 1948; Italy 1948; Norway 1949; Japan 1954; China [Taipei] 1956/1965/1966; Iceland 1980). Reprinted in two different paperback versions with new Prefaces by F. A. H. Chicago: University of Chicago Press, Phoenix Books, 1956 (see B-13, chapt. 15) and also 1976 paperback edition by University of Chicago Press and Routledge and Kegan Paul.

[Hayek wrote *The Road to Serfdom* in his "spare time from 1940 to 1943" while he was engaged in pure economic theory. The central argument was first sketched in

A-37b (1938) and expanded in P-2 (1939). Hayek's thesis is that social-political planning endangers both political and economic liberties of the individual.]

B-7 *Individualism and Economic Order*. London: George Routledge & Sons, 1948/5, also 1960, 1976; Chicago: University of Chicago Press, 1948/5, also 1969, 1976, vii, 272 pp. Paperback edition, Chicago: Henry Regnery Co., Gateway edition 1972 (out of print), but now available in a University of Chicago paperback edition; (German edition, Zurich, 1952, Norway [shortened version] 1953, Spain 1968, Netherlands no date.)

See also bibliographic postscript in the German reprint of the 1st edition, Erlenbach-Zurich: 1952: Kurt R. Leube, "Bibliographisches Nachwort zur Wiederauflage F. A. Hayek: *Individualismus und wirtschaftliche Ordnung*." Salzburg: Philosophia Verlag, 1977.

[*Individualism* reprints P-5, A-34, A-49, A-50, E-5 (Chapt. 1: "The Nature of the Problem"), E-5 (Chapt. 5: "The (Present) State of the Debate"), A-41, A-48, A-45, A-38; and some previously unpublished lectures: Chapt. 5: "The Meaning of Competition" and Chapt. 6 "Free' Enterprise and Competitive Order." These articles and speeches sound the Hayekian warning against economic and social planning.]

B-8 *John Stuart Mill and Harriet Taylor: Their Friendship and Subsequent Marriage*. London: Routledge & Kegan Paul, 1951/1969; Chicago: University of Chicago Press, 1951/1969, 320 pp.

[During the 1920s the Mill-Taylor correspondence became available for scholarly assessment of how much ideological influence Harriet Taylor exerted on the political, economic, and social ideas of her intimate friend and eventual husband, John Stuart Mill. Hayek's volume presenting their correspondence allows the reader to judge the nature of their relationship.]

B-9 *The Counter-Revolution of Science: Studies on the Abuse of Reason*. Glencoe, Illinois: The Free Press, 1952, 255 pp; new edition New York, 1964; 2nd edition with 1959 Preface to German edition, Indianapolis, Indiana: Liberty *Press*, 1979, also available in Liberty *Press* paperback. (Germany 1959, Frankfurt am Main edition published under the title *Missbrauch und Verfall der Vernunft* or "The Abuse and Decline of Reason"; German reprint of Frankfurt edition, Salzburg: Philosophia Verlag, 1979; France excerpts, 1953; Italy 1967.)

[The two major sections of this volume first appeared as articles in *Economica* as A-46 (1942–1944) and A-42 (1941), respectively: the third study first appeared as A-70 (1951). Hayek analyzes the intellectual origins of social planning and engineering. Topics covered include: scientism and the methodology of studying society, collectivism, historicism, non-spontaneous or rationalistic social planning, as well as the role of Saint-Simon, Comte, and Hegel in legitimizing scientistic sociology.]

B-10 *The Sensory Order: An Inquiry into the Foundations of Theoretical Psychology*. London: Routledge & Kegan Paul, 1952; Chicago: University of Chicago Press, 1952, xxii, 209 pp; new edition 1963/1976. Reprinted Chicago: University of Chicago Press, Phonenix Book paperback, 1963 (out of print). University of Chicago Press has reissued the paperback in a Midway Reprint, 1976, with the Heinrich Klüver Introduction.

[Though published in 1952, the "whole principle" of *The Sensory Order* was conceived 30 years earlier by Hayek in a draft of a student paper composed around 1919–1920, while he was still uncertain whether to become a psychologist or an economist. Three decades later his concern about the logical character of social theory led him to reexamine favorably his youthful conclusions on certain topics of epistemology and theoretical psychology: concepts of mind, classification, and the ordering of our mental and sensory world. In his 1952 Preface Hayek acknowledges his indebtedness "particularly" to Ernst Mach and his analysis of perceptual organization.]

B-11 *The Political Ideal of the Rule of Law*. Cairo: National Bank of Egypt, Fiftieth Anniversary Commemorative Lectures, 1955, 76 pp. [Publication of four lectures Hayek delivered at the invitation of the National Bank of Egypt. These essays form a historical survey of the evolution of freedom and the rule of law in Britain, France, Germany, and America.]

[Reprinted in a revised, edited, and abridged format as Chapters 11 and 13 - 16 of Hayek's B-12; Chapters 11 and 16 of the B-12 version were reprinted under the title, *The Rule of Law*. Menlo Park, California: Institute for Humane Studies (Studies in Law, No. 3), 1975.]

B-12 *The Constitution of Liberty*. London: Routledge and Kegan Paul, 1960; Chicago: University of Chicago Press, 1960/1963/5 (also 1969 edition); Toronto: The University of Toronto Press, 1960, x, 570 pp. Also available in paperback: Chicago: Henry Regnery Co. Gateway Edition, 1972.

German translation: *Die Verfassung der Freiheit*. Tübingen: Walter Eucken Institut (Wirtschaftswissenschaftliche und wirtschaftrechtliche Untersuchungen No. 7), [J. C. B. Mohr/P. Siebeck], 1971. (Spain 1961, Italy 1971, China [Taipei] 1975). [Hayek composed the Preface of *The Constitution of Liberty* on his 60th birthday (May 8, 1959). He intended this survey of the ideals of freedom in Western civilization to commemorate the centenary of John Stuart Mill's *On Liberty* (1859). In "Acknowledgments and Notes" he describes the various preliminary drafts and versions he incorporated into this volume; also see B-11. Hayek stresses the working of the liberal, spontaneous order of society, which is too complex to be subjected to social planning and engineering.]

B-13 *Studies in Philosophy, Politics and Economics*. London: Routledge & Kegan Paul, 1967/1969; Chicago: University of Chicago Press, 1967/1969; Toronto: University of Toronto Press, 1967/1969; x, 356 pp. Reprinted in paperback New York: Simon and Schuster Clarion Book, 1969.

[This volume of 25 essays contains reprints of articles and speeches by F. A. H. as well as previously unpublished writing and speeches over a 20-year period preceding 1967. Reprints (often revised) include: A-76, A-102, A-103b, A-112, A-108, A-115, A-65, A-68, A-99a, etc. Consult volume to determine other essays published for the first time. The scope of topics includes essays on epistemology, history of ideas, specialization, Hume, spontaneous order, the liberal social order, the transmission of liberal economic ideas, and a variety of other topics on philosophy, politics, and economics.]

B-14 *Freiburger Studien. Gesammelte Aufsätze*. Tübingen: Walter Eucken Institut (Wirtschaftswissenschaftliche und wirtschaftsrechliche Untersuchungen 5) J.C.B. Mohr/P. Siebeck, 1969, 284 pp.

["Freiburg Studies. Collected Essays." German anthology of Hayek's essays. Contains German versions of such items as P-9 and P-10.]

B-15 Law, Legislation and Liberty: A New Statement of the Liberal Principles of Justice and Political Economy, Vol. I, Rules and Order. London: Routledge & Kegan Paul; Chicago: University of Chicago Press, 1973, xi, 184 pp.

A trilogy published in the following sequence:

Vol. I, Rules and Order, 1973 Vol. II, The Mirage of Social Justice, 1976 Vol. III, The Political Order of a Free People, 1979

These volumes are also available in paperback, Phoenix Books editions of the University of Chicago Press. A French translation, *Droit, Législation et Liberté*, is available from Presses Universitaires de France in the Collection Libre Échange, edited by Florian Aftalion and Georges Gallais-Hamonno.

[Vol. I distinguishes between liberal spontaneous order ('cosmos') and planned or engineered, rationalistic social orders ('taxis'). Hayek also traces the changing concept of law, principles vs. expediency in politics, and the 'law of legislation'.]

B-16 Law, Legislation and Liberty: A New Statement of the Liberal Principles of Justice and Political Economy, Vol. II, The Mirage of Social Justice. London: Routledge & Kegan Paul; Chicago: University of Chicago Press, 1976, xiv, 195 pp.

[Vol. II outlines the meaning of justice in the free, liberal social order, critiques the notion of 'social' or distributive justice, and contrasts it with the market order or 'catallaxy', the regime of the Open Society.]

B-17 New Studies in Philosophy, Politics, Economics and the History of Ideas. London: Routledge & Kegan Paul, 1978; Chicago: University of Chicago Press, 1978. [This volume of 20 essays supplements Hayek's earlier Studies (B-13) by reprinting in a more accessible form some of his earlier articles and unpublished lectures not reprinted in Studies. Reprints include P-11a, P-9, A-121, P-10, A-127, P-9, A-131a, A-136a, A-116, A-113. Consult New Studies for titles of essays not previously

published. Ranging over themes from philosophy, politics, economics, and the history of ideas, Hayek analyzes such topics as constructivism, the 'atavism of social justice', liberalism, the dangers of economic planning, and the ideas of Mandeville, Smith, and Keynes. Chapter 2 reprints his 1974 Nobel Prize speech, "The Pretence of Knowledge."]

B-18 Law, Legislation and Liberty: A New Statement of the Liberal Principles of Justice and Political Economy, Vol. III, The Political Order of a Free People.

London: Routledge & Kegan Paul; Chicago: University of Chicago Press, 1979, xv, 244 pp. [Vol. III concludes Hayek's trilogy. Hayek exposes the weakness inherent in most forms of democratic government and outlines his alternative constitutional, political, and legal arrangements to create a democratic order that would be consistent with the free society. The Epilogue, "The Three Sources of Human Values," reprints Hayek's Hobhouse Lecture delivered at the London School of Economics, May 17, 1978.]

Pamphlets

P-1 Das Mieterschutzproblem, Nationalökonomische Betrachtungen. Vienna: Steyrermühl-Verlag, Bibliothek für Volkswirtschaft und Politik, No. 2, 1929. ["The Rent Control Problem, Political Economic Considerations." Hayek's later article (A-9b) was adapted from P-1 (the more detailed study on the effects of rent control) and both were used to form the substance of Hayek's "The Repercussions of Rent Restrictions," in F. A. Hayek, Milton Friedman, et al. Rent Control: A Popular Paradox. Evidence on The Effects of Rent Control. Vancouver: The Fraser Institute, 1975, pp. 67–83; this last volume grew out of an earlier version: Arthur Seldon, ed. Verdict on Rent Control. London: Institute of Economic Affairs, 1972.]

P-2 *Freedom and the Economic System*. University of Chicago Press (Public Policy Pamphlet No. 29. Harry D. Gideonse, editor), 1939, iv, 38 pp.

[Reprinted in an enlarged form from *Contemporary Review* (April 1938).]

P-3 *The Case of the Tyrol*. London: Committee on Justice for the South Tyrol, 1944. [F. A. H. advocates Tyrolean autonomy independent of Italian hegemony. Compare with Hayek's artice A-53 (1944).]

P-4 Report on the Changes in the Cost of Living in Gibraltar 1939–1944 and on Wages and Salaries. Gibraltar, no date (1945).

P-5 *Individualism: True and False*. (The Twelfth Finlay Lecture, delivered at University College, Dublin, on December 17, 1945.) Dublin: Hodges, Figgis & Co. Ltd. 1946; and Oxford: B. H. Blackwell Ltd. 1946, 38 pp.

[Reprinted in *Individualism* (B-7), chapter 1. German edition: "Wahrer und Falscher Individualismus." *Ordo* 1, 1948. Spain, 1968. Also reprinted in the various translation of B-7.]

P-6 Two Essays on Free Enterprise. Bombay: Forum of Free Enterprise, 1962.

P-7 *Wirtschaft, Wissenschaft und Politik*. Freiburger Universitätsreden, N.F. Heft 34, Freiburg im Breisgau: H.F. Schulz, 1963, 24 pp.

[English version, "The Economy, Science and Politics," chapter 18 of B-13. The original (in German) was Hayek's inaugural lecture on the assumption of the professorship of Political Economy Albert Ludwig University at Freiburg im Breisgau, June 18, 1962.]

P-8 Was der Goldwährung geschehen ist. Ein Bericht aus dem Jahre 1932 mit zwei Ergänzungen. Tübingen: Walter Eucken Institut (Vorträge und Aufsätze, 12), 1965, 36 pp. (France 1966): Révue d'Economie Politique 76 (1966), for French version.

["What Has Happened to the Gold Standard. A Report Beginning with the Year 1932 with Two Supplements."]

P-9 The Confusion of Language in Political Thought, With Some Suggestions for Remedying It. London: Institute of Economic Affairs (Occasional Paper 20), 1968/1976, 36 pp.

[Lecture originally delivered in 1967 in German to the Walter Eucken Institut at Freiburg im Breisgau. Reprinted in English as Chapter 6 of B-17, and in German as "Die Sprachverwirrung im politischen Denken" in B-14.]

P-10 *Der Wettbewerb als Entdeckungsverfahren*. Kiel: (Kieler Vorträge, N.S. 56), 1968, 20 pp.

["Competition as a Discovery Procedure." Originally delivered in English as a lecture to the Philadelphia Society at Chicago on March 29, 1968 and later on July 5, 1968, in German, to the Institut für Weltwirtschaft of the University of Kiel. The German version was published first, but it lacked the final section found in the English version published in Chapter 12 of *New Studies* (B-17). The German version also was reprinted in F. A. H.'s German collection of essays entitled *Freiburger Studien* (B-14), 1979.]

P-11a Die Irrtümer des Konstruktivismus und die Grundlagen legitimer kritik gesellschaftlicher Gebilde. Munich-Salzburg 1970/2 (also 1975 edition). Tübingen: Walter Eucken Institut (Vorträge und Aufsätze 51), 1975. (Italy, 1971).

[Reprinted with some changes as "The Errors of Constructivism" (Chapt. 1) of B-17.]

P-11b A Tiger by the Tail: The Keynesian Legacy of Inflation. A 40 Years' Running Commentary on Keynesianism by F. A. Hayek. Compiled and introduced by Sudha R. Shenoy. London: Institute of Economic Affairs (Hobart Paperback #4), 1972; 2nd edition 1978, xii, 124 pp. Also reprinted, San Francisco: The Cato Institute (The Cato Papers, No. 6), 1979. See A-130.

P-11c *Die Theorie Komplexer Phänomene*. Tübingen: Walter Eucken Institut (Vorträge und Aufsätze 36), 1972.

[English version, "The Theory of Complex Phenomena" appears in Chapter 2 of B-13. This essay originally appeared in English in M. Bunge, ed. *The Critical Approach and Philosophy. Essays in Honor of K. R. Popper*. New York: The Free Press, 1964.]

P-12 Economic Freedom and Representative Government. Fourth Wincott Memorial Lecture delivered at the Royal Society of Arts, Oct. 21, 1973. London: The Institute of Economic Affairs (Occasional Paper 39), 1973, 22 pp.

[Appears as Chapter 8 of B-17.]

P-13 Full Employment at Any Price? London: Institute of Economic Affairs (Occasional Paper 45), 1975/1978, (Italy 1975), 52 pp.

[Three Lectures. Lecture 1: "Inflation, The Misdirection of Labour, and Unemployment; Lecture 2: "The Pretence of Knowledge" (Hayek's 1974 Nobel Prize Speech); Lecture 3: "No Escape: Unemployment Must Follow Inflation." A Short Note on Austrian Capital Theory is added as an Appendix. Reprinted as *Unemployment and Monetary Policy*. San Francisco: Cato Institute (Cato Paper No. 3), 1979, 53 pp.]

P-14 *Choice in Currency. A Way to Stop Inflation*. London: Institute of Economic Affairs (Occasional Paper 48), February 1976/1977, 46 pp.

[Based on an Address entitled "International Money" delivered to the Geneva Gold and Monetary Conference on September 25, 1975 at Lausanne, Switzerland.]

P-15 *Drei Vorlesungen über Demokratie, Gerechtigkeit und Sozialismus*. Tübingen: Walter Eucken Institut (Vorträge und Aufsätze 63 [J.C.B. Mohr/P. Siebeck]), 1977. ["Three Lectures on Democracy, Justice, and Socialism."]

P-16a Denationalisation of Money: An Analysis of the Theory and Practice of Concurrent Currencies. London: The Institute of Economic Affairs (Hobart Paper Special 70), October 1976, 107 pp.

P-16b See, along with P-16a, the revision: *Denationalisation of Money—The Argument Refined. An Analysis of the Theory and Practice of Concurrent Currencies*. Hobart Paper Special 70, Second (Extended) edition, 1978, 141 pp.

P-17 *The Reactionary Character of the Socialist Conception, Remarks by F. A. Hayek.* Hoover Institution, Stanford University, 1978.

P-18 *Economic Progress in an Open Society*. Seoul, Korea: Korea International Economic Institute (Seminar Series No. 16), 1978.

P-19 "The Three Sources of Human Values." The Hobhouse Lecture given at the London School of Economics, May 17, 1978. Published in the Epilogue to *Law*, *Legislation and Liberty*, Vol. III. London: Routledge & Kegan Paul, 1979 (B-18).

[German translation: "Die drei Quellen der menschlichen Werte." Tübingen: Walter Eucken Institut (Vorträge und Aufsätze 70) [J. C. B. Mohr/P. Siebeck], 1979.]

P-20 Social Injustice, Socialism and Democracy. Sidney, Australia, 1979.

P-21 *Wissenschaft und Sozialismus*. Tübingen: Walter Eucken Institut, (Vorträge und Aufsätze 71) [J. C. B. Mohr/P. Siebeck], 1979.

["Science and Socialism."]

P-22 *Liberalismus*. Translated from English by Eva von Malchus. Tübingen: Walter Eucken Institut (Vorträge und Aufsätze 72) [J. C. B. Mohr/P. Siebeck 1979], 47 pp. ["Liberalism"] Reprint-translation into German of article in *New Studies* (B-17).

Books Edited Or Introduced

E-1 Hermann Heinrich Gossen. *Entwicklung der Gesetze des menschlichen Verkehrs und der daraus fliessenden Regeln für menschliches Handeln*. Introduced by Friedrich A. Hayek. 3rd edition. Berlin: Prager, 1927, xxiii, 278 pp.

["The Laws of Human Relationships and of the Rules to be Derived Therefrom for Human Action." Cf.: A-15. Gossen's (1810–1858) fame rests on this one book, first published in 1854, in which he developed a comprehensive theory of the hedonistic calculus and postulated the principle of diminishing marginal utility. He thereby anticipated the marginal utility breakthrough in the theory of economic value in 1871 by Menger, Jevons, and Walras.]

E-2 Friedrich Freiherr von Wieser. *Gesammelte Abhandlungen*. Edited with an introduction by Friedrich A. von Hayek. Tübingen: Mohr, 1929, xxxiv, 404 pp. [This edition includes von Wieser's Collected Writings published between 1876 and 1923. Friedrich Freiherr von Wieser (1851–1926) was Hayek's mentor at the University of Vienna and represented the "older Austrian school" of Economics. See A-4 and A-125b.]

E-3 Richard Cantillon. *Abhandlung über die Natur des Handels im Allgemeinen*. Translated by Hella von Hayek. Introduction and annotations by F. A. von Hayek. Jena, 1931, xix, 207 pp.

[A French translation of Cantillon's "Essay on the Nature of Trade in General" appeared as *Essai sur la Nature du Commerce en Général in Revue des Sciences Économiques* (Liège, April-October, 1936). Italian translation by the Italian liberal editor of *Il Politico*, Luigi Einaudi appeared in *Riforma sociale* (July 1932).]

E-4 *Beiträge zur Geldtheorie*. Edited and prefaced by Friedrich A. Hayek. Contributions by Marco Fanno, Marius W. Holtrop, Johan G. Koopmans, Gunnar Myrdal, Knut Wicksell. Vienna, 1933, ix, 511 pp.

["Contributions on Monetary Theory."]

E-5 Collectivist Economic Planning: Critical Studies on the Possibilities of Socialism. Edited with an Introduction and a Concluding Essay by F. A. Hayek. Contributions by N. G. Pierson, Ludwig von Mises, Georg Halm, and Enrico Barone. London: George Routledge & Sons, 1935, v, 293 pp. (France 1939, Italy 1946.)

[Reprinted New York: Augustus M. Kelley (1967), 1970 from the 1935 edition; reprinted Clifton, New Jersey: Augustus M. Kelley, 1975. Hayek's Introductory Chapter 1 deals with "The Nature and History of The Problem" of socialist calculation. Hayek's concluding chapter concerns "The Present State of the Debate." Mises' (1881–1973) article "Economic Calculation in the Socialist Commonwealth" (translated from the German by S. Adler), chapter 3, had set off the debate when it

appeared originally under the title "Die Wirtschaftsrechnung im sozialstischen Gemeinwesen" in the *Archiv für Socialwissenschaften* 47 (1920). N.G. Pierson's (1839–1909) article, "The Problem of Value in the Socialist Community," chapter 2, originally appeared in Dutch in *De Economist* 41 (s'Gravenhage, 1902): 423–456.]

E-6 Boris Brutzkus. *Economic Planning in Soviet Russia*. Edited and prefaced by Friedrich A. Hayek. London: George Routledge & Sons, 1935; xvii, 234 pp.

E-7 *The Collected Works of Carl Menger*. 4 volumes with an Introduction by F. A. von Hayek. London: The London School of Economics and Political Science (Series of Reprints of Scarce Tracts in Economic and Political Science No. 17–20), 1933–1936.

Volume 1: Grundsätze der Volkswirthschaftslehre (1871) 1934.

Volume 2: Untersuchungen über die Methode der Socialwissenschaften (1883) 1933.

Volume 3: *Kleinere Shriften zur Methode und Geschichte der Volkswirthschaftlehre* (1884–1915) 1935.

Volume 4: Schriften über Geldtheorie und Währungspolitik (1889–1893), 1936.

[Vol. 1 contains a biographical introduction to Menger by Hayek. Vol. 4 contains a complete list of Menger's known writings.]

Later 2nd German edition: Carl Menger, *Gesammelte Werke*. 4 vols. Tübingen, 1968–1970.

["Collected Works"]

E-8 Henry Thornton. *An Enquiry into the Nature and Effects of the Paper Credit of Great Britain* (1802). Edited and introduced by Friedrich A. Hayek. London: Allen and Unwin, 1939, 368 pp.

E-9 *John Stuart Mill, The Spirit of the Age*. Introduced by F.A. Hayek. Chicago: University of Chicago Press, 1942, xxxiii, 93 pp.

[Hayek's Introduction is entitled, "John Stuart Mill at the Age of Twenty-Four," and surveys Mill's intellectual development at the time of Mill's famous essay, "The Spirit of the Age," which represented important deviations from Benthamite Utilitarian liberalism.]

E-10 *Capitalism and the Historians*. Edited and introduced by F. A. Hayek. London: Routledge & Kegan Paul, and Chicago: University of Chicago Press, 1954, 188 pp. [The inspiration for the several papers presented was The Mont Pélèrin Society meetings held at Beauvallon in France in September 1951 on the distortions of historians and intellectuals in describing Capitalism and The Industrial Revolution. Hayek's Introduction (pp. 3–29) is entitled "History and Politics" and is reprinted in B-13 and (in German) as "Wirtschaftsgeschichte and Politik" ["Economic History and

Politics"] in *Ordo* 7 (1955): 3–22. T. S. Ashton's first chapter is "The Treatment of Capitalism by Historians"; L. M. Hacker's second chapter is entitled "The Anticapitalist Bias of American Historians"; Bertrand de Jouvenel contributed chapter 3, "The Treatment of Capitalism by Continental Intellectuals"; T. S. Ashton's chapter 4, "The Standard of Life of the Workers in England, 1790–1830," originally appeared in *The Journal of Economic History*, Supplement 9, 1949; the final article by W. H. Hutt, "The Factory System of The Early Nineteenth Century," originally appeared in *Economica* (March 1926). Hayek's volume provoked many pro and con reviews. A sampling: Arthur Schlesinger, Jr., *The Reporter* (March 30, 1954): 38–40; Oscar Handlin, *The New England Quarterly* (March 1955): 99–107; Charles Wilson, *Economic History Review* (April 1956); Asa Briggs, *The Journal of Economic History* (Summer 1954); W. T. Eastbrook, *The American Economic Review* (September 1954); Max Eastman, *The Freeman* (February 22, 1954); Helmut Schoek, *U.S.A.* (July 14, 1954); Eric E. Lampard, *The American Historical Review* (October 1954); and John Chamberlain, *Barron's* (January 4, 1954.)]

E-11 Louis Rougier. *The Genius of the West*. Introduction by F.A. v. Hayek. Los Angeles: Nash Publishing (published for the Principles of Freedom Committee), 1971, pp. xv-xviii.

E-12 Gerald P. O'Driscoll, Jr. *Economics as a Coordination Problem*. The Contributions of Friedrich A. Hayek. Foreward by F.A. Hayek. Kansas City: Sheed Andrews and McMeel, Inc., 1977, pp. xi-xii.

E-13 Ludwig von Mises. *Socialism: An Economic and Sociological Analysis*. Translated by Jacques Kahane. 1981 Introduction by F.A. Hayek. Indianapolis: LibertyClassics, 1981, pp. xix-xxiv. Dated August 1978.

[Hayek's Foreward pays tribute to Mises for the anti-socialist impact that Mises' *Die Gemeinwirtschaft: Untersuchungen über den Sozialismus* (Jena: Gustav Fischer, 1922) created on many intellectuals after the First World War.]

E-14 Ewald Schams. *Gesammelte Aufsätze*. Prefaced by F.A. Hayek. Ready in Spring 1983. Munich: Philosophia Verlag.

Articles In Journals, Newspapers, Or Collections Of Essays

A-1a "Das Stabilisierungsproblem in Goldwährungsländern." *Zeitschrift für Volkswirtschaft und Sozialpolitik*, N.S. 4 (1924).

["The Stabilization Problem for Countries on the Gold Standard." See note A-2a for the biographical context of Hayek's first two article publications. The journal in which Hayek published some of his first articles was closely associated with the Austrian School of economics through its editorial direction. It underwent several name changes:

1892–1918: The journal was known as *Zeitschrift für Volkswirtschaft*, *Socialpolitik und Verwaltung. Organ der Gesellschaft österreichischer Volkswirt*. ["Journal of Political Economy, Social Policy, and Administration. Publication of the Society of Austrian Political Economy"], and was published in Vienna by F. Tempsky.

1919–1920: Suspended publication.

1921–1927: It was known as *Zeitschrift für Volkswirtschaft und Socialpolitik*. ["Journal of Political Economy and Social Policy"] and was published in Vienna and Leipsig by F. Deuticke.

After 1927, the journal was superseded by *Zeitschrift für Nationalökonomie*. ["Journal of National Economy"]. See *Bibliography* A-22, etc.

The heavily Austrian School of economics-oriented editorial staff included:

1892–1918 Ernst von Plener (1841–1923)

1892–1914 Eugen von Böhm-Bawerk (1851–1914)

1892–1907 Karl Theodor von Inama-Sternegg (1843–1908)

1904–1916 Eugen von Philippovich (1858–1917)

1904–1918 Friedrich Freiherr von Wieser (1851–1926)

1911–1916 Robert Meyer (1855–1914)

1921–1927 R. Reisch (1866–?), Othmar Spann (1878–1950), and others.]

A-1b "Diskontopolitik und Warenpreise." *Der Österreichische Volkswirt* 17 (1,2), (Vienna 1924).

["Discount Policy and Commodity Prices."]

A-2a "Die Währungspolitik der Vereinigten Staaten seit der Überwindung der Krise von 1920." Zeitschrift für Volkswirtschaft und Sozialpolitik. N.S. 5 (1925).

["The Monetary Policy in the United States Since Overcoming the Crisis of 1920." Both this article and A-1a grew out of Hayek's post-graduate studies in America which he pursued from March 1923 to June 1924 at New York University. On the chronology of the Nobel Prize biography of Hayek: Official Announcement of the Royal Academy of Sciences, republished in the *Swedish Journal of Economics* 76

(December 1974): 469 ff. Also see Machlup, ed. (1976), pp. 16–17, as well as the annotation in the present Hayek *Bibliography* on item A-64. Hayek's American academic sojourn took place while he was on a leave of absence from his Austrian civil service position (1921–1926) as a legal consultant (along with Ludwig von Mises) for carrying out the provisions of the Treaty of St. Germain; see *Bibliography* A-145, p. 1 for Hayek's anecdote and background for his introduction to von Mises through von Wieser.]

A-2b "Das amerikanische Bankwesen seit der Reform von 1914." *Der Österreichische Volkswirt* 17 (29–33), (Vienna 1925).

["The American Banking System since the Reform of 1914."]

A-3a "Bemerkungen zum Zurechnungsproblem." *Jahrbücher für Nationalökonomie und Statistik* 124 (1926): 1–18.

["Comments on the Problem of Imputation." On the valuation of Producer goods. Compare Wilhelm Vleugel's *Die Lösung des wirtschaftlichen Zurechnungsproblem bei Böhm-Bawerk und Wieser*. Halle: Neimeyer (Königsberger Gelehrte Gesellschaft, Geisteswissenschaftliche Klasse, Shriften, Vol. 7, part 5), 1930.]

A-3b "Die Bedeutung der Konjunkturforschung für das Wirtschaftsleben." *Der Österreichische Volkswirt* 19 (2), (Vienna 1926).

["The Meaning of Business Cycle Research for Economic Life."]

A-4 "Friedrich Freiherr von Wieser." *Jahrbücher für Nationalökonomie und Statistik* 125 (1926): 513–530.

[Commemorative article on the occasion of the death of Hayek's Austrian School of economics mentor, von Wieser (1851–1926). Compare with Hayek's later article on von Wieser in *The International Encyclopaedia of the Social Sciences* (1968, 1972). Also see E-2 (1929) Hayek's German introduction and edition of von Wieser's Collected Writings. A-4 translated into English in an abridged form appears in *The Development of Economic Thought: Great Economists in Perspective*. Edited by Henry William Spiegel. New York & London: John Wiley & Sons, Inc. 1952, 1961, pp. 554–567.]

A-5a "Zur Problemstellung der Zinstheorie." *Archiv für Sozialwissenschaften und Sozialpolitik* 58 (1927): 517–532.

["On the Setting of the Problem of Rent Theory."]

A-5b "Konjunkturforschung in Osterreich." *Die Industrie* 32 (30), (Vienna 1927).

["Business Cycle Research in Austria."]

A-6 "Das intertemporale Gleichgewichtssystem der Preise und die Bewegungen des 'Geldwertes." *Weltwirtschaftliches Archiv* 28 (1928): 33–76.

["The Intertemporal Equilibrium System of Prices and the Movements of the 'Value of Money.""]

A-7a "Einige Bemerkungen über das Verhältnis der Geldtheorie zur Konjunkturtheorie." *Schriften des Vereins für Sozialpolitik* 173/2 (1928): 247–295. Also see same journal, Volume 175, for a discussion.

["Some Remarks on the Relationship between Monetary Theory and Business Cycle Theory."]

[See B-1 with annotation. The journal in which Hayek published this article was the publication of the influential *Verein für Sozialpolitik*, founded in 1872 by (among others) Gustav Schmoller (1838–1917). This organization for social reform did not express a monolithic unity of doctrine, but was, nevertheless, excoriated by its opponents as a union of 'Professorial Socialists' (*Katheder Sozialisten*). See the interesting group photograph of a meeting of the *Verein* at the University of Zurich, September 11–13, 1928, showing the wonderfully variegated grouping that includes Hayek, von Mises, Machlup, A. Rüstow, Hunold, Morgenstern, Strigl, and Sombart: in Albert Hunold, "How Mises Changed My Mind." *The Mont Pélèrin Quarterly* 3 (October 1961): 16–19. For background on the *Verein*, see Haney (1949), pp. 546, 820, 885. It was at the September 1928 meeting of the *Verein* that Hayek presented his paper, A-7a, which eventually grew into his *Geldtheorie* (1929).]

A-7b "Diskussionsbemerkungen über 'Kredit und Konjunktur.'" *Shriften des Vereins für Sozialpolitik* 175, Verhandlungen 1928, (1928). ["Discussion Comments on 'Credit and Business Cycle"...(Transactions 1928).]

A-8 "Theorie der Preistaxen." Közgazdasági Enciklopédia, Budapest, 1929.

[In Hungarian-German printing.]

A-9a "Gibt es einen 'Widersinn des Sparens'? Eine Kritik der Krisentheorie von W.T. Foster und W. Catchings mit einigen Bemerkungen zur Lehre von de Beziehungen zwischen Geld und Kapital." ["Is There a 'Paradox of Saving'? A Critique of the Crises-Theory of W.T. Foster and W. Catchings with some Remarks on the Theory of the Relationship between Money and Capital."] *Zeitschrift für Nationalökonomie* 1, no. 3 (1929): 125–169; revised and enlarged edition, Vienna: Springer, 1931. [English version: "The Paradox of Saving." *Economica* 11, no. 32 (May 1931). Reprinted in B-4 ("Appendix"). The English translation was done by Nicholas Kaldor and Georg Tugendhat.]

A-9b "Wirkungen der Mietzinbeschränkungen." Munich: Schriften des Vereins für Sozialpolitik 182 (1930)

["The Repercussions of Rent Restrictions." See P-1 for different treatments of the effects of rent control. A-9b formed the substance of Hayek's article in the Hayek-Friedman volume mentioned in P-1.]

A-9c "Bemerkungen zur vorstehenden Erwiderung Prof. Emil Lederers." Zeitschrift für Nationalökonomie 1 (5), (1930).

["Comments on the Preceding Reply of Prof. Emil Lederer."]

A-10 "Reflections on the Pure Theory of Money of Mr. J. M. Keynes." *Economica* 11, no. 33 (August 1931 - Part I): 270–295.

[See also A-11b.]

A-11a "The Pure Theory of Money: A Rejoinder to Mr. Keynes." *Economica* 11, no. 34 (November 1931): 398–403.

[In the same issue of *Economica*, pp. 387–397, Keynes' article appears: "A Reply to Dr. Hayek."]

A-11b "Reflections on the Pure Theory of Money of Mr. J. M. Keynes." *Economica* 12 (February 1932 - Part II): 22–44.

[See also A-10 and A-11a.]

A-11c "Das Schicksal der Goldwährung." Der Deutsche Volkswirt 6 (20), (1932).

["The Fate of the Gold Standard." See P-8.]

A-11d "Foreign Exchange Restrictions." *The Economist* 6 (1932).

A-12 "Money and Capital: A Reply to Mr. Sraffa." *Economic Journal* 42 (June 1932): 237–249.

A-13 "Kapitalaufzehrung." Weltwirtschaftliches Archiv 36 (July 1932/II): 86–108.

["Capital Consumption."]

A-14 "A Note on the Development of the Doctrine of 'Forced Saving'." *Quarterly Journal of Economics* 47 (November 1932): 123–133.

[Reprinted in B-4.]

A-15 "Gossen, Hermann Heinrich." *Encyclopaedia of the Social Sciences*. New York: Macmillan, 1932. Vol. 7, p. 3.

A-16 "Macleod, Henry D." *Encyclopaedia of the Social Sciences*. New York: Macmillan, 1933. Vol. 2, p. 30.

[Henry Dunning Macleod (1821–1902) was a Scottish economist who wrote *The Theory and Practice of Banking*, 2 vols, (1856) and *The Theory of Credit*, 2 vols, (1889–1891).]

A-17 "Norman, George W." *Encyclopaedia of the Social Sciences*. New York: Macmillan, 1933. Vol. 2.

A-18 "Philippovich, Eugen von." *Encyclopaedia of the Social Sciences*. New York: Macmillan, 1934. Vol. 12, p. 116.

A-19 "Saving." *Encyclopaedia of the Social Sciences*. New York: Macmillan, 1934. Vol. 13, pp. 548–552.

[Reprinted in revised form in B-4.]

A-20 "The Trend of Economic Thinking." *Economica* 13 (May 1933): 121–137.

[Hayek's first inaugural lecture given at the University of London about a year after he assumed the Tooke professorship, in which speech he explained his general economic philosophy. See B-13, p. 254.]

A-21 Contribution to Gustav Clausing, ed. *Der Stand und die nächste Zukunft der Konjunkturforschung. Festschrift für Arthur Spiethoff.* Munich: Duncker & Humblot, 1933.

[Translated into English in B-4 (Chapter 6) as "The Present State and Immediate Prospects of the Study of Industrial Fluctuations." Arthur Spiethoff, (1873–1957), who is honored in this *Festschrift*, was born in 1873, studied under Schmoller, and devised a "non-monetary overinvestment theory" of the business cycle. See Haney (1949), p. 673.]

A-22 "Über Neutrales Geld." Zeitschrift für Nationalökonomie 4 (October 1933).

["Concerning Neutral Money."]

A-23 "Capital and Industrial Fluctuations." *Econometrica* 2 (April 1934): 152–167.

A-24a "On the Relationship between Investment and Output." *Economic Journal* 44 (1934): 207–231.

A-24b "The Outlook for Interest Rates." *The Economist* 7 (1934).

A-24c "Stable Prices or Neutral Money." *The Economist* 7 (1934).

A-25 "Carl Menger." *Economica* N.S. 1 (November 1934): 393–420.

[This is an English translation of Hayek's Introduction to Menger's *Grundsätze* in E-7. Reprinted in *The Development of Economic Thought: Great Economists in Perspective*. Edited by Henry William Spiegel. New York and London: John Wiley & Sons, Inc. 1952, 527–553. Also reprinted in *Principles of Economics* by Carl Menger. Translated by James Dingwall and Bert F. Hoselitz. With an Introduction by F. A. Hayek. New York & London: New York University Press, 1981, pp. 11–36. See A-131a.]

A-26 "Preiserwartungen, Monetäre Störungen und Fehlinvestitionen." *Nationalökonomisk Tidsskrift* 73, no. 3 (1935).

[Reprinted in a revised form in B-4 as "Price Expectations, Monetary Disturbances and Malinvestments." Originally delivered as a lecture on December 7, 1933 in the *Sozialökonomisk Samfund* in Copenhagen. First published in German and later in French in the *Revue de Science Economique*, Liège (October, 1935).]

A-27a "The Maintenance of Capital." Economica N.S. 2 (1935): 241–276.

[Reprinted in B-4.]

A-27b "A Regulated Gold Standard." The Economist (May 11, 1935).

A-28 "Spor miedzy szkola 'Currency' i szkola 'Banking'." *Ekonomista* 55 (Warsaw, 1935).

A-29 "Edwin Cannan" (Obituary). *Zeitschrift für Nationalökonomie* 6 (1935): 246–250.

[Cannan (1861–1935) is also celebrated by Hayek in A-72. Cannan associated himself at the London School of Economics with a group who developed liberal theory. This group included Lionel Robbins, Cannan's successor, and his colleague Sir Arnold Plant (see Plant, 1969), Sir Theodore Gregory (Athens), F.C. Benkam (Singapore), W.H. Hutt (South Africa), and F.W. Paish (Paris).

A-30 "Technischer Fortschritt und Überkapazität." Österreichische Zeitschrift für Bankwesen 1 (1936).

["Technical Progress and Overcapacity."]

A-31 "The Mythology of Capital." *Quarterly Journal of Economics* 50 (1936): 199–228.

[Reprinted in William Fellner and Bernard F. Haley, eds., *Readings in the Theory of Income Distribution*. Philadelphia: 1946.]

A-32 "Utility Analysis and Interest." Economic Journal 46 (1936): 44-60.

A-33 "La situation monétaire internationale." *Bulletin Périodique de la Societé Belge d'Études et d'Expansion* (Brussels), No. 103. (1936).

["The International Monetary Situation."]

A-34 "Economics and Knowledge." *Economica* N.S. 4 (February 1937): 33–54.

[Reprinted in B-7. Also reprinted in J. M. Buchanan and G. F. Thirlby (eds.) L.S.E. *Essays on Cost.* New York and London: New York University Press, 1981 as chapter

3. Originally presented as a presidential address to the London Economic Club, 10 November 1936.]

A-35 "Einleitung zu einer Kapitaltheorie." *Zeitschrift für Nationalökonomie* 8 (1937): 1–9.

["Introduction to a Theory of Capital."]

A-36 "Das Goldproblem." Österreichische Zeitschrift für Bankwesen 2 (1937).

["The Gold Problem."]

A-37a "Investment that Raises the Demand for Capital." *Review of Economic Statistics* 19 (November 1937).

[Reprinted in B-4.]

A-37b "Freedom and the Economic System." *Contemporary Review* (April 1938).

[Reprinted in enlarged form in P-2.]

A-38 "Economic Conditions of Inter-State Federation." *New Commonwealth Quarterly* 5 (London, 1939).

[Reprinted in B-7.]

A-39 "Pricing versus Rationing." The Banker 51 (London, September 1939).

A-40 "The Economy of Capital." The Banker 52 (London, October 1939).

A-41 "Socialist Calculation: The Competitive 'Solution'." *Economica* N.S. 7 (May 1940): 125–149.

[Reprinted in B-7.]

A-42 "The Counter-Revolution of Science." Parts I-III. *Economica* N.S. 8 (February - August 1941): 281–320.

[Reprinted in B-9.]

A-43 "Maintaining Capital Intact: A Reply [to Professor Pigou.]" *Economica* N.S. 8 (1941): 276–280.

A-44 "Planning, Science and Freedom." *Nature* 148 (November 15, 1941).

A-45 "The Ricardo Effect." Economica N.S. 9 (1942).

[Reprinted in B-7. See also in B-17, Chapt. 11: "Three Elucidations of the Ricardo Effect," and A-127.]

A-46 "Scientism and the Study of Society." Part I: *Economica* N.S. 9 (1942). Part II: *Economica* 10 (1943). Part III: *Economica* 11 (1944).

[Reprinted in B-9.]

A-47 "A Comment on an Article by Mr. Kaldor: 'Professor Hayek and the Concertina Effect'." *Economica* N.S. 9 (November 1942): 383–385.

A-48 "A Commodity Reserve Currency." Economic Journal 53 (1943).

[Reprinted in B-7 as chapter 10. Also reprinted in part as a pamphlet, "Material Relating to Proposals for an International Commodity Reserve Currency," submitted to The International Monetary and Financial Conference at Bretton Woods, N.H. by the Committee for Economic Stability (1944). #380 of the F. A. Harper Archives at The Institute for Humane Studies.]

A-49 "The Facts of the Social Sciences." *Ethics* 54 (October 1943).

[Reprinted in B-7.]

A-50 "The Geometrical Representation of Complementarity." *Review of Economic Studies* 10 (1942–1943): 122–125.

A-51 "Gospodarka planowa a idea planowania prawa." *Economista Polski* (London, 1943).

[Cf. Chapter 6 of B-6: "Planning and the Rule of Law."]

A-52 Edited: "John Rae and John Stuart Mill: A Correspondence." *Economica* N.S. 10 (1943): 253–255.

A-53 "The Economic Position of South Tyrol." In: *Justice for South Tyrol*. London: 1943.

[Compare with P-3.]

A-54 "Richard von Strigl" (Obituary). Economic Journal 54 (1944): 284–286.

[Strigl who died in 1944 was a "Neo-Austrian" who developed the theory of saving and investment and analyzed monopolistic competition theory.]

A-55 "The Use of Knowledge in Society." *American Economic Review* 35 (September 1945): 519–530.

[Reprinted in B-7 and in a revised, abridged version as a pamphlet; Menlo Park, CA: Institute for Humane Studies. (Reprint No. 5), no date (1971, 1975).]

A-56 "Time-Preference and Productivity: A Reconsideration." *Economica*, N.S. no. 4, 12 (February 1945): 22–25.

A-57 Edited: "Notes on N.W. Senior's Political Economy' by John Stuart Mill." *Economica* N.S. 12 (1945): 134–139.

A-58 "Nationalities and States in Central Europe." *Central European Trade Review* 3 (London, 1945): 134–139.

A-59 "Fuld Beskaeftigelse." Nationalökonomisk Tidsskrift 84 (1946): 1-31.

A-60 "The London School of Economics 1895–1945." *Economica* N.S. 13 (February 1946): 1–31.

A-61 "Probleme und Schwierigkeiten der englischen Wirtschaft." *Schweizer Monatshefte* 27 (1947).

["Problems and Difficulties of the English Economy."]

A-62 "Le plein emploi." Economie Appliquée 1, no. 2–3, (Paris, 1948): 197–210.

["Full Employment."]

A-63a "Der Mensch in der Planwirtschaft." In Simon Moser (ed.) *Weltbild und Menschenbild*. Innsbruck and Vienna: 1948.

["Man in the Planned Economy."]

A-63b "Die politischen Folgen der Planwirtschaft." *Die Industrie*. Zeitschrift der Vereinigung Österreichischer Industrieller. No. 3 (Vienna, January 1948).

["The Political Effects of the Planned Economy."]

A-64 "Wesley Clair Mitchell 1874–1948" (Obituary). *Journal of the Royal Statistical Society* 111 (1948).

[Compare with Arthur F. Burns' commemoration of Mitchell in the *Twenty-Ninth Report of The National Bureau of Economic Research*. New York: 1969; adapted in *The Development of Economic Thought*. Edited by Henry William Spiegel. New York, 1952, 1961, pp. 414–442. Also note Hayek's personal association with Mitchell, as indicated in B-17, p. 3, note 3, during Hayek's stay in America during the early 1920s. Also note the correspondence between Wesley Mitchell and Hayek mentioned in Emil Kauder, *A History of Marginal Utility Theory*. Princeton University Press, 1965.]

A-65a "The Intellectuals and Socialism." *The University of Chicago Law Review* 16, no. 3 (Spring 1949): 417–433. German translation in *Schweizer Monatshefte* 29 (1944–50); Norwegian translation (1951).

[Reprinted in B-13 and by the Institute for Humane Studies, 1971.]

A-65b "A Levy on Increasing Efficiency. The Economics of Development Charges." *The Financial Times* (April 26–28, 1949).

A-66 "Economics." Chambers' Encyclopaedia 4 (Oxford 1950).

A-67 "Ricardo, David." Chambers' Encyclopaedia 11 (Oxford 1950).

A-68 "Full Employment, Planning and Inflation." *Institute of Public Affairs Review* 4 (6) (Melbourne, Australia 1950).

[Reprinted as Chapter 19 in B-13. Also in German (1951) and Spanish (1960).]

A-69a "Capitalism and the Proletariat." Farmand 7, no. 56 (Oslo: February 17, 1951).

A-69b "Gleichheit und Gerechtigkeit." *Jahresbericht der Züricher Volkswirtschaftlichen Gesellschaft* (1951).

["Equality and Justice."]

A-70 "Comte and Hegel." Measure 2 (Chicago, July 1951).

[Reprinted in B-9.]

A-71 "Comments on 'The Economics and Politics of the Modern Corporation'." *The University of Chicago Law School, Conference Series* no. 8, (December 7, 1951).

A-72 "Die Überlieferung der Ideale der Wirtschaftsfreiheit." *Schweizer Monatshefte* 31, No. 6 (1951).

["The Transmission of the Ideals of Economic Freedom." First in German (1951) and later in an English translation as "The Ideals of Economic Freedom: A Liberal Inheritance," in *The Owl* (London 1951), pp. 7–12. A "corrected version" in English is reprinted as Chapter 13 of B-13. Published in *The Freeman* 2 (July 28, 1952): 729–731, as "A Rebirth of Liberalism." A remarkably similar overview of the various liberal currents that flowed into modern economic liberalism is given by Carlo Mötteli (a financial editor for *Neue Zücher Zeitung*) in *Swiss Review of World Affairs* 1, no. 8 (November 1951) and entitled "The Regeneration of Liberalism," reprinted in *The Mont Pelerin Quarterly* 3 (October 1961): 29–30.]

A-73a "Die Ungerechtigkeit der Steuerprogression." *Schweizer Monatshefte* 32 (November 1952).

["The Injustice of the Progressive Income Tax." cf. A-79 and A-73b of which this is a translation.]

A-73b "The Case Against Progressive Income Taxes." *The Freeman* 4 (December 28, 1953): 229–232.

A-74a "Leftist Foreign Correspondent." *The Freeman* 3 (January 12, 1953): 275.

A-74b "The Actonian Revival." Review of *Lord Acton* by Gertrude Himmelfarb and *Acton's Political Philosophy* by G. E. Fasnacht. *The Freeman* 3 (March 23, 1953): 461–462.

A-74c "Decline of the Rule of Law. Part I." *The Freeman* 3 (April 20, 1953): 518–520; Part II *The Freeman* 3 (May 4, 1953): 561–563.

A-74d "Substitute for Foreign Aid." The Freeman 3 (April 6, 1953): 482–484.

A-74e "Entstehung und Verfall des Rechtsstaatsideales." In: Albert Hunold (ed.) *Wirtschaft ohne Wunder*. Volkswirtschaftliche Studien für das Schweizerische Institut für Auslandsforschung. Zurich, 1953.

["The Rise and Fall of the Ideal of the Constitutional State."]

A-75a "Marktwirtschaft und Wirtschaftspolitik." Ordo 6 (February 1954): 3–18.

["Market Economy and The Economic Policy."]

A-75b "Wirtschaftsgeschichte und Politik." Ordo 7 (March 1955).

["Economic History and Politics." See E-10.]

A-76 "Degrees of Explanation." *The British Journal for the Philosophy of Science* 6, no. 23 (1955): 209–225.

[Received by journal Nov. 11, 1954. Hayek acknowledges indebtedness to Chester Barnand, Heinrich Klüver, Herbert Lamm, Michael Polanyi, Karl Popper, Warren Weaver and the members of a Faculty Seminar of the Committee of Social Thought in the University of Chicago "for reading and commenting on an earlier draft of this paper." Reprinted in revised form in B-13, Chapter 1.]

A-77 "Towards a Theory of Economic Growth, Discussion of Simon Kuznets' Paper." In: *National Policy for Economic Welfare at Home and Abroad*. New York: Columbia University Bicentennial Conference, 1955.

A-78 "Comments." In: Congress for Cultural Freedom (ed.) *Science and Freedom*. London: (Proceedings of the Hamburg Conference of the Congress for Cultural Freedom) 1955.

[Also printed in German.]

A-79 "Progressive Taxation Reconsidered." In: Mary Sennholz (ed.) *On Freedom and Free Enterprise: Essays in Honor of Ludwig von Mises*. Princeton: D. von Nostrand Co., 1956. Presented on the Occasion of the Fiftieth Anniversary of his [von Mises'] Doctorate, February 26, 1956.

A-80 "The Dilemma of Specialization." In Leonard D. White (ed.) *The State of the Social Sciences*. Chicago: University of Chicago Press, 1956.

[Reprinted in B-13, Chapter 8.]

A-81a "Uber den 'Sinn' sozialer Institutionen." *Schweizer Monatshefte* 36 (October 1956).

["On the 'Meaning' of Social Institutions."]

A-81b "Freedom & The Rule of Law." (The Third Programme, BBC Radio; 1st of 2 talks.) *The Listener* (Dec. 13, 1956).

A-82a "Was ist und was heisst 'sozial'?" In Albert Hunold (ed.) *Masse und Demokratie*. Zürich: 1957.

["What is 'Social'—What Does It Mean?" Translated in an unauthorized English translation in *Freedom and Serfdom* (ed. A. Hunold), Dordrecht, 1961. The reprint in B-13, Chapter 17 is a revised version of the unauthorized English translation "which in parts gravely misrepresented the meaning of the original."]

A-82b Review of *Mill and His Early Critics* by J.C. Rees. Leicester: University College of Leicester, 1956. In *Journal of Modern History* (June 1957): 54.

A-83 "Grundtatsachen des Fortschritts." Ordo 9 (1957): 19–42.

["The Fundamental Facts of Progress."]

A-84 "Inflation Resulting from the Downward Inflexibility of Wages." In: Committee for Economic Development (ed.) *Problems of United States Economic Development*, New York: 1958, Vol. I, pp. 147–152.

[Reprinted in B-13, Chapter 21.]

A-85a "La Libertad, La Economia Planificada y el Derecho." *Temas Contemporaneos* (Buenos Aires) 3 (1958).

["Liberty, the Planned Economy, and the Law."]

A-85b "Das Individuum im Wandel der Wirtschaftsordnung." *Der Volkswirt* No. 51–52 (Frankfurt am Main 1958).

["The Individual and Change of Economic System."]

A-86 "The Creative Powers of a Free Civilization." In: Felix Morley (ed.) *Essays in Individuality*. Philadelphia: University of Pennsylvania Press, 1958.

A-87 "Freedom, Reason, and Tradition." Ethics 68 (1958).

A-88a "Gleichheit, Wert und Verdienst." Ordo 10 (1958): 5–29.

["Equality, Value, and Profit."]

A-88b "Attualitá di un insegnamento," In: Angelo Dalle Molle, ed. *Il Maestro dell' Economia di Domani* (Festschrift for Luigi Einaudi on his 85th Birthday). Verona, 1958, pp. 20–24.

["The Reality of a Teaching," In *The Master of the Economics of the Future*. Luigi Einaudi (1874–1961), who is honored in this Festschrift, was a classical liberal Italian economist and statesman. He was the first president of Italy (1948–1955). Following World War II he was governor of the Bank of Italy and devised programs for monetary stabilization. Einaudi is celebrated by Hayek, in an allusion, in A-72.]

A-89 "Liberalismus (1) Politischer Liberalismus." *Handwörterbuch der Sozialwissenschaften* 6 (Stuttgart-Tübingen-Göttingen, 1959).

["Liberalism (1) Political Liberalism." See Chapter 9 of B-17.]

A-90 "Bernard Mandeville." *Handwörterbuch der Sozialwissenschaften* 7 (Stuttgart-Tübingen-Göttingen, 1959).

A-91 "Unions, Inflation and Profits." In: Philip D. Bradley (ed.) *The Public Stake in Union Power*. Charlottesville, University of Virginia Press: 1959.

[Reprinted in B-13.]

A-92 "Freiheit und Unabhängigkeit." Schweizer Monatshefte 39 (1959).

["Freedom and Independence."]

A-93 "Verantwortlichkeit und Freiheit." In: Albert Hunold (ed.) *Erziehung zur Freiheit*. Erlenbach-Zürich: E. Rentsch, 1959: 147–170.

["Responsibility and Freedom."]

A-94 "Marktwirtschaft und Strukturpolitik." Die Aussprache 9 (1959).

["Market Economy and Structural Policy."]

A-95 "An Röpke." In Wilhelm Röpke, *Gegen die Brandung*. Zürich: E. Rentsch, 1959.

[On Röpke."]

A-96a "The Free Market Economy: The Most Efficient Way of Solving Economic Problems." *Human Events* 16, no. 50 (Dec. 16, 1959).

[Reprinted in P-6.]

A-96b "The Economics of Abundance," in Henry Hazlitt, ed. *The Critics of Keynesian Economics*. Princeton and London: Van Nostrand Co., 1960, pp. 126–130.

A-97a "The Social Environment." In B. H. Bagdikian (ed.) *Man's Contracting World in an Expanding Universe* Providence, R.I.: 1960.

A-97b "Freedom, Reason and Tradition." *Proceedings of the 16th Annual Meeting:* The Western Conference of Prepaid Medical Service Plans, (Winnipeg 1960).

A-97c "Progenitor of Scientism." National Review (1960).

A-97d "Gobierno Democratico y Actividad Economica." *Espejo* 1 (Mexico City 1960).

["Democratic Government and Economic Activity."]

A-98 "The Corporation in a Democratic Society: In Whose Interest Ought It and Will It Be Run?" In: M. Anshen and G. L. Bach (eds.) *Management and Corporations* 1985. New York: McGraw-Hill, 1960.

[Reprinted in B-13.]

A-99a "The 'Non Sequitur' of the 'Dependence Effect'." *The Southern Economic Journal* 27 (April 1961).

[Reprinted in B-13, Chapter 23.]

A-99b "Freedom and Coercion: Some Comments and Mr. Hamowy's Criticism." *New Individualist Review* 1, no. 2 (Summer 1961): 28–32.

A-100a "Die Ursachen der ständigen Gefährdung der Freiheit." *Ordo* 12 (1961): 103–112.

["The Origins of the Constant Danger to Freedom."]

A-100b "How Much Education at Public Expense?" Context 1 (Chicago 1961).

A-101 "The Moral Element in Free Enterprise." In: National Association of Manufacturers (eds.) *The Spiritual and Moral Significance of Free Enterprise*. New York: 1962.

[Reprinted in B-13 as Chapter 16. Originally delivered as an address to the 66th Congress of American Industry organized by the N.A.M. New York, December 6, 1961.]

A-102 "Rules, Perception and Intelligibility." *Proceedings of the British Academy* 48 (1962), London, 1963, pp. 321–344.

[Reprinted as Chapter 3 in B-13.]

A-103a "Wiener Schule." *Handwörterbuch der Sozialwissenschaften* 12 (Stuttgart-Tübingen-Göttingen, 1962).

["The Vienna School."]

A-103b "The Uses of 'Gresham's Law' as an Illustration of 'Historical Theory'." *History and Theory* 1 (1962).

[Reprinted in B-13, Chapter 24.]

A-104 "Alte Wahrheiten und neue Irrtümer." In: Internationales Institut der Sparkassen, ed. *Das Sparwesen der Welt*, Proceedings of the 7th International Conference of Savings Banks. Amsterdam: 1963.

["Old Truths and New Errors." Reprinted in B-14; Italian translation in *Il Risparmio* (Milan) 11 (1963).]

A-105 "Arten der Ordnung." Ordo 14 (1963).

English version under the title "Kinds of Order in Society." *New Individualist Review* (University of Chicago) 3, no. 2 (Winter 1964): 3–12. [Reprinted in B-14.] [The five volumes of *New Individualist Review* (1961–1968) in which "Kinds of Order" appears have been published in one volume as *New Individualist Review*. Indianapolis: Liberty *Press*, 1981. Reprinted as pamphlet: Menlo Park, California: The Institute for Humane Studies (Studies in Social Theory No. 5), 1975. Hayek used this essay as the basis of the second chapter of Vol. I of *Law*, *Legislation and Liberty* (B-15). Reprinted in German in B-14.]

A-106 "Recht, Gesetz und Wirtschaftsfreiheit." In: *Hundert Jahre Industrie und Handelskammer zu Dortmund 1863–1963*. Dortmund, 1963.

["Right, Law, and Economic Freedom." Reprinted in B-14.]

A-107 Introduction to "The Earlier Letters of John Stuart Mill." In F.E. Mineka, ed. *John Stuart Mill*, Vol. XII. Toronto: Toronto University Press and London: Routledge & Kegan Paul, 1963.

A-108 "The Legal and Political Philosophy of David Hume." *Il Politico* 28, no. 4 (December 1963): 691–704.

[Lecture delivered for the Faculty of Law and Political Science of the University of Freiburg im Breisgau on July 18, 1963. Reprinted as chapter 7 of B-13. Also (in German) in B-14.]

A-109 "The Theory of Complex Phenomena." In Mario A. Bunge (ed.) *The Critical Approach to Science and Philosophy: Essays in Honor of Karl R. Popper*. New York: The Free Press of Glencoe, Inc., 1964.

[Reprinted in B-13; see P-11c.]

A-110 Parts of "Commerce, History of." *Encyclopaedia Britannica*, vol. VI. Chicago: 1964.

A-111 "Die Anschauungen der Mehrheit und die zeitgenössische Demokratie." *Ordo* 15/16 (1965): 19–41.

["The Perception of the Majority and Contemporary Democracy." Reprinted in B-14.]

A-112 "Kinds of Rationalism." *The Economic Studies Quarterly* 15, no. 3 (Tokyo, 1965).

[Reprinted in B-13, Chapter 5. Originally delivered as a lecture on April 27, 1964 at Rikkyo University, Tokyo. German translation in B-14.]

A-113 "Personal Recollections of Keynes and the 'Keynesian Revolution'." *The Oriental Economist* 34 (Tokyo, January 1966).

[German translation in B-14. Reprinted in B-17.]

A-114 "The Misconception of Human Rights as Positive Claims." *Farmand* Anniversary Issue II/12 (Oslo, 1966): 32–35.

A-115 "The Principles of a Liberal Social Order." *Il Politico* 31, no. 4 (December 1966): 601–618.

[Paper submitted to The Tokyo Meeting of the Mont Pélèrin Society, Sept. 5–10, 1966. German translation in *Ordo* 18 (1967); also reprinted in B-14. Reprinted as Chapter 11 of B-13 in a slightly altered version, deleting final poem linking spontaneous order to Lao-Tzu's Taoism of *wu-wei*. See Chiaki Nishiyama (1967) for a discussion of and reflection on Hayek's paper.]

A-116 "Dr. Bernard Mandeville." *Proceedings of the British Academy* 52 (1966), London 1967.

["Lecture on a Master Mind" delivered to the British Academy on March 23, 1966. Reprinted as Chapter 15 of B-17. German translation in B-14.]

A-117 "L'Etalon d'Or — Son Evolution." Revue d'Economie Politique 76 (1966).

["The Gold Standard—Its Evolution."]

A-118 "Résultats de l'action des hommes mais non de leurs desseins." In: *Les Fondements Philosophiques des Systèmes Economiques*. Textes de Jacques Rueff et essais rédiges en son honneur. (Paris 1967).

[Translated in English in B-13 as "The Results of Human Action but not of Human Design." German translation in B-14.]

A-119 Remarks on "Ernst Mach und das sozialwissenschaftliche Denken in Wien." In Ernst Mach Institut (ed.), *Symposium aus Anlass des 50. Todestages von Ernst Mach.* (Freiburg i. B., 1967.)

[See (B-10) for the influence of Mach (1838–1916) on Hayek. A-119 is part of a symposium commemorating the 50th anniversary of Mach's death: "Ernst Mach and Social Science Thought in Vienna."]

A-120 "Rechtsordnung und Handelnsordnung." In Eric Streissler (ed.), *Zur Einheit der Rechts-und Staatswissenschaften*, Vol. 27. Karlsruhe, 1967.

["Legal Order and Commercial Order." Reprinted in B-14.]

A-121 "The Constitution of A Liberal State." *Il Politico* 32, no. 1 (Sept. 1967): 455–461.

[German translation in *Ordo* 19 (1968) and in B-14.]

A-122a "Bruno Leoni, the Scholar." *Il Politico* 33, no. 1 (March 1968): 21–25. Also translated in the same journal as "Bruno Leoni lo studioso." (pp. 26–30). In commemoration of Leoni's death (November 21, 1967).

A-122b "Ordinamento giuridico e ordine sociale." *Il Politico* 33, no. 4 (December 1968): 693–724.

["Juridical Regulation and Social Order."]

A-123a "A Self-Generating Order for Society." In John Nef (ed.), *Towards World Community*. The Hague, 1968.

A-123b Speech on the 70th Birthday of Leonard Reed. In: *What's Past is Prologue*. New York: Foundation for Economic Education, 1968.

A-124 "Economic Thought VI: The Austrian School." In *International Encyclopaedia of the Social Sciences*. Edited by David L. Sills. New York: The Macmillan Co. & Free Press, 1968, 1972; Volume 4, pp. 458–462.

A-125a "Menger, Carl." In *International Encyclopaedia of the Social Sciences*. Edited by David L. Sills. New York: The Macmillan Company & Free Press, 1968, 1972; Volume 10, pp. 124–127.

A-125b "Wieser, Friedrich von." In *International Encyclopaedia of the Social Sciences*. Edited by David L. Sills. New York: The Macmillan Co. & The Free Press, 1968, 1972; Volumes 15, 16, 17, pp. 549–550.

A-126 "Szientismus." In W. Bernsdorf (ed.), *Wörterbuch der Soziologie*, Edited by W. Bernsdorf. 2nd ed. (Stuttgart, 1969).

["Scientism."]

A-127 "Three Elucidations of the 'Ricardo Effect'." *Journal of Political Economy* 77 (March-April 1969): 274–285.

[Reprinted in B-13 and (in German) in B-14.]

A-128a "The Primacy of the Abstract." In Arthur Koestler and J. R. Smythies (eds.), *Beyond Reductionism—The Alpbach Symposium*. London, 1969.

[Reprinted in B-17.]

A-128b "Marktwirtschaft oder Syndikalismus?" In: *Protokoll des Wirtschaftstages der CDU/DSU* (Bonn 1969).

["Market Economy or Syndicalism?"]

A-129a "Il sistema concorrenziale come strumento di conoscenza." *L'industria* 1 (Turin, January-March 1970): 34–50.

[Translated with an English summary as "The Competitive System as a Tool of Knowledge."]

A-129b "Principles or Expediency?" In *Toward Liberty: Essays in Honor of Ludwig von Mises on the Occasion of his 90th Birthday, September 29, 1971*. Sponsoring Committee F. A. von Hayek *et.al*; F. A. Harper, Secretary. Menlo Park, California: Institute for Humane Studies, 1971, vol I, pp. 29–45.

A-129c "Nature vs. Nurture Once Again." A comment on C. D. Darlington, *The Evolution of Man and Society*, London, 1962 in *Encounter* (February 1971).

[Reprinted as Chapter 19 in B-17.]

A-130 "The Outlook for the 1970's: Open or Repressed Inflation." In Sudha R. Shenoy (ed.) *A Tiger by the Tail: The Keynesian Legacy of Inflation. A 40-Years' Running Commentary on Keynesianism*. London: Institute of Economic Affairs (Hobart Paperback 4), 1972.

[This actually appeared in a pamphlet format (P-11b) to which Hayek adds a new article, "The Campaign Against Keynesian Inflation." This article is also reprinted as Chapter 13 of B-17.]

A-131a "Die Stellung von Mengers 'Grundsätzen' in der Geschichte der Volkswirtschaftslehre." *Zeitschrift für Nationalökonomie* 32, no. 1 (Vienna, 1972.)

English version: "The Place of Menger's *Grundsätze* in the History of Economic Thought." In J. R. Hicks and W. Weber (eds.), *Carl Menger and the Austrian School of Economics*. Oxford, 1973, pp. 1–14. Reprinted as Chapter 17 in B-17. Compare with E-7.

[The 1934 earlier and distinct biographical study entitled "Carl Menger" found in E-7 was "written as an Introduction to the Reprint of Menger's *Grundsätze der Volkwirtschaftslehre* which constitutes the first of a series of four reprints embodying Menger's chief published contributions to Economic Science and which were

published by the London School of Economics as Numbers 17 to 20 of its Series of Reprints of Scarce Works in Economics and Political Science." An English translation of this earlier "Carl Menger" Introduction can be found in Carl Menger, *Principles of Economics*. A translation of Menger's *Grundsätze* by James Digwall and Bert F. Hoselitz, with an Introduction ("Carl Menger") by F. A. Hayek. New York and London: New York University Press, 1981, pp. 11–36.

A-131b "In Memoriam Ludwig von Mises 1881–1973." Zeitschrift für Nationalökonomie 33 (Vienna 1973)

A-131c "Tribute to von Mises, Vienna Years." National Review (Autumn 1973).

A-131d "Talk at the Mont Pélèrin." *Newsletter of the Mont Pélèrin Society* 3 (Luxembourg 1973).

A-132a "Inflation: The Path to Unemployment." Addendum 2 to Lord Robbins et. al. *Inflation: Causes, Consequences, Cures: Discourses on the Debate between the Monetary and the Trade Union Interpretations*. London: The Institute for Economic Affairs (IEA Readings, No. 14), 1974, pp. 115–120.

[Reprinted from *The Daily Telegraph* of London (October 15 and 16, 1974).]

A-132b "Inflation and Unemployment." New York Times (Nov. 15, 1974).

[Reprinted from *The Daily Telegraph* of London.]

A-132c Hayek, F.A. "Introduction" to *Catallaxy: The Science of Exchange*. Paper read at the first meeting of The Carl Menger Society, London, December 1974. [Hayek did not continue his intention to complete this book. The "Introduction" along with comment and discussion by Hayek, Lionel Robbins, and others is available in transcription at the Institute for Humane Studies.]

A-132d "The Pretence of Knowledge." An Alfred Nobel Memorial Lecture, delivered December 11, 1974 at the Stockholm School of Economics. In *Les Prix Nobel en 1974*. Stockholm: Nobel Foundation, 1975.

[Reprinted in *Full Employment at Any Price* [P-13]. (Occasional Paper 45), Institute of Economic Affairs, London 1975. Also reprinted in *Unemployment and Monetary Policy: Government as Generator of the Business Cycle* with a foreward by Gerald O'Driscoll Jr. San Francisco: Cato Institute, 1979, pp. 23–36. This has also been reprinted as Chapter 2 of B-17.]

A-132e "Freedom and Equality in Contemporary Society." *PHP* 4 (The PHP Institute, Tokyo), (Tokyo 1975).

A-132f "Economics, Politics & Freedom: An Interview with F. A. Hayek." Interview conducted by Tibor Machan in Salzburg, Austria. *Reason* 6 (February 1975): 4–12.

A-133a "Die Erhaltung des liberalen Gedankengutes." In Friedrich A. Lutz (ed.) *Der Streit um die Gesellschaftsordnung* (Zurich 1975).

["The Preservation of the Liberal Ideal of Thought."]

A-133b T.V. interview on "NBC Meet the Press." Sunday, June 22, 1975. *Meet the Press* 19, no. 25 (June 22, 1975) Washington D.C.: Merkle Press, Inc. 1975, 9 pp.

A-133c "The Courage of His Convictions." In *Tribute to Mises 1881–1973*. The Session of the Mont Pélèrin Society at Brussels 1974 devoted to the Memory of Ludwig von Mises. Chislehurst, 1975.

A-133d "The Formation of the Open Society." Address given by Professor Friedrich A. von Hayek at the University of Dallas Commencement Exercises, May 18, 1975. [Unpublished typescript, available at the Institute for Humane Studies.]

A-134a "Types of Mind." Encounter 45 (September 1975).

[This was revised and retitled "Two Types of Mind" in Chapter 4 of B-17.]

A-134b "Politicians Can't Be Trusted with Money." [(Newspaper editor's title. Paper delivered in September at the Gold and Monetary Conference in Lausanne, Switzerland.) *The Daily Telegraph* of London, Part I (September 30, 1975); Part II "Financial Power to the People" (newspaper editor's title October 1, 1975).]

A-135a "A Discussion with Friedrich Hayek." American Enterprise Institute. *Domestic Affairs Studies* 39 (Washington, D.C. 1975).

A-135b "World Inflationary Recession." Paper presented to the International Conference on World Economic Stabilization, April 17–18, 1975, co-sponsored by the First National Bank of Chicago and the University of Chicago. *First Chicago* Report 5/1975.

A-136a "The New Confusion about Planning." *The Morgan Guaranty Survey* (January 1976): 4–13.

[German translation in *Die Industrie* 10 (1976).]

A-136b "Institutions May Fail, but Democracy Survives." *U.S. News and World Report* (March 8, 1976.)

A-136c "Adam Smith's Message in Today's Language." *Daily Telegraph*, London (March 9, 1976.)

[Reprinted as Chapter 16 of B-17.]

[The gap in identification number (A-137 through A-141) will be supplied in subsequent revisions of this Hayek bibliography.]

A-142 "Il Problema della Moneta Oggi." Academia Nationale dei Lincei. Atti de Convegni Rome (1976).

["The Problem of Money Today."]

A-143 "Remembering My Cousin Ludwig Wittgenstein." Encounter (August 1977).

A-144a "Die Illusion der sozialen Gerechtigkeit." In *Schicksal? Grenzen der Machbarkeit. Eine Symposion*. Munchen: Deutscher Taschenbuch Verlag, 1977.

["The Illusion of Social Justice." Cf. B-16, Vol. II of *Law, Legislation and Liberty: The Mirage of Social Justice* esp. Chapt. 9, also note Chapter 5 of B-17: "The Atavism of Social Justice."]

A-144b "Toward Free Market Money." Wall Street Journal (August 19, 1977).

A-144c "Persona Grata: Interview with Friedrich Hayek." Interviewed by Albert Zlabinger, *World Research INK* 1, no. 12 (September, 1977): 7–9. Also available as a 30 minute 16mm color movie, entitled "Inside the Hayek Equation," from World Research, Inc.; Campus Studies Division; 11722 Sorrento Valley Rd., San Diego, CA 92121.

A-144d "An Interview with Friedrich Hayek." by Richard Ebeling. *Libertarian Review* (September 1977): 10–16.

A-144e "Is There a Case for Private Property." *Firing Line*. Columbia S.C.: Southern Educational Communications Association, 1977.

A-145 "Coping with Ignorance." Ludwig von Mises Memorial Lecture. *Imprimis* (Hillsdale College) 7 (July 1978) 6 pp.

[Reprinted in Cheryl A. Yurchis (ed.) *Champions of Freedom*. Hillsdale, Michigan: Hillsdale College Press, (The Ludwig von Mises Lecture Series Vol. 5) 1979.]

A-146a "The Miscarriage of the Democratic Ideal." *Encounter* (March 1978). [A slightly revised version later appeared as Chapter 16 of B-18.]

A-146b "Will the Democratic Ideal Prevail?" In Arthur Seldon, ed. *The Coming Confrontation: Will the Open Society Survive to 1989?* London: The Institute for Economic Affairs (Hobart Paperback No. 12), 1978, pp. 61–73.

[Revised version of an article which appeared in *Encounter* (March 1978).]

A-147 "Die Entthronung der Politik." In *Uberforderte Demokratie?* hrsg. von D. Frei, Sozialwissenschaftliche Studien de schweizerischen Instituts für Auslandsforschung, N.F. 7, Zurich 1978.

["The Dethronement of Politics" in *Has Democracy Overextended Itself?* See also Chapter 18 of B-18: "The Containment of Power and the Dethronement of Politics."]

A-148a "Can we still avoid inflation?" In Richard M. Ebeling (ed.) *The Austrian Theory of the Trade Cycle and Other Essays*. New York: Center for Libertarian Studies (Occasional Paper Series 8) 1978.

A-148b "Exploitation of Workers by Workers." The last of three talks given by Professor F. A. Hayek under the title, "The Market Economy" (Radio 3, BBC). The *Listener* (August 17, 1978): 202–203.

A-149 "Notas sobre la Evolución de Sistemas de Reglas de Conducta." *Teorema* 9, no. 1 (1979): 57–77.

["Notes on the Evolution of Systems of Rules of Conduct." Spanish version of Chapt. 4 of B-13.]

A-150 "Towards a Free Market Monetary System." *The Journal of Libertarian Studies* 3, no. 1 (1979): 1–8.

[A lecture delivered at the Gold and Monetary Conference, New Orleans, Louisiana (November 10, 1977).]

A-151a "Freie Wahl de Währungen." In *Geldpolitik*, ed. by J. Badura and O. Issing. Stuttgart and New York, 1980, pp. 136–146.

["Free Choice of Currency Standards."]

A-151b "An Interview with F. A. Hayek." Conducted by Richard E. Johns. *The American Economic Council Report* (May 1980.)

[Reprinted in *IRI Insights* (publication of Investment Rarities, Inc.) 1 (November—December, 1980): 6–12, 14–15, 32.]

A-151c "Midju—Modid." *Frelsid* (Journal of the Freedom Association of Iceland) 1 (1980): 6–15.

["The Muddle of the Middle."]

A-151d "Dankadresse." In Erich Hoppmann, ed. *Friedrich A. von Hayek*. Baden—Baden: Nomos Verlagsgesellschaft, 1980. pp. 37–42.

[See Hoppmann (1980) in the *Bibliography* of Works Relating to Hayek.]

A-151e Review of Thomas Sowell's *Knowledge and Decisions*. (New York: Basic Books, 1980). In *Reason* 13 (December 1981): 47–49.

A-151f "L'Hygiène de la démocratie." French translation of the English text of a speech delivered April 12, 1980 at the l'Assemblée Nationale in Paris by Friedrich A. Hayek. ["The Health of Democracy." In *Liberté économique et progrès social* (périodique d'information et de liaison des libéraux) No. 40 (December—January 1981): 20–23.]

A-151g "The Ethics of Liberty and Property." Chapter 4 of a forthcoming book, *The Fatal Conceit*. Published in the proceedings of the Mont Pélèrin Society 1982 General Meeting, 5–10 September, Berlin. Institut für Wirtschaftspolitik an der Universität zu Köln, 1982.

[Back to Table of Contents]

Works About Or Relevant To Friedrich A. Hayek

Aaron, Raymond. "La Definition Libérale le Libérté." *Archiv europäischer Sociologen* II (1961).

["The Liberal Definition of Liberty."]

Agonito, Rosemary. "Hayek Revisited: Mind as a Process of Classification." In: *Behaviorism: A Forum for Critical Discussions* 3, no. 2 (Spring 1975): 162–171.

Allen, Henry. "Hayek, the Answer Man." *The Washington Post* (December 2, 1982), pp. C1, C17.

Arnold, G. L. "The Faith of a Whig." Twentieth Century London (August 1960).

Arnold, Roger A. "The Efficiency Properties of Institutional Evolution: With Particular Reference to the Social—Philosophical Works of F. A. Hayek." Virginia Polytechnic Institute and State University Ph.D. Dissertation, 1979. [Dissertation supervised by James M. Buchanan.]

——. "Hayek and Institutional Evolution." *The Journal of Libertarian Studies* 4, no. 4 (Fall 1980): 341–352.

Barry, Norman P. "Austrian Economists on Money and Society." *National Westminster Bank Quarterly Review* (May 1981): 20–31.

———. An Introduction to Modern Political Theory. London: MacMillan, 1981.

——. Hayek's Social and Economic Philosophy. London: Macmillan, 1979.

——— "The Tradition of Spontaneous Order." *Literature of Liberty* 5 (Summer 1982): 7–58.

[A major section of this article deals with Hayek.]

Baumgarth, William P. "The Political Philosophy of F. A. von Hayek." Harvard University Ph.D. Dissertation in Government, Cambridge, Mass., 1976

"Hayek and Political Order: The Rule of Law." *The Journal of Libertarian Studies* 2, no. 1 (Winter 1978): 11–28

Bay, Christian. "Hayek's Liberalism: The Constitution of Perpetual Privilege." *Political Science Review* 1 (Fall 1971): 93–124.

Bettelheim, Charles. "Freiheit und Planwirtschaft." In: *Die Umschau. Internationale Revue*, Mainz, 1 (1946): 83–192. ["Freedom and the Planned Economy."]

Bianca, G. Verso la Schiavitù. Replica a von Hayek. Naples, 1979.

["(The Road) to Serfdom. Reply to von Hayek."]

Birner, Jack. "Hayek's Research Program in Economics." Ph.D. dissertation for Erasmus University in Rotterdam, no date (1982?).

[In Dutch with a 36-page summary in English. The English summary is available at the Institute for Humane Studies, Menlo Park, CA 94025.]

Black, R.D., Collison Coats, A. W., and Goodwin, Craufurd D.W. (eds.) *The Marginal Revolution in Economics: Interpretation and Evaluation*. Durham, North Carolina: Duke University Press, 1973.

Böhm, Stephan B. "Liberalism and Economics in the Hapsburg Monarchy," 12 pp. Unpublished typescript. Paper presented to "The History of Economics Society Conference," Kress Library, Harvard University Graduate School of Business Administration, June 16–19, 1980.

[Paper available at the Institute for Humane Studies]

Boland, L.A. "Time in Economics vs. Economics in Time. The 'Hayek Problem." In *The Canadian Journal of Economics* (Canadian Economic Association) Toronto, 2, no. 2 (1978): 240–262.

Bostaph, Samuel. "The Methodological Debate between Carl Menger and the German Historical School." *Atlantic Economic Journal* 6 (September 1978): 3–16.

Bradley, Jr., Robert. "Market Socialism: A Subjectivist Evaluation." *The Journal of Libertarian Studies* 5, no. 1 (Winter 1981): 23–40.

Brell, K.H. "Zur Problematik der progressiven Einkommensbesteuerung. Eine Antikritik zu F.A. von Hayeks 'Ungerechtigkeit der Steuerprogression' und C. Fohls 'Kritik der progressiven Einkommensbesteurung'." Dissertation Karlsruhe (Berenz) 1957. ["On the Problematic of the Progressive Income Tax. A Counter—Critique to F.A. von Hayek's 'The Injustice of the Progressive Income Tax' and C. Fohl's 'Critique of the Progressive Income Tax."]

Brittan, Samuel. "Hayek and the New Right." Encounter 54 (January 1980): 30–46.

Broadbeck, M. "On the Philosophy of the Social Sciences." *Philosophy of Science* 21, no. 2 (April 1959).

Brown, Pamela. "Constitution or Competition? Alternative Views on Monetary Reform." *Literature of Liberty* 5 (Autumn 1982): 7–52.

[A major section of this article surveys Hayek's proposals for the 'denationalization' of money. See Hayek, P-14, P-16a, and P-16b.]

Brozen, Yale M. "The Antitrust Task Force Deconcentration Recommendation." *Journal of Law & Economics* 13 (October 1970) 279–292.

Buchanan, James M. "Cultural Evolution and Institutional Reform." Unpublished manuscript.

. Cost and Choice. Chicago: Markham Publishing Co., 1969.

——. Freedom in Constitutional Contract. College Station, Texas: Texas A & M University Press, 1979.

Buchanan, James M. and Thirlby G.F. (eds.) *L.S.E. Essays on Cost*. London: Weidenfield Nicolsen, 1973.

[Classic essays on cost from the London School of Economics, including Hayek.]

Buckley, Jr., William F. "The Road to Serfdom: The Intellectuals and Socialism." In Fritz Machlup, ed. *Essays on Hayek*. New York: New York University Press, 1976, pp. 95–106.

Business Week. "The Austrian School's Advice: 'Hands Off!'" *Business Week* (August 3, 1974).

Campbell, William F. "Theory and History: The Methodology of Ludwig von Mises." University of Minnesota M.A. thesis. Minneapolis, 1962.

Chambers, Raymond J. *Accounting, Evaluation and Economic Behavior*. Englewood Cliffs, New Jersey: Prentice—Hall, Inc., 1966.

[Also see Thomas Cullom Taylor, Jr. (1970).]

Congdon, Tim. "Is the Provision of a Sound Currency a Necessary Function of the State?" *National Westminster Bank Quarterly Review*. (London, August 1981): 2–21. [Deals with the assorted problems of Hayek's (P-16b). See Norman P. Barry (May, 1981).]

Corbin, Peter D. (Principal Investigator, Research Coordinator, American Geographic Society.) "Geoinflationary Variations in the U.S. Economy."

[Examination of the Austrian theory of inflation which emphasizes the spatio—temporal aspects of the inflationary process. Available at the Institute for Humane Studies.]

Crespigny, Anthony de. "F.A. Hayek, Freedom for Progress." in Anthony de Crespigny and Kenneth Minogue (eds.) *Contemporary Political Philosophers*. New York: Dodd, Mead and Co., 1975; London: Methuen, 1976, pp. 49–66.

Cunningham, Robert L. (ed.) *Liberty and the Rule of Law*. College Station, Texas: Texas A & M University Press, 1979.

[A collection of 13 papers delivered at a conference in honor of F.A. Hayek, Jan. 14–18, 1976 in San Francisco. Co—sponsored by Liberty Fund, Inc. and the University of San Francisco.]

Davenport, John. "An Unrepentant Old Whig." *Fortune* (March 1960): 134–135, 192, 194, 197–198.

[Outline of Hayek's Social Philosophy on the occasion of the publication of B-12.]

Davis, Kenneth. *Discretionary Justice: A Preliminary Inquiry*. Baton Rouge, Louisiana: Louisiana State University Press, 1969.

Delettres, J.M. Les récentes théories der crises foundées sur les disparités des prix. Paris: Pendone, 1941, pp. 195–276.

["Recent Theories of Economic Crises Based on Disparities in Prices."]

Diamond, Arthur M. "F.A. Hayek on Constructivism and Ethics." *The Journal of Libertarian Studies* 4, no. 4 (Fall 1980): 353–366.

Dietze, Gottfried. "Hayek on The Rule of Law." In Fritz Machlup, ed. *Essays on Hayek*. New York: New York University Press, 1976, pp. 107–146.

——. "From the Constitution of Liberty to its Deconstruction by Liberalist Dissipation, Disintegration, Disassociation, Disorder." In Fritz Meyer, ed., *Zur Verfassung der Freiheit. Festgabe für Friedrich von Hayek*. Stuttgart, New York: Gustav Fischer Verlag (*Ordo*, vol. 30), 1979, pp. 177–197.

Dolan, Edwin G., editor. *The Foundations of Modern Austrian Economics*. Kansas City: Sheed & Ward, Inc. 1976.

[Exposition by several authors of the history, principles and applications of the Austrian School of Economics. Among the topics of interest are Israel M. Kirzner's "On the Method of Austrian Economics" and "The Theory of Capital;" Murray N. Rothbard's "The Austrian Theory of Money," and Gerald P. O'Driscoll, Jr.'s and Sudha R. Shenoy's "Inflation, Recession, and Stagflation."]

Dorn, J.A. "Law and Liberty: A Comparison of Hayek and Bastiat." Unpublished paper (October 1980), 50 pp.

[Available at the Institute for Humane Studies.]

Dreyhaupt, K.F. and Siepmann U. "Privater Wettbewerb im Geldwesen. Uberlegungen zu einem Vorschlag von F.A. von Hayek." *Ordo* 29 (1978).

["Private Competition in Monetary Affairs. Reflections on a Proposal by F.A. von Hayek."]

Dyer, P.W. and Hickman, R.H. "American Conservatism and F.A. Hayek." *Modern Age* 23, no. 4 (Fall 1979).

Eagley, Robert V. *The Structure of Classical Economic Theory*. New York: Oxford University Press, 1974.

Eastman, Max. Review of Hayek's *Capitalism and the Historians. The Freeman* 4 (February 22, 1954): 385–387.

Eaton, Howard O. *The Austrian Philosophy of Value*. Norman, Okla.: The University of Oklahoma Press, 1930.

Ebeling, Richard. "An Interview with Friedrich Hayek." *Libertarian Review* (September 1977): 10–16.

——. "Reflections on John Hick's 'The Hayek Story." Unpublished manuscript, no date; 23 pp.: Available from the Institute for Humane Studies, Menlo Park, California 94025.

———. "Hayek on Inflation." Unpublished Paper presented to The Carl Menger Society Conference entitled "Hayek—An Introductory Course," London, Dec. 6, 1980.

Ellis, Howard S. *German Monetary Theory*, 1905–1933. Cambridge, Mass: Harvard University Press, 1934.

Fabrini, L. "La teoria del capitale e dell interesse di F.A. Hayek." *Revista internazionale de scienze sociali*. Milano, Anno 58, Series 4, Volume 22 (1950): 250–286.

["The Theory of Capital and Interest of F.A. Hayek."]

Falconer, Robert T. "Capital Intensity and the Real Wage: A Critical Evaluation of Hayek's Ricardo Effect." Texas A & M Ph.D. Dissertation. College Station, Texas, 1971.

Finer, H. Road to Reaction. London: Dobson, 1946.

[Reprinted Boston, 1945. Westport, Connecticut: Greenwood Press, 1973.]

Fingleton, Eamonn. "The Guru Who Came In From the Cold." *NOW!* (January 30, 1981) 39–41.

Flanagan, T.E. "F.A. Hayek on Property and Justice." Unpublished manuscript presented at the Theory of Property Summer Workshop at the University of Calgary, July 7–14, 1978.

Frankel, S. H. "Hayek on Money." Unpublished paper presented to The Carl Menger Society Conference on Hayek at University College, London, October 28, 1978. [This

conference was structured around Hayek's newly published *New Studies in Philosophy, Politics, Economics and the History of Ideas*. In addition to Frankel, it featured Thomas Torrance, Hillel Steiner and Jeremy Shearmur.]

Fridriksson, Fridrik. "Hayek á Íslandi 1940–1980." *Frelsid* 3 (1981): 312–336. ["Hayek and Iceland, 1940–1980."]

——. Friedrich A. Hayek. Forthcoming book developed from Fridriksson's Virginia Polytechnic Institute M.A. thesis in economics.

Garrigues, A. "El individualismo verdadero y falso, segun Hayek." *Moneda y credito, Revista de economie* 34 (Madrid, 1950): 3–14.

["Individualism: True and False, according to Hayek."]

Garrison, Roger W. "The Austrian—Neoclassical Relation: A Study in Monetary Dynamics." University of Virginia, Department of Economics, Ph.D. Dissertation, 1981.

Geddes, John M. "New Vogue for Critic of Keynes." *The New York Times* (May 7, 1979).

Gerding, R. and Starbatty, J. "Zur 'Entnationalisierung des Geldes.' Eine Zwischenbilanz." Tübingen: Walter Eucken Institut (Vorträge und Aufsätze 78) (J.C.B. Mohr/Paul Siebeck), 1980.

["On the 'Denationalisation of Money.' An Interim Statement."]

Gilbert, J.C. "Professor Hayek's Contribution to Trade Cycle Theory." *Economic Essays in Commemoration of the Dundee School of Economics*, 1931–1955. pp. 51–62.

Glasner, David. "Friedrich Hayek: An Appreciation." *Intercollegiate Review* 7 (Summer 1971): 251–255.

Good, D.F. "The Great Depression and Austrian Growth after 1873." *The Economic History Review* 31 (1978).

Gordon, Scott. "The Political Economy of F.A. Hayek." *Canadian Journal of Economics* 14 (1981): 470–487.

Graf, Hans-Georg. "*Muster-Voraussagen*" und "*Erklärungen des Prinzips*" bei F.A. von Hayek. Tübingen: Walter Eucken Institut (Vorträge und Aufsätze 65) (J.C.B. Mohr/P. Siebeck.), 1978.

["Pattern-Prediction' and Clarification of Principle' in F.A. von Hayek."]

——. "Nicht-nomologische Theorie bei Komplexen Sachverhalten." *Ordo*, Jahrbuch für die Ordnung von Wirtschaft und Gesellschaft 26 (1975): 298–308.

["Non-nomological Theory in Complex Phenomena."]

Graham, F.D. "Keynes vs. Hayek on a Commodity Reserve Currency." *The Economic Journal* 54 (1944): 422–429.

Grant, James. "Hayek: The Road to Stockholm." *The Alternative: An American Spectator* 8, no. 8 (May 1975): 10–12.

Gray, John N. "F.A. Hayek on Liberty and Tradition." *The Journal of Libertarian Studies* 4 (Spring 1980): 119–137.

——. "Hayek on Spontaneous Order." Unpublished paper presented to The Carl Menger Society Conference on Hayek, London, Oct. 30, 1982.

Grinder, Walter E. Review of two books: *Macro-economic Thinking & The Market Economy* by Ludwig M. Lachmann; and *A Tiger by the Tail: The Keynesian Legacy of Inflation*. In *Libertarian Review* (November 1974): 4–5.

——. Review of 4 books: F.A. Hayek's *The Counter-Revolution of Science; Individualism and Economic Order; Studies in Philosophy, Politics and Economics;* and Ludwig M. Lachmann's *The Legacy of Max Weber*. In *Libertarian Review* 4, no. 4 (April 1975): 4–5.

——. "In Pursuit of the Subjective Paradigm" and "Austrian Economics in the Present Crisis of Economic Thought." In *Capital, Expectations and the Market Process* by Ludwig M. Lachmann. Edited by Walter E. Grinder. Kansas City: Sheed, Andrews & McMeel, Inc., 1977.

——. "The Austrian Theory of the Business Cycle: Reflections on Some Socio-Economic Effects." Unpublished paper presented at The Symposium on Austrian Economics, University of Hartford, June 22–28, 1975.

[Available at the Institute for Humane Studies, Menlo Park, CA 94025.]

Gross, N.T. *The Industrial Revolution in the Hapsburg Monarchy, 1750–1914.* Fontana Economic History of Europe, vol. 4, Part 1. London, 1973.

Haberler, Gottfried. "Mises' Private Seminar: Reminiscences." *The Mont Pélèrin Quarterly* 3 (October 1961): 20–21.

[See also an expanded version in *Wirtschafts Politische Blätter* (Journal of Political Economy, Vienna) 28, 4 (1981). A Festschrift issue on the Centennary of Luwig von Mises' birth (1881–1981).]

Hagel III, John. "From Laissez Faire to *Zwangswirtschaft*: The Dynamics of Interventionism." Unpublished paper presented to The Symposium on Austrian Economics. University of Hartford, June 22–28, 1975, 37 pp.

[Available at the Institute for Humane Studies.]

Hamowy, Ronald. "Hayek's Conception of Freedom: A Critique." <i>New Individualist Review</i> 1, no. 1 (April 1961): 28–31.
——. "Law and the Liberal Society: F.A. Hayek's <i>Constitution of Liberty." Journa of Libertarian Studies</i> 2, no. 4 (1978): 287–297.
Hampshire, Stuart. Thought and Action. London: Chatto and Windar, 1970.
——. "On Having a Reason." In G.A. Vesey, ed., <i>Human Values</i> . Royal Institute o Philosophy Lectures, Vol II 1976–1979: Harvester Press, 1976. Chapter 5.
Haney, Lewis H. <i>History of Economic Thought</i> . New York: Macmillan, 1949, 4th edition. [See especially pp. 607–634 ("Fully Developed Subjectivism: The Austrian School.") and pp. 811–831 ("Economic Thought in Germany and Austria, from 1870 to World War II."]
Harris, R. "On Hayek." Swinton Journal (1970).
Harrod, R. Money. London: St. Martin's Press, 1969.
——. "Professor Hayek on Individualism." In R. Harrod, ed. <i>Economic Essays</i> , 2nd edition. London and New York: 1972. pp. 293–301.
Hart, H.L.A. The Concept of Law. Oxford: Clarendon Press, 1961.
Hartwell, Ronald Max. "Capitalism and the Historians." In Fritz Machlup, ed. <i>Essays on Hayek</i> . New York: New York University Press, 1976, pp. 73–94.
Hawtrey, Ralph G. <i>Capital and Employment</i> . London, 1937, especially chapter 8: "Professor Hayek's <i>Prices and Production</i> ."
——. "The Trade Cycle and Capital Intensity." <i>Economica</i> n.s. 7 (February 1940): 1–15. [Hawtrey was an economist connected with the British Treasury from 1919 to 1937. He "developed a purely monetary theory of the business cycle on a macroeconomic concept of equilibrium." See citation under Sennholz.]
——. "Professor Hayek's Pure Theory of Capital." <i>Economic Journal</i> (Royal Economic Society) 51 (London 1941): 281–290.
——. "Prof. Hayek's 'Prices and Production'." In <i>Capital and Employment</i> , 2nd edition. London: Longmans, Green & Co., 1952, pp. 233–267.
Heimann, E. "Professor Hayek on German Socialism." <i>The American Economic Review</i> . 35 (1945): 935–937.

[Compare with B. Hoselitz.]

Hicks, J.R. "Maintaining Capital Intact: A Further Suggestion." *Economica* 9 (1942): 174–179.

——. "The Hayek Story." In *Critical Essays in Monetary Theory*. Oxford University Press: 1967.

[See Richard M. Ebeling citation.]

Hicks, J.R. and Weber, W. *Carl Menger and the Austrian School of Economics*. Oxford: Oxford University Press, 1973.

Hoppmann, Erich (ed.) Friedrich A. von Hayek. Vorträge und Ansprächen auf der Festveranstaltung der Frieburger Wirtschaftswissenschaftlichen Fakultät zum 80. Geburtstag von Friedrich A. von Hayek. Baden-Baden: Nomos Verlagsgesellschaft, 1980.

[Festschrift with bibliography on F.A. Hayek's 80th birthday presented by the Faculty of Economics of the University of Freiburg. Contributors include: Erich Hoppmann, Berhard Stoeckle, Karl Brandt, Christian Watrin, Hans Otto Lenel, and Klaus Peter Krause. Hayek's "Dankadresse," pp. 37–42, surveys highlights in Hayek's intellectual career and writings from the vantage point of his 80th year. The Hoppmann-edited Festschrift honoring Hayek also lists the contributors to the earlier 1979 *Ordo* Festschrift for Hayek, edited by Fritz Meyer, *et.al* (p. 53), and contains valuable updatings on bibliography by and about Hayek (pp. 55–60.)]

Hoselitz, B.F. "Professor Hayek on German Socialism." *The American Economic Review* 35 (1945): 926–934.

[Compare with E. Heimann.]

Housinden, Daniel M. Capital, Profits, and Prices: An Essay in The Philosophy of Economics. New York: Columbia University Press, 1981.

Howey, Richard S. *The Rise of the Marginal Utility School: 1870–1889*. Lawrence, Kansas: The University of Kansas Press, 1960.

Hoy, Calvin M. "Hayek's Philosophy of Liberty." Columbia University Ph.D. Dissertation. New York, 1982.

Hummel, Jeffrey Roger. "Problems with Austrian Business Cycle Theory." *Reason Papers* No. 5 (Winter, 1979): 41–53.

Hunt, Lester. "Toward a Natural History of Morality." Unpublished essay.

Hutchinson, T.W. *The Politics and Philosophy of Economics: Marxians, Keynesians and Austrians*. New York and London: New York University Press, 1981.

Janik, Allan and Toulmin, Stephen. *Wittgenstein's Vienna*. New York: Simon and Schuster, 1973.

[Important along with Carl Schorske's volume on *Fin-de-siècle Vienna* for the cultural-historical context in which Hayek and his cousin Wittgenstein lived. See A-143.]

Johnson, Frank. "The Facts of Hayek." *Sunday Telegraph Magazine* (London, no date, [1975?]) 30–34.

[Profile and biographical sketch along with photographs of F.A. Hayek.]

Johnston, William. *The Austrian Mind: An Intellectual and Social History,* 1848–1938. Berkeley, Los Angeles, London: University of California Press, 1972.

Johr, W.A. "Note on Professor Hayek's 'True Theory of Unemployment." *Kyklos* 30, no. 4 (1970): 713–723.

Jones, Harry W. "The Rule of Law and the Welfare State." *Columbia Law Review* 58, no. 2 (February 1958).

Kaldor, N. "Prof. Hayek and the Concertina Effect." In *Economica* N.S. 9 (1942): 148–176; reprinted in: Kaldor, *Essays on Economic Stability and Growth*. London: Duckworth, 1960.

Kasp, M.E. Die geldliche Wechsellagenlehre. Darstellung und Kritik de geldlichen Wechsellagentheorien von Hawtrey, Wicksell und Hayek. Jena: Fischer, 1939.

["Monetary (Exchange) Models. Representation and Critique of the Monetary (Exchange) Theories of Hawtrey, Wicksell, and Hayek."]

Kauder, Emil. "Intellectual and Political Roots of the Older Austrian School." *Zeitschrift für Nationalökonomie* 17 (1957): 411–425.

——. A History of Marginal Utility Theory. Princeton: Princeton University Press, 1965.

Keizai, S. "Theories and Thoughts of Prof. Hayek." *The World Economy*. Tokyo, 1964.

Keynes, J.M. "A Reply to Dr. Hayek." *Economica* 12 (November 1931): 387–397. [Cf. Hayek: A-10, A-11a, A-11b.]

Kirzner, Israel M. *The Economic Point of View: An Essay in The History of Economic Thought.* Princeton: Van Nostrand, 1960.

——. "Divergent Approaches in Libertarian Economic Thought." *The Intercollegiate Review* 3 (January-February 1967): 101–108.

——. *Competition and Entrepreneurship*. Chicago and London: The University of Chicago Press, 1973.

——. "Hayek, Knowledge and Market Processes." Paper delivered at The Allied Social Science Association meetings in Dallas, Texas. New York: Xerox, 1975.
——. <i>Perception, Opportunity and Profit. Studies in the Theory of Entrepreneurship.</i> Chicago and London: University of Chicago Press, 1979. Chapter 2.
——. "Entrepreneurship, Choice, and Freedom." In <i>Verfassung der Freiheit:</i> Festgabe für Friedrich A. von Hayek zur Vollendung seines achtzigstan Lebensjahres. Edited by Fritz W. Meyer, et.al. Stuttgart, New York: Gustav Fischer Verlag (<i>Ordo</i> 30) 1979, pp. 245–256.
Knight, F.H. "Professor Hayek and the Theory of Investment." <i>The Economic Journal</i> 45 (1935): 77–94.
Kristol, Irving. "Capitalism, Socialism and Nihilism." In <i>Two Cheers for Capitalism</i> . New York, 1978. Chapter 7.
Lachmann, Ludwig M. <i>Macro-economic Thinking and the Market Economy: An Essay on the Neglect of the Micro-Foundations and Its Consequences</i> . London: The Institute of Economic Affairs (Hobart Paper 56), 1973, 56 pp. Reprinted, Menlo Park, California: Institute for Humane Studies (Studies in Economics, No. 6), 1978. [See also Lachmann's essay "Toward a Critique of Macroeconomics," pp. 152–159, in Edwin G. Dolan, ed. <i>The Foundations of Modern Austrian Economics</i> .]
"Methodological Individualism in The Market Economy." In <i>Roads to Freedom: Essays in Honour of Friedrich A. von Hayek</i> . Edited by Erich Streissler <i>et.al</i> . London: Routledge and Kegan Paul, 1969.
[This essay is also reprinted in Capital, Expectations]
——. "Reflections on Hayekian Capital Theory." Paper delivered at The Allied Social Science Association meetings in Dallas, Texas. New York: Xerox, 1975.
——. Capital, Expectations, and the Market Process: Essays on The Theory of the Market Economy. Edited with an Introduction by Walter E. Grinder. Kansas City: Sheed Andrews & McMeel, Inc., 1977.
[See in this volume especially Walter E. Grinder's Introduction "In Pursuit of the Subjective Paradigm" (pp. 3–24) and his "Austrian Economics in the Present Crisis of Economic Thought" (pp. 25–41). Noteworthy among Lachmann's articles in this volume are: "The Significance of the The Austrian School of Economics in The History of Ideas" (pp. 45–64), and "A Reconsideration of the Austrian Theory of Industrial Fluctuations," (pp. 267–286). The Appendix contains a useful Bibliography of "The Writings of Ludwig M. Lachmann," (pp. 338–340.)]

pp. [Available at the Institute for Humane Studies.]
——. "Austrian Economics: An Interview with Ludwig Lachmann." Interviewed by Richard Ebeling. <i>Institute Scholar</i> (Publication of the Institute for Humane Studies) 2, no. 2 (February 1982): 6–9.
[The Interview contains interesting facts about Hayek, The London School of Economics, and the Austrian approach to money and inflation.]
——. "Ludwig von Mises and The Extension of Subjectivism." In <i>Method</i> , <i>Process, and Austrian Economics: Essays in Honor of Ludwig von Mises</i> . Edited by Israel M. Kirzner. Lexington, Massachusetts & Toronto: Lexington Books, D.C. Heath and Company, 1982, pp. 31–40.
Lakatos, I. "Popper on Demarcation and Induction." In P.A. Schilpp (ed.) <i>The Philosophy of Karl Popper</i> . LaSalle, Illinois; 1973, pp. 241–273.
Lavoie, Don. "A Critique of the Standard Account of the Socialist Calculation Debate." <i>The Journal of Libertarian Studies</i> 5, no. 1 (Winter 1981): 4–87.
"The Market as a Procedure for the Discovery and Convergence of Inarticulate Knowledge." Paper presented at The Liberty Fund Conference on Thomas Sowell's <i>Knowledge and Decisions</i> . Savannah, Georgia; April 1982.
[See Literature of Liberty 5 (Summer 1982): 60, for a summary of Lavoie's paper.]
——. "Rivalry and Central Planning: A Reexamination of the Debate over Economic Calculation under Socialism." Ph.D. Dissertation, New York University, 1982.

Leduc, G. "En rélisant von Hayek." *Revue d'Economie Politique* 86 (1976): 491–494. ["Rereading von Hayek."]

Leoni, Bruno. Freedom and the Law. Princeton, New Jersey: D. Van Nostrand, 1961.

Lepage, Henri. "Hayek ou l'économie politique de la liberté." ["Hayek or the Political Economy of Liberty"]. Part 6 of *Demain le libéralism* ["Tomorrow Liberalism"]. Paris: Le Livre de Poche (8358L), Collection *Pluriel*, 1980, pp. 409–453.

[Lepage, author of the influential *Tomorrow, Capitalism*, surveys the scholarly achievements of Hayek, covering the Austrian School of Economics, Hayek's theory of the business cycle, his rivalry with Keynes, the value of liberty, the Road to Serfdom, and Hayek's "Grand Synthesis" (*Law, Legislation and Liberty*). The article is sprinkled by anecdotes culled from a long interview with Hayek in February 1979.]

Letwin, Shirley Robin. "The Achievements of Friedrich A. Hayek." In Fritz Machlup, ed. *Essays on Hayek*. New York: New York University Press, 1976, pp. 147–162.

Leube, Kurt R. "Friedrich A. von Hayek—Nobelpreis für Wirtschaftswissenschaften." (University of Salzburg Research Papers, 1974). ["Friedrich A. von Hayek—Nobel Prize for Economic Science."] —. "F.A. von Hayek. Zu sienem 75. Geburtstag." Salzburger Nachrichten 1975. ["F.A. von Hayek. On His 75th Birthday."] the University of Salzburg, 1975). ["Inflation Theory in Hayek and Keynes."] —. "Vorwort und Bibliographie zur Wiederauflage F.A. Hayek: Geldtheorie und Konjunkturtheorie. Salzburg, 1975. ["Foreward and Bibliography to the Second (German) Edition of F.A. Hayek, *Geldtheorie*," (B-1).] —. "Ausgewählte Bibliographie zur Wiederauflage F.A. Hayek: *Preise und* Produktion." Vienna, 1975. ["Selected Bibliography to the Second (German) Edition of F.A. Hayek's *Prices and Production*," (B-2).] —. "Hayek's Perception of the 'Rule of Law'." *The Intercollegiate Review* (Winter 1976/1977). —. "Bibliographischer Anhang." In F.A. Hayek, Geldtheorie und Konjunkturtheorie. Salzburg: 2. erw. Aufl., 1976, pp. 148–160. [Kurt Leube was from 1969–1977 Hayek's Research Assistant and associate at the University of Salzburg. He currently is Managing Co-editor with Albert Zlabinger of The International Carl Menger Library, Philosophia-Verlag, and is working on a life of Eugen von Böhm-Bawerk. He has written and lectured extensively on Hayek and The Austrian School of Economics. The "Bibliographical Appendix" in this entry on the German reprinting of Hayek's Geldtheorie (B-1), is but one of an extensive number of scholarly and bibliographic contributions by Leube on Hayek. In subsequent editions of the present *Bibliography* we will cite the extensive writings by Leube.] —. "Bibliographisches Nachwort zur Wiederauflage F.A. Hayek:" Individualismus und wirtschaftliche Ordnung. (Salzburg 1977). ["Bibliographical Afterword to the Second (German) Edition of F.A. Hayek: (B-7)."] —. "Böhm-Bawerk, Wieser und Hayek." (Unpublished paper presented in Bonn, 1977.)

——. "Wer sind die 'Austrians'." Wirtschaftspolitsche Blatter, 1978. ["Who Are the 'Austrians'."]

——. "Ökonom und Philosoph: Zum 80. Geburtstag des grossen Österreichers Friedrich A. von Hayek." Die Industrie 19 (1979).

["Economist and Philosopher: On the 80th Birthday of the Austrian Friedrich A. von Hayek."]

——. "F.A. Hayek—Zum 80. Geburtstag." Zeitschrift für das gesamte Kreditwesen. Frankfurt/M. 1979.

["F.A. Hayek—On His 80th Birthday."]

——. "Hayek und die österr. Schule der Nationalökonomie." Bayern Kurier, Munich 1979. ["Hayek and the Austrian School of Economics."]

Liggio, Leonard P. "Hayek—An Overview." Unpublished paper presented to The Carl Menger Society Conference entitled "Hayek—An Introductory Course," London, December 6, 1980.

[See also contributions at this conference by Pirie, Ebeling, Steele, Graham Smith, and Shearmur. The edited papers, in the possession of Laurie Rantala, may be published.]

Lippincott, Benjamin E., ed. *On the Economic Theory of Socialism*. New York: Augustus M. Kelley, 1970.

Loenen, J.H.M.M. "The Concept of Freedom in Berlin and Others: An Attempt at Clarification." *The Journal of Value Inquiry* 10 (Winter 1976): 279–285.

Lutz, Friedrich A. "Professor Hayek's Theory of Interest." *Economica* 10 (1943): 302–310.

——. "On Neutral Money." In *Roads to Freedom: Essays in Honour of Friedrich A. von Hayek*. Edited by Erich Streissler *et. al.* London: Routledge & Kegan Paul, 1969, pp. 105–116.

Lynch, Thomas E. "Toward a Rational Political Philosophy: An Essay on the Origins of Hayek's Liberal Radicalism." B.A. Honors Thesis for The Degree in Political Economy. Williamstown, Massachusetts; Williams College, January, 1981, 72 pp. [Available at the Institute for Humane Studies, Menlo Park, CA 94025.]

McClain, Stephen Michael. "The Political Thought of the Austrian School of Economics." The Johns Hopkins University Ph.D. Dissertation. Baltimore, 1979.

[McClain's premise is that "the Austrian School, through the writings of Ludwig von Mises and Friedrich von Hayek, explicitly and comprehensively fashioned a political theory for capitalism." Chapters on Hayek cover his political thought, concept of

liberty, limits of knowledge and the spontaneous order, the rule of law, and constitutionalism.]

Macfie, A.L. Theories of the Trade Cycle. London: Macmillan, 1934.

[Deals with Hayek's *Geldtheorie und Konjunkturtheorie* (B-1) and *Preise und Produktion* (B-2) on pp. 45–87.]

Machlup, Fritz. "Liberalism and the Choice of Freedom." In *Roads to Freedom: Essays in Honour of Friedrich A. von Hayek*. Edited by Erich Streissler *et.al.*: London: Routledge & Kegan Paul, 1969, pp. 117–146.

[Machlup has been a close personal and intellectual friend of Hayek's since the early 1920s.]

——. "Friedrich von Hayek's Contribution to Economics." *The Swedish Journal of Economics* 76 (December 1974): 498–531.

[Reprinted in revised, updated form as "Hayek's Contribution to Economics" in Machlup's *Essays on Hayek* (1976).]

——. "Friedrich von Hayek on Scientific and Scientistic Attitudes." *The Swedish Journal of Economics* 76 (1974).

[Reprinted in Machlup, *Methodology of Economics and Other Social Sciences*. New York and London, 1978, pp. 513–519.]

——. Würdigung der Werke von Friedrich August von Hayek. Tübingen: Walter Eucken Institut (Vorträge und Aufsätze, Heft 62), 1977, pp. 63–75.

["Assessment of the Works of Friedrich August von Hayek."]

Mackie, J.L. *Ethics: Inventing Right and Wrong* London: Penguin Books, 1977, pp. 83–102.

Maling, Charles E. "Austrian Business Cycle Theory and Its Implications." *Reason Papers* No. 2 (Fall 1975): 65–90.

Marget, Arthur W. "Review of Friedrich A. Hayek, *Prices and Production and Preise und Produktion." Journal of Political Economy* 40 (April 1932): 261–266.

Matis, H. Osterreichs Wirtschaft 1848–1913. ["Austria's Economy, 1848–1913."] Berlin, 1972.

——. "Sozioökonomische Aspekte des Liberalismus in Osterreich 1848–1918." ["Socio-economic Aspects of Liberalism in Austria, 1848–1918."] In H.-U. Wehler, ed. *Sozialgeschichte Heute*. Göttingen, 1974.

May, Arthur. *Vienna in the Age of Franz Josef*. Norman: University of Oklahoma Press, 1966.

[See especially Chapter 3, "The Kingdom of Learning," and Chapter 7, "Science and Scholarship."]

Melis, R. "Rettifiche al neutralismo economico." Il Politico 16 (1951) 275–284.

["Alterations in Economic Neutrality."]

Meyer, Fritz W. et. al, eds. Zur Verfassung der Freiheit: Festgabe für Friedrich A. von Hayek zur Vollendung seines achtzigsten Lebensjahres. Stuttgart, New York: Gustav Fischer Verlag. (Ordo: Jahrbuch für die Ordnung von Wirtschaft und Gesellschaft, vol. 30), 1979.

["On the Constitution of Liberty: A Gift for Friedrich A. von Hayek on the Completion of his 80th Year." This Festschift honoring Hayek contains contributions from Karl Popper, Chiaki Nishiyama, George J. Stigler, Ludwig M. Lachmann, Charles K. Rowley, Arthur Seldon, Christian Watrin, Israel Kirzner, James M. Buchanan, Milton Friedman, and others.]

Milgate, M. "On the Origin of the Notion of 'Intertemporal Equilibrium'." *Economica* 46 (Fall 1979).

[Cf. Hayek, A-6.]

Miller, David. "Review of Law, Legislation and Liberty, Vol. II: The Mirage of Social Justice." British Journal of Law and Society 4 (Summer 1977): 142–145.

Miller, Eugene F. "Hayek's Critique of Reason." *Modern Age* 20, no. 4 (Fall 1976): 383–394.

——. "The Cognitive Basis of Hayek's Political Thought." In Robert L. Cunningham *Liberty and the Rule of Law*. College Station and London: Texas A & M University Press, 1979. pp. 242–267.

Miller, Robert. "Hayek, the Inter-War Years and the Gold Standard." Unpublished paper presented to The Carl Menger Society, June 10, 1978.

Minard, Lawrence. "Wave of the Past? Or Wave of the Future?" *Forbes* (October 1, 1979): 45–50, 52

[Profile on Hayek with painting of Hayek featured in the cover of this issue of *Forbes*. This painting is now at the Heritage Foundation in Washington, D.C.]

Molsberger, G. "Grundsätzliches über Freiheit, Ordnung und Wettbewerb." In *Ordo*, Jahrbuch 24 (1973): 315–325.

["Basic Principle of Freedom, Order and Competition."]

Market Books, 1978.

Morrell, Stephen O. "In Search of a New Monetary Order: An Open Discussion on Aspects of a Freely Competitive Monetary Arrangement." *Institute Scholar* (Publication of the Institute for Humane Studies) 1, no. 1, (1980): 1–2.

Morris, M.W. "The Political Thought of F.A. Hayek." *Political Studies* 2 (1972): 169–184.

Moss, Lawrence S., ed. *The Economics of Ludwig von Mises: Toward a Critical Reappraisal*. Kansas City: Sheed and Ward, Inc., 1976.

[This volume resulted from the Symposium on the Economics of Ludwig von Mises, Atlanta, Georgia, November 5, 1974 to assess the recently deceased Mises' (Sept. 29, 1881-Oct. 10, 1973) contributions to economic and social thought. Among the interesting essays included in this volume are Fritz Machlup's "The Monetary Economics of Ludwig von Mises" and Israel M. Kirzner's "Ludwig von Mises and Economic Calculation under Socialism." Since Hayek's life and writings are intimately connected with those of von Mises, this volume offers a valuable research tool in Fritz Machlup's two *Appendices* on Mises: "Chronology" and "Major Translated Writings of Ludwig von Mises."]

Murray, A.H. "Professor Hayek's Philosophy." *Economica* 12 (August 1945): 149–162

Nawroth, E.E. *Die Sozial-und Wirtschaftsphilosophie des Neoliberalismus*. Heidelberg: Kerle and Lowen: Nauwelaerts, 1961.

["The Social and Economic Philosophy of Neoliberalism."]

Nishiyama, Chiaki. "The Theory of Self-Love. An Essay on the Methodology of the Social Sciences, and Especially of Economics, with Special Reference to Bernard Mandeville." University of Chicago Ph.D. Dissertation, 1960.

[Nishiyama's dissertation was done under Hayek's supervision. From 1950–1962

Hayek was professor of social and moral science in the Committee of Social Thought headed by John U. Nef at the University of Chicago. 1960 also saw the publication of Hayek's B-12.] ———. "Hayek's Theory of Sensory Order and the Methodology of the Social Sciences." The Journal of Applied Sociology 7 (Tokyo 1964). ———. "Revival of the Philosophy of Economics: A Critique of Hayek's System of Liberty." The Economics Studies Quarterly 15, no. 2. (Tokyo 1965). —. "Arguments for the Principles of Liberty and the Philosophy of Science." Il Politico 32 (June 1967): 336-347. [Commentary on and response to Hayek, A-115.] Festgabe für Friedrich A. von Hayek zur Vollendung seines achtzigsten Lebensjahres. Edited by Fritz W. Meyer et.al. Stuttgart, New York: Gustav Fischer Verlag (Ordo 30) 1979, pp. 21–42. —. Human Capitalism. A Presidential Lecture delivered at the 1981 Stockholm Regional Meeting of The Mont Pélèrin Society, August 30, 1981. Hoover Institution, Stanford University, 1982, 33 pp. Nozick, Robert. Anarchy, State, and Utopia. New York: Basic Books, 1974.

O'Driscoll, Jr. Gerald P. "Hayek and Keynes: A Retrospective Assessment." Iowa

Oakeshott, Michael. Rationalism in Politics. London: Methuen, 1962.

—. "On Austrian Methodology." *Synthese* 36 (1977): 353–392.

State University Department of Economics Staff Paper No. 20. Ames, Iowa: Xerox 1975. [Paper prepared for the Symposium on Austrian Economics, University of Hartford, June 22–28, 1975.]

———. "Comments on Professor Machlup's Paper." Unpublished manuscript presented at a special regional meeting of the Mont Pélèrin Society, held August 24–28, 1975, at Hillsdale College in Hillsdale, Michigan.

[The quasi-Festschrift volume (*Essays on Hayek*. Edited by Fritz Machlup. New York: New York University Press, 1975) was a product of the Hillsdale Mont Pélèrin meeting and included the important Fritz Machlup bibliographical essay (in revised form) to which Prof. O'Driscoll alludes in his title. O'Driscoll's comments in this unpublished manuscript assess Hayek's contributions to economic and social theory.]

——. "Spontaneous Order and the Coordination of Economic Activities." *The Journal of Libertarian Studies* 1, no. 2 (Spring 1977): 137–151.

——. Economics as a Coordination Problem: The Contributions of Friedrich A. Hayek with a foreward by F.A. Hayek. Kansas City: Sheed Andrews & McMeel, 1977.

——. "Frank A. Fetter and 'Austrian' Business Cycle Theory." *History of Political Economy* 12, 4 (1980): 542–557.

O'Driscoll, Gerald P. and Rizzo, Mario J. "What Is Austrian Economics?" Presented at The American Economic Association meetings in Denver, October 1980, 70 pp. [A revised and enlarged version will be forthcoming as a book: Oxford: Basil Blackwell, 1983, to be entitled *The Economics of Time and Ignorance*.]

O'Neill, John, ed. *Modes of Individualism and Collectivism*. London: Heinemann, 1973. [A wide-ranging anthology of articles, including Hayek's "Scientism and the Study of Society" (A-46), sections from Karl Popper's *The Poverty of Historicism* (1961), etc. The O'Neill anthology presents the methodological debate in the social sciences over scientism and the confrontation between methodological individualism and its opponents. Contains a valuable bibliography on these issues, pp. 339–346. See also Jeffrey Paul (1974).]

Palmer, G.G.D. "The Rate of Interest in the Trade Cycle Theories of Prof. Hayek." *The South African Journal of Economics* 23 (1955): 1–18.

Pasour, Jr., E.C. "Cost and Choice—Austrians vs. Conventional Views." *The Journal of Libertarian Studies* (Winter 1978): 327–336.

Paul, Jeffrey Elliott. "Individualism, Holism, and Human: An Investigation into Social Scientific Methodology." Brandeis University (Department of Philosophy) Ph.D. Dissertation [74–16, 832] 1974.

[See also John O'Neill, ed. (1973).]

Peel, J.D.Y. *Herbert Spencer: The Evolution of a Sociologist*. London: Heinemann, 1971.

Pigou, A.C. "Maintaining Capital Intact, on F.A. von Hayek: The Pure Theory of Capital." *Economica* 8 (1941): 271–275.

Pirie, Madsen. "Hayek—An Introduction." Unpublished paper presented to The Carl Menger Society Conference entitled "Hayek—An Introductory Course," London, December 6, 1980.

Plant, Sir Arnold. "A Tribute to Hayek—The Rational Persuader." *Economic Age* 2, no. 2 (Jan.-Feb. 1970): 4–8.

Polanyi, Michael. "The Determinants of Social Action." In *Roads to Freedom: Essays in Honour of Friedrich A. von Hayek*. Edited by Erich Streissler *et.al*. London: Routledge & Kegan Paul, 1969, pp. 145–179.

[A paper on the polycentric self-regulating processes of the spontaneous order vs. central planning. Polanyi was the first to coin the term 'spontaneous order' and originally presented the present essay at the University of Chicago in 1950, the year in which Hayek joined the Committee on Social Thought at the University of Chicago. See also Polanyi's *The Logic of Liberty*. London and Chicago, 1951.]

Quine, W.V. Ontological Relativity. New York, 1969.

Raico, Ralph. "A Libertarian Maestro." *The Alternative: An American Spectator* 8, no. 8 (May 1975): 21–23.

[Analysis of Hayek.]

Ranulf, Sv. "On the Survival Chances of Democracy." Aarhus (Universitetsforlaget). Copenhagen: Munksgaard, 1948.

Raz, Joseph. "The Rule of Law and Its Virtues." *Law Quarterly Review* 93 (April, 1977): 185–211.

[Reprinted in Cunningham (1979), pp. 3–21.]

Reekie, W. Duncan. *Industry, Prices and Markets*. Oxford: Philip Allan Publishers, Ltd. 1979. American Publisher, John Wiley, 1979.

Rees, J.C. "Hayek on Liberty." *Philosophy* (1961).

Rhees, Rush. Without Answers. London: Routledge & Kegan Paul, 1969.

Rizzo, Mario J. *Time, Uncertainty and Equilibrium—Explorations on Austrian Themes*. Lexington, Mass.: Heath and Co., 1979.

Robbins, Lionel. "Hayek on Liberty." *Economica* (February 1961): 66–81. [Cf. following version of this article.]

. "Hayek on Liberty." *Economics and Politics*. London: Macmillan, 1963.

[Cf. preceding version of this article.]

. Autobiography of an Economist. London: Macmillan & Co., 1971.
Roberts, Paul Craig. <i>Alienation in the Soviet Economy</i> . Albuquerque: University of New Mexico Press, 1971.
Robertson, David J. "Why I Am a Conservative." Unpublished paper presented to The Carl Menger Society, March 11, 1978.
A critique of Hayek's "Why I am not a Conservative."]
Roche III, George C. "The Relevance of Friedrich A. Hayek." In Fritz Machlup, ed., <i>Essays on Hayek</i> . New York: New York University Press, 1976, 1–12.
Rothbard, Murray N. Man, Economy and State. Princeton, N.J.: D. Van Nostrand, 962.
. "Money, The State and Modern Mercantilism." <i>Modern Age</i> (Summer 1963) 279–289.
. "Von Mises, Ludwig." In <i>International Encyclopedia of the Social Sciences</i> . Edited by David L. Sills. New York: The Macmillan Company & The Free Press, 968, 1972, vol. 15, 16, 17, pp. 379–382.
——. "Conservatives Gratified by Nobel Prize to Von Hayek." <i>Human Events</i> November 16, 1974).
. "The Austrian Theory of Money." In Edwin G. Dolan (ed.) <i>The Foundations of Modern Austrian Economics</i> . Kansas City: Sheed & Ward, 1976, pp. 160–184.
. "The New Deal and The International Monetary System." In <i>Watershed of Empire: Essays on New Deal Foreign Policy</i> . Edited by Leonard P. Liggio and James Martin. With a Preface by Felix Morley. Colorado Springs: Ralph Myles, Publisher 976, pp. 19–64.
. "Inflation and the Business Cycle: The Collapse of the Keynesian Paradigm." in <i>For a New Liberty</i> . New York: Collier Macmillan, 1978, pp. 171–193.
. What Has Government Done to Our Money? Novato, California: Libertarian Publishers, 1978.

[See following citation.]

——. "F.A. Hayek and the Concept of Coercion." In *The Ethics of Liberty*. Atlantic Highlands, N.J.: Humanities Press 1981. Chapter 28.

[See preceding citation for original publication of this essay.]

——. "The Laissez-Faire Radical: A Quest for the Historical Mises." *The Journal of Libertarian Studies* 5, no. 3 (Summer 1981): 237–254.

Roy, Subroto. "On Liberty and Economic Growth: Preface to a Philosophy for India." Cambridge University Ph.D. Dissertation, 1982.

Rueff, Jacques. "Laudatio: Un Message pour le siècle." In Erich Streissler *et al.*, eds. *Roads to Freedom: Essays in Honour of Friedrich A. von Hayek*. London: Routledge & Kegan Paul, 1969, pp. 1–3.

[Tribute to Hayek's intellectual achievements: "Laudatio: a Message for the Age," presented for the Hayek 70th birthday Festschrift.]

Rupp, Hanns Heinrich. "Zweikammersystem und Bundesverfassungsgericht. Bermerkungen zu einem verfassungspolitischen Reformvorschlag F.A. von Hayeks." In *Zur Verfassung der Freiheit: Festgabe für Friedrich A. von Hayek zur Vollendung seines achtzigsten Libensjahres*. Stuttgart, New York: Gustav Fischer Verlag, 1979, pp. 95–104.

["A Two-Chamber System and the Federal Constitutional Court—Notes on a Proposition of F.A. von Hayek for a Constitutional Reform."]

Ryle, Gilbert. "Knowing How and Knowing That." *Proceedings on the Aristotelian Society* 46, (1945/1946): 1–16.

Sabrin, Murray and Corbin, Peter B. (American Geographical Society.) "Geographical Implications of Austrian Trade-Cycle Theory: An Analysis of the U.S. Economy, 1947–1972." A Preliminary Report to the Fred C. Koch Foundation. Wichita, Kansas (February 1976), 68 pp.

[Empirical studies testing Austrian trade cycle theory, accompanied by computer graphic print-out. See Corbin. Available at the Institute for Humane Studies.]

Sacristan, A. "Friedrich August von Hayek o el intento de romper con la neoclassica." In *Comercio Esterior* 25 (1975), pp. 193–195.

["Friedrich August von Hayek on the Intention of Breaking with Neoclassicism."]

Sampson, Geoffrey. "Nozick vs. Hayek; Retrospective vs. Anticipant Liberalism." Unpublished paper presented to The Carl Menger Society Conference on Nozick, Oct. 27, 1979.

Sarduski, W. "The Political Doctrine of Neoliberalism and the Problem of Democracy." *Panstwo i Prawo* 3 (1978): 90–100.

Saulnier, R.J. Contemporary Monetary Theory: Studies on Some Recent Theories of Money, Prices and Production. New York: Columbia University Press, 1938 and London: King, 1938.

Schorske, Carl E. *Fin-de-siècle Vienna, Politics and Culture*. New York: Basic Books, 1980. [See also Allan Janik and Stephen Toulmin, *Wittgenstein's Vienna* (1973); Arthur May, *Vienna in the Age of Franz Josef* (1966); and William Johnston, *The Austrian Mind: An Intellectual and Social History, 1848–1938*. Berkeley, Los Angeles, London: University of California Press, 1972.]

Schuller, A. "Konkurrenz der Wahrungen als geldwirtschaftliches Ordnungsprinzip." In *Wirtschaftspolitische Chronik* (Institut für Wirtschaftspolitik an der Universitat Koln) 26 (1977): 23–50.

["Concurrent Monetary Standards as an Ordering Principle of Monetary Economics."]

Schumpeter, Joseph. *Capitalism, Socialism and Democracy*. London: Unwin, 1974. New York: Harper and Row, 1950.

——. *History of Economic Analysis*. Edited from manuscript by Elizabeth Boody Schumpeter. New York: Oxford University Press, 1954, 1966.

Scott, K.J. "Methodological and Epistemological Individualism." *The British Journal of the Philosophy of Science* 2 (1960/1961).

Seldon, Arthur. "Hayek on Liberty and Liberalism." *Contemporary Review* 200 (1961): 399–406.

———, ed. "Philosophy" *Agenda for a Free Society: Essays on Hayek's The Constitution of Liberty*. London: Published for the Institute of Economic Affairs by Hutchinson, 1961.

Seligman, Ben B. *Main Currents in Modern Economics: Economic Thought Since* 1870. New York: The Free Press of Glencoe, 1962.

Sennholz, Hans F. "Chicago Monetary Tradition in the Light of Austrian Theory." *Reason* 3, no. 7 (October 1971): 24–30.

Shackle, G.L.S. *Epistemics and Economics: A Critique of Economic Doctrines*. Cambridge: Cambridge University Press, 1972, 1976.

Shearmur, Jeremy. "Hayek, Smith (and Hume)." Unpublished manuscript of paper presented at one-day Conference on Hayek at University College, London, October 28, 1978, and sponsored by The Carl Menger Society.

——. "Libertarianism and Conservatism in the Work of F.A. von Hayek." Unpublished manuscript; lecture originally presented to the Carl Menger Society in London, 1976.
——. "Menger, Hayek & Methodological Individualism." Unpublished paper presented to The Carl Menger Society, February 11, 1978.
——. "Abstract Institutions in an Open Society." In H. Berghel and others, eds. <i>Wittgenstein, The Vienna Circle and Critical Materialism</i> . Vienna: Hölder-Richler-Tempsky, 1979, pp. 349–354.
——. "Hayek and the Invisible Hand." Unpublished paper presented to the Seminar for Austro-German Philosophy at Carl Menger joint conference on Austrian Philosophy & Austrian Politics, London, April 26, 1980.
——. "Hayek on Politics." Unpublished paper presented to The Carl Menger Society conference entitled "Hayek—An Introductory Course," London, Dec. 6, 1980.
——. "Hayek on Law." Unpublished paper presented to The Carl Menger Society Conference on Hayek, London, October 30, 1982.
——. Adam Smith's Second Thoughts. (pamphlet). London: Adam Smith Club, 1982.
——. "The Austrian Connection: F.A. Hayek and the Thought of Carl Menger." In B. Smith and W. Grassl, eds. <i>Austrian Philosophy and Austrian Politics</i> . Munich: Philosophia Verlag, forthcoming (1982–1983).
Shenfield, Arthur. "Scientism and the Study of Society." In Fritz Machlup, ed. <i>Essays on Hayek</i> . New York: New York University Press, 1976, 61–72.
——. "Friedrich A. Hayek: Nobel Prizewinner." In Fritz Machlup, ed., <i>Essays on Hayek</i> . New York: New York University Press, 1976, pp. 171–176.
"The New Thought of F.A. Hayek." Modern Age 20 (Winter 1976): 54–61.
Shenoy, Sudha R. "Introduction: The Debate, 1931–71." in F.A. Hayek, <i>A Tiger by the Tail: The Keynesian Legacy of Inflation</i> . Compiled and Introduced by Sudha Shenoy.
London: The Institute of Economic Affairs, 1972, pp. 1–12.
Shibata, K. A Dynamic Theory of World Capitalism, 2nd edition. Kyoto: Sanwa

Silverman, Paul. "Law and Economics in Interwar Vienna: Kelsen, Mises, and the Geistkreis." University of Chicago Dissertation.

Shobo, September 1954.

——. "Science and Liberalism in Interwar Vienna: The Mises and Vienna Circles." Paper prepared for the Liberty Fund Seminar on Austrian Economics and its Historical and Philosophical Background, Graz, Austria. July 28–31, 1980, 53 pp. Available at the Institute for Humane Studies, Menlo Park, CA 94025. [This Conference had contributions by Israel Kirzner, Ludwig Lachmann, Carl Schorshe, and other.]

Simson, W. von "Zu F.A. Hayeks verfassungsrechtlichen Ideen." *Der Staat, Zeitschrift für Staatslehre, Offentliches Recht un Verfassungeschichte*. Berlin 18, no. 3, (1979): 403–421.

["On F.A. Hayek's Ideas of Constitutional Justice."]

Smith, Graham. "Hayek on Law." Unpublished paper presented to The Carl Menger Society conference entitled "Hayek—An Introductory Course," London, Dec. 6, 1980.

Sowell, Thomas. Knowledge and Decisions. New York: Basic Books, 1980.

Spadero, Louis M. ed. *New Directions in Austrian Economics*. Kansas City: Sheed Andrews & McMeel, 1978.

Spencer, Roger W. "Inflation, Unemployment and Hayek." *Review* (Federal Reserve Bank of St. Louis.) 57 (1975): 6–10.

Spiegel, Henry William. *The Growth of Economic Thought*. Chapter 23: "The Austrian School Accent on Utility."

[Also note Spiegel's valuable annotated *Bibliography*.]

Sraffa, Piero. "Dr. Hayek on Money and Capital [on F.A. von Hayek's *Prices and Production*] London 1931." *The Economic Journal* 42 (1932): 42–53, 249–251.

Stadler, M. "Vollbeschaftigung um jeden Preis?" Wirtschaft und Gesellschaft 3 (1978).

["Full Employment at any Price?"]

Steedman, Ian. "On Some Concepts of Rationality in Economics." No date, 27 pp.

[Deals with Hayek's notion of economic rationality and cites Hayek's (A-34) and (A-46). Available at the Institute for Humane Studies.]

Steele, David Ramsey. "Spontaneous Order and Traditionalism in Hayek." Expanded version of a paper delivered to The Colloquium on Austrian Philosophy and Austrian Politics, organized jointly by The Seminar for Austro-German Philosophy & The Carl Menger Society, at The Institute of Contemporary Arts, London, April 26–27, 1980, 75 pp. (Available at the Institute for Humane Studies.)

——. "Hayek on Socialism." Unpublished paper presented to The Carl Menger Society Conference entitled "Hayek—An Introductory Course," London, Dec. 6, 1980.

——. "Posing The Problem: The Impossibility of Economic Calculation under Socialism." *The Journal of Libertarian Studies*. 5, no. 1 (Winter 1981): 7–22.

Steiner, Hillel. "Hayek and Liberty." Unpublished paper presented to The Carl Menger Society Conference on Hayek, Oct. 28, 1978.

Stewart, William P. "Methodological Individualism: A Commentary on F.A. von Hayek." Unpublished paper presented at the First Libertarian Scholars Conference. New York, September 23–24, 1972.

Stigler, George J. "The Development of Utility Theory." *Journal of Political Economy* 58 (1950): 307–327, 372–396.

Streeten, P. "Principles and Problems of a Liberal Order of the Economy." *Weltwirtschaftliches Archiv* 104 (1970): 1–5.

Streissler, Erich et al. eds. Roads to Freedom: Essays in Honour of Friedrich A. von Hayek. London: Routledge & Kegan Paul, 1969.

[This Festschrift of "honorary essays" presented to Hayek on his 70th birthday includes essays by Streissler, Jacques Rueff, Peter T. Bauer, James M. Buchanan, Gottfried Haberler, George N. Halm, Ludwig M. Lachmann, Friedrich A. Lutz, Fritz Machlup, Frank W. Paish, Michael Polanyi, Karl R. Popper, Günter Schmölders, and Gordon Tulloch. This Festschrift also contains the first extensive Hayek bibliography, pp. 309–315, composed in the early months of 1969. Streissler's own contributions in *Roads to Freedom* include a useful "Introduction" to Hayek's life and writings and the essay "Hayek on Growth: A Reconsideration of His Early Theoretical Work," pp. 245–285.]

———, ed. "Bibliography of the Writings of Friedrich A. von Hayek." *Roads to Freedom: Essays in Honour of Friedrich A. von Hayek.* London: Routledge & Kegan Paul, 1969, pp. 309–315.

[This bibliography is the earliest of the extensive Hayek bibliographies, presented as part of a Festschrift to Hayek on his 70th birthday. See previous citation.]

Streissler, Erich and Watrin, Christian, eds. with the collaboration of Monika Streissler. *Zur Theorie marktwirtschaftlicher Ordnungen*. Tübingen: J.C.B. Mohr (Paul Siebeck), 1980.

["On the Theory of Market Economic Orders." Twelve articles and 9 commentaries on the philosophical, evolution-theoretical, economic and social dimensions of market-economic thought.]

Swan, George Steven. "The Libertarian Future: Biologically Impossible?" *Individual Liberty* (Newsletter of The Society for Individual Liberty) 12 (November 1981): 4–5.

[Commentary on Hayek's P-19.]

Taylor, Fred M. "The Guidance of Production in a Socialist State." Benjamin E. Lippincott (ed.) *On The Economic Theory of Socialism*. New York: Augustus M. Kelley, 1970.

Taylor, Jr., Thomas Cullom. "Accounting Theory in the Light of Austrian Economic Analysis." The Louisiana State University and Agricultural and Mechanical College. (Accounting) Ph.D. Dissertation, [70–18, 565], 1970

Taylor, Thomas C. *The Fundamentals of Austrian Economics*. London: Published by the Adam Smith Institute in association with The Carl Menger Society, 1980, 2nd edition. (First published by the Cato Institute.)

Torrance, J. "The Emergence of Sociology in Austria, 1885–1935." *Archives Européennes de Sociologie* 17 (1976).

Torrence, Thomas. "Hayek's Critique of Social Injustice." Unpublished paper presented to The Carl Menger Society Conference on Hayek, October 28, 1978.

Tsiang, S. Ch. "The Variations of Real Wages and Profit Margins in Relation to the Trade Cycle." Dissertation. London: Pittman, 1947.

Ullmann-Margalit, Edna. "Invisible Hand Explanations." *Synthese* 30 (1978): 263–281. [See Vernon (1979) and Barry (1982).]

Vaughn, Karen I. "Does It Matter That Costs are Subjective?" *Southern Economic Journal* (Summer 1980): 702–715.

Vernon, R. "The 'Great Society' and the 'Open Society': Liberalism in Hayek and Popper." *Canadian Journal of Political Science* 9 (June 1976).

——. "Unintended Consequences." *Political Theory* 7 (1979): 57–74.

Viner, Jacob. "Hayek on Freedom and Coercion." *Southern Economic Journal* 27 (January 1961): 230–236.

Walter Eucken Institut (Mohr, J.C.B. & Siebeck, P.). "Bibliographie der Schriften von F.A. von Hayek." In *Freiburger Studien, Gesammelte Aufsätze, Wirtschaftswissenschaftliche und wirtschaftsrechtliche Untersuchungen* 5, Tübingen: Walter Eucken Institut, 1969, pp. 279–284.

Weber, Wilhelm. "Wirtschaftswissenschaft und Wirtschaftspolitik in Österreich, 1848–1948." ["Economic Science Economics Policy in Austria, 1848–1948."] In Hans Mayer, ed. *Hundert Jahre österreichischer Wirtschaftsentwicklung, 1848–1948*. Vienna: Springer, 1949, pp. 624–678.

Weiler, Gershon. *Mauthner's Critique of Language*. Cambridge: Cambridge University Press, 1970.

[Also see Janik & Toulmin, Wittgenstein's Vienna.]

Weimer, W.B. and Palerma, D.S. (eds.) *Cognition and Symbolic Processes*, Vol. II. New York, 1978.

Welinder, C. "Hayek och 'Ricardo-effekten" In *Ekonomisk Tidsskrift* (Uppsala och Stockholm) 42 (1940): 33–39.

["Hayek on the 'Ricardo-Effect."]

White, Lawrence H. "Mises, Hayek, Hahn and The Market Process: Comment on Littlechild." In *Method, Process, and Austrian Economics: Essays in Honor of Ludwig von Mises*. Edited by Israel M. Kirzner. Lexington, Mass. & Toronto: Lexington-Books, D.C. Heath and Company, 1982, pp. 103–110.

Widmer, Kingsley. "Utopia and Liberty: Some Contemporary Issues Within Their Tradition." *Literature of Liberty* 4, no. 4 (Winter 1981): 5–62, especially pp. 8–10, with notes.

Wien-Claudi, F. *Austrian Theories of Capital, Interest and the Trade Cycle*. London: Nott: 1936.

Wieser, Friedrich Frieherr von. "The Austrian School and the Theory of Value." *Economic Journal* (England) (1891).

——. "The Theory of Value (A Reply to Professor Macvane)." *Annals of the American Academy of Political and Social Science* (1891).

——. *Social Economics*. Translated by A. Ford Himrichs. With a Preface by Wesley Clair Mitchell. New York: Adolphis Co., 1927. Reprinted New York: Augustus M. Kelley, 1967.

[In his preface, Mitchell refers to von Weiser's recent death (July 23, 1926) and to von Weiser's "pupil and friend, Dr. Friedrich A. von Hayek." The translator, Himrichs, states: "Dr. Friedrich A. von Hayek, a pupil and close friend of von Weiser, has read the proofs and submitted many suggestions."]

Wilde, Olga. "Bibliographie der wissenschaftlichen Veröffenlichungen von Friedrich von Hayek." In *Friedrich A. von Hayek*, edited by Erich Hoppmann. Baden—Baden: Nomos Verlagsgesellschaft, 1980, pp. 55–56.

["Bibliography of the Scholarly Publications of Friedrich A. von Hayek."]

Wilhelm, Morris M. "The Political Philosophy of Friedrich A. Hayek." Columbia University Ph.D. Dissertation in Political Science, New York, 1969. An article based

on this, in condensed form, appears as "The Political Thought of Friedrich A. Hayek," in *Political Studies* 20, no. 2 (June 1972): 169–184.

Willgerodt, H. "Liberalismus zwischen Spontaneitat und Gestaltung. Zu v. Hayek's gesammelten Aufsatzen." In *Zeitschrift für Wirtschafts-und Sozialwissenschaften*. Berlin 92, no. 4, (1972): 461–465.

["Liberalism between Spontaneity and Organization. On von Hayek's Collected Articles." Refers to B-14.]

Winch, Peter. "Nature and Convention." *Proceedings of the Aristotelian Society* 60 (1959–1960): 231–252. Reprinted as Chapter 3 of Winch's *Ethics and Action*. London: Routledge & Kegan Paul, 1976.

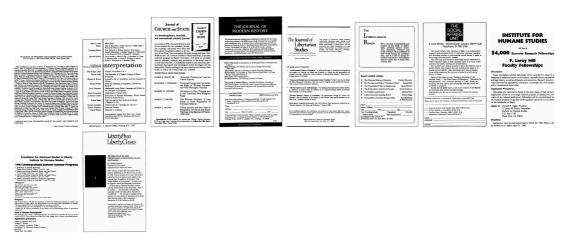
Winterberger, G. "Friedrich August von Hayek—Zum Achtzigsten Geburtstag des grossen Nationalökonomen, Stadts- und Rechtsphilosophen." *Schweizer Monatshefte* 5 (1979): 359–363.

["Friedrich August von Hayek: On the 80th Birthday of the Great Economist, Social Scientist, and Moral Philosopher."]

Wootton, B. Freedom Under Planning. London: Allen & Unwin, 1946.

Worsthorne, Peregrine. "F. A. Hayek: Next Construction for the Giant." In: *Prophets of Freedom and Enterprise*. Edited by Michael Ivens. London: Kogan Page, Ltd., for Aims of Industry, 1975. pp. 70–80.

Zöller, Michael. "Handeln in Ungewissheit. F.A. v. Hayek's Grundlegung einer freiheitlichen Sozialphilosphie." ["Acting under Uncertainty. F.A. von Hayek's Foundation of a Liberal Social Philosophy."] In *Zur Verfassung der Freiheit: Festgabe für Friedrich A. von Hayek zur Vollendung seines achtzigsten Lebensjahres*. Stuttgart, New York: Gustav Fischer Verlag (*Ordo* 30), 1979, pp. 117–129.



[1.] Henri Bergson, *Creative Evolution*, Arthur Mitchell (trans.), New York: Henry Holt and Company, 1911, p. 39.

- [2.] Edna Ullmann-Margalit, "Invisible Hand Explanations," *Synthese* 39 (1978), pp. 282–286.
- [3.] Henri Bergson, Creative Evolution, p. 37.
- [4.] Frederic Schick, "Self-Knowledge, Uncertainty and Choice," *British Journal for the Philosophy of Science* 30: 235–252.
- [5.] Henri Bergson, *Creative Evolution*, p. 39.
- [6.] Here the evolutionary theory is used to explain the *maintenance* rather than the *origin* of an order. Thus, an evolutionary principle like "survival of the fittest" presumably can explain the maintenance of certain eating customs.
- [7.] Henri Bergson, *Creative Evolution*, p. 28.
- [8.] James M. Buchanan, "Order Defined in the Process of its Emergence" *Literature of Liberty* [this issue].
- [9.]F. A. Hayek, "Degrees of Explanation," *Studies in Philosophy, Politics and Economics* Chicago: University of Chicago Press, 1967.
- [10.] John von Neumann and Oskar Morgenstern, *Theory of Games and Economic Behavior*, Princeton: Princeton University Press, 1947, p. 44.
- [1.] For a reconciliation of Hayek's theory of evolution and James M. Buchanan's contractarian approach see the impressive analysis of Victor Vanberg, *Liberaler Evolutionismus oder Vertragstheoretischer Konstitutionlismus*. Tübingen: Walter Eucken Institut (Vorträge und Aufsätze, Nr. 80) J.C.B. Mohr, 1981, ISBN 3–16–344411–3.
- [1.]Barry, p. 28, citing Smith's *Lectures on Jurisprudence*; note that this theme of the decline of all constitutions is found also in the work of Hutcheson.
- [2.]Cp., on all this, J.G.A. Pocock, *The Machiavellian Moment*, and, for some discussion of its relation to Smith, D. Winch, *Adam Smith's Politics*.
- [3.]See, on this, Jacob Viner's classic 'Adam Smith and Laissez-Faire,' and, for some brief discussion of the interpretation hinted at in this section, my pamphlet, *Adam Smith's Second Thoughts*, Adam Smith Club, London, 1982.
- [4.]Cp. my 'Abstract Institutions in an Open Society,' in *Wittgenstein, The Vienna Circle and Critical Rationalism*, ed. H. Berghel & Others, Hölder-Pichler-Tempsky, Vienna, 1979, pp. 349-54.
- [5.] See Hayek, 'Individualism True and False,' in *Individualism and Economic Order*, p. 32.
- [6.]Barry, p. 37.

- [7.]Barry, p. 37.
- [8.] See, for further references and discussion, and a fuller defence of the views advanced in this section, my 'The Austrian Connection: Carl Menger and the Thought of F.A. von Hayek,' in B. Smith and W. Grassl (eds) *Austrian Philosophy and Austrian Politics*, Philosophia Verlag, Munich, forthcoming.
- [9.] In which respect he is very close to Hayek's dismissal of 'false' individualism.
- [10.] Compare here, however, the contrasting claim made in E.F. Miller's most interesting 'The Cognitive Basis of Hayek's Political Thought,' in R.L. Cunningham (ed.) *Liberty and the Rule of Law*.
- [11.] Note the way in which the ideas in the *text* of the *Untersuchungen* and in Appendix VII are, at least prima facie, in contrast with one another.
- [12.] In this connection, one should look at Popper's 'Towards a Rational Theory of Tradition' in his *Conjectures and Refutations*, and its parallels with his ideas about 'background knowledge,' and the priority of 'dogmatism' over 'criticism' from a genetic point of view, as brought out in Popper's autobiography *Unended Quest*, rather than the more radical *Open Society*.
- [1a.] Hayek does not consistently employ the idea of spontaneous social order as an explanatory device of this sort, and some of the difficulties of his thought arise from this ambiguity. At the same time, Hayek's use of the idea of a spontaneous order in society is his most brilliant use in the context of social theory of his conception of knowledge as at bottom at once conceptual and practical. The spontaneous or undesigned patterns of order in society have the advantage over planned or constructed orders, first and foremost, because planned orders can utilize only explicit or conscious knowledge. Hayek's great thesis, then, is that, contrary to Descartes' unwitting interventionist disciples, spontaneous order is the fundamental order in society because it embodies that practical or tacit knowledge of which theory is only a precipitate or an abridgement. If we accept that the Cartesian view of knowledge and mind is in error, we have no alternative but to acknowledge that the constructivist projects of modern interventionism are all attempts to do the impossible—to replace inarticulate and tacit knowledge by articulate theory, and spontaneous order by conscious control.
- [1b.] F. A. Hayek, μB-10Õ, *The Sensory Order*, London: Routledge and Kegan Paul, 1952, pp. 4-5. *The Sensory Order* has not in fact gone wholly ignored by psychologists. For a useful symposium on it, see W. B. Weimer and D. S. Palermo, eds., *Cognition and Symbolic Processes*, vol. II, New York, 1978. Also "Hayek Revisited: Mind as a Process of Classification" by Rosemary Agnitto in *Behaviorism: a Forum for Critical Discussion*, ½, Nevada, (Spring 1975): 162-171. Neglect of Hayek's contributions to psychology by professional psychologists may in part be due to his drawing on a tradition in psychology—the neo-Kantian tradition of Helmholz and Wundt—which fell on hard times when behavioral and psychoanalytical approaches came to dominate the theoretical investigation of mental life.

- [2.] Hayek, µB-10Õ, *Sensory Order*, p. 5, para. 1.12. At times, Hayek goes so far as almost to relativize any distinction between appearance and reality. When he adopts such a position, he breaks with a decisive element in Kantian critical philosophy, for which the distinction between how things seem to us and how they are in themselves must be fundamental.
- [3.] Hayek, µB-10Õ, Sensory Order, p. 171, para. 8.24.
- [4.] Hayek, µB-10Õ, Sensory Order, p. 42, para. 2.15.
- [5.] Hayek, μB-10Õ, Sensory Order, p. 165, para. 8.2.
- [6.] Hayek, µB-10Õ, *Sensory Order*, p. 193, para. 8.93, and his µB-12Õ, *The Constitution of Liberty*, London: Routledge and Kegan Paul, 1960, pp. 13, 438. See Mach's influence on Hayek by consulting the bibliography to my essay: B-10 and A-119.
- [7.] Hayek, *Sensory Order*, µB-10Õ, pp. 178-9, para. 8.45. Hayek's affirmation of a practical dualism in the theory of the mind may well have been influenced by Mises, who adopts a very similar standpoint in several of his writings.
- [8.] Hayek, µB-10Õ, *Sensory Order*, p. 194, para. 8.97.
- [9.] Hayek, µB-10Õ, *Sensory Order*, p. 194, para. 8.97.
- [10.] See W. V. Quine, *Ontological Relativity*, New York: 1969. Unlike Hayek, Quine sees compelling reasons for postulating a realm of abstract entities, including numbers, but, like Hayek, he admits no ontological gulf between body and mind. Hayek's objection to the neutral monism defended by William James, Bertrand Russell, and John Dewey seems to be on the grounds of its psychologistic features as it is stated by these writers: see *Sensory Order*, p. 176, para. 8.38. Neutral monism need not have these features, however, and perhaps Hayek's system need not exclude it.
- [11.] See Hayek's interesting discussion of differences of method as between natural and social sciences in µE-5Õ, the collection which he edited: *Collectivist Economic Planning*, London: 1956 (originally published 1935), pp. 10-11. Hayek withdraws from the strong methodological dualism about natural and social science adopted here and in many of his earlier writings, explicitly in the Preface to his *Studies in Philosophy, Politics and Economics*, London: Routledge and Kegan Paul, 1967, p. viii, where he asserts that through Popper's work "the difference between the two groups of disciplines has thereby been greatly narrowed." For a brilliant discussion of Popper's demarcation criterion for science, see I. Lakatos, "Popper on Demarcation and Induction," in P. A. Schilpp, ed., *The Philosophy of Karl Popper*, La Salle, Illinois: 1974, pp. 241-273.
- [12.] See F. A. Hayek, "Kinds of Rationalism" in his µB-13Õ, *Studies in Philosophy, Politics and Economics*, Ch. 5, pp. 82-95, and his *Law, Legislation and Liberty*, Vol. I, London: Routledge and Kegan Paul, 1973, p. 29.

- [13.] Karl R. Popper in P. A. Schilpp, ed., *The Philosophy of Karl Popper*, pp. 1059-1060.
- [14.] J. W. N. Watkins in P. A. Schilpp, ed., *The Philosophy of Karl Popper*, pp. 401-402.
- [15.] Hayek, Sensory Order, µB-10Õ, p. 176, para. 8.39.
- [16a.] Hayek does cite Popper's ideas of a third world of abstract entities with apparent endorsement in µB-18Õ, *Law, Legislation and Liberty*, Vol. III, p. 157.
- [16b.] See Hayek's reminiscences, "Remembering My Cousin Ludwig Wittgenstein," *Encounter* (August 1977), listed as A-143 in *Bibliography*.
- [17.] I owe to Professor Hayek this information regarding his interest in Mauthner's work. Wittgenstein's reference to Mauthner occurs in para. 4.0031 of his *Tractatus Logico-Philosophicus*. The only book-length study of Mauthner's philosophy in English is that of Gershon Weiler, *Mauthner's Critique of Language*, Cambridge: Cambridge University Press, 1970. Also see Allan Janik and Stephen Toulmin, *Wittgenstein's Vienna*. New York: Simon and Schuster, 1973, pp. 121-133, 178-182.
- [18.] See F. A. Hayek, µB-17Õ, *New Studies in Philosophy, Politics and Economics*, London: Routledge and Kegan Paul, 1978, Chapter Six.
- [19a.] In attributing a pragmatist aspect to Hayek's Kantianism, I do not mean to ascribe to Hayek any of the doctrines of modern Pragmatism, but rather to note the sense in which for Hayek action or practice has primacy in the generation of knowledge. For Hayek, in some contrast with Kant, knowledge emanates from practical life in the sense that it is ultimately embodied in judgments and dispositions to act.
- [19b.] In his µB-13Õ, *Studies in Philosophy, Politics and Economics*, p. 24, speaking of "the erroneous belief that if we look only long enough, or at a sufficient number of instances of natural events, a pattern will always reveal itself," Hayek remarks that "in those cases the theorizing has been done already by our senses."
- [20.] See Gilbert Ryle, "Knowing How and Knowing That," *Proceedings of the Aristotelian Society* 46 (1945–1946): 1-16.
- [21.] See Michael Polanyi, *The Tacit Dimension*, London: Routledge and Kegan Paul, 1967.
- [22.] Michael Oakeshott, "Rational Conduct," in *Rationalism in Politics*, London: Methuen, 1962, pp. 97-100.
- [23.] Hayek, µB-13Õ, *Studies in Philosophy, Politics and Economics*, London: Routledge and Kegan Paul, 1967, pp. 60-62. Hayek's belief that the reflexive investigation of our own minds must always be incomplete, inasmuch as it will

- always be governed by meta-conscious rules beyond the range of critical scrutiny, is not one that Kant could easily have accepted.
- [24.] Hayek, μB-13Õ, *Studies*, p. 44, footnote 4.
- [25.] Hayek, µB-13Õ, *Studies*, Chapter 4.
- [26.] Hayek, μB-17Õ, *New Studies*, p. 45, footnote 14.
- [27.] Hayek, µB-16Õ, *Law, Legislation and Liberty*, Vol. II, London: Routledge and Kegan Paul, 1976, p. 25.
- [28.] I have in mind, of course, Popper's important criticism of holistic social engineering in Karl R. Popper, *The Poverty of Historicism*, London: Routledge and Kegan Paul, 1972, pp. 83-93.
- [29.] Hayek goes so far as to assert that "the idea of a mind fully explaining itself involves a logical contradiction." See µB-13Õ, *Studies*, p. 34.
- [30.] Hayek, µB-15Õ, *Law, Legislation and Liberty*, Vol. I, London: Routledge and Kegan Paul, 1973, p. 17.
- [31.] Descartes may not always have committed the errors Hayek finds in him or his disciples. See on this Stuart Hampshire, "On Having a Reason," Chapter 5 of G. A. Vesey, ed., *Human Values*, Royal Institute of Philosophy Lectures, vol. II, 1976–1977, Harvester Press, 1976, where on p. 88 Hampshire speaks in Hayekian fashion of "a Cartesian error, which was not consistently Descartes', and which consists of assuming a necessary connection between thought on the one side and consciouness and explicitness on the other..."
- [32.] Hayek, µB-13Õ, *Studies*, p. 73. On Hayek's view of spontaneous order, see Barry (1982) in *Bibliography*.
- [33.] Hayek, µB-13Õ, *Studies*, pp. 71-72.
- [34.] Hayek, µB-15O, Law, Legislation and Liberty, Vol. I, p. 13.
- [35.] Hayek, µB-17Õ, New Studies, p. 253.
- [36.] Hayek, μ B-13Õ, p. 76. "The problems of how galaxies or solar systems are formed and what is their resulting structure is much more like the problems which the social sciences have to face than the problems of mechanics..." See also μ B-16Õ, *Law, Legislation and Liberty*, Vol. II, pp. 39-40.
- [37.] Hayek, µB-17Õ, New Studies, p. 250.
- [38.] On Spencer, see J. D. Y. Peel, *Herbert Spencer: the Evolution of a Sociologist*, London: Heinemann, 1971.

- [39.] See Hayek, µB-18Õ, Law, Legislation and Liberty, Vol. III, pp. 153-155.
- [40.] See Peter Winch, "Nature and Convention," *Proceedings of the Aristotelian Society*, 60 (1959-1960): 231-252, reprinted as Chapter 3 of Winch's *Ethics and Action*, London: Routledge and Kegan Paul, 1976. In some of his writings published after *The Open Society and Its Enemies*, Popper comes closer to a Hayekian position. In his "Towards a Rational Theory of Tradition," in particular, perhaps in response to Oakeshott's writings, he effectively abandons the Sophistic dichotomy of nature and convention entailed in his earlier writings. See Popper's *Conjectures and Refutations*, London: Routledge and Kegan Paul, 1963, for this study.
- [41.] Hayek, µB-13Õ, *Studies*, Chap. 4.
- [42.] Personal communication from Professor Hayek to the author.
- [43.] See Hayek, µB-13Õ, *Studies*, p. 61: "...if 'to have meaning' is to have a place in an order which we share with other people, this order itself cannot have meaning because it cannot have a place in itself."
- [44.] See Hayek, µB-12Õ, *The Constitution of Liberty*, p. 160.
- [45.] On the calculation debate, see *The Journal of Libertarian Studies* 5, No. 1 (Winter 1981) especially the historical paper by Don Lavoie, "A Critique of the Standard Account of the Socialist Calculation Debate," pp. 41-87.
- [46.] All the preceding three quotations occur on pp. 80-81 of Hayek, µB-7Õ, *Individualism and Economic Order*, London: Routledge and Kegan Paul, 1976.
- [47.] Hayek, µB-7Õ, *Individualism*, p. 50.
- [48.] Israel M. Kirzner, *Competition and Entrepreneurship*, Chicago and London: University of Chicago Press, 1973, p. 68.
- [49.] Joseph Schumpeter, *Capitalism, Socialism and Democracy*, London: Unwin, 1974, Chapter XVI.
- [50.] See Paul Craig Roberts, *Alienation in the Soviet Economy*, Albuquerque: University of New Mexico Press, 1971.
- [51.] Hayek, µB-13Õ, *Studies*, p. 40.
- [52.] Hayek, µB-13Õ, *Studies*, p. 35.
- [53.] See F. A. Hayek, µB-9Õ, *The Counter-Revolution of Science*, Indianapolis: Liberty Press, 1979, Chapter Three.
- [54.] Hayek, *Studies*, p. 26.

- [55.] Quoted by T. W. Hutchinson, *The Politics and Philosophy of Economics*, Oxford: Basil Blackwell, 1981, p. 214.
- [56.] Norman P. Barry, *Hayek's Social and Economic Philosophy*, London: MacMillan, 1979, p. 41.
- [57.] Barry, *Hayek*, p. 40.
- [58.] Hayek, µB-17Õ, New Studies, pp. 51-52.
- [59.] Hayek, µB-13Õ, Studies, p. viii.
- [60.] Hayek, µB-13Õ, *Studies*, p. 6: "while this possibility µof falsificationÕ always exists, its liklihood in the case of a well-confirmed hypothesis is so small that we often disregard it in practice."
- [61.] Hayek, μB-13Õ, *Studies*, p. 16.
- [62.] Hayek, µB-13Õ, *Studies*, p. 36. See also *Studies*, p. 18: "Where our predictions are thus limited to some general and perhaps only negative attributes of what is likely to happen, we evidently also shall have little power to control developments." And on p. 19: "the wise legislator or statesman will probably attempt to cultivate rather than to control the forces of the social process."
- [63.] Hayek, µB-16Õ, Law, Legislation and Liberty, vol. II, p. 157, footnote 25.
- [64.] Michael Oakeshott, *Rationalism in Politics*, London: Methuen, 1962, p. 4.
- [65.] Rush Rhees, Without Answers, London: Routledge and Kegan Paul, 1969, p. 49.
- [66.] F. A. Hayek, μP-16bÕ, *Denationalisation of Money*, 2nd edition, London: Institute of Economic Affairs, 1978, p. 52.
- [67.] G. L. S. Shackle, *Epistemics and Economics: a Critique of Economic Doctrines*, Cambridge, Cambridge University Press, 1976.
- [68.] Hayek, µB-12Õ, The Constitution of Liberty, pp. 35-6.
- [69.] Hayek, µB-13Õ, Studies in Philosophy, Politics and Economics, p. 38.
- [70.] Hayek, µB-13Õ, *Studies*, p. 113. Hayek acknowledges earlier in his Hume essay (p. 109, note 5: "My attention was first directed to these parts of Hume's works many years ago by Professor Sir Arnold Plant, whose development of the Humean theory of property we are still eagerly awaiting.") Hayek is alluding to his discussions with Sir Arnold in the early 1930s at the London School of Economics, where Hayek had migrated to take up The Tooke Professorship. See Sir Arnold Plant, "A Tribute to Hayek—The Rational Persuader." *Economic Age* 2, no. 2 (January-February 1970): 4-8, especially p. 5: "I myself had returned to LSE in the middle of 1930 after six years at the University of Cape Town, where I had developed a special interest in the

scope of and functions of property and ownership, both private and public. It was a delight to find Hayek as well seized of the economic significance of the ramifications of property law as I was myself. I recall his excitement when I called his attention to the profound discussion of these matters in David Hume's *Enquiry concerning the Principles of Morals*: section III, Of Justice, and my own gratitude to him for his influence on my own thinking about so-called intellectual and industrial property law." The entirety of Sir Arnold's article should be consulted for the light it sheds on LSE during the 30s as a seedbed for transmitting Austrian economics (One visitor described LSE as "ein Vorort von Wien"—a suburb of Vienna; Plant, p. 6). See also Hayek's important Inaugural lecture delivered at LSE March 1, 1933, "The Trend of Economic Thinking," (A-20) and his revealing article on the history of "The London School of Economics, 1895–1945," (A-60). During the 1940s Hayek was also editor of LSE's journal, *Economica*.

- [71.] H. L. A. Hart, *The Concept of Law*, Oxford: Clarendon Press, 1961.
- [72.] See, especially, Henry Sidgwick's masterpiece, *The Method of Ethics*, in which Sidgwick defends an indirect form of utilitarian morality.
- [73.] For Hayek's criticism of the standard variety of utilitarian theory, see especially µB-16Õ, *Law, Legislation and Liberty*, vol. II, pp. 17-23.
- [74.] See Hayek, µB-13Õ, *Studies in Philosophy, Politics and Economics*, p. 173: "An optimal policy in a catallaxy may aim, and ought to aim, at increasing the chances of any member of society taken at random of having a high income, or, what amounts to the same thing, the chance that, whatever his share in total income may be, the real equivalent of this share will be as large as we know how to make it."
- [75.] See Hayek, µB-16Õ, *Law, Legislation and Liberty*, vol. II: *The Mirage of Social Justice*, p. xiii, for his endorsement of some aspects of Rawls' theory.
- [76.] See Ronald Hamowy, "Law and the Liberal Society: F. A. Hayek's *Constitution of Liberty," Journal of Libertarian Studies* 2, no. 4 (Winter 1978): 287-297; J. Raz, "The Rule of Law and Its Virtue," in *Liberty and the Rule of Law*, ed. R. L. Cunningham, Texas A & M University Press, 1979, pp. 3-21; and John N. Gray, "F. A. Hayek on Liberty and Tradition," *Journal of Libertarian Studies* 4, no. 2 (Spring 1980): 119-137.
- [77.] See footnote 76 above.
- [78.] See footnote 76 above.
- [79.] See my "F. A. Hayek on Liberty and Tradition," cited in footnote 76 above.
- [80.] Hayek, µB-13O, Studies in Philosophy, Politics and Economics, p. 168, ff.
- [81.] Hayek, µB-13Õ, *Studies*, pp. 116-117.
- [82.] Raz, "The Rule of Law," µin Cunningham, ed.Õ, p. 19.

- [83.] Hamowy, "Law and the Liberal Society," pp. 291-292.
- [84.] I draw heavily here on the account of universalization given in J. L. Mackie's *Ethics: Inventing Right and Wrong*, London: Penguin Books, 1977, pp. 83-102.
- [85.] Hayek, µB-13Õ, *Studies*, p. 168.
- [86.] Hayek, µB-13Õ, *Studies*, pp. 116-117: "What Kant had to say about this µjusticeÕ seems to derive directly from Hume."
- [87.] See R. M. Hare, *Moral Thinking*, Oxford: Clarendon Press, 1981.
- [88.] Hayek, µB-13Õ, Studies, p. 168.
- [89.] Hayek, µB-13Õ, *Studies*, p. 166.
- [90.] See Hayek, µB-13Õ, *Studies*, p. 163.
- [91.] Hayek, µB-13Õ, *Studies*, p. 116. Hayek's argument for a procedural conception of justice—an argument which, unlike Nozick's, does not depend on one's prior acceptance of Lockean rights theory—is one of the fundamentally important theses of his later philosophy, all the more important because his claim is that the procedural view of justice follows from the Kantian principle and is uniquely consonant with the requirements of the free market process.
- [92.] Hamowy, "Law and the Liberal Society."
- [93.] Hamowy is surely right that Hayek's account of coercion is faulty. On this see Murray N. Rothbard, *The Ethics of Liberty*, Atlantic Highlands, N.J.: Humanities Press, 1981, Chapter 28, "F. A. Hayek and the Concept of Coercion."
- [94.] See J. L. Mackie, *Ethics*, p. 88: "This...thesis is well formulated by Hobbes: 'that a man...be contented with so much liberty against other men, as he would allow other men against himself.' Hobbes equates this with the Golden Rule of the New Testament...."
- [95.] See James M. Buchanan, "Cultural Evolution and Institutional Reform" (unpubl.) I am most grateful to Professor Buchanan for allowing me to read this paper.
- [96.] James M. Buchanan, *Freedom in Constitutional Contract*, College Station: Texas A & M University Press, 1977, pp. 25-30.
- [97.] Robert Nozick, *Anarchy, State, and Utopia*, New York: Basic Books, 1974, pp. 18-22. For a most penetrating discussion of some related aspects of social explanation, see Nozick's "On Austrian Methodology," *Synthese* 36 (1977): 353-392. See also Edna Ullmann-Margalit's "Invisible Hand Explanations," *Synthese* 30 (1978): 263-291. I am indebted to Professor Lester Hunt both for directing me to Ms. Ullmann-Margalit's article and for showing me his unpublished paper, "Toward a

Natural History of Morality," in which some of Ullmann-Margalit's work is pushed further. See also Norman P. Barry, "The Tradition of Spontaneous Order," *Literature of Liberty* 5 (Summer 1982): 7-58, as well as Richard Vernon, "Unintended Consequences," *Political Theory* 7 (1979): 57-74.

- [98.] See Oakeshott's "Rationalism in Politics," in the book of that name for his most explicit criticism of Hayek.
- [99.] See Nozick, Anarchy, State, and Utopia, Part Three.
- [100.] See Hayek's *Law, Legislation and Liberty*, vol. II, Chapter Ten, for the clearest acknowledgement of the role of chance in the alembic of catallaxy.
- [101.] See Irving Kristol, *Two Cheers for Capitalism*, New York, 1978, Chapter 7, "Capitalism, Socialism and Nihilism."
- [102.] See Hayek's "Dr. Bernard Mandeville," *New Studies*, pp. 249-266; and his remarks on contemporary morality in the Epilogue to vol. III of *Law*, *Legislation and Liberty*, pp. 165-166.
- [103.] For their detailed comments on an earlier draft of this article, I am indebted to James M. Buchanan, Jeremy Shearmur, David Gordon, and Lester Hunt. I am also indebted to Michael Oakeshott and Robert Nozick for illuminating conversation on the themes addressed in this article.

I have learned much from three studies by Jeremy Shearmur: (1) "Abstract Institutions in an Open Society," in H. Berghel and others, eds. *Wittgenstein, the Vienna Circle and Critical Materialism*, Vienna: Holder-Pichler-Tempsky, 1979, pp. 349-354; (2) "The Austrian Connection: F. A. von Hayek and the Thought of Carl Menger," in B. Smith and W. Grassl, eds., *Austrian Philosophy and Austrian Politics*, Munich: Philosophia Verlag, forthcoming; and (3) *Adam Smith's Second Thoughts* (pamphlet), London: Adam Smith Club, 1982.