Readings
of particular interest

In Defense of Price Cutting

"A Theory of Competition" by G. Warren Nutter and John H. Moore, in *Journal of Law and Economics,* April 1976.

What makes firms compete? Crucial though this question may be to the regulation of competition among firms, Warren Nutter and John Moore of the University of Virginia suggest that it has been avoided by economists.

In that branch of economics that specializes in the study of industries, the emphasis is not on the competitive process but on "structure"—the organization of industry. Data are gathered and tests run to see whether industrial concentration (usually, the fraction of industry sales accounted for by the four or eight largest firms) correlates with certain measures of industrial performance (excessive profit rates, the price-cost margin). All of this is done without knowing just what it is that the data should be expected to reveal. Performance is supposed to improve with decreases in concentration because, so the argument goes, it just makes sense to assume that an increase in the number of firms sharing a market will cause prices to fall.

The difficulty, as Nutter and Moore show, is that the competitive process is not so simple after all. There is, to begin with, no "frictionless" tendency for managements to begin cutting price after the firms sharing a market reach some magic number. Some managements will cut price, despite the long-run disadvantages to their firms of doing so, because they believe that others will not cut prices, at least not for a while. The temporary gain may outweigh the permanent loss. Competition is therefore not merely a numbers game in which a particular index of concentration translates smoothly into a particular index of performance, without any disturbances along the way. Wherever competition is at work, some firms will charge lower prices than other firms. Indeed, it is the fact of price cutting—not some idealized state of affairs in which "many" firms charge the same "competitive" price—that distinguishes competition from monopoly.

Managers know that the success of a price cut depends on the alertness of their customers and their rivals, and they know that different buyers and sellers will engage in different amounts of "search" for low prices. At a given cost of search, buyers will engage in more search the longer they expect a given seller to wait before he matches a rival's suspected price cut and the less search in which they expect sellers to engage. Similarly, sellers will search more intensively the more they expect their "representative" buyers to search and the fewer the number of firms in the industry.

This line of reasoning yields some counterintuitive results. The authors discover, for example, that a rise in the number of firms may not increase the temporary gain from a price cut even though it will reduce the permanent loss. While "the number of firms" does therefore have "a great deal to do with making price cheaper," the behavioral effects of changes in concentration are not nearly so simple as traditional industrial organization theory has assumed. First, the number of firms required to generate competition differs from one industry to another and, second, the discriminatory practices now outlawed by antitrust legislation may have merit when they are weighed against the desirability of competition. "Since friction is necessary to generate competition, one should be cautious about condemning such practices as price discrimination or 'secret' price-cutting out of hand. They may do more good than harm, as we judge such things."

Trends in Regulation

"The New 'Social Regulation' " by William Lilley III and James C. Miller III in *The Public Interest*, Spring 1977; AEI Reprint No. 66.

William Lilley of the House Budget Committee and James Miller of the American Enterprise Institute begin by noting a sharp rise in all types of government regulation in the 1970–75 period, the major part of it occurring not in economic regulation but in the newer category of social regulation (see table). According to the authors, both former officials of the Council on Wage and Price Stability, these two categories of regulation employ fundamentally different approaches. Economic regulation usually applies to the rates and services of a given industry (for example, airlines or trucking), whereas social regulation specifies, often in minute detail, the product that must result and the conditions under which it must be produced (for example, toys incorporating certain specifications or dust-free factories). Also, social regulation, which applies across the board, affects far more consumers than does old-style economic regulation.

The authors believe that, particularly in the case of social regulation, the country pays far too much for what it is getting. They ascribe this to two factors, the general regulatory approach and, more important, the performance of the regulatory agencies. First, the process often gets off to a bad start because of the regulatory approach selected. Typically, that choice is based upon inadequate information and characterized by an unwillingness to weigh the costs of various methods and a resistance to considering alternatives. Some of this, the authors note, must be blamed on legislators rather than regulators. Congress often mandates a single approach to a regulatory problem—and sometimes only a single standard for evaluating benefits under that approach.

But, second, agency performance in the post-selection phase almost guarantees a poor result. Officials and staff of regulatory agencies tend to have a philosophical attraction to regulation—to the idea that government can produce a better outcome than people left to their own devices. They are then placed in an environment where evenhandedness seems to require generally punitive standards applied to everyone, rather than differentiated standards applied according to the costs and benefits of the specific situation. Also they are conditioned to expect their most serious political trouble from proponents of the regulatory approach and make an effort to avoid trouble from that quarter by fashioning detailed regulations, far more extensive than the problem or the prevailing information might justify.

INDICES OF GROWTH IN FEDERAL REGULATION, 1970–1975
(dollars in millions)

	Major "Economic" Regulatory Agencies		Major "Social" Regulatory Agencies		Number of Pages	
Year	Number	Expenditures	Number	Expenditures	*Federal Register*	*Code of Federal Regulations*
1970	8	$166	12	$1,449	20,036	54,105
1971	8	$197	14	$1,882	25,447	54,487
1972	8	$246	14	$2,248	28,924	61,035
1973	8	$199	17	$2,774	35,592	64,852
1974	9	$304	17	$3,860	42,422	69,270
1975	10	$428	17	$4,251	60,221	72,200
Percent increase 1970–75	25	157	42	193	201	33

Source: *The Public Interest.*

More on Rate-of-Return Regulation

"A Note on the Optimal Investment Policy of the Regulated Firm" by David Peterson and James Vander Weide, in *Atlantic Economic Journal*, Fall 1976.

This contribution by Professors Peterson and Vander Weide of Duke University further enriches the work begun by Harvey Averch and L. L. Johnson's seminal analysis of regulation. Averch and Johnson, whose findings have intrigued economists and provided ammunition for consumer groups, asked how regulation of a firm's rate of return would affect that firm's investment policies. The Peterson/Vander Weide article extends the analysis by looking at investment decisions over time.

Averch and Johnson's principal conclusion was that regulated firms overinvest in plant and equipment compared to unregulated firms. Their analysis begins by postulating two firms, each producing a single good using only two inputs, labor and capital, and each able to draw upon unlimited quantities of these inputs at constant unit prices and to readily substitute one for the other. The only difference between the two firms is that one is regulated in such a way that it can earn no more than a "fair" rate of return on its capital investment.

The conclusion that regulated firms overinvest in physical capital makes intuitive sense. If a firm is guaranteed a fixed rate of return on its capital investment, as most utilities are, one would expect that firm to invest as much as possible. This overinvestment pushes the firm's cost of production above what it would be without regulation. Put another way, it is a regulation-induced inefficiency.

In order to derive their results mathematically, Averch and Johnson make a number of assumptions that differ markedly from conditions in the real world. Nevertheless, consumer advocates have seized upon their results to argue—in electric utility rate hearings and elsewhere—that this or that utility deliberately overinvests in plant and equipment in order to increase its rate base, and thereby its rates.

The importance of the Peterson/Vander Weide article is its finding that, under more realistic assumptions, the tendency for rate-of-return regulation to induce overinvestment does not always hold. In fact, they find cases where a regulated firm may actually underinvest in capital.

Regulatory Illusion

"Inflation, Regulation, and Utility Stock Prices" by Michael W. Keran, in *Bell Journal of Economics*, Spring 1976.

Investors gloating over their high dividends on utility stocks should take a closer look. For, according to Michael Keran of the Federal Reserve Bank of San Francisco, those stocks they expect to behave like stocks are acting more like bonds.

Using statistical analysis, researcher Keran demonstrates that, in periods of inflation, investor expectations force regulated industries to increase current yield in compensation for declining real rates of return. The problem is that the regulatory authorities generally set prices so that a utility earns a fixed nominal rate on the book value of its capital stock. As inflation picks up speed the real value of this rate declines. True, the regulators allow price increases based on higher costs—and even on higher interest costs associated with new bond issues. But so far they have disallowed increases in the return on book-value equity. Thus, in effect, utility stocks have become fixed income securities.

The author argues that regulators behave as if they had "money illusion," but unfortunately the markets do not. As inflation accelerated after 1965, utility dividends climbed in a pattern mimicking bond interest, whereas utility stock prices remained relatively flat, losing ground when compared to their unregulated cousins. Thus the regulators have caused losses for utility stockholders relative to nonregulated industrial stockholders.

High yields are, of course, attractive to investors seeking relatively fixed income. However, through various expansions of the basic formula R (rate) $= Y$ (yield) $+ g$ (expected growth), Keran demonstrates how poorly protected those yields may be.

As inflation persists, utilities face increasing costs of capital, almost as if they were financing their operations only with debt. The result may be fewer resources allocated to utilities, and therefore fewer utility services available to consumers, than would otherwise be the case. Keran concludes with a warning from P. L. Joskow and Paul MacAvoy: "Without substantial increases in the rate of return on equity allowed by regulatory commissions, it is unlikely that sufficient capital can be raised to achieve historic growth rates in capacity."

Management Self-Indulgence

"Managerial Objectives in Regulated Industries: Expense Preference Behavior in Banking" by Franklin R. Edwards, in *Journal of Political Economy,* February 1977.

Profit-maximizing firms occupy hallowed ground in the realm of traditional economic theory. But in the world of regulated industries, their place is not so secure. In this world, expense preference rather than profit maximization may be the firm's principal goal, says Franklin Edwards of Columbia University.

"Expense preference behavior" is a rather inelegant phrase which means simply that firms do not try to earn as much profit as possible. Instead, managers appropriate some potential profits for their own enjoyment by hiring larger staffs and by giving themselves higher salaries and more emoluments than they would if they did try to maximize profits.

From an examination of banking-industry data for forty-four metropolitan areas, Edwards finds that as competition falls, labor expenses tend to rise. This is inconsistent with the hypotheses of profit maximization, which would have predicted that less competition would raise profits but leave the demand for labor unchanged. It is consistent, however, with the hypothesis that managers indulge themselves with larger staffs and higher salaries in the face of weaker competition.

The fact that banking is a highly regulated industry is an important element in the finding that expense preference behavior may better describe the goals of the firm than does profit maximization. For expense preference to be possible, two conditions must be satisfied. First, ownership of the firm must be separated from control of the firm. This separation, in conjunction with the "transactions costs" that the owners (that is, stockholders) must incur to put the reins on management, gives management the leeway it needs to practice expense preference behavior.

The second condition is that there be market imperfections in the industry. In the banking industry there are a number of such imperfections: key interest rates are regulated, entry into the industry and into specific markets is limited, and branching and mergers are strictly controlled. All of these "imperfections" are the result of regulation. This suggests the possibility—a possibility that Edwards recognizes—that not only banking but also most other regulated industries may behave in accordance with expense preference theory.

A Major Theoretical Advance

"Toward a More General Theory of Regulation" by Sam Peltzman, in *Journal of Law and Economics,* August 1976; AEI Reprint No. 71.

Sam Peltzman of the University of Chicago asks: is the public interest served by regulation? High purpose is always expressed as the intent, both in setting up a regulatory program and in making a regulatory decision. However, skepticism about whether high purpose is actually achieved in practice is widespread. Many maintain that in contrast to its constructive—or at least benign—intent, regulation serves special interests. Observers ranging from Ralph Nader to George Stigler have argued that regulation frequently serves mainly the interest of the regulated.

In this provocative article, Peltzman develops a framework for analyzing regulatory behavior that builds upon an idea introduced by Stigler—that regulation is a way of enlisting state power in pursuit of private goals.

Peltzman's approach recognizes that most regulatory proceedings involve a number of groups each trying to advance its own interests. In making decisions, regulators must take into account both the interests of these groups and the strength with which they are pursued, an essentially political undertaking that can be analyzed *as if* vote-getting considerations were directly impinging on the regulatory process. The pursuit of the private goals sought through regulation usually takes the form of struggles over rate-setting, service requirements, conditions of entry, and the like. While these struggles are the means by which private advantage is pursued, they can be viewed *as if* redistribution of income or wealth were the primary thrust of the regulatory decision-making process.

The framework that Peltzman develops based on these two propositions can be used to examine the effects of a wide range of conditions upon regulatory behavior. Peltzman examines the implications of differences in conditions influencing the ability to assemble effective coalitions, differences in costs and industry structure, and changes in political or economic variables. A surprising number of implications that can be tested empirically are generated by this analytic framework.

Although considerable technical knowledge is required to follow the details of Peltzman's argument, the basic ideas underlying his approach and many of the implications derived from it are quite easily grasped. For example, the "capture theory" (essentially the idea that regulation serves the interests of the industry subject to regulation) turns out to be one possible result. Other implications involve the structure of regulated prices and sharing by different interest groups of the transfers associated with regulation.

Advertising and Concentrated Industries

"Advertising, Concentration, and Price-Cost Margins" by Allyn D. Strickland and Leonard W. Weiss, in *Journal of Political Economy*, October 1976; *Industrial Concentration and Advertising Intensity* by Stanley I. Ornstein, American Enterprise Institute for Public Policy Research, 1977.

The idea that industrial concentration and advertising are related in some harmful way dates back at least to the late forties when Nicholas Kaldor argued that advertising-created scale economies and brand loyalties cause industrial concentration. Although the evidence for Kaldor's argument is at best mixed, the idea that advertising creates "shared monopoly" and "barriers to entry" has been the basis for a number of antitrust complaints, notably the cereals case currently before the Federal Trade Commission. Two recent studies—one by Leonard Weiss of the University of Wisconsin and Allyn Strickland of the University of Delaware and the other by Stanley Ornstein of UCLA—offer some improvements over earlier statistical tests without reducing the scope for disagreement over Kaldor's argument.

Both studies employ large samples of narrowly defined (four-digit Census of Manufactures) industries, and both draw their advertising-to-sales data from the U.S. input-output tables. Ornstein reports findings for 1947, 1963, and 1967. Strickland and Weiss report findings only for 1963 but increase the explanatory power of their tests by incorporating not only industrial concentration and advertising intensity, but also certain other variables, including the price-cost margin and a proxy for production economies of scale.

The principal difference in the two studies lies in their findings about the strength and direction of the advertising-concentration relationship. Ornstein argues that, on theoretical grounds, it is concentration that may cause advertising intensity to rise, rather than the other way around. His findings indicate a positive and significant—but weak—relationship: advertising tends to rise with concentration, but concentration ordinarily explains no more than 10 percent of the variation in advertising. Strickland and Weiss, on the other hand, find that initially concentration rises with advertising and subsequently advertising falls with concentration (a "quadratic" or inverted-U relationship). Advertising intensity and production economies of scale explain over 60 percent of the variation in industrial concentration in their sample of consumer goods industries.

Despite these conflicting results, neither study supports the brand-loyalty hypothesis. Noting that advertising does not significantly affect price-cost margins for consumer goods, Strickland and Weiss conclude "that the product differentiation barrier to entry is not very great."

Contradiction on Capitol Hill

"The Crusade against Federal Paper Work" by Paul H. Weaver, in *Fortune*, November 1976.

Though resentment continues to grow against the amount of paperwork required by the federal government of all segments of society, Paul H. Weaver of *Fortune* finds there are inherent limitations to improving the situation. The biggest category of government paperwork consists of forms people fill out for their own advantage—forms that often return significant benefits such as reliable statistics. The redundancy of state and federal forms is a problem that defies solution as long as we have a federalist system, and duplication within federal paperwork cannot be eliminated because nearly identical forms often have different functions. For instance, Census Bureau surveys must preserve confidentiality, while a similar form of the Federal Trade Commission gathers information for purposes of publication or legal prosecution.

However, the author maintains that something can and should be done about the excessive paperwork imposed by certain kinds of laws passed in the last decade. These deal with equal opportunity, energy, environmental problems, occupational safety, and retirement plans. The Employment Retirement Income Security Act, for instance, has hurt the very workers it is designed to protect. Partly because of the paperwork burden imposed by the act, there has been a significant decrease in the number of pension plans run by small employers.

Such excessive paperwork is symptomatic of a larger problem rooted in a certain hostile attitude on the part of legislators and a tendency on their part to impose standards without fully considering the consequences. The Ford administration saw the danger of using reports as a mechanism of law enforcement, but Congress continues to pursue policies that mandate paperwork even while it stages a dramatic crusade against it through the Commission on Federal Paperwork. Basic reforms thus do not seem possible; the one hope is that people in and out of government will continue to make modest marginal reforms within the limits of their authority.

Bigger Government—Less Control?

"Can Government Regulate Itself?" by James Q. Wilson and Patricia Rachal, in *The Public Interest*, Winter 1977.

The growth of central government raises basic questions about the ability of one government agency to modify the behavior of another. Harvard Professor James Wilson and Patricia Rachal, a graduate student, suggest that although such centralization means that the various public bureaucracies must increasingly give orders to each other, their ability to do so effectively is inherently limited. Even within the same level of government, an agency will have great difficulty in attaining its goal if, to do so, it must change the behavior of another agency. Generally, it is easier for a public agency to change the behavior of a private organization than that of another public agency.

For example, they point out that the Veterans Administration is less susceptible than private hospitals to reform efforts by other governmental agencies; the Environmental Protection Agency can influence private utility companies more easily than it can the Tennessee Valley Authority; the Boston Inspection Department has much greater success correcting complaints against private landlords than against the Boston Housing Authority; and the Office of Federal Contracts Compliance is ineffective in getting other agencies to impose affirmative action policies on private contractors.

The inefficacy of attempts at interagency control has various causes. It is difficult for civil servants to affect the behavior of personnel in other agencies, especially those of higher rank. A federal agency can have considerable financial influence over a private firm, but it has no direct control over the personnel, structure, or budget of another agency. Furthermore, courts do not, except in unusual circumstances, mediate interagency conflicts, because this can result in a violation of the constitutional principle of separation of powers doctrine.

Thus, the nationalization of enterprises reduces the chances that those enterprises will be effectively regulated. "It may be," the authors conclude, "that as power in a society becomes more concentrated, it becomes less effective in serving a variety of public goals."

A Dead End?

"The Reformation of American Administrative Law" by Richard Stewart, in *Harvard Law Review*, June 1975.

Administrative law, that part of the law concerned with the procedures of regulatory agencies, is undergoing a fundamental change that calls into question its proper role in our legal system. The most salient feature of this change, says Richard Stewart of Harvard Law School, is the increasing importance of public interest groups in administrative decision-making. Published two years ago, Stewart's 144-page article remains the most thoughtful and comprehensive work on the origins and implications of this development. His conclusions offer little hope to those seeking to improve the content of regulatory decisions and the process by which they are made.

The central task of administrative law in America has been to check the discretionary power of regulatory agencies in a way that reconciles the control exercised over private citizens by unelected officials with the traditions of American democracy. The traditional view saw the agency as a mere transmission belt for legislative directives. The Congress passed a law; the agency applied the policy expressed in the law, following procedures designed to ensure that it did so accurately and rationally; and the courts, limited to providing judicial review, decided whether the agency had strayed beyond the law.

Something happened to this model. Severely strained by New Deal legislation delegating wide administrative discretion to new agencies created to solve a variety of problems, it was partially rescued as the courts put certain controls on the exercise of that discretion. Later, the problems Congress sought to solve through regulation became more complex and less amenable to resolution by administrative decision, and experience withered the faith that professional administrators can reliably carry out legislative mandates in pursuit of an objective "public interest."

Today, the exercise of agency power is no longer viewed as a way of transmitting legislative decisions into specific policy. Instead, Stewart argues, judges, legislators, administrators, and lawyers see agencies as essentially engaged in a legislative process—one of adjusting the competing claims of various private interests affected by agency policy. Each agency is an arena where the regulators, the regulated, and the groups likely to be affected by a decision struggle to work their will.

As this view of the agency decision-making process gained ascendency, regulation-watchers from across the political spectrum reached a consensus on the quality of agency decisions—it has been poor. The reason for this, many believe, is that the agencies are responding to the organized interests before them, at the cost of neglecting other, perhaps broader, interests. At its crudest, this explanation sees the agencies as captives of the enterprises they are regulating.

When one combines this explanation for poor agency performance with the view that the regulatory process is like the workings of a legislature, it is easy to see why there has been a trend towards involving more groups in agency deliberations. If the Federal Communications Commission does not adequately represent the interests of television viewers in license renewal proceedings, then allow ad hoc groups of viewers to intervene.

This interest-group representation model is helpful, Stewart argues, if it is indeed true that better and fairer decisions result from greater participation. But is this the case? How can we be sure that all the appropriate interests will be listened to? Does not this model, by complicating the issues and increasing the number of contending views, expand the opportunities for arbitrary decision-making? Moreover, the interest group model imposes substantial costs upon society in terms of delay and other transaction costs. Are these costs worth the benefits?

Administrative law appears headed for a dead end. The old model of agency decision-making has been largely replaced but the usefulness of the new model for solving the pressing problem of agency discretion is doubtful at best. However, for lack of a better solution, it is likely to continue to dominate.