

Regulatory Conflict in the Gilded Age: Federalism and the Railroad Problem

Herbert Hovenkamp†

The regulation of railroads during the Gilded Age has been the focal point of many theories of economic regulation. Two of the three theories that are prominent today—the “public interest theory” and the New Left “capture theory”—have their genesis in that debate. In this Article, Professor Hovenkamp criticizes recent revisionist histories, which argue that early federal railroad regulation represents a clear case of inefficient capture by the regulated industry. Hovenkamp argues that the New Left history of the Gilded Age ignores the models of classical federalism and classical economics that dominated policymaking in the late 19th century. A proper understanding of the economic and political models of the time, he argues, supports the conclusion that although the railroads did support federal regulation, that regulation was consistent with the public interest model of regulation.

Few issues have been as controversial or have aroused every level and branch of government as much as the proper relation between the sovereign and the railroads during the late 19th century. The reasons for the controversy are clear. Both the economics and the politics of business regulation were going through a period of convulsive change, particularly in those businesses identified by the Supreme Court as “affected with a public interest.”¹ In economics, although the modern theory of natural monopoly utility regulation had not emerged, economists were becoming aware that certain industries were subject to substantial market failures that hindered efficient competition.² Railroads were the most important of these industries.³ In politics, a variety of interests stood to gain from a

† Professor of Law, University of Iowa College of Law. Thanks to Louis B. Schwartz, Frank H. Easterbrook, Lester G. Telser, and Sheldon F. Kurtz for reading an earlier draft.

1. These included common carriers and public utilities such as gas lighting, the telegraph, and, later, electricity and the telephone. *Munn v. Illinois*, 94 U.S. 113, 130 (1876).

2. Among the first to make this observation was John Stuart Mill, who argued in *Principles of Political Economy* that the London gas light industry would perform more efficiently if it were a regulated monopoly rather than a competitive industry. J. MILL, *PRINCIPLES OF POLITICAL ECONOMY* 143 (W. Ashley rev. ed. 1923) (1848); see also Adams, *Relation of the State to Industrial Action*, 1 *PUBLICATIONS AM. ECON. A.*, Jan. 1887, at 55. For the contemporary understanding of natural monopoly in the railroad industry by one of its most notable regulators, see Adams, *The Railroad System*, in *CHAPTERS OF ERIE AND OTHER ESSAYS* 360–66 (1871).

3. Other such industries included gas light utilities and telegraphs, which were of recent origin, and toll bridges, which were older. See Hovenkamp, *Technology, Politics and Regulated Monopoly: An American Historical Perspective*, 62 *TEX. L. REV.* 1263, 1284–95 (1984).

particular government policy concerning the railroads. The political controversy was sharp because the stakes were so high: In the 1880's, the railroads were one of the largest areas of American economic activity, and by 1900, railroad assets accounted for about ten percent of American wealth.⁴

Historical studies of why Gilded Age railroad regulation took the shape it did generally have focused so heavily on the politics of the period that they have overlooked the fact that 19th century political economists developed a sophisticated regulatory theory. This Article searches for the proper balance between interest group politics and economics in Gilded Age regulatory policy by attempting to take the regulatory theory of the day seriously. This theory often provides better explanations than does the parsing of vested political interests, even though these interests were substantial.

The problem of railroad regulation in the Gilded Age involved two broad, very different issues: how should the railroads be regulated, and which sovereign—state or federal—is the optimal regulator. The first Section of this Article provides the background for an examination of these issues by reviewing the two major theories of economic regulation—the public interest theory and the capture theory—that historians have employed to explain railroad regulation in the Gilded Age. It also presents the understandings of regulatory economics and federalism that were dominant in that era, because an explanation of regulatory legislation must draw from the economic and political pressures that operated on the legislators of the period.

Section II of the essay analyzes the economics of railroad rates and demonstrates that railroads represented in the 1880's what later economists understood to be a natural monopoly. But economics of the 19th century was dominated by a classical theory that contained a poorly formed model of natural monopoly. That economic theory—imperfect as they were—explains most aspects of the regulatory history of railroads during the late 19th century.

In Section III, the Article explores the most important and controversial problem of railroad regulatory policy in the Gilded Age—rate discrimination. In the process, the Article takes up a subject rarely explored in the history of Gilded Age and Progressive Era railroad regulation: the “federalist” nature of the great railroad rate controversies. Most studies of railroad regulation in this period focus exclusively either on federal regulation⁵ or on state regulation.⁶ Both approaches yield exaggerations or

4. H. FAULKNER, *POLITICS, REFORM AND EXPANSION: 1890-1900*, at 75 (1959). See generally A. CHANDLER, *THE RAILROADS—THE NATION'S FIRST BIG BUSINESS* (1965).

5. See, e.g., Rabin, *Federal Regulation in Historical Perspective*, 38 *STAN. L. REV.* 1189 (1986) (discussing federal regulation in general, including railroads); A. MARTIN, *ENTERPRISE DENIED: ORIGINS OF THE DECLINE OF AMERICAN RAILROADS, 1897-1917* (1971); G. KOLKO, *RAILROADS*

mischaracterizations that make identification of the public interest, or proof of regulatory capture, appear too easy.

Part IV shows that to understand state and federal regulatory responses to rate discrimination, one must look at the great debates over railroad control as problems of federalism, for the American railroad system was a network that simultaneously operated in two "markets" and created two quite different sets of problems. One market was the short-haul, generally intrastate market; the other was the long-haul, or trunk-line market, which was generally interstate. Although the federal government responded to a constituency that was concerned about both sets of problems, prevailing commerce clause doctrine until the 1910's permitted Congress to address only the long-haul problem in any comprehensive way.⁷ Individual states, on the other hand, were constitutionally incapable of regulating long-haul traffic directly. After 1886, they had no jurisdiction over routes or shipments that did not begin and end within the same state.⁸ Until 1920, the states had final authority over most short-haul traffic.

By looking at railroad regulation as a problem of federalism, one can see more clearly the relationship between economics and politics in Gilded Age regulatory policy. The Interstate Commerce Act of 1887 was the first comprehensive regulatory measure passed by Congress. The states had been regulating railroads for a half century, and state regulation had contributed significantly to the railroads' financial troubles. The railroads' worst problem in the Gilded Age was that they were an industry subject to substantial market failure, but regulation by a sovereign with jurisdiction to control the entire system comprehensively had not yet emerged. The inevitable process of federal regulation was to take regulatory authority away from the individual states.

The purpose of this Article is *not* to prove or disprove any particular

AND REGULATION: 1877-1916 (1965).

6. See, e.g., L. BENSON, *MERCHANTS, FARMERS, AND RAILROADS: RAILROAD REGULATION AND NEW YORK POLITICS, 1850-1887* (1955); G. MILLER, *RAILROADS AND THE GRANGER LAWS* (1971). Although Benson's book discusses federal legislation as well, it does so entirely from the perspective of New York lobbyists and political concerns. See also Siegel, *Understanding the Lochner Era: Lessons from the Controversy Over Railroad and Utility Rate Regulation*, 70 VA. L. REV. 187, 210-59 (1984) (looking only at state regulation). Some studies of railroads and government view the problem from a federalist perspective, but they are concerned with railroad development and subsidy rather than regulation of rates and practices. C. GOODRICH, *GOVERNMENT PROMOTION OF AMERICAN CANALS AND RAILROADS: 1800-1890* (1960); L. MERCER, *RAILROADS AND LAND GRANT POLICY: A STUDY IN GOVERNMENT INTERVENTION* (1982); M. SUMMERS, *RAILROADS, RECONSTRUCTION, AND THE GOSPEL OF PROSPERITY: AID UNDER THE RADICAL REPUBLICANS, 1865-1877* (1984).

7. See *infra* text accompanying notes 84-85. Some contemporary railroad scholars argued that, since Congress had authority only over interstate traffic, a comprehensive regulatory system would involve federal-state cooperation. See, e.g., Garrett, *The Railway Problem*, 129 N. AM. REV. 361 (1879) (Congress can regulate to address national concerns but state regulation necessary to address local problems). A few believed that if a railroad carried *any* interstate cargo, all of its operations, including intrastate rates and practices, could be regulated by Congress. Welch, *The Inter-State Railway Solvent*, 145 N. AM. REV. 86 (1887).

8. See *infra* text accompanying notes 236-42.

theory of regulation. Rather, it argues that a failure to appreciate the complexity of Gilded Age regulatory policy in a federalist system has led historians to oversimplify the nature of regulation. For example, one of the most popular historical analyses of the Gilded Age sees the railroad policy of that era as a clear instance of regulatory capture by the regulated industry.⁹ A proper understanding of the federalist nature of the railroad controversy suggests that the eventual federal regulation of railroads, although supported by the railroads themselves, was consistent with the public interest.

I. UNDERSTANDING REGULATION IN HISTORY

A. *Theories of Regulation and the Problem of Federalism*

The myopic treatment of economics in the historical writing about railroad regulation carries a certain irony, for two of the three major theories of economic regulation¹⁰—the public interest theory and the New Left capture theory—were developed in writing about the railroads. The public interest theory—that regulatory policy's purpose is to control the regulated firms' monopoly pricing or other abuses of consumers or labor—was developed in writings by Charles Francis Adams and Louis Brandeis. That writing was directed largely at the railroads.¹¹ The heyday of the public interest theory of regulation—from the Progressive Era until well after the New Deal—was also the age in which the railroads were the dominant regulated industry.¹² The Progressive historical critique of fed-

9. See G. KOLKO, *supra* note 5.

10. The third major theory of regulation—the New Right regulatory capture thesis—has not been central to the discussion of the history of railroad regulation in the Gilded Age. The New Right view explains regulation as the result of “rent seeking” by special interest groups, which petition legislative bodies for regulation to inhibit entry into their markets or to guarantee their profit margins through price regulation. See, e.g., R. POSNER, *ECONOMIC ANALYSIS OF LAW* 249–63, 317–64, 491–507 (3d ed. 1986); Easterbrook, *The Supreme Court, 1983 Term—Foreword: The Court and the Economic System*, 98 HARV. L. REV. 4, 45–58 (1984). Importantly, the New Right recognizes that the burden of market failure often falls on the firms themselves. In such cases, the firms may clamor for regulation through their lobbyists, and the regulation might serve the public interest.

A fourth theory, not addressed here, is not as much a model of regulation as a theory about how legislation is formulated and passed, and, therefore, how it must be interpreted. See Farber & Frickey, *The Jurisprudence of Public Choice*, 65 TEX. L. REV. 873 (1987); Macey, *Promoting Public-Regarding Legislation Through Statutory Interpretation: An Interest Group Model*, 86 COLUM. L. REV. 223 (1986).

11. See T. MCCRAW, *PROPHETS OF REGULATION* 1–142 (1984).

12. Scholarship in the public interest genre includes 2 C. BEARD & M. BEARD, *THE RISE OF AMERICAN CIVILIZATION* (1928); E. JOHNSON & T. VAN METRE, *PRINCIPLES OF RAILROAD TRANSPORTATION* 499–508 (1926); W. RIPLEY, *RAILROADS: RATES AND REGULATION* 467–73 (1920); 1 I. SHARFMAN, *THE INTERSTATE COMMERCE COMMISSION: A STUDY IN ADMINISTRATIVE LAW AND PROCEDURE* (1931); Knapp, *The Regulation of Railway Rates*, 6 PUBLICATIONS AM. ECON. A. (3d s.) 250 (1905); Meyer, *Government Regulation of Railway Rates*, 7 PUBLICATIONS AM. ECON. A. 69 (1906); Ripley, *Public Regulation of Railroad Issues*, 4 AM. ECON. REV. 541 (1914); Smalley, *Railroad Rate Control*, 7 PUBLICATIONS AM. ECON. A. (3d s.) 327 (1906). Perhaps the best comprehensive defense of the public interest theory of regulation is J. LANDIS, *THE ADMINISTRATIVE PROCESS* (1938), which was written in response to the regulatory capture theories that accompanied the new realism of the 1930's. Landis substantially repudiated his own position in 1960. J.

eral railroad regulation¹³ was that (1) regulation was necessary to protect the general public from powerful railroad monopolies too large to be reached by state legislation, (2) Congress had such regulation in mind when it passed the Interstate Commerce Act in 1887, and (3) the Act would have succeeded except for its emasculation at the hands of the Supreme Court in a series of decisions that undermined the Commission's powers.¹⁴

But many of the advocates of the public interest theory, as well as the liberal historians who adopted it, never understood the economics of railroad operation or of Gilded Age regulatory policy.¹⁵ For example, they tended to regard practices like rate discrimination as "unjust" per se, and as contrary to the best interest of society. The economic theory suggested that, although particular groups of shippers might be injured by rate discrimination, the discrimination favored shippers collectively by increasing the total amount of cargo that the railroads could carry and reducing overall shipping costs in the process.¹⁶ Without knowing it, the advocates and historians of the public interest theory often became the spokespersons for particular interest groups, such as farmers shipping short hauls, and thus facilitated regulatory capture by particular classes of consumers.

Since the earliest days of federal railroad regulation, writers have noted the threat of regulatory capture—the possibility that the legislature or regulatory agency would come to represent the interests of one particular group of people, rather than those of the public in general. The captors might be the railroads themselves,¹⁷ but they might also be farmers or shippers who would use government control of railroads as a device to enhance their own welfare at the expense of railroads¹⁸ or other groups of shippers.¹⁹ In any event, public interest regulation would deteriorate into politics.

LANDIS, REPORT ON REGULATORY AGENCIES TO THE PRESIDENT-ELECT (1960) (submitted to U.S. Senate; calling for reappraisal of activities and functions of regulatory agencies).

13. For the Progressive history, see H. FAULKNER, *THE DECLINE OF LAISSEZ FAIRE: 1897-1917*, at 187-191 (1962); E. KIRKLAND, *A HISTORY OF AMERICAN ECONOMIC LIFE* 286-301 (1932).

14. On the last point, see G. KOLKO, *supra* note 5, at 80-82.

15. *E.g.*, H. FAULKNER, *supra* note 13.

16. That is, as the volume of shipping increased, the amount of fixed costs that had to be allocated per unit decreased. See *infra* text accompanying notes 96-99.

17. See Bolles, *Difficulties and Dangers of Government Rate-Making*, 181 N. AM. REV. 873, 883-84 (1905).

18. See Gaines, *A Living Rate for the Railroads*, 1 YALE REV. (n.s.) 65 (1911) (arguing that Interstate Commerce Commission regulation of railroad rates stifled necessary growth of railroads); Gaines, *Reasonable Regulation of Railroad Rates*, 1 YALE REV. (n.s.) 657 (1912) (arguing that economics of railroads made them too complicated to be run by any agency; politics rather than sensible rate-making was sure to result); Hines, *Legislative Regulation of Railroad Rates*, 4 PUBLICATIONS AM. ECON. A. (3d s.) 84 (1903) (arguing that rate setting by commissioners, who are politicians, will yield political results); McPherson, *The Farmer, the Manufacturer and the Railroad*, 186 N. AM. REV. 405 (1907) (same); Newcomb, *The Diminished Dollar and Railway Rates*, 189 N. AM. REV. 561 (1909) (arguing that shippers had managed to use legislative process to force real rates down to unremunerative levels).

19. *E.g.*, Meyer, *Railway Rates as Protective Tariffs*, 14 J. POL. ECON. 1 (1906) (arguing that

The principal difference between the public interest and capture theories of regulation is that the public interest theory believes that regulation, when passed, is efficient; it makes society as a whole better off.²⁰ To be sure, advocates of the public interest theory historically have not used an economic word like "efficient" to describe the principal purpose of regulation. They would be more inclined to use words such as "just" or "fair." Nevertheless, what they had in mind was a regulatory policy in the public interest, which was identified as the interest of the community as a whole. Economically, a state of affairs that optimizes the public interest is probably best described as Pareto-optimal or potentially Pareto-optimal.

In contrast, capture theorists argue that regulation ends up serving some particular interest group that has managed to make its case to the legislative body or regulatory agency. Incidentally, the regulation may be efficient, but often it is not. The first generation of post-Progressive revisionist historians who wrote about the railroads rejected the public interest theory in favor of a capture theory—but those doing the capturing were shippers or farmers rather than the railroads themselves. For example, George Miller²¹ argued that the impetus for state railroad regulation in the Midwest came from merchants dependent on river traffic and concerned about their own interests, whether or not these interests coincided with the interest of society as a whole. It may also have come from midwestern farmers seeking to obtain local rates as low as the trunk line rates to eastern markets. Lee Benson²² argued that the impetus for regulation came from New York City merchants, whose favored position at the gateway of America's east-west water routes, primarily the Erie Canal, was being challenged by the railroads, and from New York farmers injured by short-haul/long-haul discrimination.²³

The revisionism offered by Miller and Benson is relatively modest in one respect: both the Progressive public interest theory and the Miller/Benson theory believed that the underlying purpose of railroad regulation was to control the railroads for the benefit of shippers. Likewise, both

ICC unduly favored large cities and populated regions at expense of rural areas). *But see* Lorenz, *Railway Rates as Protective Tariffs—Another View*, 14 J. POL. ECON. 170 (1906) (responding to Meyer).

20. For discussions and critiques of the public interest theory, see Becker, *Pressure Groups and Political Behavior*, in CAPITALISM AND DEMOCRACY: SCHUMPETER REVISITED 120 (1985); Becker, *A Theory of Competition Among Pressure Groups for Political Influence*, 98 Q.J. ECON. 371 (1983); Peltzman, *Toward a More General Theory of Regulation*, 19 J.L. & ECON. 211 (1976); Posner, *Theories of Economic Regulation*, 5 BELL J. ECON. & MGMT. SCI. 335 (1974); Stigler, *The Theory of Economic Regulation*, 2 BELL J. ECON. & MGMT. SCI. 3 (1971). *See generally* J. ELY, DEMOCRACY AND DISTRUST: A THEORY OF JUDICIAL REVIEW (1980); Farber & Frickey, *supra* note 10 (arguing that public interest theory of government regulation is far from dead); Sunstein, *Interest Groups in American Public Law*, 38 STAN. L. REV. 29 (1985); Sunstein, *Legal Interference with Private Preferences*, 53 U. CHI. L. REV. 1129 (1986).

21. G. MILLER, *supra* note 6.

22. *See* L. BENSON, *supra* note 6.

23. It cost New York farmers about as much to ship their grain to New York City as it cost midwestern farmers who were four or five times further away.

believed that the railroads were guilty of abuses and that regulatory legislation was designed to force the railroads to be fair. Self-interest may have colored their notions about what is "fair," but that is a different matter.

The work of Miller and Benson is subject to two important criticisms. First, interest group politics standing alone fails to establish regulatory capture. Iowa farmers, midwestern shippers, New York merchants, and the railroads each may have wanted regulation for their own benefit, but that observation is as consistent with the traditional theory of regulation in the public interest as with any theory of regulatory capture. In fact, efficient regulation should claim more widespread support than inefficient regulation, because efficient regulation creates greater net benefits. Any convincing theory of regulatory capture must show not only that some interest group wanted a particular regulatory regime and successfully obtained it. It must also show that the interest group succeeded, even though the regulation resulted in more damage to other interests than benefits to its supporters. Neither Benson nor Miller tried to do this.

Second, neither Benson nor Miller addressed the economic content of 19th century regulatory policy. By and large, Gilded Age railroad economists defended widespread rate discrimination, which was the object of the intensive campaigns described by both Benson and Miller, as economically efficient. These late 19th century economic notions have been surprisingly robust, and they continue to form an important part of regulatory policy, subject only to technical revision.

But the disdain for economics in the public interest theory of regulation or in the essentially Progressive critiques of Benson and Miller is nothing like that contained in the New Left regulatory capture hypothesis, championed principally by Gabriel Kolko in *Railroads and Regulation*.²⁴ According to that theory, regulatory policy, no matter what its initial motive, inevitably falls under the control of the regulated firms. Regulation protects firms from competition, either by controlling rates or restricting entry, and it guarantees their profit margins, no matter how inefficient their investments or operations. Kolko's "proof" of the regulatory capture hypothesis was dramatic. He examined forty years of the legislative and political history of federal railroad regulation and showed that, far from opposing each marginal increase in federal regulatory authority, the railroads were among the strongest supporters. They supported most of the provisions of the original Interstate Commerce Act, as well as most subsequent amendments that broadened federal power and eventually preempted state control.²⁵ In many cases they received almost exactly what they wanted. Kolko's book presented incontrovertible evidence that a prin-

24. G. KOLKO, *supra* note 5.

25. See *infra* notes 261-93 and accompanying text.

cial beneficiary of federal policy toward the railroads during this period was the railroads themselves.

Kolko's study encouraged a broad-based, New Left cynicism about government regulation.²⁶ The gist of the cynical argument is that, good intentions notwithstanding, regulation is almost always passed for the benefit of the regulated, mainly in order to protect regulated firms from competition with one another. Consumers are inevitably regulation's victims rather than its beneficiaries. Ironically, this argument is popular not only with the New Left, but also with parts of the right,²⁷ who have their own theory of regulatory capture.²⁸ Only a few liberals remain to defend the traditional public interest theory,²⁹ which today is widely characterized as naive, out-of-date, inefficient, or—perhaps most painful of all—anticonsumer.³⁰

But Kolko overstated his case, erring at least as much in one direction as the Progressive critique had in the other.³¹ First, he minimized or ignored the role that state regulation played in the overall structure of railroad regulation.³² Second, he made no attempt to explain how the politics and the economics of the railroad industry engaged each other. In Kolko's mind, every dispute became pure politics. *Railroads and Regulation* is a book about railroad lobbying, not about railroad economics. Perhaps his anticapitalist biases prevented him from seeing that in a market economy that includes privately owned regulated firms, the public also has an interest in the long run. The long run in this case included federal protec-

26. Other revisionist work includes L. DAVIS & D. NORTH, *INSTITUTIONAL CHANGE AND AMERICAN ECONOMIC GROWTH* 157-66 (1971); E. KIRKLAND, *DREAM AND THOUGHT IN THE BUSINESS COMMUNITY, 1860-1900*, at 1-28 (1956); P. MACAVOY, *THE ECONOMIC EFFECTS OF REGULATION: THE TRUNK-LINE RAILROAD CARTELS AND THE INTERSTATE COMMERCE COMMISSION BEFORE 1900* (1965); R. WIEBE, *THE SEARCH FOR ORDER: 1877-1920*, at 133-63 (1967).

27. See, e.g., Easterbrook, *supra* note 10; Easterbrook, *Statutes' Domains*, 50 U. CHI. L. REV. 533, 545-48 (1983); Posner, *The Decline of Law as an Autonomous Discipline: 1962-1987*, 100 HARV. L. REV. 761, 774 (1987).

28. See *supra* note 10.

29. In fact, even among liberals acknowledgement of widespread regulatory capture is common. See, e.g., Wiley, *A Capture Theory of Antitrust Federalism*, 99 HARV. L. REV. 713, 723 (1986); Hovenkamp & Mackerron, *Municipal Regulation and Federal Antitrust Policy*, 32 UCLA L. REV. 719 (1985).

30. See e.g., Easterbrook, *supra* note 10, at 15.

31. See Purcell, *Ideas and Interests: Businessmen and the Interstate Commerce Act*, 54 J. AM. HIST. 561, 561-63 (1967). Purcell notes that "business" interests were far less unified than either Kolko or other revisionist historians, such as Lee Benson, suggested. Different groups of shippers, including farmers, and even different business people with railroad interests wanted different kinds of regulatory approaches. See also Harbeson, *Railroads and Regulation, 1877-1916: Conspiracy or Public Interest?*, 27 J. ECON. HIST. 230 (1967). The most comprehensive counterargument to Kolko is A. MARTIN, *supra* note 5. Good summaries of the Progressive theory and those of the revisionists are contained in S. SKOWRONEK, *BUILDING A NEW AMERICAN STATE: THE EXPANSION OF NATIONAL ADMINISTRATIVE CAPACITIES, 1877-1920*, at 125-50 (1982), and McCraw, *Regulation in America: A Review Article*, 49 BUS. HIST. REV. 159 (1975).

32. See *infra* text accompanying notes 194-60.

tion from aggressive state regulatory policies that were driving the railroads to ruin.³³

In the absence of a coherent model for natural monopoly, even one who had no anticapitalist bias would be inclined to view the situation as Kolko saw it. The 19th century debate was excessively politicized, because it was not guided by an economic model that explained railroad behavior in any robust way. However, as an economic explanation emerged, regulatory alternatives appeared that might work to the best interest of both railroads and consumers. Kolko wrote as if Gilded Age regulatory economics had nothing to contribute to Gilded Age railroad practice or policy. As a result, although many of the facts he cited were correct—for example, that by 1887 the railroads were in deep trouble and wanted federal legislation to bail them out³⁴—he missed the point.

The point, once again, is that not every regulation that is supported by the regulated interests constitutes regulatory capture. Implicit in Kolko's argument is an hypothesis about the public interest theory of regulation that only its most simple-minded adherents would support: anything that benefits the regulated firm must not be in the public interest. Thus, the railroads and the shippers were playing a zero-sum game. Any time the railroads won a point, the consumers or shippers necessarily lost. But if *both* political and economic considerations were relevant, then the railroads and the shippers were not playing a zero-sum game at all. Some regulatory approaches could in fact create solutions that simultaneously benefited consumers or shippers and saved the railroads from financial difficulty.

In one important sense the Progressive public interest theory of regulation is more responsive to the historical record than is the Kolko regulatory capture thesis. The public interest theory acknowledges, at least in principle, that regulatory decisionmaking *can* have an economic content. Within the Progressive regulatory model, some regulatory solutions were seen as better for the community as a whole, even though they injured certain interests. The Progressives may have been mistaken to assume that there was an optimal theory of regulation that would emerge from the political process. But if economics has any role in regulatory policy, it is to develop models for regulatory approaches that are better than the alternatives. The Progressives, unlike the New Left, were willing to assume that such approaches existed and that right-minded public officials could sometimes find them.

It is important to understand Gilded Age railroad regulation as a problem of federalism. Writing during the Gilded Age, distinguished legal scholar and eventual railroad regulator Thomas M. Cooley understood

33. See *infra* text accompanying notes 261–93.

34. See *infra* text accompanying notes 138–41.

the most fundamental problem of railroad rate regulation far better than many of the historians who have written about it since:

What is a fatal impediment to its control by law is, that the States and the nation have, in respect to it, a divided power; and while it is for the interest of the nation at large to encourage the competition which favors long hauls, it is for the interest of localities to make competition most active in short hauls. A State is therefore likely to favor legislation which compels proportional charges, or something near such charges, for all distances; but this, if it should be adopted and enforced, would preclude the great through lines of New York and Pennsylvania from competing at Chicago, St. Paul, and St. Louis in the grain-carrying trade of the Northwest, and would reduce such links as are wholly within a State, to the condition of mere local roads, compelled to make high charges or go into bankruptcy.³⁵

By looking only at federal regulation, Kolko³⁶ made the historical case for regulatory capture look much stronger than it is. In the 1880's, states had jurisdiction only over intrastate routes, where rates tended to be very high. On the other hand, the federal government had jurisdiction only over interstate routes, where competition had driven rates on most routes so low that they were unremunerative.³⁷ As a result, the problem Congress faced in the final decades of the 19th century was not high railroad rates but rather the potential collapse of the national railroad system as a result of rate wars or overzealous state regulation. In failing to recognize the importance of federalism, Kolko stacked the deck.

B. *Motive or Model: Regulatory Statutes and Legislative Intent*

Much has been written about the intent of Congress in passing statutes designed to control the railroads, such as the Interstate Commerce Act of 1887,³⁸ the Sherman Antitrust Act of 1890,³⁹ and their successor statutes.⁴⁰ Likewise, much has been written about the intent of state legisla-

35. Cooley, *State Regulation of Corporate Profits*, 137 N. AM. REV. 205, 215 (1883). The solution for Cooley was that rates should not be regulated at all; competition would be much fairer to shippers and suppliers alike. In those few cases—mostly involving municipal utility monopolies—where no competition existed, rate regulation might be necessary. Then it should be carried on with rigorous attention to the public interest. *Id.* at 216.

36. G. KOLKO, *supra* note 5.

37. *See infra* text accompanying notes 81–89.

38. *See, e.g.*, G. KOLKO, *supra* note 5, at 35–71; A. MARTIN, *supra* note 5; Martin, *The Troubled Subject of Railroad Regulation in the Gilded Age—A Reappraisal*, 61 J. AM. HIST. 339 (1974); Rabin, *supra* note 5, at 1209–13.

39. *See* W. LETWIN, *LAW AND ECONOMIC POLICY IN AMERICA: THE EVOLUTION OF THE SHERMAN ANTITRUST ACT* (1965); H. THORELLI, *FEDERAL ANTITRUST POLICY* (1954); Bork, *Legislative Intent and the Policy of the Sherman Act*, 9 J.L. & ECON. 7 (1966); Hovenkamp, *Antitrust Policy After Chicago*, 84 MICH. L. REV. 213, 249–52 (1985); Lande, *Wealth Transfers as the Original and Primary Concern of Antitrust: The Efficiency Interpretation Challenged*, 34 HASTINGS L.J. 65, 80–106 (1982).

40. *See infra* text accompanying notes 263–66.

tures in passing various regulatory statutes such as the Granger laws⁴¹ or the New York scheme of railroad regulation. In almost every case, the word "intent" means subjective intent, and the author examines statements made by participants in the legislative process.⁴²

Those who ascribe a "motive" to Congress when looking at thirty or so years of regulatory legislation are applying an individual psychological metaphor to a large legislative body, and the metaphor does not work well.⁴³ The members of Congress considering railroad legislation had widely different constituencies—those that benefited from low rates for long hauls, such as midwestern shippers,⁴⁴ and those that were injured by them, such as New York shippers;⁴⁵ those that benefited from price discrimination and those that were injured by it; farmers; easterners; westerners; and railroaders themselves. The political process that yielded the antipooling and antidiscrimination provisions of the original 1887 Interstate Commerce Act cannot be reduced to something as simple and unified as a particular congressional intent. As in most controversial statutes, each clause of the 1887 Interstate Commerce Act had a unique set of supporters and critics, as did each subsequent statutory amendment. It is difficult to fashion from this hodgepodge anything resembling unitary subjective "intent."

The problem of intent in the state legislatures is generally simpler, even though the legislative histories are much thinner. In this case, less is better than more, for the enormous legislative history and background of the Interstate Commerce Act only fosters confusion. More importantly, states tended to have less complex interests than did the federal government. This was particularly true of rural midwestern states that had undiversified economies. For example, Iowa, Minnesota, and Wisconsin—three of the four Granger states⁴⁶—had overwhelmingly agricultural economies and relatively few railroad interests. It is fairly clear that the purpose of the Granger laws was to improve the economic welfare of resident farmers.⁴⁷

41. E.g., G. MILLER, *supra* note 6. The Granges were organizations of farmers formed during the late 1860's. Their purpose was to improve the economic welfare of farmers, principally by lobbying state legislatures to set maximum railroad rates. *Id.*

42. Of course, there are the usual questions about whether statements made by those opposing legislation should be counted as describing congressional "intent," or at least whether they are entitled to be counted as much as statements by drafters or other supporters. Those opposing legislation are likely to exaggerate a proposed statute's weaknesses, while they underemphasize or perhaps even mischaracterize its strengths. People speaking in support of a statute may do the opposite.

43. For particularly pessimistic views, see Easterbrook, *Statutes' Domains*, *supra* note 27, at 547-48; Schofield, *Formal Political Theory*, 14 *QUALITY & QUANTITY* 249, 249-50 (1980). See generally W. RIKER, *LIBERALISM AGAINST POPULISM: A CONFRONTATION BETWEEN THE THEORY OF DEMOCRACY AND THE THEORY OF SOCIAL CHOICE* (1982).

44. See G. MILLER, *supra* note 6, at 3-23.

45. See L. BENSON, *supra* note 6, at 29-54.

46. The fourth Granger state was Illinois, which, because of the presence of Chicago as a major shipping point, had a somewhat more complex constituency. See G. MILLER, *supra* note 6, at 59-96.

47. Even here, however, there is evidence that businessmen whose fortunes were tied to river

“Objective” rather than “subjective” studies of legislative history often provide more reliable indicators about legislative policy or motive. To understand why a legislative body acted, it is often more important to know something about the economic, psychological, and intellectual pressures on the legislature than what its individual members said. They are playing to the gallery far too often. As a result, the historian trying to understand regulatory legislation should pay more attention to the prevailing economic views and political pressures of the day, and less to the manifold, inconsistent statements of subjective Congressional intent. Intellectual history and economic history can be more valuable than legislative history as explanatory devices.

C. *The Politics and Economics of Gilded Age Railroad Policy*

The relative weight of distributive and efficiency concerns in legislative policy depends on the state of science in the area affected by the policy.⁴⁸ Distributive concerns are always present and generally well known to gainers and losers, even if the scientific formulation of a problem is relatively primitive or naive. Without a robust model that describes a social problem and makes reliable predictions, legislative regulation of that particular problem will be highly susceptible to politics, for every legislative proposal produces gainers and losers, whether the resulting regulation is efficient or even coherent.

As a robust model develops and becomes an acceptable part of normal science,⁴⁹ however, a consensus develops and legislative policy becomes more coherent. The less controversial the model, the more isolated and impotent its opponents. When a particular scientific explanation becomes widely accepted, the state will more likely be able to implement the model despite the objections of losers. For example, the holders of corporate charters claiming monopoly power suffered when the prevailing economic model changed from mercantile to classical political economy.⁵⁰ The law of race discrimination was transformed when the prevailing social science model changed from genetic determinism to environmentalism.⁵¹ On the other hand, those areas where science appears not to provide satisfactory answers remain the most politically controversial.⁵²

transportation also wanted to regulate rate discrimination. *See id.* at 67.

48. *See* Hovenkamp, *The Political Economy of Substantive Due Process*, 40 *STAN. L. REV.* 379 (1988); Hovenkamp, *supra* note 3; Hovenkamp, *Social Science and Segregation Before Brown*, 1985 *DUKE L.J.* 624.

49. On “normal” science, see T. KUHN, *THE STRUCTURE OF SCIENTIFIC REVOLUTIONS* 10–34 (2d ed. 1970).

50. *See* M. HORWITZ, *THE TRANSFORMATION OF AMERICAN LAW: 1780-1860*, at 109–139 (1977); Hovenkamp, *supra* note 3, at 1290–93; Hovenkamp, *The Classical Corporation in American Legal Thought*, — *GEO. L.J.* — (1988).

51. *See* Hovenkamp, *Social Science and Segregation Before Brown*, *supra* note 48, at 665–70.

52. For example, psychology and psychiatry have never forged a robust consensus about the relationship between mental state and criminal responsibility. As a result, legislative attempts to make

None of this is to say that the legislative process is always efficient, or that it is usually inefficient.⁵³ Economic models define efficient solutions, but two different models may develop quite different ideas of efficiency.⁵⁴ For example, the "Codes of Fair Competition" developed during the New Deal, which permitted various kinds of industry cartelization, may have appeared quite efficient according to the prevailing economic model—the theory of monopolistic competition. But when neoclassicism reemerged as the dominant model, the Codes looked like just another way that the regulatory process might help businesses avoid competition. The best one can say is that in the absence of a coherent model, legislation is less likely to be efficient by any measure. When legislation is guided by a coherent and robust model, it is more likely to be efficient in terms of that particular model. It may not be efficient as defined by some other model.

Likewise, no argument is made here that the legislative process, or even the process of molding scientific models, can transcend politics. On the contrary, science is as political as any discipline, and a scientific model is nothing more than a kind of argument that the world should be viewed in a certain way. Some modernists would have us believe that scientific models are politically neutral statements whose only purpose is to facilitate predictions.⁵⁵ But in fact models are designed to build consensus. We accept them because they achieve the results we want or expect. We accept them because we find them attractive, whether because of their elegance,⁵⁶ their rhetoric,⁵⁷ or their simplicity, which may be a combination of both.

Nowhere is this view of scientific models clearer than in the formation of American regulatory policy during the 19th century. When the first American railroads were built in the 1820's, the dominant American theory of political economy was classicism, although many American jurists were still educated in a pre-classicist, mercantilist theory. Both mercantilism and classicism had poorly developed theories of natural monopoly.

criminal responsibility a "scientific" issue rather than a moral or legal problem have been highly controversial and commensurately less successful. See Hovenkamp, *Insanity and Criminal Responsibility in Progressive America*, 57 N.D.L. REV. 541 (1981).

53. There is a great deal of literature on the question whether legislation is efficient. See Easterbrook, *supra* note 10, at 15-17; Farber & Frickey, *supra* note 10; Macey, *supra* note 10; Peltzman, *supra* note 20; Posner, *Economics, Politics, and the Reading of Statutes and the Constitution*, 49 U. CHI. L. REV. 263 (1982); Stigler, *supra* note 20.

54. See, e.g., E. CHAMBERLIN, *THE THEORY OF MONOPOLISTIC COMPETITION* (1933). See also E. HAWLEY, *THE NEW DEAL AND THE PROBLEM OF MONOPOLY: A STUDY IN ECONOMIC AMBIVALENCE* 36-43 (1966).

Likewise, the classical model of welfare economics believed that wealth transfers were neutral at best, and potentially inefficient. The late neoclassical, or material welfare, school believed that wealth transfers from the wealthy to the poor increased total welfare, because a dollar held by a poor person produced more satisfaction than one held by a rich person. Hovenkamp, *Political Economy of Substantive Due Process*, *supra* note 48, 437-38.

55. See, e.g., M. FRIEDMAN, *The Methodology of Positive Economics*, in *ESSAYS IN POSITIVE ECONOMICS* 3 (1953).

56. See Nobel Prize physicist Steven Weinberg's *Beautiful Theories* (Second Annual Gordon Mills Lecture on Science and the Humanities, Univ. of Texas, April 5, 1983).

57. See generally D. McCLOSKEY, *THE RHETORIC OF ECONOMICS* (1985).

Mercantilists such as Sir William Blackstone⁵⁸ or Justice Story,⁵⁹ believed that the granting of monopoly rights was an important mechanism for encouraging investment.⁶⁰ Within the mercantile model, monopoly rights were generally justified if the investment required to enter a particular market was relatively large.

At the other extreme, classical political economy was an essentially political reaction to the guilds, the Corn Laws, and other state-created monopoly interests produced by the Crown during the Elizabethan period.⁶¹ Classical political economy was antimonopolistic with a vengeance, and it developed elaborate theories showing that monopolies were socially harmful.⁶² Most classical political economists—who clearly dominated both economic and judicial thinking in America by the 1850's—believed that in every market, competition among incumbent sellers was the optimal way to deliver goods and services. For the relatively few exceptions, such as the provision of streets, lighthouses, or poor relief, there should be no “market” at all, and the government should be the only supplier.⁶³

Jurists laboring at different periods of the 19th century and considering large issues of state economic policy accepted either mercantilism or classicism as a basic explanatory model. The shift from one model to the other explains the rather awesome difference in constitutional “attitude” presented in *Charles River Bridge*⁶⁴ in 1837 and the *Slaughter-House Cases*⁶⁵ less than forty years later. *Charles River Bridge* made a constitutional issue of whether a monopoly provision should be implied in a charter that did not explicitly contain one. The *Slaughter-House Cases* made a constitutional issue of whether a monopoly provision explicitly contained in a charter was invalid because market participants had a constitutional right to a competitive regime. In less than four decades, a mere economic revolution had stood the Constitution on its head.

Classical political economy generally began with the premise that *all* markets worked best if they were competitive. Furthermore, Adam Smith's “pure” classical political economy, without the market failures later perceived by Thomas Malthus, David Ricardo, and John Stuart

58. See M. HORWITZ, *supra* note 50, at 115.

59. See *Charles River Bridge v. Warren Bridge*, 36 U.S. (11 Pet.) 420, 608 (1837) (Story, J., dissenting); see also M. HORWITZ, *supra* note 50, at 118; Hovenkamp, *supra* note 3, at 1287-92.

60. See Hovenkamp, *supra* note 3, at 1291-92.

61. See *The Case of Monopolies*, 11 Coke 84, 77 Eng. Rep. 1260 (1602). See generally De Roover, *Monopoly Theory Prior to Adam Smith: A Revision*, 65 Q.J. ECON. 492 (1951); Letwin, *The English Common Law Concerning Monopolies*, 21 U. CHI. L. REV. 355 (1954).

62. For a contemporary American argument, see Nott, *Monopolies*, 1 INT'L REV. 370 (1874).

63. For a candid perspective on the difficulties faced by an economist trained in the classical tradition and then learning about large industries in which competition will not work, see Hadley, *Legal Theories of Price Regulation*, 1 YALE REV. 56 (o.s.) (1891). But see Lewis, *Can Prices be Regulated by Law?* 6 AM. L. REG. (2d s.) 9 (1893) (responding to Hadley).

64. *Charles River Bridge v. Warren Bridge*, 36 U.S. (11 Pet.) 420, 608 (1837) (Story, J., dissenting).

65. 83 U.S. (16 Wall.) 36 (1873).

Mill, lasted much longer in the United States than it did in England.⁶⁶ Even as late as the 1880's, when substantial evidence indicated that railroads performed poorly under competition, some die-hard classicists continued to assert the classical model. In 1884, Gerrit Lansing argued that rate regulation of railroads was completely unnecessary, because competition was quite adequate to control the problem.⁶⁷

Lansing believed that in the long run the railroads could not earn a higher return on their capital than other industries earned, because capital always flows to where the return is highest. As a result, new investment in railroads would continue until competition drove returns down to the level prevailing in other industries.⁶⁸ This attitude undoubtedly contributed much to the railroad overdevelopment already ruining the industry in the 1880's.⁶⁹ Lansing failed to perceive the difficulty of his distinctly classical argument in a market where the classical model fell apart.⁷⁰ If railroads were indeed a natural monopoly, monopoly railroads would earn monopoly returns, while competitive railroads would earn negative returns. There was no unregulated equilibrium at which they would perform competitively.⁷¹

D. *Federalism, Classicism, and the Interstate Market for Railroad Transportation*

1. *The Railroads and the Growth of Interstate Markets*

Although the development of railroads in the United States left behind its share of individual victims,⁷² virtually every major interest group—farmers, other shippers, investors, and certainly consumers—profited immensely in the aggregate. Railroads made more goods available to more people at a lower price. They made economic development of the Midwest possible and greatly hastened the pace of development in the eastern seaboard, the South, and the West.⁷³

To be sure, railroads often earned monopoly returns—particularly in

66. See Hovenkamp, *The Political Economy of Substantive Due Process*, *supra* note 48, at 411-37.

67. Lansing, *The Railway and the State*, 138 N. AM. REV. 461, 475 (1884).

68. *Id.* at 462-63.

69. See *infra* text accompanying notes 138-41.

70. Indeed, by the time Lansing wrote, many European countries had begun to socialize their railroad systems. See A. HADLEY, *RAILROAD TRANSPORTATION: ITS HISTORY AND ITS LAWS* 236-37 (1885).

71. See *infra* text accompanying notes 93-99.

72. An example is the settlers in the San Joaquin Valley, California, who suffered as a result of railroad development. See F. NORRIS, *THE OCTOPUS* (1931).

73. There is some controversial evidence to the contrary. See R. FOGEL, *RAILROADS AND AMERICAN ECONOMIC GROWTH: ESSAYS IN ECONOMETRIC HISTORY* (1964). Fogel's thesis that the railroads made only a modest contribution to American economic growth is criticized in McClelland, *Railroads, American Growth, and the New Economic History: A Critique*, 28 J. ECON. HIST. 102 (1968); see also D. McCLOSKEY, *supra* note 57, at 114-19 (summarizing Fogel's thesis and characterizing his argument as overly rhetorical and self-referential).

the early period of their development—but they earned them because railroads were so much better than the alternatives. Even the most monopolistic railroad freight rates were lower than the prevailing rates under older forms of transportation. As Yale political economist Arthur Twining Hadley noted in 1885, before the coming of the railroads, wheat could be economically shipped only about 200 miles from the place where it was grown. Railroads eventually made nationwide and worldwide shipping of wheat and other foodstuffs commonplace.⁷⁴ This market expansion was a mixed blessing for farmers and other shippers. On the one hand, they could market their products over a much wider area. On the other hand, everyone else could do the same, and the market for many products became much more competitive. Ironically, although many of the railroads were monopolies, they destroyed many more local monopolies than they created by facilitating competition between regions. In fact, one of the greatest complaints of eastern shippers, particularly of New York merchants, was that the railroads undermined their favored position at the gateway of American commerce by giving other cities the same access to worldwide markets.⁷⁵

The railroads did not only create interstate markets for many of the products that they shipped; they themselves became a large interstate market—namely the market for interstate transportation services. Both competition and essential cooperation among railroads took place on a national rather than an intrastate scale. This emergence of a national transportation market explains why the problem of railroad regulation so quickly became a problem of federalism as well.⁷⁶

2. *The Classical Theory of Federalism*

During the Taney period,⁷⁷ the Supreme Court adopted a constitutional theory of federalism drawn largely from classical political economy.⁷⁸ In fact, the Jacksonian federalism that eventually dominated the 19th century law of federal-state relations represented the triumph of classical economic theory in American public law. The great legal writers like Cooley, who contributed so much to the development of laissez-faire constitutional theory, were Jacksonians trained in a western, expansionist, antistatist tradi-

74. A. HADLEY, *supra* note 70, at 65–66. Charles Francis Adams, Jr. quoted slightly different figures fourteen years earlier. He believed that before the emergence of railroads, it cost as much to ship a bushel of corn 125 miles as the corn was worth, or as much to ship a bushel of wheat 250 miles as the wheat was worth. Adams, *supra* note 2, at 356.

75. See G. KOLKO, *supra* note 9, at 18–25. See generally L. BENSON, *supra* note 22, at 80–87.

76. On the railroad system in 1890 and its development, see G. TAYLOR & I. NEU, *THE AMERICAN RAILROAD NETWORK, 1861–1890* (1956). States had to contend with other natural monopolies, including toll bridges, gas lights, and waterworks, but these other monopolies largely operated in discrete, intrastate markets.

77. Chief Justice Roger B. Taney was appointed by President Jackson in 1836 and served until 1864.

78. See Hovenkamp, *The Classical Corporation in American Legal Thought*, *supra* note 50.

tion, that believed state regulation was often little more than a grant of special privilege to the politically favored.⁷⁹ Within this Jacksonian theory, competition was the preferred regulator of commercial markets. Governmental control, particularly federal control, was the exception rather than the rule, and the common law was not yet thought of as a “regulatory” device.

This classical concept of federalism, with its built-in bias against governmental intervention, created so many regulatory vacuums that it hindered comprehensive regulation of interstate markets.⁸⁰ The developers of classical federalism assumed that substantial government regulation would not be necessary. As a result, they ignored the fact that even in the early 19th century there were many interstate markets and that most of those markets did not follow state lines. Failures in such markets were inherently interstate problems.

Under the classical theory of federalism, the states could control only intrastate transactions. Decisions like *Gibbons v. Ogden*,⁸¹ *Pennoyer v. Neff*,⁸² and *Swift v. Tyson*⁸³ greatly limited a state’s power to regulate outside its boundaries. Likewise, the federal government had exclusive control over interstate *movement*, but not generally over transactions within a single state that merely affected interstate commerce.⁸⁴ For this reason, members of Congress, such as the authors of the Cullom Committee Report, which preceded the passage of the Interstate commerce act, refused to assert any authority over intrastate railroad traffic.⁸⁵

Classical federalism’s regulatory model often gave neither the states nor the federal government effective control over spillovers—areas in which intrastate transactions had interstate effects, or interstate movement had local effects. The high point of this regulatory attitude was the *E.C.*

79. See Jones, *Thomas M. Cooley and “Laissez-Faire Constitutionalism”: A Reconsideration*, 53 J. AM. HIST. 751 (1967); see also M. MEYERS, *THE JACKSONIAN PERSUASION: POLITICS AND BELIEF* 142–56 (1957); Benedict, *Laissez-Faire and Liberty: A Re-Evaluation of the Meaning and Origins of Laissez-Faire Constitutionalism*, 3 LAW & HIST. REV. 293 (1985); Gold, *Redfield, Railroads, and the Roots of “Laissez-Faire Constitutionalism,”* 27 AM. J. LEGAL HIST. 254 (1983). On the Jacksonian roots of laissez-faire constitutional theory, see W. NELSON, *THE ROOTS OF AMERICAN BUREAUCRACY, 1830-1900*, at 148–55 (1982).

80. Ironically, the much broader interpretations of the Commerce Clause and of state extraterritorial power that emerged in the 20th century have turned the federal system into one that chronically *overregulates*, because so many markets are subject to simultaneous federal and state control.

81. 22 U.S. (9 Wheat.) 1 (1824) (commerce clause prevents state from creating monopoly steamship line between itself and another state).

82. 95 U.S. 714, 722 (1877) (concluding that “no State can exercise direct jurisdiction and authority over persons or property without its territory” and that “the laws of one State have no operation outside of its territory, except so far as is allowed by comity . . .”).

83. 41 U.S. (16 Pet.) 1 (1842) (applying general common law rather than state law in diversity cases in federal courts). See Hovenkamp, *Federalism Revised* (Book Review), 34 HASTINGS L.J. 201 (1982).

84. *Illinois Cent. R.R. v. McKendree*, 203 U.S. 514, 520 (1906); *Addyston Pipe & Steel Co. v. United States*, 175 U.S. 211, 247 (1899). See R. REEDER, *THE VALIDITY OF RATE REGULATIONS, STATE AND FEDERAL* 15–16 (1914).

85. See S. REP. NO. 46, 49th Cong., 1st Sess. 28–39 (1886).

*Knight*⁸⁶ decision in 1895, which interpreted the Commerce Clause narrowly to deny Congress the power to regulate interstate manufacturing trusts. The courts had already established that states did not have jurisdictional power to control such trusts.⁸⁷ The result of *E.C. Knight* was a regulatory vacuum⁸⁸ so large that the Supreme Court soon changed its mind and expanded federal power over interstate commerce.⁸⁹

The classical theory of federalism led America to undertake a fundamentally irrational plan that, on the whole, proved to be extraordinarily successful: to develop an interstate railroad system largely by means of state initiative⁹⁰ and almost exclusively under state control. It took nearly a century for federal policymakers to decide that national markets require federal regulation and suppression of inconsistent regulation from the states.⁹¹

86. *United States v. E.C. Knight Co.*, 156 U.S. 1 (1895).

87. *E.g.*, *State v. Standard Oil*, 49 Ohio 137, 30 N.E. 279 (1892). *Standard Oil* was found to be in violation of the state common law of trade restraints and ordered to divest its out-of-state assets. It responded to the Ohio decree by forming a new corporation under New Jersey law and transferring all the affected assets there. *See* B. BRINGHURST, *ANTITRUST AND THE OIL MONOPOLY: THE STANDARD OIL CASES, 1890-1911*, at 10-39 (1979); *see also* *People v. American Sugar Ref. Co.*, 7 RAILWAY & CORP. L.J. 83 (Cal. 1890); *People v. North River Sugar Ref. Co.*, 121 N.Y. 582, 24 N.E. 834 (1890); *State v. Nebraska Distilling Co.*, 29 Neb. 700, 46 N.W. 155 (1890); *People ex rel. Peabody v. Chicago Gas Trust Co.*, 130 Ill. 268, 22 N.E. 798 (1889); *Louisiana v. American Cotton Oil Trust*, 1 RAILWAY & CORP. L.J. 509 (La. 1887). In each of these cases, the corporations responded to the state dissolution decree by reincorporating under the liberalized New Jersey law. McCurdy, *The Knight Decision of 1895 and the Modernization of American Corporation Law, 1869-1903*, 53 BUS. HIST. REV. 304, 323 (1979).

88. *See* E. CORWIN, *THE TWILIGHT OF THE SUPREME COURT 20-21* (1934); *see also* Stewart, *Progress of the Law*, 43 AM. L. REG. & REV. 77, 88-90 (1895) (scathing review of *E.C. Knight* decision, which concludes that *Knight* left both states and Congress "powerless to overthrow" interstate trusts).

Charles McCurdy disputes the notion that the *Knight* decision effectively created a regulatory vacuum with respect to interstate manufacturing companies. *See* McCurdy, *supra* note 87. McCurdy argues that although the states had no power to reach productive assets or corporations in other states, they did have the power to prevent productive assets within their own states from being acquired by foreign corporations. But McCurdy cites for that proposition cases holding that states could prevent their own corporations from acquiring shares in a New Jersey holding company. *Id.* at 330-34 & n.102 (citing, e.g., *McCutcheon v. Merz Capsule Co.*, 71 F. 787 (6th Cir. 1896)).

Some trusts were formed when subsidiary corporations desired to exchange their shares for shares in the holding company, but the part of that transaction in which the holding company shares passed to the subsidiary was illegal under the laws of most states. State law often did not reach asset acquisitions. *See* *Diamond Match Co. v. Roeber*, 106 N.Y. 473, 13 N.E. 419 (1887) (finding merger to monopoly by asset acquisition legal). Likewise, state law generally could not reach cash purchases of shares by holding companies chartered in other states. As McCurdy himself notes, states did not mount a successful attack on trusts organized under liberalized corporation laws such as those of New Jersey. McCurdy, *supra* note 87, at 338.

89. *E.g.*, *Montague & Co. v. Lowry*, 193 U.S. 38, 48 (1904); *United States v. Addyston Pipe & Steel Co.*, 85 F. 271, 296-99 (6th Cir. 1898), *modified*, 175 U.S. 211 (1899).

90. Although federal subsidies, particularly via land grants, were a significant supplement to state and local subsidies, *see generally* C. GOODRICH, *supra* note 6, at 169-203, before 1887 federal regulation was virtually nonexistent, except for regulations written into the particular charters of federally chartered railroads. *See* Rabin, *supra* note 5, at 1196.

91. The relevant dates are 1826, when the first American railroad was chartered by Massachusetts, to 1920, when the Federal Transportation Act was passed to give the federal government authority over even intrastate rate-making. *See* C. ADAMS, *RAILROADS: THEIR ORIGIN AND PROBLEMS 47* (1893); *see also infra* text accompanying notes 107-08.

II. THE RAILWAY PROBLEM

From about the end of the Civil War until well after the passage of the Interstate Commerce Act in 1887, a number of interrelated theoretical concerns about the governance of railroads led to what many called "the railway problem."⁹² The fundamental problem at the root of all these difficulties was that the laws of competition developed in classical economic theory were not working well for the railroads. Monopoly railroads earned monopoly profits, while competing railroads were driven into bankruptcy. This economic problem quickly became a constitutional problem, for it meant that *some* sort of sovereign intervention might be required—precisely the kind of intervention that the classical theory of federalism made so difficult.

A. *The Simple Economics of Railroad Rates*

Both the difficult economic problem of railroad regulation and the closely related problem of federalism result from the same fact: narrowly considered, a railroad line between two given points is a "natural monopoly."⁹³ Both the building of tracks and the operation of trains are subject to substantial economies of scale. As a result, in most cases the total fixed and variable costs of operating one railroad between two given points are significantly lower than the total costs of operating two railroads between the same two points, which, in turn, are lower than the total costs of operating three railroads. A single line is generally capable of handling all the traffic, and the acquisition of land, and construction and maintenance of the track incur some of the largest costs of operating a railroad. Furthermore, even on a single line, the cost of shipping tends to decline as volume increases. For example, larger trains carry cargo at a lower cost per unit than do smaller trains. As additional cars are added, the cost per car decreases. The optimal system would have a single railroad operating between two given points and earning only a competitive return. However, since a privately owned railroad seeks to maximize its profits just as much as any other private firm, monopoly railroads can be expected to charge monopoly prices.

Nothing is deadlier for a natural monopoly firm than to be thrown into "unnatural" competition. Within the neoclassical economic model, there is

92. E.g., A. FINK, *THE RAILROAD PROBLEM AND ITS SOLUTION* (1880); A. STICKNEY, *THE RAILWAY PROBLEM* (1891); Bryce, *The Railway Problem: I. The Legislative Solution*, 164 N. AM. REV. 327 (1897); Garrett, *The Railway Problem*, 129 N. AM. REV. 361 (1879); Patterson, *The Railway Problem*, 13 PRINCETON REV. (4th s.) 36 (1884); Waite, *The Railway Problem: II. A Mercantile View*, 164 N. AM. REV. 338 (1897). See also James, *The Railway Question*, 2 PUBLICATIONS AM. ECON. A. 236 (1887); Morris, *The Railway Crisis: A Way Out*, 4 YALE REV. (n.s.) 520 (1915).

93. Initially, the discussion addresses only a single line or parallel lines between the same two points. As the later discussion indicates, competition between railroad lines that were not parallel could be substantial.

no equilibrium⁹⁴ at which two or more natural monopoly competitors can both behave competitively and earn positive rates of return. Total costs of operating railroads rise as the number of railroads operating between two given points increases, because the large capital costs of building lines must be incurred multiple times, even though one line is capable of carrying all the traffic. However, prices are likely to go down as the railroads compete with each other for business. Although railroads have very high fixed costs (acquisition of land, assuming they have to pay for it,⁹⁵ construction of tracks, and acquisition of trains), they have relatively low variable costs (fuel and wages). As a result, a price equal to short-run marginal cost—the cost of accepting an additional package for shipment on a train that is already scheduled—is much less than the total cost that shipping the package imposes on the railroad. Under competition, prices will be driven down to a level sufficient to cover operating costs, but insufficient to cover the fixed costs, and the railroad will be unable to service its long-term debts.

To take a simple example, assume that a railroad must pay \$100,000 monthly in order to amortize its fixed costs on a certain route. Once the land is acquired and the tracks built, this amount must be paid whether or not the trains run, and it does not vary with the amount of freight the trains carry. The railroad makes 100 runs per month on this route, with trains capable of carrying 1000 units of cargo each. Thus, in order to cover its fixed costs alone, the railroad must receive \$1.00 per unit. But the cost of accepting an additional unit of cargo on such a train is small, perhaps 40 cents per unit.⁹⁶ Assuming that the variable costs of shipping (i.e., the costs of fuel and labor) are constant,⁹⁷ the railroad would make a reasonable profit at a rate of \$1.40—enough to pay both its fixed and variable costs, which are defined to include a sufficient profit to maintain investment in the industry.

The unregulated monopoly railroad cannot be expected to charge \$1.40. Rather it will charge the amount it estimates the traffic will bear, and this price may very well be much higher than \$1.40. For example, if the closest competitors are horse-driven wagons, which must charge \$2.50 per

94. That is, there is no stable situation.

95. In fact, frequently they did not have to pay for land, and this accounts for a great deal of the overdevelopment. See generally L. MERCER, *supra* note 6. See also C. GOODRICH, *supra* note 6.

96. This ratio of fixed to variable costs is consistent with the ratios found to obtain in 1873 on the Louisville & Nashville and Great Southern Railroad. A. FINK, *COST OF RAILROAD TRANSPORTATION, RAILROAD ACCOUNTS, AND GOVERNMENTAL REGULATION OF RAILROADS* (1875); Fink, *Cost of Railroad Transportation*, 1 J. RAILWAY A. AM. 46, 53 (1874). Fink estimated that the ratio of fixed costs to direct operating costs on the different lines of that railroad varied from approximately .38 to approximately 2.44.

97. In fact, these costs are not constant, but decline as the train becomes larger. For example, both a train with 10 cars and a train with 60 cars might need a crew of four. Likewise, it costs about as much to ship a half empty car as it costs to ship one that is completely filled. These facts make the railroad's natural monopoly situation even more extreme.

unit in order to make a profit, the railroad might maximize its profits at a price of \$2.40.

A state policymaker witnessing these high railroad profits might be disturbed. If this policymaker were a classicist, the first solution that would come to mind would not be rate regulation, but competition. Under a competitive regime, if a second railroad line were chartered and built between the same two points, fixed costs would double. There would be two lines, *each* of which must pay \$100,000 monthly in order to recoup its investment in its land, tracks, and equipment. If the volume of shipping were to remain constant at 1000 units between the two points, the fixed cost component of the freight rate would have to be doubled to \$2.00 per unit, for each railroad would carry only one half the traffic.⁹⁸ This market is a natural monopoly, because fixed costs are lowest when a single firm satisfies the entire market.

If the two railroads behave competitively, however, they will begin cutting prices in order to steal business from each other. Any price above short-run marginal cost is "profitable" in the sense that it covers the direct costs of shipping and contributes *something* to the amortization of the fixed costs. That is, the railroad would be better off accepting a package for 55 cents, which would cover its direct costs and contribute 15 cents to fixed costs, than it would be in not carrying the package at all, even though 55 cents is not nearly enough to cover all the costs. Such competition would drive prices to marginal cost, but in the case of the natural monopoly market, these costs are much lower than total costs. Both railroads would lose money until they formed a cartel and set a very high price, sufficient to cover their *joint* fixed costs and variable costs, which would be at least \$2.40 per unit.⁹⁹ Otherwise, one of the railroads would be driven out of business, and the monopoly situation would be restored.

Because of the doubling of fixed costs caused by railroad "competition," the price of shipping a package could actually rise while both railroads lost money. Thus, competition is bad for the railroads and often bad for consumers as well. In the short run, consumers may benefit from very low rates; but in the long run they will end up bearing the cost of needless additional capacity. Once the two railroads are built, not even price regulation will help consumers much, because the regulator must set a rate sufficient to guarantee each railroad a reasonable return, and that rate will be much higher if there are two railroads than if there is only one.

98. Variable costs would remain constant at 40 cents per unit.

99. It could be substantially more, because demand for the railroads' services will decline in response to the higher price, thus raising the fixed costs to more than \$2.00 per unit shipped.

B. Responses

The simple model described above explains virtually every important phenomenon in the regulatory history of American railroads in the late 19th century.

1. *Why the States Tried To Charter Multiple Railroads*

Monopoly railroads meant monopoly rates. Within the classical model of political economy, the first solution to monopoly is not rate regulation but competition. In a few early cases, states made the expensive mistake of creating railroad monopolies by charters that granted exclusive rights to carry cargo or passengers between two named points.¹⁰⁰ But states learned their lessons quickly, and by the mid-19th century the vast majority of railroad charters contained no monopoly provisions. State legislatures generally attempted to solve the problem of high railroad rates by creating more railroads, with the result that railroad routes, particularly along longer hauls, became increasingly competitive between 1860 and the 1890's.¹⁰¹ The eventual consequences for the railroads were disastrous, for the reasons suggested by the simple model above.¹⁰²

2. *Why Subsidies Were Necessary for Multiple Railroads*

An experienced railroad manager did not need an economic model of natural monopoly to know that competition was bad for the railroad business. For this reason, railroads needed to be encouraged to build new lines, especially if there were other railroads nearby.¹⁰³ This explains many of the government subsidies to encourage railroad development in

100. See *The New Jersey Monopolies*, 104 N. AM. REV. 428 (1867); Cooley, *Limits to State Control of Private Business*, 1 PRINCETON REV. (4th s.) 233, 261 (1878); Towles, *Early Railroad Monopoly and Discrimination in Rhode Island, 1835-55*, 18 YALE REV. 299 (o.s.) (1909). In addition, there were a few early decisions that railroad charters implied monopoly rights. E.g., *Boston & L.R.R. v. Salem & L.R.R.*, 68 Mass. (2 Gray) 1, 32-34 (1854). As a matter of federal law, the Supreme Court held in *Charles River Bridge v. Warren Bridge*, 36 U.S. 420 (1837), that a corporate charter need not imply a monopoly right. However, it consistently upheld explicit monopoly rights contained in corporate grants. *The Slaughter-House Cases*, 83 U.S. (16 Wall.) 36 (1873); *In re Binghamton Bridge*, 70 U.S. (3 Wall.) 51 (1865).

101. The Cullom Committee Report, urging passage of what was to become the Interstate Commerce Act of 1887, assumed that a principal cause of the railroads' financial woes was overdevelopment brought on by state subsidy and other legislative urging. S. REP. NO. 46, 49th Cong., 1st Sess. 48-51 (1886).

102. Alfred Chandler suggests that railroad overdevelopment resulted not merely from state growth policy, but also from each railroad's desire to protect itself by controlling lines to every point in its perceived territory. A. CHANDLER, *THE VISIBLE HAND: THE MANAGERIAL REVOLUTION IN AMERICAN BUSINESS* 147 (1977).

103. For an examination of the reluctance of railroads to build competing lines in the absence of state subsidy, see C. GOODRICH, *supra* note 6, at 238. See also Callender, *The Early Transportation and Banking Enterprises of the States in Relation to the Growth of Corporations*, 17 Q.J. ECON. 111, 112 (1902) (arguing subsidies were necessary for railroads to develop in many markets). For a contemporary economic evaluation of the subsidy policy in one state, see Million, *State Aid to Railroads in Missouri*, 3 J. POL. ECON. 73 (1894).

the mid-19th century. The subsidies included free land, subsidized loans often financed by municipal bonds, or sometimes even outright grants of cash.¹⁰⁴ State courts frequently considered the constitutionality of such subsidies and they approved most of them,¹⁰⁵ as did the United States Supreme Court.¹⁰⁶

3. *Why the States Regulated First: The Historical Development of the Rate Regulation Movement*

States began to regulate railroad rates some forty years before the federal government did.¹⁰⁷ Most of the monopoly rates were charged for short hauls, which were predominantly intrastate, while most long-haul, interstate rates were quite low. From the viewpoint of the federal government, which had jurisdiction only over interstate shipments, rates seemed quite competitive, or even so low that they were unremunerative.¹⁰⁸

4. *Why the Railroads Sought Repeatedly To Cartelize the Freight Market, and Why the Cartels Did Not Work Well*

As noted above,¹⁰⁹ multiple railroads operating between the same two points could not make a profit if they behaved competitively. As far as the railroads were concerned, the solution was not to behave competitively. Many students of the railroad problem argued that wherever there were competing railroads, cartelization was inevitable.¹¹⁰ In no other industry have attempts at both legal and illegal cartelization been so persistent, widespread, systematic, or ultimately doomed to failure.

For thirty years, a great debate waged among railroad economists and policymakers over whether "pooling"—a form of cartelization in which traffic and income were divided among participating railroads¹¹¹—should

104. The best study of such subsidies is C. GOODRICH, *supra* note 6.

105. For state court decisions striking down railroad subsidies, see *People ex rel. Detroit & H.R.R. v. Township Board*, 20 Mich. 452 (1870); *Hansen v. Iowa*, 27 Iowa 28 (1869); see also Kent, *Municipal Subscriptions and Taxation in Aid of Railroads*, 9 AM. L. REG. (n.s.) 649 (1870) (favoring subsidies); Payson, *Taxation for Railroads by New England Towns*, 16 AM. L. REV. 893 (1882) (arguing against public subsidies and taxation for railroads); W. B. J., *County Subscriptions to Railroad Corporations*, 11 AM. L. REG. 737 (1872) (arguing against subsidies).

106. *Quincy v. Jackson*, 113 U.S. 332 (1885); *City of Jonesboro v. Cairo & St. L.R.R.*, 110 U.S. 192 (1884) (decided under state law); *Taylor v. Ypsilanti*, 105 U.S. 60 (1881) (state law); *Railroad Co. v. County of Otoe*, 83 U.S. (16 Wall.) 667 (1872) (state law). However, the Supreme Court occasionally struck down subsidies to industries other than railroads, holding that they violated the constitutional obligation that tax monies be used for a public purpose. *City of Parkersburg v. Brown*, 106 U.S. 487 (1883); *Loan Ass'n v. Topeka*, 87 U.S. (20 Wall.) 655 (1874).

107. Eminent railroad legal scholar Isaac Redfield, however, called for federal regulation as early as 1874. Redfield, *Regulation of Interstate Traffic on Railways by Congress*, 22 AM. L. REG. (o.s.) 1 (1874).

108. See *infra* text accompanying notes 261–88.

109. See *supra* text accompanying notes 93–99.

110. E.g., Rice, *A Remedy for Railway Abuses*, 134 N. AM. REV. 134 (1882).

111. On the development of the American pooling system, see Gilchrist, *Albert Fink and the Pooling System*, 34 BUS. HIST. REV. 24 (1960); see also A. CHANDLER, *supra* note 102, at 122–44.

be legal. Many prominent economists¹¹² and some lawyers informed about railroad problems¹¹³ made the case for legal pooling, arguing that it was essential to the survival of the railroads.¹¹⁴ Some went so far as to argue that "ruinous competition" would destroy the railroads, and that member railroads who cheated on their pooling agreements should be punished.¹¹⁵ Shippers were understandably opposed to pooling, and they generally obtained favorable federal legislation. Congress wrote an antipooling provision into the Interstate Commerce Act of 1887 and an even stronger provision into the Mann-Elkins Act of 1910.¹¹⁶ The Interstate Commerce Commission itself was more sympathetic to the plight of the railroads, and it advocated a certain amount of controlled pooling throughout the 1890's.¹¹⁷ But the economic arguments for pooling became largely academic after 1897, when the Supreme Court condemned railroad cartels and pools under the antitrust laws.¹¹⁸ Pooling remained strictly forbidden until it was legalized, subject to Interstate Commerce Commission control, in the Transportation Act of 1920.¹¹⁹

The complexity of the pooling issue underlines the important difference between the railroads and most other businesses. The *Trans-Missouri* case condemning railroad cartels has been characterized as a reasonable application of the per se rule in antitrust to a "naked" price-fixing agree-

112. See, e.g., Seligman, *Railway Tariffs and the Interstate Commerce Law*, II, 2 POL. SCI. Q. 369, 389 (1887). Seligman argued that the pools were a good idea because, with price competition eliminated, the railroads would engage in nonprice competition by striving to better one another in the provision of "accommodations and facilities." Yale's Arthur Twining Hadley agreed. A. HADLEY, *supra* note 70, at 74-79; Hadley, *The Prohibition of Railway Pools*, 4 Q.J. ECON. 158 (1890); Hadley, *Railroad Abuses, At Home and Abroad*, 2 NEW PRINCETON REV. 355 (1886). Accord W. RIPLEY, *RAILROADS: FINANCE & ORGANIZATION* 575-607 (1915); Hudson, *The Southern Railway & Steamship Association*, 5 Q.J. ECON. 70 (1891).

113. One such lawyer was Thomas McIntyre Cooley. See Cooley, *Popular and Legal Views of Traffic Pooling*, 27 RAILWAY REV. 15 (1887).

114. See Bacon, *Railways and the State*, 30 NEW ENGLANDER 713 (1871) (supporting comprehensive regulation of railroad companies); Bryce, *supra* note 92, at 335 (criticizing Interstate Commerce Act for having antipooling provision); Bullen, *Railroad Cooperation*, 13 INT'L REV. 399 (1882) (supporting pooling); Newcomb, *The Present Railway Situation*, 165 N. AM. REV. 591 (1897) (arguing that pooling should be legal and controlled by Interstate Commerce Commission); Waite, *supra* note 92, at 345-46 (arguing that legalized pooling under control of stronger Commission is probable solution to then-existing evils).

115. E.g., Garrett, *supra* note 92; Porter, *Railway Rates*, 153 N. AM. REV. 718 (1891) (arguing that pools should be legal but made subject to direct federal supervision, and criticizing recently passed Interstate Commerce Act for preventing them); see also W. RIPLEY, *supra* note 112, at 575-76 (arguing for adoption of English system, in which pooling agreements were legally enforceable).

116. Ch. 309, 36 Stat. 539, 547-52 (1910).

117. E.g., ICC ANN. REP. 16-21 (1898); ICC ANN. REP. 13 (1900).

118. *United States v. Joint Traffic Ass'n.*, 171 U.S. 505 (1898); *United States v. Trans-Missouri Freight Ass'n.*, 166 U.S. 290 (1897). See Miller, *The Decision Against Railway Pooling*, 167 N. AM. REV. 752, 757 (1898) ("The decision of the Supreme Court, therefore, is right, while the law is wrong . . ."); Newcomb, *The Opposition to Railway Pooling*, 168 N. AM. REV. 321 (1899) (approving pooling); Patterson, *The Case of the Trans-Missouri Freight Association*, 36 AM. L. REG. (n.s.) 307 (1897) (condemning Court decision); Smith, *Railway Pooling and the Interstate Commerce Commission*, 168 N. AM. REV. 506 (1899) (arguing that pooling should be legal but that further ICC control of it was unnecessary).

119. See *infra* text accompanying note 284.

ment—that is, an agreement that has no purpose except to exact monopoly prices from consumers.¹²⁰ Nothing could be further from the truth. In fact, already in the 1890's, the Commission realized two things about the railroads that had escaped both Congress and the Supreme Court. First, in the absence of minimum and maximum rate regulation, pooling was necessary to preserve the financial integrity of the railroads. Second, the railroads themselves were engaged in a joint venture that made either private coordination or broad legislative control essential.

In upholding the arrangement eventually struck down by the Supreme Court in *Trans-Missouri*, the circuit court relied on the conclusion of the Interstate Commerce Commission that the railroads needed “common authority” to “fix rates, and to provide for their steady maintenance.”¹²¹ Judge Sanborn noted that merchandise traveling interstate often needed to be handled by several different railroads. As a result, substantial cooperation among them was necessary.¹²² Further, since the transfer problems were interstate, regulating them was “obviously beyond the reach of compulsory [state] legislation”¹²³ The judge concluded:

The fact that the business of railway companies is irretrievably interwoven, that they interchange cars and traffic, that they act as agents for each other in the delivery and receipt of freight and in paying and collecting freight charges, and that commodities received for transportation generally pass through the hands of several carriers, renders it of vital importance to the public that uniform rules and regulations governing railway traffic should be framed by those who have a practical acquaintance with the subject, and that they should be promulgated and faithfully observed.¹²⁴

Just as the simple economics of the railroad industry explains why the industry was so prone to cartelization,¹²⁵ it also explains why the cartels

120. R. BORK, *THE ANTITRUST PARADOX: A POLICY AT WAR WITH ITSELF* 22–26 (1978) (defending Justice Peckham's brilliant, “pro-consumer” orientation in *Trans-Missouri*).

121. *United States v. Trans-Missouri Freight Ass'n*, 58 F. 58, 76 (8th Cir. 1893) (quoting ICC ANN. REP. 25 (1889)).

122. In fact, the railroads themselves were responsible for coordinating the first national railroad system and facilitating the handling of through traffic that required the use of multiple roads. See A. CHANDLER, *supra* note 102, at 122–44.

123. *Trans-Missouri Freight Ass'n*, 58 F. at 76 (quoting ICC ANN. REP. 3 (1888)). James C. Carter made this argument before the Supreme Court to no avail. Brief for the *Trans-Missouri Association*, *United States v. Trans-Missouri Freight Ass'n*, 166 U.S. 290 (1897).

124. 58 F. at 79–80.

125. A substantial body of economic literature argues that in certain industries with very high fixed costs there is no stable situation under which the firms can be expected to behave competitively. See Telser, *Cooperation, Competition, and Efficiency*, 28 J.L. ECON. 271 (1985). *Addyston Pipe & Steel Co. v. United States*, 175 U.S. 211 (1899), may have involved such an industry. See Bittlingmayer, *Price-Fixing and the Addyston Pipe Case*, 5 RES. L. & ECON. 57 (1983); Bittlingmayer, *Decreasing Average Cost and Competition: A New Look at the Addyston Pipe Case*, 25 J.L. ECON. 201 (1982). The theory, if sound, tends to confirm the beliefs of Progressive Era economists that cartelization or consolidation was inevitable in a wide variety of heavy industries, not merely the railroads. See M. SHUBIK, *A GAME-THEORETIC APPROACH TO POLITICAL ECONOMY* 360 (1984); L.

worked so poorly, particularly in areas of railroad overdevelopment. The rate set by the cartel, which was designed to cover both fixed and variable costs, was so large when compared to short-run marginal cost, that a great deal of room remained for shaving prices to obtain more business. If a railroad could secretly obtain a large shipment at any price higher than its direct operating costs, it could pay the balance to its stockholders. As a result, cheating by cartel members was widespread. The two most common mechanisms were secret rebates given to large shippers in exchange for their business, generally called "personal" discrimination,¹²⁶ and intentional misclassification of freight.¹²⁷

The effect of widespread cheating was that "real" freight rates throughout the system were substantially lower than posted freight rates. Frequently, cheating scandals would erupt, railroads would publicly defect from a cartel or pooling arrangement, and there would be a protracted rate war in which all the railroads lost money until the cartel was once again restored.¹²⁸ Overall, cartelization of the American railroad industry proved to be an unsuccessful way of controlling rates.¹²⁹

5. *Why the Railroads Consolidated*

The most efficient way to eliminate competition among railroads was to eliminate competition for profits altogether, and thereby destroy all incentives for cheating. The desire to eliminate competition for profits explains the great railroad merger movement that began in the 1880's and transformed America's network of hundreds of small railroads into a half dozen giant systems by the 1920's.¹³⁰ The tendency of competing railroads to merge was understood by railway economists as early as 1871, when Charles Francis Adams, Jr. argued that consolidation was inevitable in the presence of competition, but that government control was necessary to

TELSER, *ECONOMIC THEORY AND THE CORE* (1978); Aivazian & Callen, *The Coase Theorem and the Empty Core*, 24 J.L. ECON. 175 (1981).

126. See *infra* text accompanying notes 164-68.

127. For example, if the first class rate, reserved for fine products such as finished textiles or furniture, was 25 cents per unit, while the fourth class rate for unfinished lumber was 12 cents per unit, the railroad and a large shipper might enter into an agreement under which the furniture would be intentionally misclassified as "lumber," thus qualifying for the lower rate. The Hepburn Act of 1906, Ch. 3591, 34 Stat. 584 (1906), contained a strong antirebate provision that made it illegal for a railroad to grant a rebate or for a shipper to receive one. However, there was no federal legislation controlling freight classifications. As a result, after 1906, freight misclassification became the preferred mechanism for giving individual rate preferences to large shippers. See G. KOLKO, *supra* note 9, at 169; W. RIPLEY, *supra* note 12, at 190. Large shippers were much more likely to obtain the benefit of such cheating than smaller shippers because the trade-offs to the railroad were much more attractive: the chances of getting caught by other members of the pool were no greater for the large shipper than the small one, but the rewards were much larger.

128. See J. GRODINSKY, *THE IOWA POOL: A STUDY IN RAILROAD COMPETITION: 1870-84*, at 53-67 (1950); W. RIPLEY, *supra* note 12, at 251.

129. For an economic analysis of why the railroad trunk line cartels were unsuccessful, see P. MACAVOY, *supra* note 26.

130. See Martin, *supra* note 38, at 371. For a complete account, see W. RIPLEY, *supra* note 12, at 412-33.

prevent monopoly pricing.¹³¹ Others argued that consolidation was necessary for the efficient operation of the railroads.¹³²

A great deal has been made of the impact of the American antitrust laws in causing this merger movement.¹³³ The argument is that because elimination of competition was essential to survival, and since the Supreme Court made all forms of cartelization illegal under the Sherman Act, the only alternative left was merger. In the case of the railroads, however, it seems relatively clear that the loose combinations¹³⁴ were not working,¹³⁵ and they would have taken advantage of tighter forms of organization whether or not the Sherman Act was applied to them. At most, the *Trans-Missouri*¹³⁶ and *Joint Traffic*¹³⁷ decisions encouraged railroads to merge somewhat more quickly.

6. *Why the Railroads Were in a Sorry State in the 1890's*

The simple economics of railroads explains why by 1895, when overdevelopment of railroads in the United States was at its worst, one-fourth of American railroads assets were in receivership.¹³⁸ It also explains why the great railroad consolidations probably would have occurred whether or not the Supreme Court had used the Sherman Act to deal the final death blow to railroad pools.¹³⁹

By the 1870's or 1880's, many of the unique features of railroad eco-

131. Adams, *The Government and the Railroad Corporations*, 112 N. AM. REV. 31 (1871). Making essentially the same arguments at the same time is Bacon, *Railways and the State*, 30 NEW ENGLANDER 713 (1871); see also Dixon, *Railroads in Their Corporate Relations*, 23 Q.J. ECON. 34 (1908) (discussing causes of railroad amalgamation, methods of control, intercorporate relationships, public opposition to holding companies, and suggested remedies).

132. E.g., Comment, *Railway Rate Regulation*, 13 YALE REV. 341, 343 (1905) (consolidation has gone long way toward curbing personal discrimination); Bryce, *supra* note 92, at 334; Gibbon, *Railroad Consolidation*, 154 N. AM. REV. 251 (1892); Huntington, *A Plea for Railway Consolidation*, 153 N. AM. REV. 272 (1891). Collis P. Huntington was President of the Southern Pacific Railroad. One major debate was between Russel Sage, who argued that consolidations were bad for consumers because they yielded monopoly pricing, and James A. Hill, president of the Great Northern Railroad, who contended that they yielded lower prices through increased efficiency. Compare Sage, *Industrial and Railroad Consolidations: I. A Grave Danger to the Community*, 172 N. AM. REV. 641 (1901) with Hill, *Industrial and Railroad Consolidations: II. Their Advantages to the Community*, 172 N. AM. REV. 646 (1901).

133. See, e.g., A. CHANDLER, *supra* note 102, at 315-39; N. LAMOREAUX, *THE GREAT MERGER MOVEMENT IN AMERICAN BUSINESS, 1895-1904*, at 159-86 (1985); 1 I. SHARFMAN, *supra* note 12, at 33; cf. Bittlingmayer, *Did Antitrust Policy Cause the Great Merger Wave?*, 28 J.L. ECON. 77 (1985).

134. Loose combinations were those, such as pools or freight associations, that did not involve the joining of the companies' assets into a single firm.

135. They may have been more effective in other industries where consolidation occurred in response to antitrust condemnation of cartels. See N. LAMOREAUX, *supra* note 133, at 159-86.

136. *United States v. Trans-Missouri Freight Ass'n*, 166 U.S. 290 (1897).

137. *United States v. Joint Traffic Ass'n*, 171 U.S. 505 (1898).

138. Crowell, *Railway Receiverships in the United States: Their Origin and Development*, 7 YALE REV. 319, 319 (1898) (noting that in 1895, one of every four dollars worth of railway securities was controlled by receivers); see also Brief for Fremont, Elkhorn and Missouri Valley R.R., *United States v. Trans-Missouri Freight Ass'n*, 166 U.S. 290 (1897) (reporting 169 railroads in receivership in 1894).

139. See *supra* text accompanying notes 130-37.

nomics described above were well known to economists.¹⁴⁰ By the 1890's, they were known much more broadly; even the "Great Commoner," William Jennings Bryan, understood them. In his 1898 argument to the Supreme Court defending a Nebraska rate regulation statute, he described the peculiar economics of the railroad industry to the Court and explained why the construction of competing lines was not a suitable alternative to rate regulation for determining reasonable rates. Under competition, he argued, fixed costs, and thus total costs, are higher.¹⁴¹

The question was what to do about these problems. If the railroads were permitted to have unregulated monopolies, rate gouging and large monopoly profits at the expense of carriers were sure to result. On the other hand, if the railroads were forced to compete with each other and pooling or other forms of cartelization were strictly forbidden, railroad rates would almost certainly be driven to a level too low to cover fixed costs, eventually forcing railroads into bankruptcy. The railroad interests seemed destined to be either filthy rich or perpetually broke.

Finally, and most importantly, the simple economic model explains the origin of rate discrimination, which became the most important and controversial problem of railroad regulatory policy in the Gilded Age and after, and the rationales for different and ultimately inconsistent state and federal responses. Following the treatment in Section III of the problem of rate discrimination, Section IV takes up the problem of the disparate federal and state approaches to rate discrimination. It examines the unique problems generated by a federalist approach to railroad regulation and their ultimate resolution as the national government began to assert, with Supreme Court sanction, increasing power over the railroads.

III. UNJUST DISCRIMINATION

Rate discrimination is a difference in rates between two shipments disproportionate to differences in the cost of service. If the same carrier charges 3 cents per mile for a certain volume of freight between points A and B, but only 2 cents per mile between points A and C, it discriminates

140. See, e.g., C. Adams, *The Railroad System*, *supra* note 2, at 363-66; A. HADLEY, *supra* note 70, at 63-74; Adams, *supra* note 131; Bacon, *Railways and the State*, 30 *NEW ENGLANDER* 713 (1871); Cooley, *Popular and Legal View of Traffic Pooling*, 28 *Railway Rev.* 15 (1887); Hadley, *Private Monopolies and Public Rights*, 1 *Q.J. ECON.* 28 (1886); Hadley, *The Prohibition of Railway Pools*, 4 *Q.J. ECON.* 158 (1890); Hadley, *The Workings of the Interstate Commerce Law*, 2 *Q.J. ECON.* 162 (1888); Seligman, *Railway Tariffs and the Interstate Commerce Commission. I*, 2 *POL. SCI. Q.* 223, 223-27 (1887); Taussig, *A Contribution to the Theory of Railway Rates*, 5 *Q.J. ECON.* 438 (1891); see also H. NEWCOMB, *RAILWAY ECONOMICS* 55-88 (1898). By the early 20th century a large literature had arisen on the question of the relationship between competition and railroad rates. See Agger, *Monopoly and Competitive Prices*, 3 *AM. ECON. REV.* 589 (1913); Brown, *The Basis of Rate-Making as Affected by Competition Versus Combinations of Railroads*, 16 *YALE REV. (o.s.)* 79 (1907); Clark, *Some Neglected Phases of Rate Regulation: Fluctuating Prices and the Earnings of Capital*, 4 *AM. ECON. REV.* 565 (1914).

141. See *Smyth v. Ames*, 169 U.S. 466, 493-94 (1898). Bryan lost the case; the Supreme Court found the Nebraska rate confiscatory.

among freight according to the distance shipped. A carrier can also discriminate by charging different rates for different types of freight or to different shippers of the same freight along the same route. During the Gilded Age, rate discrimination was widespread and considered by the railroads to be inherent in the rate-making process. It was widely condemned by critics.

The common law subjected common carrier rates to the general requirement that they be "reasonable," and the presence or absence of discrimination could be a factor in determining reasonableness. As early as the 17th century, the common law had derived the duty to charge reasonable rates from the common carrier's obligation to serve everyone; it could not escape this duty simply by quoting an undesired shipper a rate that was much higher than the rate offered to others.¹⁴²

At first glance, the common law seems to be an important weapon against rate discrimination. Within the classical theory of federalism, it had one distinct advantage over state legislation: extraterritorial reach. Before *Erie Railroad v. Tompkins*¹⁴³ undermined the federal judicial notion of a general common law, the commerce clause did not substantially limit state common law adjudication of rates in interstate commerce. Federal preemption did not occur until it came by way of statute¹⁴⁴—the Interstate Commerce Act of 1887—and even then the Act only preempted specific transactions. In an important decision involving the telegraph industry,¹⁴⁵ the Court held that a state could apply its common law to an interstate rate, because, quoting Chancellor Kent, "[t]he common law includes those principles . . . which do not rest for their authority upon any express and positive declaration of the will of the legislature."¹⁴⁶ To hold otherwise, Justice Brewer concluded, would effectively exempt interstate transactions from any regulation whatsoever unless the federal government had passed a statute on the subject.¹⁴⁷ The Court concluded that "the principles of the common law are operative upon all interstate commercial transactions except so far as they are modified by Congressional enactment."¹⁴⁸ The states retained the ability to regulate interstate dis-

142. See *Jackson v. Rogers*, 2 Show. 327 (1683) (common carrier could not refuse to carry pack when tendered reasonable compensation).

143. 304 U.S. 64 (1938) (declaring that common law of forum state should determine law to be applied in diversity cases).

144. See *Texas & Pac. Ry. v. Abilene Cotton Oil Co.*, 38 Tex. App. 366, 85 S.W. 1052 (1905), *rev'd*, 204 U.S. 426 (1907). The Supreme Court held that the Interstate Commerce Act preempted the common law with respect to interstate rates. It did not hold that the state lacked the jurisdiction to apply the common law rule to an interstate rate.

145. *Western Union Tel. Co. v. Call Pub. Co.*, 181 U.S. 92 (1901); see also *Western Union Tel. Co. v. Commercial Milling Co.*, 218 U.S. 406 (1910).

146. 181 U.S. at 101 (quoting 1 J. KENT, COMMENTARIES 471 (4th ed. 1840)).

147. *Id.* at 102.

148. *Id.*

crimination by common law, even though under the *Wabash Railway* decision¹⁴⁹ they were unable to do so by statute.

But the common law was not consistently applied, and its strictures on rates usually were insubstantial. The only rule applied with anything approaching uniformity was that a railroad could not charge two different rates to two different shippers for precisely the same shipment—that is, the same quantity of the same cargo between the same two points.¹⁵⁰ Many courts held that even when the two shipments were in all respects identical, the fact that the plaintiff was charged more than someone else could be used only as evidence that the higher rate was unreasonable; it did not conclusively establish unreasonableness.¹⁵¹ Further, if there was even a slight difference in the articles, the amount shipped, or the route, the common law generally permitted the discrimination.¹⁵² As a result of these limitations, the common law was never effectively applied to short-haul/long-haul discrimination.¹⁵³

Nearly every person who wrote about railroads in the nineteenth and early twentieth century, from Progressive muckrakers like Ida Tarbell¹⁵⁴ and Frank Norris¹⁵⁵ to stuffy formalists like Harvard Law School professor Joseph Beale,¹⁵⁶ railed at the widespread practice of rate discrimination.¹⁵⁷ Rate discrimination in the Gilded Age consisted of three general kinds, all of which were the subject of extensive criticism.

A. Preferred Customers

Most scorned and least defended were preferential rates for large favored customers, the most notorious being John D. Rockefeller's Standard

149. *Wabash, St. L. & Pac. Ry. v. Illinois*, 118 U.S. 557 (1886); see *infra* text accompanying notes 241–43.

150. *E.g.*, *Cook v. Chicago, R.I. & Pac. Ry.*, 81 Iowa 551, 46 N.W. 1080 (1890); *Messenger v. Pennsylvania R.R.*, 36 N.J.L. 407 (Sup. Ct. 1872).

151. *Johnson v. Pensacola & P.R.R.*, 16 Fla. 623 (1878); *Hoover v. Pennsylvania R.R.*, 156 Pa. 220, 27 A. 282 (1893).

152. *E.g.*, *Fitchburg R.R. Co. v. Gage*, 78 Mass. (12 Gray) 393 (1859) (legal for railroad to charge different rates for ice and brick along the same routes); *Commonwealth v. Louisville & N.R.R.*, 113 Ky. 759, 68 S.W. 1103 (1902) (legal to charge different rates for different grades of coal).

153. See J. BEALE & B. WYMAN, *THE LAW OF RAILROAD RATE REGULATION WITH SPECIAL REFERENCE TO AMERICAN LEGISLATION* § 851 (1907) (suggesting that it might be false imprisonment to force passenger who had paid for long haul to get off earlier at higher cost destination, but finding no common law cases). The best brief summary of the common law position, citing many cases, is 4 B. ELLIOTT & W. ELLIOTT, *A TREATISE ON THE LAW OF RAILROADS* 2283–85 (1st ed. 1897).

154. 1 I. TARBELL, *THE HISTORY OF THE STANDARD OIL COMPANY* 44–49 (1904); see also Rice, *supra* note 110 (arguing that only solution for discrimination and other abuses was government ownership of railroads).

155. F. NORRIS, *supra* note 72, at 67–68; see *infra* text accompanying notes 174–75.

156. J. BEALE & B. WYMAN, *supra* note 153, §§ 749–750.

157. See also Lord, *A Brief Review of the Subject of Federal Railroad Regulation*, 181 N. AM. REV. 754 (1905).

Oil Company.¹⁵⁸ Even conservative, relatively pro-railroad economists such as Yale's Arthur Twining Hadley abhorred such "personal discrimination."¹⁵⁹ Three phenomena may explain the use of such discrimination. First, lower rates for very large shippers may not have been discriminatory at all, but merely reflective of the lower cost of selling in large volume. For example, carload lots could be handled much more cheaply than smaller lots that required the railroads to "break bulk," and carload lots accordingly received a lower rate. But the record of discriminatory pricing in favor of Standard Oil and other large shippers is substantial and reveals far more than economies of scale in shipping.¹⁶⁰

Second, preferred rates for certain shippers may have reflected the fact that many of the railroads were vertically integrated firms, with interests in coal, timber, or other commodities. They often gave their own parent or subsidiary firms preferred rates. Section one of the Hepburn Act of 1906¹⁶¹ attempted to solve this problem, with some overkill,¹⁶² by forbidding vertically integrated railroads from transporting commodities in which they had an interest.¹⁶³

The third and most the important cause of discrimination in favor of preferred customers was the use of "secret rebates"¹⁶⁴ or improper freight classifications, which resulted when a member of a railroad pool or other cartel cheated on its fellow cartel members by shaving the cartel price in order to capture a large sale.¹⁶⁵ Such cheating made the cartels particularly unstable.¹⁶⁶ Nevertheless, secret rebates were widely condemned by

158. See generally I. TARBELL, *supra*, note 154. See also Lloyd, *Story of a Great Monopoly*, 47 ATLANTIC MONTHLY 317, 322 (1881) (telling how Standard Oil Company entered into agreements with railroads under which they would charge higher rates to Standard's competitors); see also *Scotfield v. Railway Co.*, 43 Ohio St. 571, 3 N.E. 907 (1885) (condemning agreements under which Standard Oil Company obtained rates lower than competitors).

159. See A. HADLEY, *supra* note 70, at 119-21.

160. See I. TARBELL, *supra* note 154.

161. Ch. 3591, 34 Stat. 584 (1906).

162. See Hill, *Recent Utterances of Mr. Hill and Mr. Harriman Upon Railway Problems*, 14 J. POL. ECON. 627 (1906) (noting that statute was interpreted to prevent railroads from owning stock of any industry along road, because such industry would likely want to ship on closest available line); see also Dixon, *The Interstate Commerce Act as Amended*, 21 Q.J. ECON. 22 (1906) (concluding that provision was radical, but easy to enforce).

163. In *United States v. Delaware & Hudson Co.*, 213 U.S. 366 (1908), the Supreme Court interpreted the clause narrowly, holding that a railroad that had made a bona fide sale of commodities before shipment no longer had an interest in them and could ship them. Of course, if rate preferences were being granted, they would show up in the commodity purchase price. For contemporary analysis of the problem of rate discrimination by vertically integrated railroads, see E. JONES, *THE ANTHRACITE COAL COMBINATION IN THE UNITED STATES* (1914).

164. See *Scotfield v. Lake Shore & M.S. Ry.*, 43 Ohio St. 571, 3 N.E. 907 (1885) (condemning secret rebates given to Standard Oil Company); *Cook v. Chicago, R.I. & Pac. Railway.*, 81 Iowa 551, 46 N.W. 1080 (1890) (condemning secret rebates). Many of the rebates were given to large shippers in exchange for agreements that the shippers would ship all their freight or at least a specified large amount on the railroad in question. *E.g.*, *Louisville, E. & St. L. Consol. R.R. v. Wilson*, 132 Ind. 517, 32 N.E. 311 (1892).

165. For the economics of such cheating, see H. HOVENKAMP, *ECONOMICS AND FEDERAL ANTI-TRUST LAW* § 4.1 (1985).

166. See *supra* text accompanying notes 109-26.

Progressives such as Ida Tarbell for enhancing the economic power of large shippers like Standard Oil,¹⁶⁷ even though their effect almost certainly undermined the railroad cartels, which the Progressives also abhorred.¹⁶⁸

B. *Preferred Products*

Another form of discrimination, widely practiced but less widely criticized, was the use of rate differentials between different products. Finished cotton goods, for example, were sent in the highest rate classification, while lumber and coal were sent in the lowest. The differences in rates between these classes were substantial, and often the lowest rates were not sufficient to pay the average total costs of operation—that is, the sum of variable costs and a pro rata share of capital costs.¹⁶⁹ As a result, the railroads were sometimes accused of using artificially high rates on first class goods to “subsidize” low rates on cheaper goods.

However, in 1885, Hadley already had demonstrated that this reasoning was fallacious. Any rate higher than average variable cost contributed to the fund needed to pay fixed costs, and thus tended to reduce rates for other products.¹⁷⁰ As a result, shippers of first class goods benefited if the railroads shipped fourth class goods at any rate higher than direct operating costs, even if the difference in rate for the two classes of goods was not justified by differences in cost of service. As Hadley persuasively argued, the discrimination benefited everyone. The railroads could not give everyone the same low rate, because they would not recover fixed as well as variable costs. They could not charge the lumber and coal dealers the higher rate, because the dealers would not be able to pay it. If they charged the same rate for all products, lumber and coal dealers, first class shippers, and railroads would all be worse off.

Bona-fide discrimination on the basis of freight classification was the least controversial form of rate discrimination,¹⁷¹ although it was criticized by those who defended “cost of service” rather than “value of service” rate-making.¹⁷² Even Congress recognized that such discrimination was sometimes essential.¹⁷³ Neither customer discrimination nor product discrimination, however, raised the fundamental issues of federalism present in discrimination between short, generally intrastate hauls and long, generally interstate hauls.

167. See I. TARBELL, *supra* note 154.

168. See *supra* text accompanying notes 111–22.

169. See *supra* text accompanying notes 94–97.

170. A. HADLEY, *supra* note 70, at 112–13.

171. The problem of intentional misclassification of freight was less controversial. See *supra* text accompanying notes 164–65.

172. See Taussig, *supra* note 140; Clark, *supra* note 140; see also *supra* text accompanying notes 126–30.

173. See S. REP. NO. 46, *supra* note 101, at 184–94.

C. *The Central Problem of Federalism: Short-Haul/Long-Haul Discrimination*

In *The Octopus*, Frank Norris' muckraking antirailroad novel of 1901, Harran Derrick, a rancher from Bonneville, California, in the San Joaquin valley, orders a set of plows from the East. One day while talking casually to the Bonneville railroad freight agent, Harran finds out that his plows are aboard a train standing in the station. Harran is pleased, because that means he can begin plowing immediately. But the agent tells Harran he cannot have the plows, for "the cars are going north, not, as you thought, coming *from* the north. They have not been to San Francisco yet." The agent then patiently explains—undoubtedly for the thousandth time that year—that the plows must be shipped from the East to San Francisco and then *back* to Bonneville, even though the train bound for San Francisco passes through Bonneville. Furthermore, it costs more to ship the plows back the short distance from San Francisco to Bonneville than to ship them all the way across the country, and Harran must pay the sum of the two rates. When Harran expresses his disgust about the "whole dirty business," the agent shrugs. "I am willing to do what I can for you. I'll hurry the plows through, but I can't change the freight regulation of the road."¹⁷⁴

For Frank Norris, the story about railroad rates was part of a much larger point. The railroad was impersonal, and it gobbled up fortunes and destroyed the lives of one group of people while it enriched others, all apparently without reason. All these things may have been true, but there probably *was* a very good reason for the railroad's rate policy. It was designed to take advantage of the fact that San Francisco was a competitive railroad shipping point, while Bonneville, California was a monopoly point.

Short-haul/long-haul discrimination occurred when a railroad charged a higher price per mile for a short haul than it did for a long one. Once again, some difference in pricing between short and long hauls was non-discriminatory. For example, loading and unloading of cars must be done once for both short and long hauls and generally costs the same whether the distance traveled is ten miles or one thousand. As a result, no one would expect that a railroad that was willing to load, unload, and ship a cargo 1000 miles for 3 cents per mile would be willing to do the same thing for a haul of fifty miles.

More often than not, however, the rate differentials between long and short hauls were far out of proportion to actual direct costs. Further, if short hauls had merely cost *proportionately* more than long hauls, the voices of complaint in the Gilded Age would undoubtedly have been much

174. F. NORRIS, *supra* note 72, at 67-68.

more muted. The biggest protest against short-haul/long-haul discrimination arose from the fact that short hauls frequently cost *absolutely* more than long hauls, even though the short haul was contained completely within the long-haul route. For example, a shipment from Denver to Peoria, Illinois, might cost more than a shipment from San Francisco to New York, even though the cargo bound from San Francisco to New York passed through both Denver and Peoria on the way. Such discrimination was considered appalling by both liberal critics and conservative legal writers, and many late 19th century legal writers who wrote on the subject castigated the practice of "unjust" short-haul/long-haul discrimination.¹⁷⁵ A few political economists attempted to defend the principle,¹⁷⁶ but for their trouble they were identified as nothing more than mouth-pieces for the railroad interests. Even later, historians in the Progressive tradition found such rate discrimination abusive, and denounced both the railroads and those who defended it.¹⁷⁷

Today, many regulators and consumers have a different perspective on short-haul/long-haul discrimination. For example, most of us accept willingly that a flight from San Francisco to New York costs \$119.00, while a flight from Ogden, Utah, to Cedar Rapids, Iowa—one-fourth the distance—costs twice as much. Competition rather than cost determines the rate.

By the late 1860's, railroad economists began to discern an economic basis for short-haul/long-haul rate discrimination. In a paper presented to the newly founded American Social Science Association in 1869,¹⁷⁸ Joseph Potts, president of the Empire Transportation Company, observed that railroad lines between distant points were far more competitive than people once thought, because variable costs were so small. Since the competing lines connected the same commercial "centres of commerce" but

175. See H. BARNES, *INTERSTATE TRANSPORTATION* §§ 111-119 (1910); N. COLLIER, *PUBLIC SERVICE COMPANIES* §§ 125-132 (1918); W. COOK, *STOCK AND STOCKHOLDERS AND GENERAL CORPORATION LAW* § 674 (2d ed. 1889); 1 N. FETTER, *CARRIERS OF PASSENGERS* §§ 259-274 (1897); R. HUTCHINSON, *THE LAW OF CARRIERS* § 297 (F. Mechem, 2d ed. 1891); F. JUDSON, *THE LAW OF INTERSTATE COMMERCE AND ITS FEDERAL REGULATION* §§ 172-218 (1905); 2 & 3 D. MOORE, *MOORE ON CARRIERS* 704-26, 1757-1901 (1914); W. NOYES, *AMERICAN RAILROAD RATES* 89-123 (1905); E. PIERCE, *THE LAW OF RAILROADS* 498-99 (1881); PRENTICE & EGAN, *THE COMMERCE CLAUSE* 284-94 (1898); 3 J. PURDY, *THE LAW OF PRIVATE CORPORATIONS* §§ 1033-1036 (1905); W. SNYDER, *THE INTERSTATE COMMERCE ACT AND FEDERAL ANTITRUST LAWS* 89-106 (1904); 4 S. THOMPSON, *COMMENTARIES ON THE LAW OF PRIVATE CORPORATIONS* §§ 5548-5549 (1895); 2 B. WYMAN, *WYMAN ON PUBLIC SERVICE CORPORATIONS* §§ 1310-1338 (1911); see also H. FULLER, *THE ACT TO REGULATE COMMERCE CONSTRUED BY THE SUPREME COURT* 227-59 (1915); 1 J. LACEY, *A DIGEST OF RAILWAY DECISIONS* 182-83 (1875); Hamilton, *Discriminative Traffic Rates*, 16 AM. L. REV. 818 (1882); see also Hamilton, *Extortionate Traffic Rates*, 16 AM. L. REV. 446 (1882).

176. See, e.g., A. HADLEY, *infra* text accompanying notes 185-87.

177. E.g., C. DEGLER, *THE AGE OF THE ECONOMIC REVOLUTION: 1876-1900*, at 27-28 (1977).

178. Potts, *The Science of Transportation*, 1 (no. 2) J. SOC. SCI. 115 (1870). Potts' paper was given in October 1869.

passed through different points en route, competition for traffic between the centres was far greater than competition for points along the way:

Usually, additional lines, while they seek the same large centres of commerce, reach them through different districts. This confines their competition to the trade of such centres, while the traffic of the country peculiar to each line is not only uncompetited for, but subjected to an extra and often oppressive tax in order to restore the revenue depletions which each road suffers in its violent struggles with the others for jointly accessible business.¹⁷⁹

It cost only a little more to ship a package from points A to B by an indirect 600 mile route than by a 300 mile straight line. If one should trace out the possible rail routes from, say, St. Louis to Chicago, one might find as many as sixty possibilities. This simple observation—that lines did not have to be substantially “parallel” in order to compete—lay at the crux of the short-haul/long-haul problem. It also helped explain why railroad pooling worked so badly. Most shippers did not care if their traffic from St. Louis to Chicago went by way of Peoria or even St. Paul; they cared only about what they paid. As a result, in the absence of cartelization, the railroad market from St. Louis to Chicago operated as close to perfect competition as any market one could find.¹⁸⁰ For that reason, the rates between major terminal points were generally driven to marginal cost, considerably less than the rate that would permit the railroad to amortize its capital costs.

Charles Francis Adams, Jr., a champion railroad regulator,¹⁸¹ conceded in 1870 that competition among railroads was a “dangerous evil. . . . It disturbs every calculation, vitiates every result, puts a stop to all experiment, destroys all system.”¹⁸² By the early twentieth century, it was well known that indirect routes between two points frequently had an economic *advantage* over direct routes between the same two points for the simple reason that the railroads stopped at more towns on the longer routes. As a result, they were in a better position to fill their cars than they would be on the direct route, and the cost of traveling with less than a full load often outweighed the cost of going extra miles.¹⁸³

Where there was no competition, on the other hand, railroads set a rate sufficient to cover both their variable and fixed costs—and those fixed

179. *Id.* at 124.

180. See Lansing, *supra* note 67, at 466:

Markets that are common to various points of production or supply control the rates from all these points by the competition which may exist with any one of them. The lowest rate to the market by any route, controls the rates by all the other routes.

181. See T. McCRAW, *supra* note 11, at 1-56.

182. Adams, *Railway Problems in 1869*, 110 N. AM. REV. 116, 133-34 (1870).

183. Brown, *The Competition of Transportation Companies*, 4 AM. ECON. REV. 771, 771-76 (1914).

costs that were not covered by the rates on long-haul traffic were covered by the short-haul rates. This created the perception that the high short-haul rates somehow "subsidized" the long-haul rates. For example, even railroad manager Joseph Potts characterized the high short-haul rates as an "oppressive tax" designed to "restore the revenue depletions" that accrued from excessive competition on long hauls.¹⁸⁴

In fact there was no subsidy, provided that long-haul rates exceeded direct operating costs, which they almost always did. As Hadley explained in 1885, even the shippers who paid the high local freight rates actually benefited from short-haul/long-haul discrimination. Hadley's argument, which was well known to later railroad economists,¹⁸⁵ was essentially correct.

Suppose, he argued, that suppliers of oysters at point X on the Delaware coast wanted to enlarge their market by shipping oysters to Philadelphia. The market price in Philadelphia was such that the oysters could not profitably be shipped if shipping costs exceeded one dollar per hundred pounds. The only railroad between point X and Philadelphia initially agreed to ship the oysters at that rate, provided that the shippers could fill a car on a regular basis. However, the shippers from point X were able to supply only a half carload at a time. The railroad could not profitably ship a half carload at the one dollar price, and the shippers could not afford to pay more. It initially appeared that the railroad and the shippers would be unable to do business. However, another possibility appeared:

At some distance beyond X, the terminus of this railroad, was another oyster-growing place, Y, which sent its oysters to market by another route. The supply at Y was very much greater than at X. The people at Y were paying a dollar a hundred to send their oysters to market. It would hardly cost twenty-five cents to send them from Y to X. If, then, the railroad from X to Philadelphia charged but seventy-five cents a hundred on oysters which came from Y, it could easily fill its car full.¹⁸⁶

Immediately, of course, the shippers from X complained that oysters originating at Y were charged a lower rate for the same distance than the rate for oysters originating at X, but Hadley gave the obvious response: the lower rate for the shippers from Y made the rate for shippers from X possible. If the railroad attempted to charge more to the Y shippers, they would not ship, for they had a competitive alternative. If the Y shippers

184. See *supra* note 179.

185. See, e.g., W. RIPLEY, *supra* note 12, at 217-20 (recounting and exploring complexity of Hadley's argument); see also Meyer, *Government Regulation of Railway Rates*, 7 PUBLICATIONS AM. ECON. A. 69 (1906).

186. A. HADLEY, *supra* note 70, at 117.

did not ship, the rate from X would become unprofitable, because even the lower rate from Y was contributing enough to operating costs to make the addition of the oyster car profitable. As a result, the shippers at X were actually better off under the rate discrimination scheme than they would have been in the absence of discrimination, for without discrimination there would have been no shipments at all.

In a seminal contribution to the development of regulatory economics in 1891, F.W. Taussig explained in more technical terms why price discrimination was important for natural monopoly industries with high fixed costs.¹⁸⁷ Taussig began with the observation, already well known in the economics literature on railroads,¹⁸⁸ that rates under competition were a function of variable, or operating, costs, not of fixed costs.¹⁸⁹ Nevertheless, fixed costs must be paid. As a result, the railroads were an industry subject to "joint" costs, only one of which would be calculated into price in a competitive situation. If fixed costs were not accounted for, the railroads would be unprofitable, and there would be no new investment in them.¹⁹⁰ But since the competitive pricing mechanism did not allocate anything to contribute to fixed costs, how should they be accounted for in rate-making? Taussig concluded that the notion of "cost of service" had no meaning apart from the variable costs incurred in performing that particular service. As a result, there was no cost-based mechanism for determining how fixed costs should be allocated in railroad rates. From this Taussig concluded that *value* of service rather than cost of service would be the most efficient mechanism for allocating fixed costs, because it would maximize the amount of traffic on the railroads.¹⁹¹ Those who are able to pay more should pay more. Taussig reasoned that price discrimination based on freight classifications was economically sound,¹⁹² as was geographic discrimination based on the amount of competition along a particular route.¹⁹³ Such discrimination was efficient when it permitted things to be shipped that would not be shipped otherwise. In short, the most efficient policy was to encourage the largest amount of shipping of all kinds of

187. Taussig, *supra* note 140. The same argument was developed further a generation later by John Maurice Clark. See Clark, *supra* note 140.

188. See, e.g., A. HADLEY, *supra* note 70, at 264-65 (fixed charges do not directly affect rates but costs of service do); Hadley, *Private Monopolies and Public Rights*, 1 Q.J. ECON. 28, 35 (1886); see also M. KIRKMAN, *RAILWAY REVENUE: A TREATISE ON THE ORGANIZATION OF RAILROADS AND THE COLLECTION OF RAILWAY RECEIPTS* (1879).

189. For a simple model and explanation of this phenomenon, see *supra* text accompanying notes 93-99.

190. Taussig, *supra* note 140, at 442.

191. *Id.* at 458. Edwin Seligman made a similar argument. Seligman, *supra* note 140, at 230-31. Taking issue with Taussig and Seligman is Hammond, *Railway Rate Theories of the Interstate Commerce Commission*, 25 Q.J. ECON. 1, 279, 471 (1910-11). See also Lorenz, *Cost and Value of Service in Railroad Rate-Making*, 30 Q.J. ECON. 205 (1916) (arguing that more empirical data must be obtained before value of service rate-making could be proved superior).

192. Taussig, *supra* note 140, at 454.

193. *Id.*

products, even if they had to be shipped at widely disparate rates. This would permit fixed costs to be amortized over the largest possible amount of cargo and, thus, would tend to lower freight rates overall. Taussig concluded that the railroads' existing rate-making practices were generally efficient.

According to the Taussig formulation, in an efficient railroad system, intrastate short-haul rates would always be substantially higher than interstate trunk line rates. But state legislators were generally more interested in the relative size of the intrastate rates paid by their shipper constituencies than in the efficiency of the national railroad system. State and federal concerns were inherently inimical to one another. The problem of competing regulatory structures would ultimately be resolved in favor of the national legislature, as Congress, with the eventual imprimatur of the Supreme Court, moved to save the financially troubled railroads from the provincial interests of individual states.

IV. STATE AND FEDERAL REGULATORY RESPONSE TO SHORT-HAUL/LONG-HAUL-DISCRIMINATION

The most important problem of federalism posed by market failure in the railroad industry is illustrated by Figure One, which shows part of a railroad traveller's map in 1879.¹⁹⁴

194. RAND McNALLY & CO., *NEW RAILROAD MAP, FROM THE ATLANTIC COAST TO THE ROCKY MOUNTAINS* (1879). This map was selected more or less at random. The degree of railroad development in the United States varied considerably by location, and development at any given time generally was less intensive in the West. Almost any regional map will provide the necessary background for a discussion of short-haul/long-haul rate discrimination.

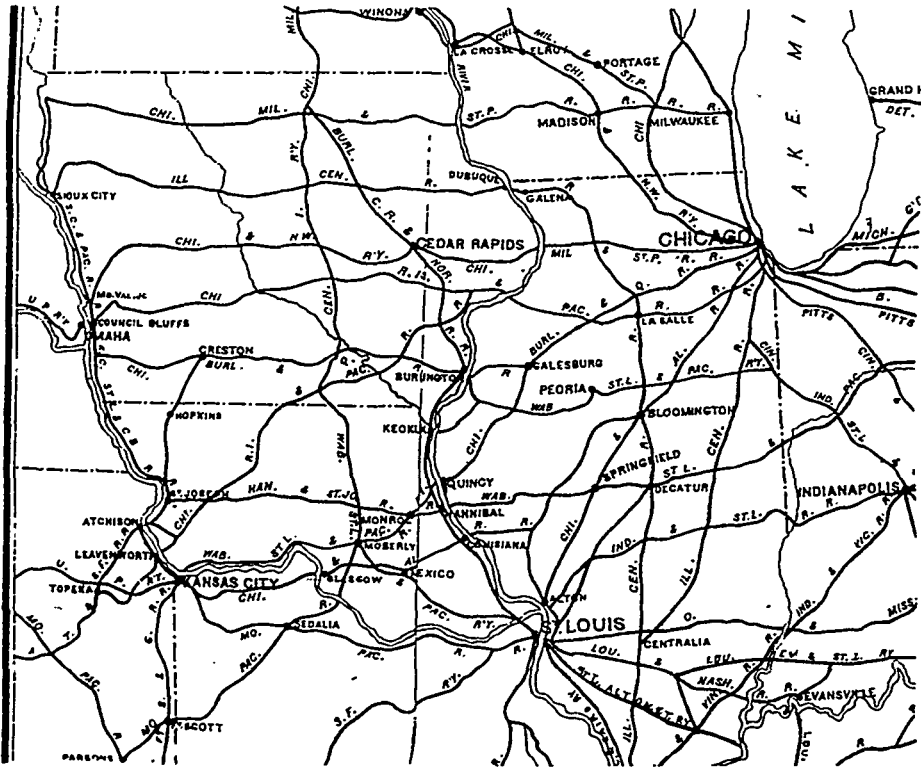


Figure One

By the late 1870's the United States had a large, impressive network of railroads. By the 1880's, many people—particularly those within the industry—believed there was severe overbuilding of railroad trackage. The impact of this overbuilding on a particular shipment, however, depended greatly on two factors: the relationship between the departure and destination points and a large commercial center, and the distance that the shipment was to be sent.

Railroad competition for traffic to and from large commercial centers was keen, but frequently it was nonexistent for small, isolated towns. Furthermore, the longer the route, the more alternatives. For example, someone shipping from St. Louis, Missouri, to Chicago, Illinois, had a choice of many different routes. Even someone shipping to Chicago from Omaha, Nebraska, had a wide variety of alternative routes, notwithstanding the fact that Nebraska was relatively underdeveloped. On the other hand, someone shipping from one small town to another—for example, from Galesburg to Quincy, or from Hopkins to Creston—would have only a single alternative. Likewise, someone shipping even to Chicago from a nearby smaller town, such as Bloomington or La Salle, would have only one or two alternatives, while more remote towns had several. Within a particular state, many rates were noncompetitive. Interstate traffic, on the other hand, was almost always quite competitive.

The railroads' response to this situation was predictable. First, they attempted repeatedly to cartelize the competitive, generally interstate, part of the railroad market. However, the cartels almost always fell apart, and the result was a series of vicious rate wars throughout the 1880's and 1890's.¹⁹⁵ When the railroads were forced to compete, they slashed prices and lost money on the competitive longer hauls. In 1886, railroad bankruptcy lawyer William P. Shinn observed that “[t]he rate wars which have of late years so devastated the finances of railroad companies, are all inaugurated and carried on upon *inter-state* traffic.”¹⁹⁶ But the railroads refused to make equivalent price cuts for short hauls between points where they had a monopoly. On the contrary, they charged a monopoly price for traffic on those routes and were commonly thought to be subsidizing their low rates on the longer routes by charging higher rates on the shorter routes.

As Figure One illustrates, one result of this situation was that the federal problem of railroad regulation was perceived quite differently from the state problem. The federal government's authority to regulate interstate commerce gave it jurisdiction over interstate railroad rates, where the departure and destination points were in two different states. Until well

195. See *supra* text accompanying notes 109–29.

196. Shinn, *The Relations of Railways to the State*, 26 RAILWAY REV. 121, 122 (1886) (emphasis added).

into the 20th century, the prevailing understanding was that the federal government had no jurisdiction over rates on intrastate shipments—those where the bill of lading showed departure and destination points in the same state.¹⁹⁷ The interstate shipping market, which consisted of longer hauls, tended to be very competitive.

By looking exclusively at federal railroad regulation, writers such as Gabriel Kolko¹⁹⁸ concluded that the principal purpose and effect of rate regulation in the United States was the protection of the railroads from competition. But such protection was necessary for the continued viability of a national railroad system, particularly given the fact of state regulation that did not take the existence of interstate competition into account. Kolko's principal error was myopia; he failed to look simultaneously at state and federal regulatory responses.

The problem of state regulation was much different, and somewhat more complicated. The state's jurisdictional power was roughly the mirror image of the federal government's: a state could regulate shipments that commenced and terminated within the state,¹⁹⁹ but it had no power to regulate interstate shipments. Indeed, in 1886 the Supreme Court made clear that a state did not even have the power to regulate the intrastate portion of an interstate shipment.²⁰⁰

The perceived *intrastate* regulation problem was not to save railroads from bankruptcy resulting from ruinous competition, but rather to prevent price gouging on short hauls. The extent to which this was true varied from one state to another, depending on the degree of railroad development within the state. This explains why states began regulating maximum railroad rates nearly a half century before the federal government did, and why rate regulation first became prominent in relatively rural states. When the Granger laws regulating maximum railroad rates were first passed in the Midwest in the late 1860's and early 1870's,²⁰¹ Minnesota, Wisconsin, Illinois, and Iowa were in relatively early stages of railroad development, and there were many monopoly routes, upon which freight rates were very high.²⁰² Even by that time, however, interstate freight rates to the East were so low that farmers and merchants from

197. See *supra* text accompanying notes 86-88; see also *United States v. E.C. Knight Co.*, 156 U.S. 1 (1895) (mere intent of monopolist manufacturer to ship items interstate does not provide sufficient relation to commerce to justify federal jurisdiction). For identification of an intrastate bill of lading as dispositive on the jurisdictional issue, see *Cincinnati, N.O. & Tex. Pac. Ry. v. ICC*, 162 U.S. 184, 193 (1896).

198. G. KOLKO, *supra* note 9.

199. That is, a state had power to regulate shipments as long as the contracts clause or the due process clause of the Fourteenth Amendment did not interfere. See generally Hovenkamp, *The Political Economy of Substantive Due Process*, *supra* note 48.

200. See *Wabash, St. L. & Pac. Ry. v. Illinois*, 118 U.S. 557 (1886). See *infra* text accompanying notes 241-43.

201. See G. MILLER, *supra* note 21, at 172-73. As Miller notes, earlier Granger legislation regulating maximum rates was not challenged.

202. *Id.* at 3-41.

upstate New York were complaining that midwestern farmers could make an interstate shipment to the Port of the City of New York as cheaply as they could make an intrastate shipment of only one-tenth the distance.²⁰³

Interestingly, when Congress was in the same position as the states, it also legislated rates. For example, in 1886, more than two decades before Congress first authorized federal rate setting, it passed a statute authorizing the construction of railroads in federal Indian territory.²⁰⁴ The statute, which authorized the Kansas City, Fort Scott, and Gulf Railroad Company to build a railroad, specifically provided that the railroad could not set higher rates than those currently authorized by statute in the state of Arkansas, and that passenger rates could not exceed three cents per mile. Likewise, when Congress first incorporated a steam railroad to operate in the District of Columbia, it set the railroad's maximum rates at six cents per ton per mile for freight, and three cents per mile for passengers.²⁰⁵ Congress, just as much as the most radical Granger states, did not want local railroads under its direct control to charge monopoly prices. On the other hand, when Congress itself chartered a long interstate line, such as the Union Pacific, which was chartered in 1862, it failed to set maximum rates, either by statute or in the charter itself.²⁰⁶ Later when the Union Pacific did charge very high rates, Congress entertained bills to control them, but none ever passed.²⁰⁷

A. *Extraterritorial Effects of State Regulation: From The Granger Cases to The Minnesota Rate Cases*

1. *The Problem of State Free-Riding and Federal Judicial Review of Rates*

States could respond to the problem of high rates for intrastate hauls in two ways. First, they might adopt an antidiscrimination provision that either required railroad tariffs to be proportional to distance or forbade rates on short hauls from being higher than rates for long hauls on the same route and in the same direction. At first glance, such responses seem more moderate than direct regulation of maximum rates. In fact, they were more radical, for competition had forced long-haul rates too low to cover fixed costs. Antidiscrimination provisions imposed the same below-cost rates for intrastate traffic that the railroads were obtaining on interstate traffic.

Effective state legislation against most short-haul/long-haul discrimina-

203. See L. BENSON, *supra* note 22, at 40-43 (describing competition between intrastate and interstate shipments from Midwest).

204. 25 Stat. 124 (1886).

205. 20 CONG. REC. 2322 (Feb. 26, 1889); see 2 L. HANEY, A CONGRESSIONAL HISTORY OF RAILWAYS IN THE UNITED STATES 195 (1910).

206. For the text of the charter, see 2 L. HANEY, *supra* note 205, at 65-68.

207. *Id.* at 108-10.

tion became impossible in 1886 when the Supreme Court decided that a state could control short-haul/long-haul discrimination only if terminal points of *both* the long and short haul were within the state.²⁰⁸ Since short-haul/long-haul discrimination was fundamentally an interstate problem, the states substantially lost the power to control it.

The alternative was direct maximum rate regulation, which was designed to keep local rates closer to long-haul rates. By the late 1870's, many states were engaging in direct maximum rate regulation. Although in *Munn v Illinois* the Court appeared to permit such regulation without qualification,²⁰⁹ it hinted in 1884 that it might review the rates themselves if the "authorities do not exercise an honest judgment, or if they fix upon a price which is manifestly unreasonable"²¹⁰ In 1890, the Court held that the federal courts must review the substantive reasonableness of the rates set.²¹¹ In 1898, in *Smyth v. Ames*,²¹² it condemned a maximum rate that was too low for the railroad to recover its operating costs plus a reasonable return on its property located within the regulating state.²¹³ The federal courts were immediately embedded in a quicksand of substantive rate cases.

The Supreme Court of the Gilded Age and Progressive Era often has been criticized for giving the federal courts excessive authority to review the substance of rates set by state statute or commission.²¹⁴ However, the potential for abuse, particularly for freeriding by the states, was substantial, and federal control by either legislation or judicial intervention was clearly necessary. Congress had no power over intrastate rates, so the job fell to the courts. Those who criticize the Supreme Court for usurping state administrative prerogatives²¹⁵ miss the point. The point was not that the Court was a better fact finder than the agency, but that the agency represented the state and its parochial interests. The federal courts were the only competent federal arm to control state free riding and protect the integrity of the national railroad system.

Before the Granger statutes regulating maximum railroad rates, most rate regulation imposed by states was written into corporate charters,²¹⁶ which often stipulated the maximum amount that the chartered firm could

208. *Wabash, St. L. & Pac. Ry. v. Illinois*, 118 U.S. 557 (1886).

209. *Munn v. Illinois*, 94 U.S. 113 (1877), and companion cases.

210. *Spring Valley Water Works v. Schottler*, 110 U.S. 347, 354 (1884) (Waite, C. J., also author of Court's opinion in *Munn*).

211. *Chicago, M. & St. P. Ry. v. Minnesota*, 134 U.S. 418 (1890).

212. 169 U.S. 466 (1898).

213. See *infra* text accompanying notes 232-35.

214. For a summary of the criticisms, see Siegel, *Understanding the Lochner Era: Lessons From the Controversy Over Railroad and Utility Rate Regulation*, 70 VA. L. REV. 187, 210-59 (1984).

215. The principal case that attracts this criticism is *Chicago, M. & St. P. Ry. v. Minnesota*, 134 U.S. 418 (1890), which struck down a statute giving commission the authority to set rates and made its findings unreviewable.

216. See Hovenkamp, *supra* note 3, at 1290-91.

charge.²¹⁷ Such rate regulation by charter had a long pedigree.²¹⁸ Even the Charles River Bridge charter, which was drafted in 1785, stipulated the maximum tolls the proprietors could charge.²¹⁹

Rates set by charter and rates set by statute differ in two important respects. First, the charter is issued before the corporation has made its investment. The timing of the charter prevents a state from taking advantage of a corporation after it has committed funds to a project. This is not true of statutory regulation, which generally is imposed after the corporate investment. Once a bridge or railroad tracks are installed, the costs of installation become "sunk" and cannot generally be recovered, whether or not the facility goes into operation. As a result, a state could set a rate slightly higher than direct operating costs, but not large enough to retire the indebtedness for the capital expenditure. As long as operating costs plus a small surplus were covered, the corporation would be better off operating than shutting down.²²⁰

Second, a charter was a contract with the state, and no one was forced to accept a charter unless its terms were agreeable. For that reason, even laissez faire constitutional scholars such as Thomas M. Cooley,²²¹ who generally opposed statutory rate regulation, and Isaac Redfield, the eminent conservative legal authority on railroad law,²²² believed it was permissible to enforce charter provisions stipulating maximum rates. In a charter, a corporation voluntarily agreed to limit its rates at the time it negotiated the charter. On the other hand, statutory rate regulation imposed upon a firm whose charter said nothing about rates smacked of "retroactive legislation" in which the state reneged on its original grant.²²³ By regulating rates on railroads that were chartered under the assumption that the proprietors could set their own rates, the state effectively changed

217. A list of several state charters regulating railroad rates is given in *The Minnesota Rate Cases*, 230 U.S. 352, 412 nn.1-3 (1913). For discussions of rate regulation provisions in state railroad charters, see Meyer, *Railway Charters*, 1 PUBLICATIONS AM. ECON. A. (3d s.) 231 (1900); W. NOYES, *supra* note 175, at 5-6, 214.

218. For a brief history of state railroad regulation by individual charter provision, see Adams, *Legislative Control Over Railway Charters*, 1 AM. L. REV. 451 (1866).

219. See Hovenkamp, *supra* note 3, at 1291 n.164.

220. Normally, a firm will continue to produce as long as it is able to recover its variable costs, but will shut down when price falls below average variable cost. See H. VARIAN, *INTERMEDIATE MICROECONOMICS* 373-74 (1987).

221. Cooley, *supra* note 35, at 210-11; Cooley, *supra* note 100, at 254-55.

222. 1 I. REDFIELD, *THE LAW OF RAILWAYS* 449-50 (3d ed. 1867).

223. Wharton, *Retrospective Legislation and Grangerism*, 3 INT'L REV. 50 (1876); see also Atwater, *The Regulation of Railroads*, 7 PRINCETON REV. (4th s.) 406 (1881); Brewer, *Protection to Private Property from Public Attack*, 55 NEW ENGLANDER 97 (1891) (Yale Law School commencement address by Justice Brewer). Justice Field made a similar argument in his dissent in one of the Granger cases, *Stone v. Wisconsin*, 94 U.S. 181, 183 (1877) (Field, J., dissenting).

The debate over the sovereign's power to regulate rates by statute rather than by charter was revived when Congress began thinking about regulating interstate rates. See Bascom, *Railroad Rates*, 14 YALE REV. 237 (1905) (in favor of giving ICC rate-making power); Willcox, *Rates By Fiat and Existence By License*, 14 YALE REV. 260 (1905) (against giving ICC rate-making power).

the terms of a binding contract.²²⁴ Isaac Redfield argued that rate regulation of state-chartered railroads should come from the federal government, for Congress had made such railroads no promises, and state rate regulation might violate the contracts clause of the Constitution, which applied only to the states. In the 1870's, he appealed unsuccessfully for congressional control of railroad rates.²²⁵

The problem of state opportunism was exacerbated in the case of the railroads, for most railroads were fundamentally interstate enterprises, even if they operated under state charters. In 1866, Congress passed the first national railroad regulation statute under its power to regulate interstate commerce. The bill facilitated the construction of interstate railroads by providing that every steam railroad in the United States had the right to carry its cargo into other states.²²⁶ The statute was designed to prevent states from protecting their own railroads by refusing to accept cargo shipped by railroads in adjacent states.²²⁷ Whether because of this statute or state eagerness to charter any new road, by the 1870's many railroads had charters from multiple states and operated continuously through all of them.

The state incentive to impose unremunerative rates on railroads became much larger when the railroad was interstate.²²⁸ Since the railroads were common carriers, they were required by law to accept in the ordinary course of business all those willing to pay.²²⁹ The states had jurisdiction only over purely intrastate traffic—that which both originated and terminated within the state²³⁰—and this was typically less than fifteen percent of the total.²³¹ As a result, a very low rate on local traffic in any particu-

224. Wharton, *supra* note 223, at 61. Wharton argued that the "estates to vest in the future" may be changed by legislation, but "estates now vested" may not, and previously granted charters were clearly in the latter category. *Id.* at 56.

Although the railroads in the Granger cases were chartered, the grain elevator owned by Munn & Scott, at issue in *Munn v. Illinois*, was an unchartered partnership. Hovenkamp, *supra* note 3, at 1309. Consistent with Wharton's argument, rate regulation applied to them would have been permissible.

225. Redfield, *supra* note 107, at 9-10.

226. See CONG. GLOBE, 39th Cong., 1st Sess. 2871 (1866).

227. But the statute provided that it should not "be construed to authorize any railroad company to build any new road or connection with any other road without authority from the State in which such railroad or connection may be imposed." *Id.*

228. When the regulating sovereign has authority over a smaller area than the extent of the firm being regulated, the opportunities for self-dealing become more apparent. See Mashaw & Rose-Ackerman, *Federalism and Regulation*, in *THE REAGAN REGULATORY STRATEGY: AN ASSESSMENT* 111-85 (G. Eads & M. Fix eds. 1984); Maloney, McCormick & Tollison, *Economic Regulation, Competitive Governments, and Specialized Resources*, 27 J.L. & ECON. 329 (1984); Hovenkamp & MacKerron, *supra* note 29, at 765.

229. J. BEALE & B. WYMAN, *supra* note 153, §§ 101, 102 (1907).

230. See *Wabash, St. L. & Pac. Ry. v. Illinois*, 118 U.S. 557 (1886); see also *The Minnesota Rate Cases*, 230 U.S. 352, 416 (1913) (summarizing earlier decisions as holding "that the state could not prescribe interstate rates but could fix reasonable intrastate rates throughout its territory").

231. For example, in *Smyth v. Ames*, 169 U.S. 466, 528-39 (1898), the Court found that 7.5% of the railroad revenues generated in Nebraska came from intrastate traffic. See also *id.* at 543 (concluding that Chicago, Burlington & Quincy's intrastate earnings accounted for only 5% of its total earn-

lar state would not have a substantial impact on the railroad's total revenue, and the railroad would continue to operate within the state even if the maximum permissible rates on the relatively small amount of intrastate cargo were very low.

In *Smyth v. Ames*²³² the Supreme Court decided that state rates that were too low to permit the railroads a reasonable return on the part of their investment dedicated to local traffic amounted to an unconstitutional taking of private property without due process of law. The Court rejected the obvious argument, raised by the states, that if a railroad's overall business within the state was profitable it should not matter what the rates were on intrastate traffic.²³³ Likewise, it rejected the argument that a state could constitutionally reduce rates to a level sufficient to cover only direct operating costs.²³⁴ Either of these rules would have shifted to interstate traffic the burden of amortizing the railroads' fixed costs.²³⁵

2. State Power To Regulate the Interstate Railway System

In the *Granger* cases,²³⁶ the Supreme Court appeared to approve state regulation of railroad rates if *either* the origin or the destination were within the state. The Wisconsin *Granger* opinion opened with these words:

These suits present the single question of the power of the legislature of Wisconsin to provide by law for a maximum of charge by the Chicago and North-western Railway Company for fare and freight upon the transportation of persons and property carried within the State, or taken up outside the State and brought within it, or taken up inside and carried without.²³⁷

For the next decade, the issue of state power to regulate came frequently before the Supreme Court. The principal issue was the relationship between the regulatory statute and the railroad's charter. The Supreme Court generally purported to begin with the premise that the Contracts Clause exempted a railroad from regulation if its original charter expressly allowed the railroad to set its own fares. The Court rejected

ings); The Minnesota Rate Cases, 230 U.S. at 438 (chart showing about 12% of Minnesota's traffic at that time to be local); *Ames v. Union Pac. Ry.*, 64 F. 165, 186 (C.C.D. Neb. 1894).

232. 169 U.S. 466 (1898).

233. *See id.* at 486 (1898) (argument of John Webster and A. Churchill, Attorney General of Nebraska).

234. The Nebraska Attorney General also made this argument in *Smyth. Id.* at 487.

235. For an analysis of *Smyth* and an extensive argument for federal takeover of state rate-making, see White, *Government Control of Transportation Charges*, 46 AM. L. REG. (o.s.) 721 (1898), 47 AM. L. REG. (o.s.) 151, 288, 355 (1898-1899).

236. *Munn v. Illinois*, 94 U.S. 113 (1877); *Chicago, B. & Q.R.R. v. Iowa*, 94 U.S. 155 (1877); *Peik v. Chicago & N.W. Ry.*, 94 U.S. 164 (1877); *Winona & St. P.R.R. v. Blake*, 94 U.S. 180 (1877).

237. *Peik*, 94 U.S. at 175.

virtually every contract clause challenge to a state rate regulation, however,²³⁸ finding either that the charter failed to give the railroad authority to set its own rates,²³⁹ or that earlier state legislation had reserved the regulatory power to the state and thereby limited the subsequently granted charter.²⁴⁰

In *Wabash Railway*, the Supreme Court severely qualified²⁴¹ the *Granger* cases by strictly limiting the state's regulatory power to shipments that *both* commenced and terminated within the regulating state. The Court struck down Illinois' application of a short-haul/long-haul antidiscrimination provision to the rates from two different points in Illinois to New York City. The Wabash, St. Louis & Pacific Railway had carried goods from Peoria, Illinois to New York for fifteen cents per hundred pounds, while it carried goods of the same classification from Gilman, Illinois to New York for twenty-five cents per hundred pounds. The distance from Peoria to New York was eighty-six miles greater than the distance from Gilman to New York, and the route was identical: the goods bound for New York from Peoria passed through Gilman on the way. The Court found that application of the antidiscrimination statute to these transactions was a regulation of interstate commerce forbidden to the states.

The *Wabash* case appeared to undermine severely the power of the states to regulate local rates by reducing short-haul/long-haul discrimination. Under *Wabash*, a midwestern state with two or more large traffic centers, such as Chicago and Peoria, could continue to condemn short-haul/long-haul discrimination between Peoria-Chicago traffic and traffic to or from local points between those cities.²⁴² But the greater purpose of state control of short-haul/long-haul discrimination was to bring local rates more closely into parity with interstate rates to the East, and *Wabash* denied western states this power.

In his dissent in *Wabash*, Justice Bradley noted what appeared to be obvious: The extraterritorial part of the route was identical in the two shipments to which the Illinois antidiscrimination statute was applied. The only difference in the two routes lay entirely within Illinois. As a

238. See Hovenkamp, *The Classical Corporation in American Legal Thought*, *supra* note 50.

239. *E.g.*, *Ruggles v. Illinois*, 108 U.S. 526 (1883).

240. *E.g.*, *id.*; *The Railroad Commission Cases*, 116 U.S. 307 (1886); *see also* *Dow v. Beidelman*, 125 U.S. 680 (1888) (holding that when a railroad incorporated before 1874 consolidated with another and was reincorporated after 1874, it became subject to 1874 state constitutional provision authorizing government to set railroad rates).

241. The Court noted the apparent inconsistency with the *Granger* decisions, but suggested that the question did not receive any elaborate consideration there, for the basic question—whether the state had the right to regulate rates at all—“overshadowed all others . . .” *Wabash, St. L. & Pac. Ry. v. Illinois*, 118 U.S. 557, 568–69 (1886).

242. *See Louisville & N.R.R. v. Kentucky*, 183 U.S. 503, 518 (1902) (upholding short-haul/long-haul provision in Kentucky constitution if applied exclusively to long hauls entirely within state); *see also* *Louisville & N.R.R. v. Eubank*, 184 U.S. 27 (1902) (reaffirming doctrine of *Wabash* case).

result, the requirement of proportionality of rates along different routes applied, if at all, only within the state.²⁴³

However, Justice Miller's opinion for the Court noted something else: application of the Illinois statute to shipments between Illinois and other states could have a substantial effect on interstate rate-making. For example, Justice Miller suggested, interstate competition might indicate a rate of fifteen cents per hundred pounds from New York City to Peoria, but the railroad would be forbidden from charging this low rate because it was already charging higher rates on the noncompetitive parts of its lines. The statute required it to charge the higher rate on the interstate shipment as well. Likewise, Justice Miller argued, the rate charged by a railroad for a very short local haul—from Gilman, Illinois to Sheldon, a distance of twenty-three miles—would end up dictating the minimum rate that the railroad could charge on interstate shipments, even though the cost of loading and unloading accounted for almost the entire expense of the short haul but only a small percentage of the expense of the long haul.²⁴⁴

Justice Miller's illustrations were more rhetorical than realistic: he assumed in all of them that the effect of the antidiscrimination provision would be that the railroads would *raise* the rates for interstate shipments rather than lower the rates for local shipments. The state legislature had of course predicted the latter, and the legislature was almost certainly correct, because the interstate rates were set by competition. The Wabash railway could comply with the statute only by lowering its local rates.

But Justice's Miller's basic observation was nonetheless valid. By prohibiting short-haul/long-haul discrimination on interstate routes, a state could effectively depress interstate freight rates along competitive trunk lines. In the late 1880's railroad scholars already had begun to note that state regulation was affecting interstate operations.²⁴⁵ The Supreme Court never dealt effectively with this important state power over interstate rates because of its stubborn distinction between "direct" and "indirect" effects on interstate commerce. That an interstate rate had to be adjusted to take into account a legislated intrastate rate was only an "indirect" effect on interstate commerce, and the intrastate regulation did not exceed state power.

Thus, in the circuit court opinion that was reviewed in *Smyth v. Ames*, then-Judge Brewer refused to hold that a Nebraska maximum rate statute unduly burdened interstate commerce, even though the resulting maximum intrastate rate forced a readjustment of interstate rates on traffic

243. *Wabash*, 118 U.S. at 578-80 (Bradley, J., dissenting).

244. *Id.* at 576.

245. *E.g.*, Clews, *Legislative Injustice to Railways*, 148 N. AM. REV. 319, 321 (1889) (arguing that legislation of one state effected forcible, "unconstitutional" control of railroad practices in other states as well).

through surrounding states as well.²⁴⁶ Likewise, in the *Louisville & Nashville* case,²⁴⁷ the Supreme Court rejected an argument that a short-haul/long-haul antidiscrimination provision applied entirely within the state was unconstitutional, despite the fact that application of the Kentucky statute would force a change in long-haul rates determined by competition with routes outside the state. The Court conceded that intrastate rate regulation "may somewhat affect commerce generally"; however, "such a result is too remote and indirect to be regarded as an interference with interstate commerce"²⁴⁸

During the decade after *Smyth v. Ames*, state power over interstate rates became more fully understood. In approving the *Smyth* decision, Harry Robinson, editor of *The Railway Age*, noted that individual states were too small to regulate the rates of an essentially national railroad system.²⁴⁹ The result was self-dealing, as each state tried to ensure that its rates were no higher than the rates of its neighbors. Unfortunately, no one was concerned for the integrity of the system as a whole. "It would be an incalculable blessing, both to the people and the companies," Robinson argued, "if the railway system of the United States could be treated as a national unit under Federal control only."²⁵⁰

In a seminal article in 1908, *How the States Make Interstate Rates*,²⁵¹ Robert Mather, president of the Rock Island Railroad, showed how state regulation of purely intrastate rates effectively controlled a broad range of interstate rates.²⁵² The largest force in setting interstate rates was competition. The effect of a maximum intrastate rate from one state border to another, Mather illustrated, was that competitive lines outside the state were forced to match the legislated rate or lose their business. This created an effect which could be felt all the way up and down the line, and over routes that crossed several states. More ominous, argued Mather, was that the states were interested only in protecting their own constituencies. Unlike the Interstate Commerce Commission, which had jurisdiction over interstate rate-making, they had no regard for the integrity of the system as a whole:

There is hardly a rate on any article of commerce but feels the force

246. *Ames v. Union Pac. Ry.*, 64 F. 165, 171 (C.C.D. Neb. 1894), *aff'd sub nom. Smyth v. Ames*, 169 U.S. 466 (1898). The statute was struck down, however, as denying the railroad a fair rate of return on its investment.

247. *Louisville & N.R.R. v. Kentucky*, 183 U.S. 503 (1902).

248. *Id.* at 518. The Court applied similar reasoning in *Minneapolis & St. L.R.R. v. Minnesota*, 186 U.S. 257, 267-70 (1902). See also *Northern Pac. Ry. v. North Dakota*, 216 U.S. 579 (1910) (upholding constitutionality of state law fixing coal carriage rates).

249. Robinson, *State Regulation of Railways*, 166 N. AM. REV. 398 (1898).

250. *Id.* at 398.

251. Mather, *How the States Make Interstate Rates*, 32 ANNALS, at 95, 102 (1908).

252. *Id.* For a similar argument, see Ripley, *The Trunk Line Rate System: A Distance Tariff*, 20 Q.J. ECON. 183 (1906).

of these competitive conditions [on interstate routes]. They absolutely dictate the traffic policy of the railroads operating in the territory affected by them. The carrier makes no rates that are not effectively moulded by these conditions, and the rate-making power of the Interstate Commerce Commission itself cannot ignore them. The only rate-regulating body that makes rates without reference to these commercial conditions is the legislature or the railroad commission of a single state.²⁵³

Despite the concerns raised by academics and journalists, the Supreme Court reaffirmed Judge Brewer's circuit court ruling in *Smyth* in *The Minnesota Rate Cases*²⁵⁴ in 1913. It conceded that the states had substantial power over interstate rates, but once again it classified this power as merely an "indirect" burden on interstate commerce. Additionally, the Court held that in determining whether a state maximum rate was so low as to be unconstitutionally confiscatory,²⁵⁵ the courts must look at operating costs plus the return on that portion of the tonnage carried within the state devoted entirely to intrastate traffic.²⁵⁶ Under the Court's analysis, if, for example, a railroad had property worth \$1,000,000 within the state and twelve percent of the traffic measured by ton miles was intrastate, the intrastate rate must be high enough to give the railroad operating expenses and a reasonable return on \$120,000.²⁵⁷ Finally, the court placed on the railroads the considerable burden of showing that the rates legislated by the states were confiscatory.²⁵⁸

Under this rule, if a state set its rates at the constitutional minimum, the railroad would have to amortize its fixed costs evenly over intrastate and interstate traffic or it would fail to break even. Given that competition tended to force rates on interstate routes to variable costs, the rule in *The Minnesota Rate Cases* effectively permitted states to impose negative returns overall.²⁵⁹ This best explains why, Supreme Court intervention not-

253. Mather, *supra* note 251, at 104.

254. 230 U.S. 352 (1913).

255. In *Smyth v. Ames*, 169 U.S. 466, 528-29 (1898), which held that railroads were entitled to "just compensation" for their investment, the Court had set this standard for defining the minimum reasonable rate of return that a state price regulation could impose.

256. In the Court's words,

[w]here the business of the carrier is both interstate and intrastate, the question whether a scheme of maximum rates fixed by the State for intrastate transportation affords a fair return, must be determined by considering separately the value of the property employed in the intrastate business and the compensation allowed in that business under the rates prescribed.

The *Minnesota Rate Cases*, 230 U.S. at 435. The problem is discussed more fully in an earlier article upon which the litigants may have relied. Robinson, *The Legal, Economic and Accounting Principles Involved in the Judicial Determination of Railway Passenger Rates*, 16 YALE REV. 355 (1908). For later criticism of the decision, see Collins, *The Minnesota Rate Cases and the Fourteenth Amendment*, 48 AM. L. REV. 27 (1914).

257. The *Minnesota Rate Cases*, 230 U.S. at 438 n.1.

258. *Id.* at 465-66.

259. The Court rejected the argument that the value of the railroad's property within the state should be established by a ratio to the total value of the railroad's property equal to the ratio between intrastate gross revenue and total gross revenue. The Court found that this ratio, if based on pre-

withstanding, the railroads sought, and Congress eventually felt obliged to provide, preemption of the greater part of the state's rate-making power, even respecting intrastate traffic.²⁶⁰ The Supreme Court should be criticized not for interfering in the state rate-making process, but for setting a constitutional minimum too low to prevent state free-riding, which undermined the integrity of the national railroad system.

B. *The Development of Federal Supremacy*

In the early 20th century, the perceived rapid growth of federal supremacy over the American economy was controversial, but it appeared to be inevitable. Woodrow Wilson found himself in a quandry. He wished to protect the federalist system and the state's right to regulate, but he recognized that the economy was national, that inconsistent state laws were imposing enormous costs on business, and that there was no realistic hope for uniform state lawmaking.²⁶¹ Henry Wade Rogers, Dean of the Yale Law School, also admitted the problem, but he believed that the states' authority to regulate their own business was essential to the preservation of the federal system.²⁶² The railroads stood at the crossroads of this conflict of sovereignties. State prerogatives notwithstanding, expanded federal control clearly lay on the horizon.

Congress gradually increased the authority of the Interstate Commerce Commission over interstate rates. The Elkins Act of 1903 forbade rebating and required the railroads to file their rates with the Commission.²⁶³ Once filed, these rates became mandatory, and railroads were forbidden to deviate from them. Since joint rate-making was legal under the Act, its overall effect was to make cartel cheating more difficult.²⁶⁴ Thus, the statute tended to shore up secret pools and price-fixing arrangements, and may have made interstate rates more profitable.²⁶⁵ The Hepburn Act of 1906²⁶⁶ additionally empowered the Commission, upon complaint, to declare an existing rate unreasonable and prescribe a new one, thus giving

statute rates, would give the railroad a constitutional right to have perpetuated the same disproportionately high rates that the state was trying to control. *Id.* at 459-62. The Court was correct, but the railroads were trying to preserve a system that acknowledged that rates on the competitive part of the system were too low to become the basis for statutory rate regulation.

260. See *infra* text accompanying notes 283-86.

261. Wilson, *The States and the Federal Government*, 187 N. AM. REV. 684 (1908). For a more optimistic account of the ability of states to act together to pass uniform state laws, see Allen, *States With Ideas of Their Own*, 190 N. AM. REV. 515 (1909).

262. Rogers, *The Constitution and the New Federalism*, 188 N. AM. REV. 321 (1908).

263. Elkins Act of 1903, ch. 708, 32 Stat. 847 (1903).

264. The statute both permitted the railroads to draft and propose rates jointly and prevented any particular railroad from deviating from those rates. The best cartel is one facilitated by the government itself.

265. By this time, pooling and other forms of price fixing had been condemned under the antitrust laws. See *supra* text accompanying notes 133-35.

266. Ch. 3591, 34 Stat. 584 (1906). For contemporary commentary, see Bryan, *The Constitutional Aspects of the Senatorial Debate Upon the Rate Bill*, 41 AM. L. REV. 801 (1907); Cohn, *Recent Developments in the Law Relating to Interstate Commerce*, 42 AM. L. REV. 666 (1908).

the Commission its first real rate-making powers. The Mann-Elkins Act of 1910²⁶⁷ carried the Commission's power one step further by giving it the authority to suspend proposed changes in interstate rates pending an investigation, and to condemn short-haul/long-haul discrimination without the need for a complaint. The Mann-Elkins Act effectively gave the Commission full control over interstate rates, subject to judicial review of their reasonableness.

Already in 1889, the Interstate Commerce Commission had begun to advocate broader federal control over *intrastate* railroad rates,²⁶⁸ but Congress did not assert such authority for another thirty years.²⁶⁹ On the contrary, it had explicitly exempted intrastate shipments from the Interstate Commerce Act in 1887²⁷⁰ and did so once again in the Hepburn Act in 1906.²⁷¹ Congress probably continued to believe that it had no authority to legislate intrastate rates, and thus refused to give that power to the Commission.

However, the Commission received some encouragement in 1913 in *The Minnesota Rate Cases*.²⁷² The Court suggested that where the extraterritorial effects of intrastate rate-making were clear because of the "interblending of the interstate and intrastate operations of interstate carriers," Congress might have the power to preempt state rate control. Such preemption would require a showing that "adequate regulation of . . . interstate rates cannot be maintained without imposing requirements with respect to . . . intrastate rates which substantially affect the former"²⁷³

The Supreme Court made its position clearer a year later in *The Shreveport Rate Case*,²⁷⁴ when it held that even the existing legislation gave the Interstate Commerce Commission power over purely intrastate rates if it could show that they actually burdened interstate traffic. Shreveport, Louisiana was an important port city on the Red River, a large tributary of the Mississippi with direct access to all Mississippi River traffic. Substantial competition with water routes forced railroads to make very low rates into and out of Shreveport.²⁷⁵

267. Ch. 309, 36 Stat. 539 (1910); see generally Dixon, *The Mann-Elkins Act, Amending the Act to Regulate Commerce*, 24 Q.J. ECON. 593 (1910).

268. ICC Ann. Rep. 73-75 (1889).

269. See *infra* text accompanying notes 283-85.

270. Ch. 104, § 1, 24 Stat. 379 (1887); see *The Minnesota Rate Cases*, 230 U.S. 352, 417-18 (1913).

271. Ch. 3591, 34 Stat. 584 (1906); see *The Minnesota Rate Cases*, 230 U.S. at 418.

272. 230 U.S. at 417.

273. *Id.* at 432-33.

274. *Houston, E. & W. Tex. Ry. v. United States; Texas & Pac. Ry. v. United States*, 234 U.S. 342 (1914) [hereinafter *The Shreveport Rate Case*].

275. Such competition was not unique to the Texas-Louisiana area; it figured prominently in long-haul rate-making across the country. For example, the rates charged by the Panama Canal forced American coast-to-coast railroad rates to a level much lower than the level that prevailed between many pairs of inland cities. On the competition between railroads and canals, see Bogart, *Early*

But the Texas Railroad Commission, which set Texas rates,²⁷⁶ followed its own policy of encouraging the economic growth of Texas cities.²⁷⁷ It attempted to compensate for the low interstate rates accorded to Shreveport by making rates within Texas much lower than the interstate rates from Shreveport to the same Texas points. For example, the rate from Houston to Lufkin, Texas, a distance of 118.2 miles, was 50 cents per hundred pounds. The rate from Shreveport to Lufkin, a distance of 112.5 miles, was 69 cents. The effect of this scheme was to give Houston and Dallas an advantage over Shreveport with respect to shipments originating in or destined for other Texas points.

The Interstate Commerce Commission responded with an order that was the obverse of the statute struck down in the *Wabash Railway*²⁷⁸ case: It ordered the carriers to make intrastate rates proportional to the prevailing interstate rates.²⁷⁹ The classical theory of commerce clause power²⁸⁰ would have suggested that just as the state could not apply its antidiscrimination provision to interstate traffic, Congress could not apply its antidiscrimination law to intrastate traffic. In this case it was clear, however, that the intrastate rate-making was having a substantial effect on interstate commerce:

The fact that carriers are instruments of intrastate commerce, as well as of interstate commerce, does not derogate from the complete and paramount authority of Congress over the latter, or preclude the Federal power from being exerted to prevent the intrastate operations of such carriers from being made a means of injury to that which has been confided to Federal care.²⁸¹

The Court noted the lack of symmetry between its decisions condemning state power and approving federal power over interstate/intrastate discrimination, but concluded that it was "for Congress to supply the needed correction where the relation between intrastate and interstate rates presents the evil to be corrected"²⁸²

Canal Traffic and Railroad Competition in Ohio, 21 J. POL. ECON. 56 (1913); Daggett, *The Panama Canal and Transcontinental Railroad Rates*, 23 J. POL. ECON. 953 (1915); James, *The Canal and the Railway*, 5 PUBLICATIONS AM. ECON. A. 282 (1890). Bogart blamed railroad rate discrimination—lower rates in the presence of canal competition than the railroads charged elsewhere—for the demise of the canals.

276. On the Texas Railroad Commission at this time, see Haney, *Railway Regulation in Texas*, 19 J. POL. ECON. 437 (1911).

277. See W. RIPLEY, *supra* note 12, at 394.

278. *Wabash, St. L. & Pac. Ry. v. Illinois*, 118 U.S. 557 (1886). See *supra* text accompanying notes 241–44.

279. *The Shreveport Rate Case*, 234 U.S. at 347.

280. The theory was developed in *Cooley v. Board of Wardens*, 53 U.S. (12 How.) 299 (1851).

281. *The Shreveport Rate Case*, 234 U.S. at 351.

282. *Id.* at 355. Finally, the Court concluded that since Congress had the power to reach interstate/intrastate discrimination, that power could be delegated to the Interstate Commerce Commission. It then held that § 3 of the Interstate Commerce Act, preventing railroads from making an "undue or unreasonable preference or advantage" for one person over another, justified the Commis-

The *Shreveport Rate Case* began to open Congress' eyes to the harmful potential of simultaneous state and federal rate-making. It eventually responded with the Transportation Act of 1920,²⁸³ which rewrote railroad regulatory policy,²⁸⁴ and for the first time created a single, national railroad system.²⁸⁵ The Transportation Act gave the Interstate Commerce Commission substantial power to set intrastate as well as interstate rates, and to set minimum as well as maximum rates.²⁸⁶ The immediate result was a number of Commission actions challenging unduly low state-imposed rates on the theory that they discriminated against interstate commerce.²⁸⁷ In upholding the Commission's power over intrastate rates, the Supreme Court expressly relied on the interstate effects of low intrastate rates, concluding that "[i]f the railways are to earn a fixed net percentage of income, the lower the intrastate rates, the higher the interstate rates may have to be. . . . [Effective Commission administration of the Transportation Act] will reasonably and justly require that intrastate traffic should pay a fair proportionate share of the cost of maintaining an adequate railway system."²⁸⁸

V. CONCLUSION: FEDERALISM AND REGULATORY CAPTURE

An important part of any theory of regulation is the identification of the optimal regulatory sovereign. Who should regulate? The most serious problem the railroads faced in the late nineteenth century was not that no one understood the simple economics of running railroads, for many did.²⁸⁹ Far more serious was that for half a century the primary task of controlling an essentially national railroad system had been left to the states with their parochial interests. The railroads looked to the federal government for salvation, because they wanted some order in a national system that was falling apart.

That American railroads were going bankrupt, that they petitioned Congress for relief, and that Congress responded with legislation may be consistent with a capture theory of regulation, but it falls far short of

sion's order. *Id.* (quoting Interstate Commerce Act, ch. 104, 24 Stat. 379, 380) (1887).

For contemporary analysis of the problem, see Coleman, *The Commerce Clause and Intrastate Rates*, 12 COL. L. REV. 321 (1912); Coleman, *The Evolution of Federal Regulation of Intrastate Rates: The Shreveport Rate Cases*, 28 HARV. L. REV. 34 (1914).

283. Act of Feb. 28, 1920, ch. 91, 41 Stat. 456; Act of May 8, 1920, ch. 172, 41 Stat. 589.

284. For example, section five reversed Congress' longstanding opposition to pooling, and permitted the practice under certain circumstances, subject to Commission approval. 1 I. SHARFMAN, *supra* note 12, at 183.

285. *See id.* at 177-244.

286. Title IV, § 416, 41 Stat. 484 (1920), amending § 13 of the Interstate Commerce Act.

287. *E.g.*, *In re Rates, Fares, and Charges of the New York Central R.R. & Other R.R. in N.Y.*, 59 I.C.C. 290 (1920); *In re Intrastate Rates Within Ill.*, 59 I.C.C. 351 (1920); *Wisconsin Passenger Fares*, 59 I.C.C. 391 (1920), *enforced sub nom.* *Railroad Comm'n of Wis. v. Chicago, B. & Q. R.R.*, 257 U.S. 563 (1922).

288. 257 U.S. at 586.

289. *See supra* text accompanying note 140.

establishing capture. Americans had made a policy choice in favor of privately-owned rather than state-owned railroads. Clearly one might argue that state ownership of the railroads would have been better for America than private ownership, but the work of capture ideologues such as Gabriel Kolko makes no attempt to do this.

Given the assumption of privately owned railroads, any responsible appreciation for the historical development of railroad regulation must include the premise that the investor-owned railroad company is entitled to earn a profit. Protection of railroad profits is as important to government regulatory policy as is consumer protection, for without profits no new investment can be expected. This fact seems to have escaped Kolko, who saw every congressional or Commission move to protect railroad profits as a conspiracy directed at the railroads' consumers. Kolko simply overlooked the fact that shippers and farmers profited as much from the railroads as did railroad stockholders. Moreover, there is nothing necessarily inconsistent with the public interest in the railroads' desire for a regulatory scheme that allowed them to gain some positive return on investment. Everyone had a strong long-run interest in the maintenance of an economically healthy railroad system, whatever their short run interests may have been.

But the difficulties of the Kolko thesis are not merely a matter of economics or logic. They go to the historical record as well. One problem is the 1887 Interstate Commerce Act itself. The Act (1) contained no provision authorizing the Interstate Commerce Commission to set minimum rates; (2) forbade pooling; and (3) prohibited short-haul/long-haul discrimination. On its face, this appears to be the worst possible statute for the railroads. Rates on competitive lines—the only ones that Congress had the power to regulate²⁹⁰—would continue to be set by competition, and competition dictated unprofitable rates. Further, the two devices that had permitted the railroads to earn net positive returns were condemned. The Act appeared to reduce the railroads' power to use pools to cartelize competitive markets, and they could no longer use monopoly rates from short hauls to offset the competitive returns they were obtaining from long hauls.

Because of the efforts of the Commission, which continued to favor pooling in spite of the antipooling clause,²⁹¹ and the Supreme Court, which interpreted the long-haul/short-haul clause narrowly,²⁹² these provisions of the Act did not do as much damage to the railroads as they

290. See *supra* text accompanying notes 86–87.

291. See *supra* text accompanying note 117.

292. *ICC v. Alabama Midland Ry.*, 168 U.S. 144 (1897) (competition should be taken into account in cases challenging long-haul/short-haul discrimination, and discrimination permitted if competition required lower rate for long haul). Since competition explained virtually *all* instances of short-haul/long-haul discrimination, the decision eviscerated the long-haul/short-haul clause of the original Interstate Commerce Act.

could have. But if Congress had any role in easing the burden on railroads, it was more a result of poor drafting than of legislative policy. The development of the original Interstate Commerce Act makes a strong case for the premise that Congress did not want to do the railroads any favors, and that the Supreme Court's record was ambiguous—emasculating the antidiscrimination section, but virtually eliminating pooling under the antitrust laws.²⁹³

The record of congressional activity in the area of railroad regulation in the late 19th and early 20th centuries is probably as consistent with the traditional Progressive public interest theory of regulation as it is with the Kolko thesis or other alternative theories.²⁹⁴ The alternative that makes the most sense is that, beginning with the Interstate Commerce Act in 1887, the national railroad system first became a regulated "market"—that is, an industry regulated by a sovereign large enough to encompass all its operations. The resulting regulatory policy was not perfect; on the contrary, it was experimental and filled with flaws. But the flaws were not ones of motive or extreme naivete. They were flaws that derived from two things—first, an economic model that was incomplete and only imperfectly understood; and second, a set of constitutional rules and historical precedents that continually forced Congress to show excessive deference to state interests until the Supreme Court finally relaxed its views about congressional power over intrastate rates. Such a record makes a poor case for congressional philandering with the regulated.

293. See I. SHARFMAN, *supra* note 12, at 11-70.

294. One alternative is that Congress merely wanted to control the economic power of the railroads, even if that reduced efficiency; Congress preferred a broken down system to an economically powerful one. See A. MARTIN, *supra* note 31; Martin, *supra* note 38. The atomization of the economic power of railroads may have been the long-term effect of governmental regulation, but no one has produced a convincing argument that it was the motive of Congress, the ICC, the Supreme Court, or any other governmental entity.