

Should Noncompetes Be Enforced?

New empirical evidence reveals the economic harm of non-compete covenants.

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Law students laugh when they first learn that the law will only enforce a covenant not to compete — that is, an employment agreement that the worker will not leave the firm and go to work for a competitor — if the covenant is judged “reasonable.” (Since “covenants not to compete” is cumbersome, everyone now seems to call them “noncompetes,” and so will I. They are also sometimes called “restrictive covenants.”) A vaguer legal standard is hard to imagine. The American Law Institute, currently preparing an authoritative restatement of employment law, makes things only a little clearer: An employer seeking to enforce a noncompete must demonstrate a “legitimate interest,” and simply not wanting competition is not a “legitimate interest.” The employer must instead show that enforcing the noncompete will protect its “confidential information, customer relationships, investment in the employee’s reputation in the market, or investment in the purchase of a business belonging to the employee.” Even when the employer demonstrates such a legitimate interest, the noncompete may be enforced only if “it is reasonably tailored in scope, geography, and time” to protect that legitimate interest.

The cases are more unruly. Many lawyers who litigate noncom-

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This article is adapted from a chapter that Hyde has contributed to the forthcoming book *Research Handbook on the Law and Economics of Labor and Employment Law*, edited by Michael Wachter and Cynthia Estlund (Edward Elgar, 2011).

petes have told me that no category of litigation is less predictable. Some courts will routinely enjoin the departing employee from competing with the old employer simply because he or she signed a noncompete, without worrying much about the employer’s legitimate interest. At the other extreme are states like California and Colorado that never enforce noncompetes signed by employees. In the middle, it is very hard to guess what will be found “reasonable.”

This kind of uncertainty used to be just entertainment for law students. A generation ago, most large American corporations filled top management and technical positions entirely with career employees who had come up through the ranks. If firms do not hire from outside, noncompete law really does not matter much; mid-career employees will not leave anyway. Recently, however, a series of unrelated economic developments have put noncompetes under new scrutiny. All U.S. employers now hire management and technical personnel from competitors in their industry. Start-ups and spin-outs now interest us as much as old-line companies, and these new firms are always started by managers experienced in that industry. Nobody has real data on these questions, but most observers think that nearly all managers sign noncompetes, and that litigation over them is growing.

When, if ever, should noncompetes be enforceable? This question is very difficult to answer if approached as a theoretical question. It all depends on where you start, but, wherever you start, the noncompete will seem like an anomaly.

Some readers of this journal will want to start from freedom of contract. The genius of U.S. employment law, as a general mat-

ter, is freedom of contract between employers and employees. We do not go in for the detailed standard employment contracts of so much European and Latin American law, which are so rigid that a high percentage of the workforce ends up being paid off the books. In the United States, by contrast, employers and employees are free to agree on any level of compensation (above the minimum), benefits, or vacations that they choose. Why can they not similarly agree on post-termination terms? Why is competition the only term of the employment contract that must satisfy courts under a vague standard of “reasonableness”? Why should employees not be bound by anything they sign?

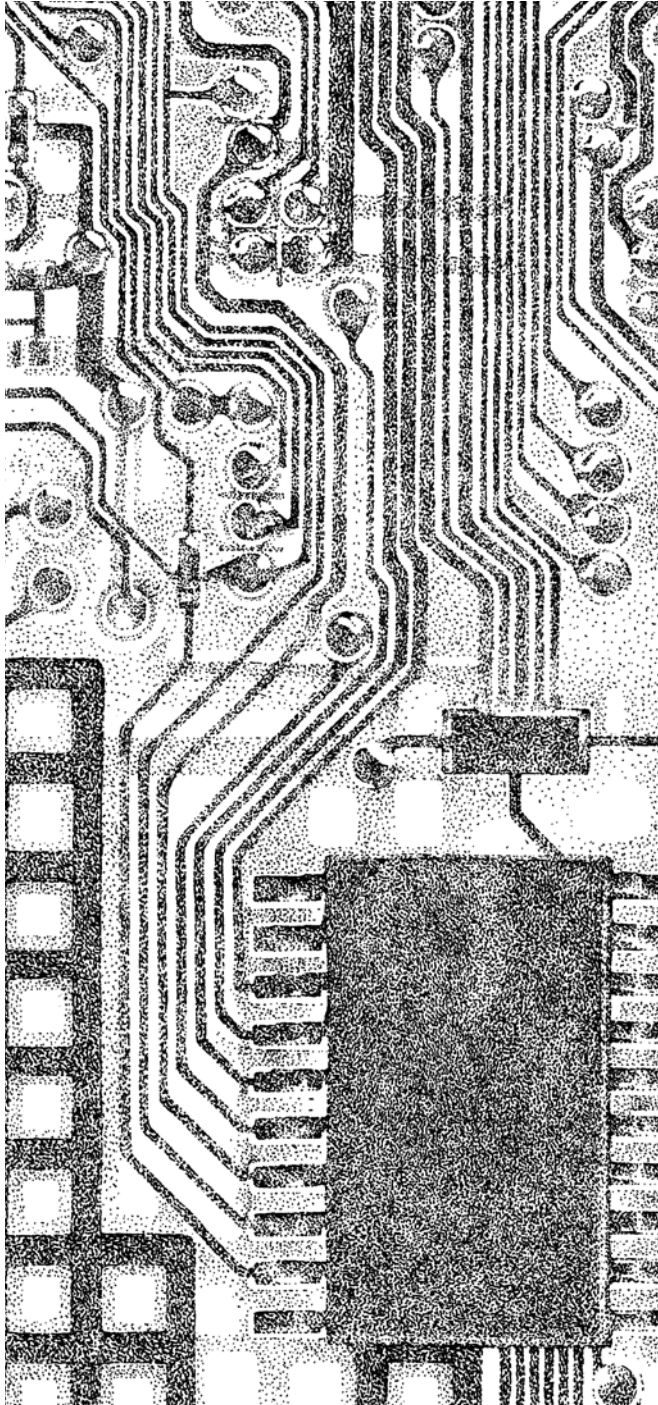


ILLUSTRATION BY MORGAN BALLARD

One can equally well argue, however, that the starting point should not be freedom of contract, but freedom of competition. In this story, the genius of U.S. employment law is a free and competitive labor market in which there are no restrictions on anyone’s ability to compete for employment. Looked at this way, a noncompete is just a judicially enforced restriction on freedom of contract. We could see the law of noncompetes as just an application of basic, uncontroversial law on business competition. A famous law school teaching case successfully enforces a lumber yard’s noncompete against its departing sales manager. But Home Depot, Lowe’s, and Fullerton Lumber (the lumber yard involved in the case) are not legally permitted to agree that only one of them will sell building supplies in Clintonville, WI. Such an agreement is a *per se* violation of antitrust law, without specific proof of harm to consumers. Why then is Fullerton Lumber able to enforce such an agreement against its departing sales manager, simply because his rival yard was winning the sales competition through better prices and services? In the actual case, enforcing the noncompete accomplished nothing; the sales manager’s wife ran the company during the noncompete, and today his company survives and his old employer no longer exists. As we shall see, however, not all enforcement of a noncompete is so ineffectual.

There has been little public debate about noncompetes in the United States, and the little that there is sometimes takes the form of a clash of absolutes (freedom of contract versus freedom of mobility, for example). Recently, however, some of us have suggested – thinking about high technology industries in states like California and Colorado – that the nation would be better served by never enforcing noncompetes. Now, very recently, we have the first hard data that indicate that most regions and industries, and certainly employees and the general public, would be better off if noncompetes were completely unenforceable, as is true in California. (See “Hurd on the Street,” p. 2.)

Questions from Silicon Valley

Noncompetes are completely unenforceable in California and have been for over a century. The California Supreme Court recently made clear that there are no exceptions to this ban. Employers in California, like anyplace else, may sue to enjoin “actual or threatened” disclosure of their trade secrets, but they are almost never able to enjoin departing employees from working for competitors. The ban reflects accidents of 19th-century codification, not social policy. Nevertheless, it has led to some very fluid employment markets there, what I have called “high-velocity labor markets.” To appreciate that fluidity, consider that a man working in the computer industry in California has a 56 percent greater likelihood of changing jobs this month than the average Californian.

Managers in technology companies who had managed both back East and in Silicon Valley began to notice as early as 1981 that employees changed jobs more frequently in California. Of course, there are many reasons for this. Californians might be more restless in other ways. But certainly the state’s refusal to

enforce noncompetes must be part of the mix.

In 1994, AnnaLee Saxenian published an enormously influential book comparing America's two great technology districts: Silicon Valley and the Route 128 corridor in Boston. From similar origins, the regions had taken different paths. California had developed a culture of start-ups, with rapid mobility among firms and thus substantial flows of information across firm boundaries. Firms cooperated by sharing technology, joint ventures, and outsourcing. Employees talked to their friends and former (and future) colleagues at competing firms. California engineers moved easily among employers, while their counterparts in Massachusetts pursued stable careers in the internal labor markets at Digital or Wang. Saxenian identified the rapid flow of information across firm boundaries as the crucial factor that had led to Silicon Valley's surpassing Route 128. She mentioned employee mobility, but also stressed formal contracting among firms and social ties among employees and managers. She did not discuss legal factors at all. Some of us read her book in 1994 and wondered whether employee mobility and employment law — specifically, the California refusal to enforce noncompetes — might not be a bigger part of the story.

When I began lecturing on these issues in the 1990s, many people argued that start-ups, planned employee mobility, and outsourcing were management fads, and that companies that went too far down that road would come to regret it. We now know that this is not true. For a certain kind of company, hiring for short tenure (think temps, independent contractors, and noncitizens on work visas) and rapid employee turnover can be positive for firm productivity. A company that invests heavily in research and development, or that uses advanced technologies, will be more productive if it hires frequently and if its compensation rewards ability, not experience. Companies that do not invest in R&D or use advanced technologies will not realize much gain in productivity if they switch to very-short-term hiring.

It may be that for a region or industry to realize the potential productivity gains from such a high-velocity labor market, it cannot enforce noncompetes. Noncompetes let old employers interfere with start-ups. It may also be that highly talented employees will only take short-term employment if they know that they will not face impediments when they move on to the next opportunity. Recent scholarship suggests exactly this. But before turning to it, I want to introduce two important developments in economic and management literature that help explain why employee turnover can be positive for productivity: economic literature on nonrivalrous and nonexcludable information, and management literature showing how mobile employees actually spread such information.

Nonrivalrous and nonexcludable information | Economic analysis of markets for information is still in its infancy, and most potential applications of this analysis to labor markets lie in the future. Until the 1990s or so, economists typically assumed that information had economic value only insofar as it was held as property, typically intellectual property.

Economic reference to shared information typically took place,

if at all, within the framework of “spillover.” The most famous analysis was Kenneth Arrow's. In this framework, normal production of goods and services has, as a kind of unintended consequence, the production of information, for example, of what kinds of production are and are not possible. This information then “spills over” to rival firms without compensation. “Spillover” models before the 1990s saw this as a problem, not a blessing. Since the social value of production exceeded the private return to the producer, there would be a tendency for firms to invest in R&D at levels below the socially optimum.

By contrast, in the New Economics of Growth of Paul Romer and Robert Lucas, among others, nonrivalrous and nonexcludable information, property of no one, becomes the most important factor in economic growth or economic “miracles.” Romer distinguishes between rivalrous and excludable information. His theory is limited to information that is both nonrivalrous and nonexcludable:

Rivalry is a purely technological attribute. A purely rival good has the property that its use by one firm or person precludes its use by another; a purely nonrival good has the property that its use by one firm or person in no way limits its use by another. Excludability is a function of both the technology and the legal system. A good is excludable if the owner can prevent others from using it.

I will follow Romer's terminology. When a given court refuses an injunction to plaintiff Employer 1 and permits an employee to found or join a rival firm, the court is allocating both rivalrous and nonrivalrous (and now, by definition, nonexcludable) information. The rivalrous information is the “tacit information” or “know-how” of an employee, not reducible to code. Information lodged in a human body that can be in only one place at one time is technologically rivalrous, in Romer's terminology. The departing employee will also carry formulas, algorithms, ideas, and negative information that are nonrivalrous — many firms may use them — and, should the court deny an injunction, nonexcludable. So far as I know, Romer's is the first economic analysis of legally nonexcludable information as a factor in economic growth, rather than what earlier analysts called “spillover.” The term “spillover” is, however, now often used, somewhat confusingly, to denote this nonrivalrous, nonexcludable information.

Most of this nonrivalrous information is produced by private firms, as opposed to general scientific or technological facts. Firms produce information, whether or not they can exclude others from using it, because it provides the best return on investment, and they do not need special legal monopolies in technical information in order to produce it. As we shall see, this single insight lies behind most recent critical examination of employment intellectual property law. For example, if everyone in information technology knows the features of Intel's next central processing chip, they can design programs and applications that are compatible with it. If, as is true of Google's Android software for mobile phones, the code is open source, anyone can design and market an application to run on a phone that runs Android. Most practical examples are on a smaller scale, however. It turns

out that most firms have more to gain from openness than from secrecy. If you know what projects were wastes of money for other firms in your industry, you will not waste your money on duplicative research. All firms are frequently better off when they can converge on common protocols and practices.

Mobile employees and information flow | It turns out that mobile employees are the best source for spreading lawful, public domain information. It is much easier for firms to learn about recent developments by hiring someone who knows them than it is to try to learn from scientific journals, conferences, and the like. We now have impressive data from scholars who have tracked which patents are cited when new patents are applied for. In the 1990s, most firms in semiconductor technology just cited their own patents. Engineers at old-style firms like IBM and Texas Instruments knew only what had been invented in their own firms. The only region of the country in the 1990s where patent applications frequently cited patents from other firms — mostly, other Valley firms — was Silicon Valley, as Paul Almeida and Bruce Kogut showed in 1999. This was significant support for Saxenian’s account of Silicon Valley: collaboration across firm lines leading to flexibility and growth. While Saxenian emphasized informal social ties and production networks that spanned firm boundaries (while also mentioning employee mobility), Almeida and Kogut singled out employee mobility as the explanation for the Valley’s unusual pattern of nonrivalrous information.

A decade on, that pattern is no longer unique to Silicon Valley. Study after study shows how much more productive firms will be if they can hire, free of lawsuits, someone who worked at a rival. Perhaps more surprisingly, it is not just the hiring firm that becomes more productive; the old employer does, too. In high-velocity labor markets, losing an employee does not mean losing information. It means access to a new information network. Firms’ patent citations are much more likely to cite patents from firms or regions to which their former employees have moved.

The literature showing the importance, for information flow, of enduring personal ties and geographic proximity may just seem like common sense, like something your mother used to tell you. But it is not obvious, and it is not what everybody used to believe. We all remember predictions, still encountered, that in the future everyone would work at computers linked to all the other computers in the world and that physical location would thus become irrelevant. There is some truth here, but it is wildly overstated. Certainly some kinds of knowledge do not require physical proximity. When new chips come onto the market, chip manufacturers around the world seem equally able to use them to improve their own. It did not matter whether the two manufacturers had ever been in a joint venture, were across the road, or in different continents. For other kinds of knowledge, however, personal proximity matters intensely; it is hard to explain H-1B visas for programmers any other way. Why do firms lobby for visas for programmers rather than outsource the programming to India, when the programmers are cheaper in India and the “human capital” of the programmers

is the same in Bangalore or San Jose? Because a programmer — any technical employee — is more productive for the firm if he or she has worked, at least for a time, in San Jose.

Germany has given us a natural experiment of a self-conscious attempt to build a culture of high-tech start-ups without changing the employment contract. It failed. The German government thought, not implausibly, that Germany had no start-ups because its excessively rigid securities market discouraged venture capital. It turned out that the problem was not, or not just, a rigid investment market, but also a rigid labor market. Germany has the second-lowest rate of mobility of scientific and technical personnel in Europe. (Only Italy’s is lower.) There is no labor market for mid-career German scientists and it would be folly for any to leave Siemens or SAP for a start-up. New Jersey is the U.S. equivalent. New Jersey is one of the wealthiest states, with a highly educated workforce and a large technology sector centered around communications and pharmaceuticals, among others. Yet it has essentially no venture capital, no culture of start-ups, no banking or law firms that specialize in start-ups. It also vigorously enforces noncompetes and is one of perhaps three states in which employers may enjoin a departing employee from taking a job on the grounds that he or she will “inevitably disclose” some unspecified trade secret.

If you put the economic literature on nonexcludable information, the management literature on patent citations, and the observations of Silicon Valley together, you get a picture of noncompetes that is about the opposite of the traditional picture. Remember that the employer is never, in theory, able to enforce a noncompete just because it does not like competition. The employer has to show a kind of intellectual property interest, broadly defined: the employee can be enjoined from competing with us because he knows our trade secrets, or our customer information, or because he received expensive training from us. But it now turns out that there are intellectual property concerns the other way. In California, there are no noncompetes, employees move freely, and there are few secrets. Firms continue to produce innovations and inventions, but these diffuse rapidly and there is little wasted duplicative research. Recent scholarship looking just at noncompetes shows that this is not just a California story.

New Studies of Noncompetes

Very recently, several economists and other scholars have constructed more rigorous tests of the impact of legal restrictions on employee mobility. Some compare jurisdictions horizontally; others are event studies. While this work is in its infancy, so far it all suggests that the public would be better served if employers cannot impede employee mobility.

Some of us used to compare California’s growth with other states. This was a crude measure; there are many reasons why California is California. Yale economist Olav Sorenson and his associates have constructed a more sophisticated index of enforcing noncompetes, depending on which of six legal doctrines a given state has adopted. This lets them run results that exclude California entirely. They found that more biotech firms are founded in

states that do not enforce noncompetes. More recently they have compared metropolitan areas. They found that full enforcement of noncompetes reduces venture capital, business start-ups, and patenting. The finding on patenting is crucial: The sole legitimate reason for enforcing noncompetes, as we have seen, is their supposed tendency to encourage employer investment in training and information — investment that, supposedly, will never take place if employees are free to depart. If there is anything to this scenario, it is outweighed by its opposite. “[N]ot only does the enforcement of non-compete agreements limit entrepreneurship ... but also it appears to *impede* innovation.”

Similarly, Mark Garmaise, a professor of finance at the Anderson School of Management at UCLA, who studied executive compensation, shows that managers in jurisdictions that enforce noncompetes are less mobile, are paid less, and take more poorly paid jobs if they change jobs. They invest less in their own human capital. As a result, employers in jurisdictions that do not enforce noncompetes are more productive and better able to attract financing.

Michigan in 1985 repealed, apparently inadvertently, its previous California-like statutory restrictions on the enforcement of noncompetes and began to enforce noncompetes. This created a natural experiment analyzed by Matt Marx of MIT and associates, who studied patent applications from Michigan before and after. Mobility among inventors dropped 8.1 percent, with higher drops among inventors with more human capital. There was no social benefit from this decline in mobility. In particular, there was no increase in patents. Michigan employers may have gained the power to impede their employees’ mobility, but they did not do anything useful with that power. The results did not change significantly if the automobile industry was completely excluded. They then tracked inventor mobility nationally, through the patent database, and found a significant brain drain from states that enforce noncompetes to states that do not, controlling for general economic conditions. The most productive and most networked patenting inventors are the most likely to move from enforcing to nonenforcing states. The result does not change if California is left out of the analysis entirely.

What happens to employees who are subjected to a covenant not to compete? The first such study, also by Marx, is just now available online. Marx interviewed around 60 inventors in the automatic speech recognition industry who had been enjoined from competing with former employers. He found that the waste of human capital is enormous. A significant number were unable to use their skills again. They switched industries or absorbed the cost of being out of work for the duration of the noncompete. Those that decided to change jobs anyway were much likelier to go to a large firm that could afford litigation with the earlier employer than a smaller firm.

The unanimity of the early studies of noncompetes is striking. Using different data sets and methodologies, none have found any social advantage in enforcing noncompetes. Enforcing covenants not to compete reduces employee mobility, start-ups, venture capital, patenting, employee compensation, and growth.

Enforcement harms employees (considerably), regions, and, in most cases, the enforcing firm itself. It has no economic function except to raise rivals’ costs and decrease competition for consumers. There is, therefore, no more reason to enforce an employee’s promise not to compete than any analogous agreement in which producers agree to limit competition.

Protecting firm investment | It is important to remember that, even where law provides no recourse against employees walking out the door, firms keep their rights to trade secrets. They also develop private informal norms that can be just as effective as legal enforcement. Recipes of leading French chefs are unprotected by any formal system of intellectual property. Moreover, the relevant community includes chefs in many different countries on several continents. Nevertheless norms have arisen, without legal sanction, that are adhered to strictly. Recipes are not to be copied exactly; a recipe shared with another chef must not be given to a third; credit must be given when recipes are used. Chefs who violate these norms are not given further information. Decreasing legal enforcement of intellectual property rights that impede employee mobility will not result in a state of nature; informal norms will arise and may be more efficient than legal rules.

I will just mention another body of academic literature on restrictions on employee mobility. Some economists have approached this as a problem in the economics of contracting. These models are highly responsive to their assumptions and detailed treatment here is not necessary. But most of the studies in this genre show that employers who are unprotected by any legal means of frustrating employee mobility have a simple solution to the problem: they could pay the employee not to leave. For example, they could increase compensation or develop the employee’s invention in partnership with the employee. I interviewed employees, technology managers, and lawyers in Silicon Valley for my 2003 book on the Silicon Valley labor market and I must say that this is exactly the way the world works. In California, where firms cannot enforce noncompetes, firms seriously consider whether or not to try to hold on to the employee who wants to leave. The employer asks what the employee was working on and whether his departure would harm the firm. It then decides whether to outbid rivals. The old employer is at no systematic disadvantage in these negotiations. It knows more about the employee and his or her human capital than the prospective new employer or the venture capitalists know. There does not seem to be any harm in this California solution: do not enforce noncompetes, and tell employers to rely on contract negotiations if they need to protect their trade secrets or customer information.

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What Do We Know and Not Know?

It seems clear that, on balance, the social advantage lies in following California and forbidding employers from enforcing noncompetes. This will result in greater employee mobility, ease of start-up, flow of lawful, nonproprietary information

across firm lines, patenting, and growth. Employers would not be defenseless against the harm that a departing employee might cause. They would retain all their remedies under trade secrets law against actual or threatened disclosure of trade secrets. And, like French chefs, they would have informal norms that might be more effective than legal sanctions.

It is possible that there are particular industries that really do depend on their secrets, would be harmed if employees could all move around freely, and could not rely on trade secrets law to protect those secrets. They might argue that they need some kind of noncompete to protect employer investment in information and training. But nobody has ever identified such a specific industry, and it is long past time for them to step forward and bear the burden of proving why they need limited noncompetes when most of America is better off without them.

The most important intellectual challenge is to integrate this understanding of knowledge and employee mobility into the globalization of the economy, specifically the economics of international trade and migration. Amazingly little is known about the employer's choice between:

- manufacturing at home and importing workers,
- manufacturing abroad and importing finished products,

- investing in a foreign manufacturer, and
- buying finished products from a foreign manufacturer.

Only in economics departments is factor mobility a complete substitute for trade. Does the economics of information spillover play a role in this decision? Is there a difference between local and global knowledge spillover (other than the greater efficacy of the former)? Might an American look benignly on information flowing from one California firm to another, yet hold reservations about the same information accompanying mobile engineers home to China or India? Paul Samuelson, in one of his last papers, argued that accepted models of gains from free trade break down here. Suppose it is true that both Britain and Portugal will experience gains from trade if each pursues its comparative advantage in making cloth and wine respectively. It does not follow that this model can be applied to the United States pursuing comparative advantage in information and China pursuing comparative advantage in manufacturing — not in a world in which the information, nonrivalrous or embodied in mobile workers, can pass costlessly from one country to another. To what extent is global migration of professionals driven by markets for information, and what are the implications for makers of trade, immigration, or industrial policy? R

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