A REALISTIC CRITIQUE OF FREEDOM OF CONTRACT IN LABOR LAW NEGOTIATIONS: CREATING MORE OPTIMAL AND JUST OUTCOMES

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ABSTRACT

This Note initially discusses fundamental problems created by the "freedom of contract" principle that arise in an era where the imbalance of both wealth and political power are at their highest rates seen in years. This Note also discusses the principles at work in current labor law: (1) how it is influenced by neoclassical economics and, (2) how, in the alternative, both the related legal doctrine and practice of collective bargaining can improve by incorporating behavioral economics, neuroeconomics, and game theory. Labor law practitioners and shapers should recognize neoclassical economics' shortcomings and adopt a more efficient contractual process that leads to more just and efficient outcomes.

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"Law still struggles to induce people to behave more constructively."

—Owen D. Jones & Timothy H. Goldsmith¹

"Law is intended to create context in which cooperative and other socially optimal behaviour is beneficial"

-Terrence Chorvat & Kevin McCabe²

I. INTRODUCTION

United States labor law suffers from adherence to a neoclassical economic framework, a poor model for predicting, shaping, and explaining human behavior. Deference to neoclassical economics in constructing and interpreting labor law creates inefficiency and dysfunction in the American labor market. This hurts both labor unions and business owners. Despite the sometimes contentious debate in this area of law, there is potential for common ground and positive change in how we understand labor law and, more specifically, bargaining over contracts.

This Note initially discusses fundamental problems created by the "freedom of contract" principle that arise in an era where the imbalance of both wealth and political power are at their highest rates seen in years. This Note also discusses the principles currently at work in labor law: (1) how it is influenced by neoclassical economics and, (2) how, in the

^{1.} Owen D. Jones & Timothy H. Goldsmith, *Law and Behavioral Biology*, 105 COLUM. L. REV. 405, 408 (2005).

^{2.} Terrence Chorvat & Kevin McCabe, *The Brain and the Law*, 359 PHIL. TRANS. R. SOC. LOND. B. 1727, 1733 (2004).

alternative, both the related legal doctrine and practice of collective bargaining can improve by incorporating behavioral economics, neuroeconomics, and game theory. Labor law practitioners and shapers should recognize neoclassical economics' shortcomings and adopt a more efficient contractual process that leads to more just and efficient outcomes.

II. THE HISTORIC POWER IMBALANCE CREATED BY UNITED STATES LABOR LAW

Labor law doctrine is an outgrowth of contract law,³ yet it has sometimes paradoxically constrained workers' right to contract and bargaining leverage. The initial jurisprudential outlook on labor-employer relations stemmed from the pre-19th century "master-servant" legal doctrine of England and the United States.⁴ The prevailing attitude was that "[t]he capitalist is fond of declaring that labor is a commodity, and the wage contract a bargain of purchase and sale like any other."⁵ This view ends up depersonalizing the relationship between the worker and the employer, making it solely one of economic convenience.⁶ In one light,

[t]o separate labor from other activities of life and to subject it to the laws of the market was to annihilate all organic forms of existence and to replace them by a different type of organization, and atomistic and individualistic one. Such a scheme of destruction was best served by the application of the principle of freedom of contract.⁷

The early results were stark. During the 19th and early 20th century, "freedom of contract" produced poor working conditions for most American workers. The United States government, in response to worker concerns amplified during the Great Depression, passed the National Labor Relations Act (NLRA)⁸ and subsequent amendments.⁹ One policy

^{3.} Karl E. Klare, *Critical Theory and Labor Relations Law*, *in* THE POLITICS OF LAW: A PROGRESSIVE CRITIQUE 61, 73 (David Kairys ed., 1990).

^{4.} JAMES B. ATLESON, VALUES AND ASSUMPTIONS IN AMERICAN LABOR LAW 13 (1983).

^{5.} Harry Braverman, Labor and Monopoly Capital: The Degradation of Work in the Twentieth Century 97 (1974).

^{6.} Klare, *supra* note 3, at 73.

^{7.} KARL POLANYI, THE GREAT TRANSFORMATION 163 (1944).

^{8.} See National Labor Relations Act, Pub. L. No. 74-198, 49 Stat. 451 (codified as amended at 29 U.S.C. \$ 151–180 (2006)).

^{9.} See also Labor-Management Relations Act of 1947, Pub. L. No. 80-101, 61 Stat. 136 (codified as amended at 29 U.S.C. §§ 141–187 (1994)); Labor-Management Reporting and Disclosure Act of 1959, Pub. L. No. 86–257, 73 Stat. 519 (codified as amended in scattered sections of 29 U.S.C.)).

aim was to create a demand-side/worker-side stimulus to "strengthen[] unions so that the purchasing power of workers would increase, thereby avoiding future economic depressions."¹⁰ Another aim was to encourage more of a seller's market for labor in an era where widespread poverty and unemployment left individual workers with little leverage when seeking and maintaining employment.

Before the NLRA became law, however, liberals and conservatives debated whether employment bargaining should take place in a totally "free" market, regulated only by common law, or, in the alternative, whether the NLRA should reconstruct that market to advance employee rights.¹¹ The final result was mixed; once the right to bargain collectively was established, the law receded into the background and "refrain[ed] from any further attempts to redistribute power or steer the substantive content of employment contracts."¹² Thus, the NLRA was crafted to give workers bargaining power to transform the "anarchy of the marketplace, which exploited workers, into the harmony of a modern cooperative capitalism, which protected workers."¹³

Despite this aim, the NLRA authors understood labor-employer relations as two parties at a bargaining table: on one side, workers, and on the other side, employers. "[S]tanding opposed to each other are these two rights: The right of the employer to a free labor market, and the right of the striking employés in their strife with him to impair that freedom."¹⁴ This jurisprudence, rooted in an adversarial view, created a zero-sum game. Each side competed for finite sets of rights, powers, and economic value. The NLRA gave workers more leverage, but it did not stray from the notion that the most preferable method of wage-setting was unlimited adversarial contract negotiations.

Thus, the Act did not address the notion that "freedom of contract" and the bargaining method itself is problematic.¹⁵ Under the freedom of contract framework, there is an assumption that each side bargains from a

^{10.} ATLESON, *supra* note 4, at 67 (citing the National Labor Relations Act § 1; 29 U.S.C § 151 (1970)); *see also* NLRB v. Jones & Laughlin Steel Corp., 301 U.S. 1, 33 (quoting American Steel Foundries v. Tri-City Central Trades Council, 257 U.S. 184, 209 (1921)).

^{11.} Klare, *supra* note 3, at 79.

^{12.} Id.

^{13.} James B. Atleson, *Wartime Labor Regulation, the Industrial Pluralists, and the Law of Collective Bargaining, in* INDUSTRIAL DEMOCRACY IN AMERICA 143, 143 (Howell John Harris & Nelson Lichtenstein eds., 1993).

^{14.} Ellen M. Kelman, American Labor Law and Legal Formalism: How "Legal Logic" Shaped and Vitiated the Rights of American Workers, 58 ST. JOHN'S L. REV. 1, 24 (quoting L. D. Willcutt & Sons v. Bricklayers' Benevolent and Protective Union No. 3, 200 Mass. 110, 85 N.E. 897 (1908)).

^{15.} Klare, supra note 3, at 73.

position of strength, that any contract formed is one of mutual assent, and that the outcome sets an equitable price. Yet courts have historically read into contracts "implied' terms which reserved to the employer the full authority and direction of employees."¹⁶ Thus, it is unclear whether workers really ever had full "freedom of contract" in the first place.

The idea that workers are free to contract is flawed further because employees can be backed into bargaining away already existing statutory rights. In the *Boys Markets* case, employees contractually gave up their right to strike.¹⁷ According to Karl Klare, if

the background to bargaining is one of enormous and pervasive inequality (as is typical in the workplace), a legal regime that makes rights under employee protective statutes freely waivable effectively permits employers to deploy their economic power so as to dilute or undermine whatever victories employees have won in the legislature, with the consequence that self-determination is decreased rather than enhanced by free contract.¹⁸

The end result is that the NLRA was not completely effective in achieving a balance in bargaining power between well-positioned firms and their poorly-leveraged workers. Yet the philosophical parent to the notion of freedom of contract—neoclassic economics—"place[s] an imprimatur of legitimacy on the outcomes of collective bargaining, no matter how parsimonious or inequitable they may be."¹⁹ Thus, current labor law framework legitimizes bargained-for contracts that nonetheless produce unequal or unjust outcomes.

Furthermore, "[t]he right to strike is granted because the threat to withdraw labor power, or its actual withdrawal, is the only employee action that will make collective bargaining effective."²⁰ Yet, the act of a strike requires the sacrifice of needs far more basic than the opportunity to make profit. Employers sacrifice future profits, but employees sacrifice vital funds that they use to pay for food, shelter, and monthly living expenses. Additionally, court-imposed²¹ and statutory²² limits on unions'

21. See generally NLRB v. Mackay Radio & Telegraph Co., 304 U.S. 333 (1938) (allowing employers to permanently replace workers on strike for economic reasons, so long as the employer has not committed a separate labor law violation).

^{16.} Atleson, supra note 13, at 14.

^{17.} Klare, supra note 3, at 77.

^{18.} *Id*.

^{19.} *Id*.

^{20.} ATLESON, *supra* note 4, at 7.

^{22.} See § 8(b)(4) of the NLRA (effectively banning secondary boycotts).

striking power make it difficult to wield their only significant weapon without disastrous economic consequences. Although the NLRA gives workers the power of collectivity to counterbalance a firm's superior bargaining position, this right to collective action is often not enough to overcome this imbalance, especially in a more globalized economy where buyers of labor have significantly increased leverage.

Other important problems with labor law include the wedge it drives between organized and unorganized sectors of the workforce and its privatization of welfare functions.²³ Labor law "uncouple[s] the concerns of unorganized low-wage workers from the labor movement's political agenda, to the ultimate detriment of both groups."²⁴ The NLRA fragmented the lower class's political and socioeconomic power and pitted class members against each other.²⁵ This eroded the political strength of each group. Fragmentation has led to legislative hostility and indifference to workers. This is exemplified by recently-passed free trade agreements the passage of which relied on the promise of new, albeit non-union jobs—which have diminished workers' bargaining leverage and widened the power gap between capital and workers.²⁶

Even with the right to collectively bargain, freedom of contract does not work when socioeconomic and political power is significantly out of balance, and when the law has faded into the background to let the "free market" reign.²⁷ In fact, the notion that absence of law or regulation leads to greater freedom is fundamentally flawed at its core.²⁸ In many cases, the purported contractual freedom sustains the power imbalance, with the

^{23.} Klare, supra note 3, at 83.

^{24.} Id.

^{25.} An example of the political polarization of labor issues in current events is that of the Labor protests in Wisconsin against Governor Scott Walker's attempts to strip away collective bargaining rights for state employees. For a summary of these events with citations to news stories, see Wikipedia, 2011 Wisconsin protests, http://en.wikipedia.org/wiki/2011_Wisconsin_protests (last accessed Nov. 2, 2012).

^{26.} A well-known example is the North American Free Trade Agreement passed in 1993.

^{27.} Klare, *supra* note 3, at 78. Klare notes "the overall shape of the bargain is predominantly cast by the background economic context which in our society is generally one of profound employer/employee inequality and massive corporate power, even throughout most of the dwindling unionized sector." *Id.*

^{28.} This notion is captured by the passage: "[G]overning doesn't disappear when government shrinks; instead corporations come to govern your life—like HMO's, oil companies, drug companies, agribusiness, and so on, with accountability only to maximizing profit, not to public needs." George Lackoff, "Where's the Movement?", HUFFINGTON POST, Jan. 25, 2010, http://www.huffingtonpost .com/george-lakoff/wheres-the-movement_b_435045.html (last accessed Nov. 2, 2012). The power to govern doesn't necessarily stem from laws. It can just as easily stem from economic might. In the bargaining context, economic prowess alone gives one leverage to negotiate a favorable deal even in the absence of laws or regulations.

entities having the least amount of power consistently getting the short end of the deal. Yet "[w]hen it comes to setting wage rates and working conditions, the law most definitely does not favor administrative or regulatory techniques."²⁹ This Note argues that a more structured process will produce a more efficient and just bargaining process, and reduce destructive behavior—the benefits of which can be reaped by both workers and ownership.

III. THE CURRENT PARADIGM: NEOCLASSICAL LAW AND ECONOMICS JURISPRUDENCE

For decades, courts and legislatures have used neoclassical economics to construct and interpret laws that shape human behavior. Related scholarship grew into a field, appropriately titled "law and economics." Gary Becker explains law and economics' cornerstone assumptions: "[A]ll human behavior can be viewed as involving participants who 1) maximize their utility, 2) form a stable set of preferences, and 3) accumulate an optimal amount of information and other inputs in a variety of markets."30 A consequence of these assumptions is the "rational actor," personified as "Homo Economicus," representing the idea that all human economic actors act rationally when carrying out market transactions.³¹ As Cass Sunstein explains, "The task of law and economics is to determine the implications of such rational maximizing behavior in and out of markets, and its legal implications for markets and other institutions."³² Rational Choice Theory (RCT) holds that the price of any good-tangible or intangible—traded on a market is set by a rational buyer and seller.³³ Each party negotiates a price in between the good's true value to the buyer and the true value to the seller. Parties increase their economic utility by executing the transaction, provided these values overlap. This utility maximizing behavior is considered rational because the execution of the transaction leads to economic gains for both parties.³⁴

^{29.} Klare, supra note 3, at 73.

^{30.} GARY S. BECKER, THE ECONOMIC APPROACH TO HUMAN BEHAVIOR 14 (1976).

^{31.} Owen D. Jones & Timothy H. Goldsmith, *Law and Behavioral Biology*, 105 COLUM. L. REV. 405, 443 (2005).

^{32.} Cass R. Sunstein, A Behavioral Approach to Law and Economics, 50 STAN. L. REV. 1471, 1476 (1998).

^{33.} Andrew M. Colman, *Cooperation, Psychological Game Theory, and Limitations of Rationality in Social Interaction*, 26 BEHAVIORAL AND BRAIN SCI. 139, 139 (2003).

^{34.} Id. at 141.

Taken a step further, many neoclassical economists argue that market transactions bargained at arm's length create self-regulating pricing. If a seller asks too high a price, he must lower it or the buyer will walk away. Neoclassical economics also predicts that humans will respond rationally to changes in these economic incentives.³⁵ For example, if the price of a good goes up, people will buy less of it.³⁶ Thus, neoclassical theory contends that market prices naturally gravitate toward a fair price, and backers of the theory contend that any outside intervention in price-setting is unnecessary and unjustifiably intrusive into private dealings.

Some rational choice theorists recognize that economic actors consider not just economic value in a tangible sense, but intangible social value as well.³⁷ However, these models retain the assumption that the economic actor will still act to maximize his own self-interest. Thus, neoclassical models can account for intangible and purely psychological value in their utility calculations, but they maintain that individual actors will still act self-interestedly. That intangible utility can be added into the utility maximizing calculation does not, however, tell a full or accurate story of human economic behavior.

IV. THE EMERGING PARADIGM: BEHAVIORAL LAW AND ECONOMICS JURISPRUDENCE

Neoclassical economics has frequently failed to predict actual human behavior in various experiments. To use it as a model to describe behavior can lead to incorrect predictions. As Sunstein concludes, "Traditional law and economics is largely based on the standard assumptions of neoclassical economics. These assumptions are sometimes useful but often false."³⁸ The failure stems from its various assumptions—including those of rational actors,³⁹ information symmetry,⁴⁰ self-interested actors,⁴¹ and

^{35.} See generally Jones & Goldsmith, supra note 31.

^{36.} Sunstein, supra note 32, at 1481.

^{37.} Michael P. Vandenbergh, Amanda R. Carrico, & Lisa Schultz Bressman, Regulation in the Behavioral Era, 95 MINN. L. REV. 715, 724 (2011).

^{38.} Sunstein, supra note 32, at 1545.

^{39.} Jones & Goldsmith, *supra* note 31, at 443.

^{40.} Vandenbergh, *supra* note 37, at 743. Individuals make inefficient economic decisions, such as letting their cars idle for more than 30 seconds ("the average individual [] believes she should idle for over 4 minutes before it becomes cost-effective to turn off the vehicle") because they are unaware of the true utility of a potential economic action.

^{41.} *Id.* at 732–33. Individuals may "feel[] a sense of social connectedness or reciprocity with other individuals" and act in a generous, rather than self-interested fashion. In addition, "individuals will go to great lengths to conform to the attitudes and beliefs of those around them, even when conforming violates known facts or one's own ideological worldview." *Id.*

behavioral consistency⁴²—that do not necessarily occur in real life. In fact, there are systematic exceptions to these assumptions that cause the neoclassical model's predictive ability to be of little jurisprudential worth when it comes to price setting and bargaining. Thus, "accounting for extrarational responses to social outcomes is an essential, but largely underappreciated, area of regulatory analysis."⁴³ The core problem is that "some theory of how humans think underlies any coherent argument about the law."⁴⁴ But current doctrine almost completely ignores this notion. Behavioral economics is a relatively new field of study that has attempted to fill this gap. Indeed, "[1]aws are made by humans, and hence the study of human behavior is clearly pertinent to the study of law."⁴⁵

A. Human Behavior is Not Always Informed, Utilitarian, and Rational

Information asymmetries are one example of how poor and irrational economic decisions can be made. Early work by economist Joseph Stiglitz uncovered the effect of information asymmetries on markets.⁴⁶ If the seller and buyer have incomplete or imbalanced information about the entity being priced, this reduces Pareto efficiency, and utility will not be maximized. Pareto improvements are defined as adjustments that make one party to a deal better off without making another party worse off. Pareto efficient outcomes maximize the total value of the negotiation.⁴⁷

^{42.} Daniel Kahneman & Amos Tversky, *Choices, Values, and Frames*, 39 AM. PSYCHOLOGIST 341, 341–42 (1983). Humans are also subject to "framing" effects. If an economic decision is framed in terms of a loss, the subject is less likely to execute the transaction than when it is framed as a gain. Subjects in one study cited were asked to choose one of two options in two different exercises regarding the fate of 600 people. Exercise one: If Program A is adopted, 200 people will be saved (72% chose this). If Program B is adopted, there is a one-third probability that 600 people will be saved at wo-thirds probability that no people will be saved (28% chose this). Exercise two: If Program C is adopted, 400 people will die (22% chose this). If Program D is adopted, there is a one-third probability that nobody will die and a two-thirds probability that 600 people will die (78% chose this). The percentages were almost completely reversed, even though options A and C saved the same amount of people. The only difference was that option A was framed as a gain and option C was framed as a loss. *Id.* at 343–44.

^{43.} Vandenbergh, *supra* note 37, at 724.

^{44.} Oliver R. Goodenough, *Mapping Cortical Areas Associated with Legal Reasoning and Moral Intuition*, 41 JURIMETRICS J. 429, 432 (2001).

^{45.} Terrence Chorvat, Kevin McCabe, and Vernon Smith, *Law and Neuroeconomics*, 13 S. CT. ECON. REV. 35, 36 (2005).

^{46.} See generally Bruce C. Greenwald & Joseph E. Stiglitz, Externalities in Economies with Imperfect Information and Incomplete Markets, 101 Q.J. ECON. 229 (1986).

^{47.} For a detailed discussion on Pareto efficiencies and outcomes, *see* DEEPAK MALHOTRA & MAX H. BAZERMAN, NEGOTIATION GENIUS 65–66 (2007).

These asymmetries are not the only example of how poor and irrational economic decisions are made. Endowment effects,⁴⁸ self-serving biases,⁴⁹ and failure to ignore sunk costs⁵⁰ are other instances where negotiators stray from rationality. Behavioral economics characterizes these events as examples of "bounded rationality."⁵¹ In essence, the conclusion is that economic actors make irrational choices as a "result of (a) constraints on time and energy for gathering perfect information and (b) constraints on the brain's information capacities, wiring, and computing speed."⁵²

Some of behavioral economics' most well-known findings come from experiments on participants in the "ultimatum game."⁵³ This game has two opposing participants. The first player is given a sum of money (for example, \$10) and is to offer a percentage of it to the second player. The second player can then accept his offered share—in which case player one gets to keep the rest-or reject the offer, in which case both players get nothing. Neoclassical economics predicts that the second player will always accept any offer greater than zero, because the second player gets nothing if the offer is rejected. However, "[o]ffers usually average between 30 percent and 40 percent of the total. Offers of less than 20 percent are often rejected."⁵⁴ In other words, in an ultimatum game where the "pot" is \$10, if the first player offers less than \$2 to player two, player two will often reject the offer and opt to get no money. Thus, the second player will reject offers he or she feels are unfair even if it means foregoing financial gain. Similar results have been recorded across cultures and dollar amounts.⁵⁵ Moreover, results have been known to differ when both players compete to earn the right to be the proposer. In these cases, initial offers are lower and acceptance rates of lower offers are higher.⁵⁶ The fact that one player has "earned" his right to propose alters decision-making and seems to give an imprimatur of legitimacy to the offeror's behavior, even though similar offers may be considered unfair under different circumstances.

^{48.} Sunstein, supra note 32, at 1484.

^{49.} Id. at 1501.

^{50.} Id. at 1482-83.

^{51.} Jones & Goldsmith, supra note 31, at 445.

^{52.} Id.

^{53.} Cass R. Sunstein, Behavioral Analysis of Law, 64 U. CHI. L. REV. 1175, 1186-87 (1997).

^{54.} Id. at 1186.

^{55.} Colin Camerer and Richard H. Thaler, *Anomalies: Ultimatums, Dictators and Manners*, 9 J. ECON. PERSP. 209, 210–11 (1995).

^{56.} NEUROECONOMICS: DECISION MAKING AND THE BRAIN 4 (Paul W. Glimcher et al. eds., 2009).

Another experimental example involving union negotiations shows how self-serving biases can lead to bargaining impasses when negotiating teacher salaries.⁵⁷ During contract negotiations in Pennsylvania school districts, custom dictated that both school boards and unions use the average of teacher salaries from nearby "comparable" school districts in order to determine what teacher salaries should be in their own district.⁵⁸ Researchers surveyed school boards and union heads to determine which neighboring school districts were actually "comparable."59 Where the surrounding districts all had similar salaries, comparison districts selected by the union had similar average salaries to those selected by the school board.⁶⁰ But where surrounding districts exhibited wide variation in average salaries, unions tended to select comparison districts with higher average salaries. School boards also selected districts with lower average salaries.⁶¹ Thus, each side showed a self-serving bias because they selected districts with comparable average salaries favorable to their bargaining position.

It is important to note that the selections in this study were not during actual negotiations. Researchers were the only audience, so participants had no strategic advantage to exaggerate the truth.⁶² It is possible that such comparison district selections reflected behavior derived from a strategic bargaining technique. But even if this is so, unions and boards should theoretically settle on some midpoint. To investigate whether this occurred, researchers examined the past propensity for strikes in each school district surveyed. In districts where the survey-reported divide between board and union comparable district salaries was greater than \$1000, strikes were 49 percent more likely to occur.⁶³

Neoclassical economic theory's assumption that actors negotiate rationally is inconsistent with these results. Participants had no economic interest in submitting salaries favorable to their organizations to researchers. Furthermore, organizations in school districts with greater variance in surrounding-district salaries had no reason to strike more often. This irrational behavior occurred in a controlled experiment when participants knew they were being observed, and there was no real value at

^{57.} Linda Babcock, Xianghong Wang, George Lowenstein, *Choosing the Wrong Pond: Social Comparisons in Negotiations that Reflect a Self-Serving Bias*, 111 Q.J. ECON. 1 (1996).

^{58.} Id. at 3.

^{59.} Id. at 8.

^{60.} *Id.* at 10–12.

^{61.} *Id*.62. *Id*. at 17–18.

^{63.} *Id.* at 13.

stake. When applied to real-life situations, negotiations have more potential to get contentious and irrational. As such, these findings cast serious doubt on the "rational actor" assumption.

B. Game Theory and Economics

Game theory also indicates that price negotiations can lead to irrational and Pareto-inefficient results. The Prisoner's Dilemma is one example. It involves a scenario where utility is maximized if two players cooperate. However, cooperating when the other party fails to do so leads to loss for the cooperating party and gain for the non-cooperating party. This means trust in your opponent's motives is a large factor. Two players each choose one of two "strategies" and simultaneously reveal their choices to one another. If Player 1 and Player 2 both choose strategy A (the cooperate, and Player 2 chooses to defect, Player 1 gets zero points and Player 2 gets four points. If both players choose to defect, they each get only two points. The most efficient outcome is the dual-cooperation strategy. Each player nets six points in that case. However, if Player 1 suspects Player 2 is going to defect, it behooves Player 1 to defect as well. Player 1 will get two points as opposed to zero.

Contrary to what the neoclassical model would predict, games usually do not proceed with both players choosing to cooperate—thus utility is not maximized. When one player first defects, both players frequently start defecting in later rounds in order to protect themselves. The game can quickly descend into a dystopia of mistrust and inefficiency. Neoclassical economics does not account for this behavior, and thus it is given little attention in labor law. Yet prisoner's dilemmas often occur in the real world, especially during negotiations. If both labor and management are negotiating towards a mid-point, one side may not want to give in if it does not trust the other side to give up an equal amount in response. Lack of trust causes uncooperative behavior such as strikes or lockouts. In these cases, both parties generally lose.

^{64.} The point values can differ, but it is their relative values to other options that make the game what it is.

V. NEUROECONOMICS JURISPRUDENCE

The brain dictates human behavior, and psychological studies routinely find that even the most intelligent and well-educated individuals make irrational decisions. Neuroeconomics examines the pattern of brain activity that occurs during economic decision-making. It stems from cognitive neuroscience, which "integrates psychology, biochemistry, neurology, evolutionary biology, and related sciences in order to further our understanding of human behavior."⁶⁵

Neuroeconomics, like behavioral economics, suggests that legal doctrine should not be based on the rational actor assumption. It suggests that not all decisions are made with the rational part of the mind. In fact, "[u]nder the influence of powerful emotions or drives, people often end up doing the opposite of what they think is best for them, even at the moment of acting."⁶⁶ If laws are meant to be read, comprehended, and obeyed, it is difficult to deny that laws "interact with neural mechanisms to create behaviour."⁶⁷ If we are to create prudent laws, it is only common sense to incorporate how our brains actually process information into our jurisprudential framework.

A. The Mind: The Foundation and Origin for Law

Research by linguist Noam Chomsky has developed and expanded on the concept of "universals," that is, the existence of mental themes consistent throughout all human cultures. Such universals include the concepts of fairness, property, reciprocal exchange, and the rejection of murder, among others.⁶⁸ Much has already been said about mental structures and processes being the origin of human language and thought patterns.⁶⁹ "The language faculty is a distinct system of the mind/brain, with an initial state so common to the species . . . and apparently unique to

^{65.} Terrence Chorvat & Kevin McCabe, *Neuroeconomics and Rationality*, 80 CHI.-KENT L. REV. 1235, 1247 (2005).

^{66.} Sandra Blakeslee, *Brain Experts Now Follow the Money*, N.Y. TIMES, June 17, 2003, *available at* http://www.nytimes.com/2003/06/17/science/brain-experts-now-follow-the-money.html? pagewanted =all&src=pm (quoting Dr. George Lowenstein).

^{67.} Terrence Chorvat & Kevin McCabe, *The Brain and the Law*, 359 PHIL. TRANS. R. SOC. LOND. B. 1727, 1728 (2004).

^{68.} Scott Fruehwald, *The Emperor Has No Clothes: Postmodern Legal Thought and Cognitive Science*, 23 GA. ST. U. L. REV. 375, 405 (2006).

^{69.} See generally NOAM CHOMSKY, KNOWLEDGE OF LANGUAGE: ITS NATURE, ORIGIN, AND USE (1986).

it in essential respects."⁷⁰ Chomsky has suggested that what is true of language is also true in other areas where human beings acquire knowledge. Cognitive science has confirmed this by showing universals in many areas.⁷¹ This has implications for legal jurisprudence because the law itself could be an extension of principles physically encoded into our brains. Legal themes that transcend cultural and political boundaries could very well be biologically ingrained principles, built by years of evolutionary forces. "An evolutionary perspective should uniquely predict that the same general sets of [universals] are central features of legal systems in virtually every human culture worldwide."⁷²

Mental concepts like the desire for "fairness" in economic exchanges provide an evolutionary advantage. Individuals that have no problem making uneven exchanges bent out of their favor would be less likely to survive. The concept of personal property, at least to some extent, may be equally demanded by evolutionary pressures. One who is familiar with the concept of personal ownership is more likely to hoard and protect resources for survival. Similarly, it is easy to see how rejection of murder would be universal to a species that thrives communally. The presence of behavioral tendencies and reactions encoded into our brains at birth and reinforced later in life is hardly a groundbreaking idea. However, this idea is foreign to the prevalent jurisprudential area of legal positivism.

Oliver Goodenough postulates that the impulses from these complex brain mechanisms

are so compelling that the *perception*, at the conscious level in some structure . . . is one of unquestionable and universal validity. The apparent tautology of ought to ought . . . comes from the structure of the brain itself; "ought" is not without context, but rather is the conclusion of approval given by the portion of the brain that analyzes action in the light of the unspoken algorithm of acceptable behavior.⁷³

Thus, the process of lawmaking may very well include the process of "translating the unarticulated models of natural justice into the articulated rules of positive law."⁷⁴

74. Id.

^{70.} Id. at 25.

^{71.} Fruehwald, supra note 68, at 405.

^{72.} Jones & Goldsmith, supra note 31, at 471.

^{73.} Goodenough, supra note 44, at 439 (emphasis in original).

B. The Role of Behavioral Biology

Owen Jones and Timothy Goldsmith argue that behavioral biology and evolutionary pressures may have created preferences for certain legal concepts.⁷⁵ They note that, in current jurisprudence, there is a "near-total absence of recognition in legal thinking that all behavior, and all the brain activity that perceives and directs it, are fundamentally biological phenomena, rendering the study of behavior biology manifestly relevant to any deep and current understanding of how and why humans behave in ways important to the law."⁷⁶ They also note, however, that behavioral biology merely "provides one important component of many necessary to any firm foundation for understanding human behavior."⁷⁷

One of the strongest arguments for behavioral biology's influence on law is the presence of behavioral predispositions and the proclivity "to learn some behaviors far more easily than others."⁷⁸ Humans learn the same socially beneficial behaviors our laws attempt to promote, even in cultures with very crude or rudimentary legal codes. This suggests that law may come from a biological, rather than textual, source—a reflection of behaviors we are already biologically inclined to favor and promote. One example of seemingly law-influenced behavior appearing across cultures is inheritance laws. There is a noted similarity among almost all human cultures regarding the presence of these laws.⁷⁹ Evolutionary analysis predicts such an occurrence because "natural selection has inclined people to care more for relatives than for nonrelatives, all else being equal."⁸⁰

Similarly, animals demonstrate some "human" behaviors even in the absence of language and cognitive skills necessary to derive their behavior from law. For example, "[i]n recent work on higher primates, primatologists, behavioral scientists, and anthropologists have found instances of cooperation, reciprocity, reconciliation after conflict, deception of other members of the social group, division of labor, sharing of production, [and] adverse reaction to distributional inequities^{*81} Thus, behaviors familiar with our concept of justice seem to thrive even in populations of beings that cannot read the law.

^{75.} See generally Jones & Goldsmith, supra note 31.

^{76.} Id. at 419.

^{77.} Id. at 412.

^{78.} *Id.* at 424.

^{79.} Fruehwald, *supra* note 68, at 407.

^{80.} Jones & Goldsmith, supra note 31, at 470.

^{81.} Id. at 467.

Furthermore, in practice humans exhibit more cooperative behavior than the completely self-interested rational actor would display.⁸² In humans, "[a] predisposition toward selectively cooperative behavior that is directed toward others who cooperate usually yields higher reproductive success than persistent selfishness."⁸³ Moreover, "[u]nrestrained self-interest is an impossible strategy for living among others."⁸⁴ Thus, it could be that spitefully rejecting another's selfish offer in an ultimatum game in order to punish the other for acting unfairly is evolutionarily adaptive. The "spiteful actor" maintains a reputation that he or she will not be cheated.⁸⁵ Although this concept could raise the question of whether defecting in the previously discussed ultimatum game is ultimately rational, to consider this "self-interested" behavior would broaden the concept far beyond the current neoclassic price-setting use of the term.

The notions of cooperation and trust have little place in a world where self-interested and calculating "rational actors" seek only to maximize their own utility. However, trust is culturally valued, and it fosters mutually beneficial relationships. As a result, trust and reliance on others' good faith are promoted in many areas our legal code. But these concepts are not fully accounted for in neoclassical economic theory. As a result, problems and inefficiencies that arise from lack of trust are not effectively addressed in the doctrine of labor law.

C. Neuroeconomics: The Brain Itself and Economic Decision-making

Even if, as legal positivists assert, law comes from rational principles beyond our physical brains, there is no reason why these principles should make false assumptions about human behavior. Behavioral economics indicates that humans do not always make rational economic decisions. Neuroeconomics offers some insight on why this might be.

First, it is important to consider how the brain has developed:

Humans are confronted with only a finite, although very large set of problems. Solving the specific problems presented, and having tissues structured for solving those problems would be more

^{82.} See supra Part IV.

^{83.} Jones & Goldsmith, supra note 31, at 431.

^{84.} *Id.* at 440.

^{85.} Id. at 442.

efficient than having general purpose tissues, which would likely be more costly, and not well adapted.⁸⁶

Thus, the human brain would be at an evolutionary advantage to have many specialized problem-solving areas. This anatomically specialized concept of the brain is reinforced by the fact that "neurons in different areas of the brain exhibit different types of cytoarchitecture."87 Furthermore, early studies on people with damage to different parts of the brain show that only certain behaviors are affected following injury, while other behaviors are left almost completely intact.⁸⁸ For example, "patients with damage to the ventromedial [prefrontal cortex] are unlikely to exhibit emotional responses to stimuli, whereas those patients with dorsolateral [prefrontal cortex] damage appear to have problems in cognitive processing of tasks that do not seem to evoke emotional processing."⁸⁹ Similarly, researchers have identified the anterior cingulate cortex ("ACC") as part of the brain that is involved in mental conflict resolution.⁹⁰ The ACC registers a conflict between two different processing regions in the brain, and helps to sort out which region ultimately prevails.⁹¹ Moreover, trust, as made apparent in game theory experiments,⁹² requires individuals to have a theory about what others are thinking, known as a theory of mind ("TOM").⁹³ "The primary areas involved in deriving the TOM appear to be the medial [prefrontal cortex], the related area of the [orbital frontal cortex], paracingulate cortex, the temporal poles, and the posterior [superior temporal sulcus]."⁹⁴ Thus, differing brain functions are segregated to different areas of the brain.

Functional magnetic resonance imaging brain scans of players playing the "ultimatum game" discussed above show neural activity in differing parts of the brain depending on whether an economic decision involves a

^{86.} Chorvat & McCabe, supra note 67, at 1728.

^{87.} Id.

^{88.} Id. at 1729. See also Goodenough, supra note 44, at 434. The most famous early case involves the story of Phineas Gage, a railroad worker who, in 1848, had a long railroad spike driven through his head. The heat and speed with which the spike passed through his skull sterilized and cauterized the wound, and Gage survived despite the limited medical technology at the time. Miraculously, he had no impairment of movement, and his memory and intelligence were normal. However, he suffered from a sudden lack of social convention, and spoke abundant profanities and would never honor his social commitments. Gage's injury was reconstructed many years later and used to map functions of the brain.

^{89.} Chorvat & McCabe, supra note 67, at 1728.

^{90.} Id.

^{91.} Id.

^{92.} See supra Part IV.B (discussing game theory and its effects on economic decision-making).

^{93.} Chorvat & McCabe, supra note 67, at 1729.

^{94.} Id.

rational calculation or has extra-rational content relating to "fairness."⁹⁵ Unfair offers resulted in activation of both the dorsolateral prefrontal cortex (cognitive processing area) and the anterior insula (an area known to be active during negative emotional experiences).⁹⁶ Moreover, there was higher activity in the insula for rejected offers than there was for accepted offers.⁹⁷ Rejected offers, of course, result in the economic actor forgoing economic gain. There was also ACC activation during all offers. This suggests that the brain was balancing information from both rational and emotional areas.⁹⁸

Further evidence suggests that punishment in a Pareto-inefficient Prisoner's Dilemma context can even activate the same reward system in the brain affected by addictive drug use.99 Numerous studies and pharmacological experiments have shown that the neurotransmitter dopamine is released in specific areas of the brain when a subject gains a desired "reward."¹⁰⁰ Specifically, dopaminergic neurons (responsible for the chemical's release) have been shown to be present in the prefrontal cortex (near the front of the brain, used for logical exercises and learning), and the striatum (located deep in the middle of the brain), "a potential venue for the integration of movement and motivational information."101 Recent neuroimaging studies have shown that dopamine is released in the striatum during highly arousing situations that elicit motivation, such as playing a video game that gives out monetary rewards.¹⁰² Most importantly, however, are studies that show these very same areas are activated when participants playing the Prisoner's Dilemma game exact revenge on defectors; a result "interpreted by the authors as a rewarding feeling resulting from the punishment of perceived unfairness."¹⁰³ These

results suggest that destructive behavior might end up becoming rewarding, leading to Pareto-inefficient outcomes in situations like collective bargaining.

In a different example of how the brain can exhibit inconsistent economic decision-making, a group of participants playing a "trust

^{95.} Id. at 1731. For a discussion of these results, see Jedediah Purdy, *The Promise (and Limits) of Neuroeconomics*, 58 ALA. L. REV. 1, 10–11 (2006).

^{96.} Chorvat & McCabe, supra note 67, at 1731.

^{97.} Id.

^{98.} Id.

^{99.} Mauricio R. Delgado & James G. Dilmore, *Social and Emotional Influences on Decision Making and the Brain*, 9 MINN. J.L. SCI. & TECH. 899, 905 (2008).

^{100.} Id. at 900-01.

^{101.} Id. at 901–02 (emphasis added).

^{102.} Id. at 902-03.

^{103.} Id. at 905.

game^{"104} were experimentally given increased levels of the neuropeptide oxytocin.¹⁰⁵ Oxytocin release in the brain is related to positive social interactions involving social attachment and affiliation, and is hypothesized to be involved in promoting trusting behavior.¹⁰⁶ Researchers compared the economic decisions made by participants given a dose of oxytocin to a control group that received no dose.¹⁰⁷ "Investors" with the increased dose of the neuropeptide sent more money to the trustees in the game than those that received none.¹⁰⁸ Thus, temporarily altering the chemistry of the brain caused people to judge risks differently.

Evidence strongly suggests that some economic decision-making is related to brain functions that are irrational or inconsistent. The human thought process is not always cognitive and calculating. It is prone to error and mental shortcuts. People will not act rationally while valuing commodities, investors will certainly not act rationally when setting prices in financial markets, and collective bargaining will continue to produce results. Game theory, behavioral economics, inefficient neuroeconomics do not have all the answers, but considering the strong evidence these fields have uncovered so far, it is time to stop oversimplifying human behavior and assuming we will all be rational all of the time—sometimes to the catastrophic detriment of many.¹⁰⁹

108. Id.

^{105.} NEUROECONOMICS, supra note 56, at 10.

^{106.} Kosfeld et al., supra note 104, at 673.

^{107.} Id.

^{109.} The financial industry collapse of 2008 can be blamed on many of the irrationalities common to human behavior discussed in this Note.

VI. OVERCOMING CRITICISMS

The brain uses different areas to solve different problems. Some critics have stated that this fails to refute the rational actor assumption.¹¹⁰ They concede that some areas of the brain experience greater neural activity during either emotional or moral decision-making, but contend that this correlation does not prove causation.¹¹¹ Further, critics contend that neurological studies do not yet show us precisely how these brain mechanisms work and therefore are not valuable.¹¹² Such criticisms ask the field of neuroeconomics to prove too much. It may be true that "both behavioral law and economics and the underlying literature in cognitive psychology are far better at explaining *that* people often behave in ways inconsistent with traditional economic theory than they are at explaining why they do so."¹¹³ However, this is not a refutation of the theory's claims. Failing to understand completely how something works does not disprove the fact that it does in fact work.

VII. SUGGESTIONS FOR CREATING MORE OPTIMAL AND JUST OUTCOMES

"[E]mpirical critiques of the simple axiomatic approaches [of the neoclassical model], in the form of counterexamples, could lead to more general axiomatic systems that [are] more sensibly rooted in principles of psychology."¹¹⁴ For this reason, a behavioral and neuroeconomic approach should be promoted. If "human behavior is the very currency in which law deals,"¹¹⁵ and if "law's behavior models [are to] serve as fulcra for the levers of law,"¹¹⁶ than it makes little sense to defend behavioral models that have little evidentiary backing. Neuroeconomics adds weight to this contention by observing that parts of the brain associated with emotionality are active during such irrational outcomes. Moreover, "[1]aw is intended to create context in which cooperative and other socially optimal behavior is beneficial."¹¹⁷ If we ignore actual behavior in our economic calculus, and use this calculus to structure law, how can we develop legal doctrine to produce the optimal amount of justice?

^{110.} See Michael S. Pardo & Dennis Patterson, Philosophical Foundations of Law and Neuroscience, 2010 U. ILL L. REV. 1211, 1238–39 (2010).

^{111.} Id. at 1238.

^{112.} Id.

^{113.} Jones & Goldsmith, supra note 31, at 446.

^{114.} NEUROECONOMICS, *supra* note 56, at 4.

^{115.} Jones & Goldsmith, *supra* note 31, at 407.

^{116.} *Id.* at 416.

^{117.} Chorvat & McCabe, supra note 67, at 1733.

Related to labor law, the results suggest that a more structured dispute resolution mechanism would benefit workers as well as ownership.¹¹⁸ It is certainly not necessary that such changes go so far as to interfere with Section 7 rights under the NLRA, nor property rights historically accorded to business owners. I do, however, aim to raise awareness of new possibilities that can be implemented either voluntarily or on a limited basis.

For example, both arbitration and some forms of mediation could generate more Pareto-efficiency by limiting or discouraging each party's options for destructive behavior. This could reduce lockouts, strikes, permanent replacements, and smooth over a general atmosphere of political divisiveness and mistrust. Moreover, self-aware actors with a more nuanced understanding of human behavioral tendencies may be more effective at achieving a Pareto-efficient outcome, even in a standard negotiation setting. If both parties come to the table with similar knowledge, they could consciously work to avoid destructive and mistrustful behavior. Zero sum negotiations between "rational actors," which frequently occur in traditional labor negotiations, force unions and ownership to dig into trenches. Because labor negotiations, unlike financial market transactions, are generally conducted in a more personal setting, there is an increased likelihood for emotional-rather than rational-decisions.¹¹⁹ Consequently, some unions are now pushing for legislation that includes devices such as first contract arbitration.¹²⁰

While unions and management may resist giving up their "contractual freedom," they may do so unnecessarily and at the expense of efficiency and justice. Moreover, reliance on more structured price-setting techniques need not be seen as usurping union utility to workers. Some scholars have noted¹²¹ that recent developments in employment law such as the Civil

^{118.} Chorvat, McCabe & Smith, *supra* note 45, at 56. The authors state neuroeconomics argues for laws that foster higher-trust relationships because they tend to be less costly and cheaper to both the participants and society.

^{119.} Id.

^{120.} See generally Susan J. T. Johnson, *First Contract Arbitration: Effects on Bargaining and Work Stoppages*, 63 INDUS. & LAB. REL. REV. 585 (2009–2010) (discussing the Employee Free Choice Act and why unions support the inclusion of first contract arbitration). *See also* Theodore J. St. Antoine, *ADR in Labor and Employment Law During the Past Quarter Century*, 25 A.B.A. J. LAB. & EMP. L. 411 (2009–2010) (discussing the benefits and drawbacks of alternative dispute resolution in relation to labor law).

^{121.} Bruce Kaufman, *The Future of Collective Bargaining and its Impact on Dispute Resolution*, *in* ARBITRATION 1999: QUO VADIS? THE FUTURE OF ARBITRATION AND COLLECTIVE BARGAINING: PROCEEDINGS OF THE 52ND ANNUAL MEETING OF THE NATIONAL ACADEMY OF ARBITRATORS 22–23 (Jay E. Grenig & Steven Briggs eds., 2000).

Rights Act,¹²² the Age Discrimination in Employment Act,¹²³ and ERISA¹²⁴ have weakened unions by assigning the protection of workers to the government. However, this view underrates unions' necessity in protecting such rights. Workers need collective power more than ever to stand up for these rights; workers are not always aware of their rights, and can be emotionally and financially unable to use them. Thus, union roles are still critical in workplaces less prone to prolonged labor contract disputes and where workers are concurrently protected by statutory civil rights laws. Strikes are costly and strain relationships between union management and its members. They also engender workplace hostility after the negotiation has ended. If their necessity can be reduced though reliance on more Pareto-efficient price setting techniques, and union resources can be instead directed toward protecting employee rights and organizing, this should be viewed as a positive path forward.

Furthermore, while current doctrine intends to prioritize labor peace and economic productivity while discouraging work stoppages,¹²⁵ it does so in a way that gives employers an inordinate amount of power. Labor may benefit from a dispute resolution technique where authority for pricesetting is not derived mainly from the economic leverage wielded by each party—especially in a political and economic backdrop where fiscal capital is far more mobile than human capital. In the current setting, especially, it is important to consider whether the notion of "freedom of contract" really grants parties to price negotiations equal freedom.

While there are reasons to be cautious about the scope of change justified by these new economic viewpoints, a new legal doctrine incorporating the limitations of "freedom of contract" and human behavior into the calculus *could* help level the playing field and increase efficiency in a way that will produce not only more optimal outcomes, but also ones that are more just. However, one must still treat the experimental results discussed in this Note with some caution. "Recent revisions in understanding human behavior greatly unsettle certain arguments against paternalism in law. They certainly do not make an affirmative case for paternalism; but they support a form of anti-antipaternalism."¹²⁶ They do

^{122.} Civil Rights Act of 1964, Pub. L. No. 88-352, 78 Stat. 253 (codified as amended at 42 U.S.C. § 2000e-e17 (2011)).

^{123.} Age Discrimination in Employment Act of 1967, Pub. L. No. 90-202, 81 Stat. 602 (codified as amended at 29 U.S.C. §§ 621–634 (2011)).

^{124.} Employee Retirement Income Security Act (ERISA) of 1974, Pub. L. No. 93-406, 88 Stat. 829 (codified as amended at 29 U.S.C. §§ 1001–1461 (2011)).

^{125.} Klare, supra note 3, at 63 (commenting on the Boys Markets case).

^{126.} Sunstein, *supra* note 53, at 1178.

not necessarily prove that a more regulated bargaining process will always be more efficient and just. Thus, this Note's suggested solutions, such as arbitration and mediation, should not be pursued without scrutiny of their own. It is enough to say, however, that the current system needs to be questioned and improved, and the status quo should no longer be taken for granted.

VIII. CONCLUSION

In order to improve the future for the American worker and American businesses, we must change the way we look at labor-management relations. We must broaden awareness of effective methods by which just and efficient negotiation and bargaining results can be accomplished. Parties simply informed of the mind's perils and shortfalls in an adversarial setting exposed by behavioral economics, game theory, and neuroeconomics may be less likely to be tripped up by their own inefficient tendencies.