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The Overlooked Utility of the Defendant Class Action

THE OVERLOOKED UTILITY OF THE DEFENDANT CLASS ACTION

FRANCIS X. SHEN[†]

When and how can defendant class actions serve the goal of increasing social welfare? Existing literature on class actions has overlooked the utility of defendant class actions, and thus, has failed to answer this question. This Article presents a general theory of defendant class actions, and argues that three interrelated principles should guide the use and evaluation of defendant class actions. (1) Forward looking deterrence principle. The forward looking deterrence principle holds that the utility of defendant class actions should be measured by its contribution to future deterrence of harms by the proposed defendant class. (2) Dynamic effects principle. The dynamic effects principle holds that evaluation of a defendant class action should include all secondary effects such as feedbacks, price adjustments, new incentive structures, and changing group dynamics. (3) Aggregate analysis principle. Taking the dynamic effects principle one step further, the aggregate analysis principle holds that the evaluation of defendant class actions should ultimately rest on an aggregate, society-wide cost-benefit analysis. In developing its general theory, and synthesizing these three principles, this Article utilizes a newly constructed database of 177 cases considering defendant class action certification. This Article also spends significant time analyzing deficiencies in Hamdani and Klement's 2005 proposal for "the class defense." Three potential applications for defendant classes are considered at various points in the paper: (1) illegal file sharing on the Internet, (2) corporate fraud and illegal dealing, and (3) copyright infringement. In each context, this Article argues that existing literature and jurisprudence generally take a backwards looking approach, do not properly account for dynamic effects, and too often ignore aggregate analyses.

INTRODUCTION

You know what a class action lawsuit is. But what do you remember about *defendant* class actions from your civil procedure or torts class? The answer, most likely, is nothing. That is because defendant

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class actions are typically overlooked in both law school classes and legal scholarship.¹ This Article argues that upon closer examination the defendant class action can—in certain situations that may present themselves more frequently in coming years—serve the goal of maximizing social welfare.

To date, academic analysis of class action litigation has focused almost exclusively on plaintiff class actions.² Although there have been a handful of articles and notes concerned with the defendant class, they do not provide us with a comprehensive theory with which to understand and evaluate defendant class actions.³ Recent proposals for expanding

1. See *infra* Figure 1.

2. See David L. Shapiro, *Class Actions: The Class as Party and Client*, 73 NOTRE DAME L. REV. 913, 914 n.2 (1998) (“A full bibliography of those publications devoted in whole or substantial part to the use of class actions in litigation would warrant a sizable appendix. But a listing of books and articles I have found helpful—some of which are long and detailed, while others, though short, are incisive and provocative—may serve a dual purpose: to provide a brief, accessible bibliography for those interested in further research and to furnish a single, easily consulted source of cross-reference for later citations in this essay.”).

3. See generally Theodore W. Anderson & Harry J. Roper, *Limiting Relitigation by Defendant Class Actions from Defendant’s Viewpoint*, 4 J. MARSHALL J. PRAC. & PROC. 200 (1971) (discussing the differences between plaintiff and defendant class actions under the then recently adopted Rule 23); Debra Lyn Bassett, *U.S. Class Actions Go Global: Transnational Class Actions and Personal Jurisdiction*, 72 FORDHAM L. REV. 41, 42–44 (2003) (discussing “the impact of the participation of other countries’ citizens in U.S.-based class action litigation,” specifically in regard to the issue of personal jurisdiction); Elizabeth Barker Brandt, *Fairness to the Absent Members of a Defendant Class: A Proposed Revision of Rule 23*, 1990 BYU L. REV. 909, 909–12 (1990) (discussing due process and general fairness concerns when Rule 32 is applied to defendant class actions); Vince Morabito, *Defendant Class Actions and the Right to Opt Out: Lessons for Canada from the United States*, 14 DUKE J. COMP. & INT’L L. 197, 197–202 (2004) (“[O]pt out regimes should not be employed in defendant class proceedings as they create serious obstacles to the fulfillment of the policy objectives of the class action device . . . and are not necessary to ensure that members of defendant classes are treated fairly.”); A. Peter Parsons & Kenneth W. Starr, *Environmental Litigation and Defendant Class Actions: The Unrealized Viability of Rule 23*, 4 ECOLOGY L.Q. 881, 908–14 (1975) (arguing that the defendant class action can be used as “a constitutionally sound and highly practical vehicle for environmental litigation” in certain situations); Samuel M. Shafner, *The Juridical Links Exception to the Typicality Requirement in Multiple Defendant Class Actions: The Relationship Between Standing and Typicality*, 58 B.U. L. REV. 492, 492–93 (1978) (discussing how the standing doctrine and typicality requirement apply to class actions involving multiple defendants, specifically regarding the potential problems arising from the juridical links exception to typicality); Robert R. Simpson & Craig Lyle Perra, *Defendant Class Actions*, 32 CONN. L. REV. 1319, 1319 (2000) (exploring “the sparse law governing defendant class action lawsuits and its potential applicability to the recent wave of litigation against the firearms industry”); Barry M. Wolfson, *Defendant Class Actions*, 38 OHIO ST. L.J. 459, 459–61 (1977) (presenting defendant class action as a legitimate, useful and under-utilized, tool in litigating certain issues); Angelo N. Ancheta, Comment, *Defendant Class Actions and Federal Civil Rights Litigation*, 33 UCLA L. REV. 283, 283–89 (1985) (arguing that “the defendant class action is a powerful, albeit uncommon, procedure for vindicating constitutional and statutory civil rights”); Note, *Defendant Class Actions*, 91 HARV. L. REV. 630, 632–33 (1978) [hereinafter *The Harvard Note*] (presenting an overview of defendant class actions and discussing the potential due process and general fairness issues presented by this litigation device); Irving A. Gordon, Comment, *The Common Question Class Suit Under the Federal Rules and in Illinois*, 42 ILL. L. REV. 518, 528 (1948) (“[T]he defendant class suit presents both motive and opportunity for improper practice.”); Debra J. Gross, Comment, *Mandatory Notice and Defendant Class Actions: Resolving the Paradox of Identity Between Plaintiffs and Defendants*, 40 EMORY L.J. 611, 611–13 (1991) (proposing a revision to Rule 23 which would mandate notice to all defendants in defendant class action suits); Robert E. Holo, Comment, *Defendant Class Actions: The Failure of Rule 23 and a Proposed Solution*, 38 UCLA L. REV. 223, 266–68 (1990) (arguing that Rule 23 ought not to govern defendant class actions and proposing the adoption of a new rule spe-

the use of defendant class action devices have focused primarily on issues arising out of internet and mass communication markets, without considering a more general application.⁴ For example, these recent proposals have almost entirely missed the possibility of defendant class actions as a tool for improving responsible corporate decision-making.

In the standard treatment of class actions, commentators typically set aside analysis of defendant class actions altogether with an explanation such as, “today defendant class actions are rare and pose special problems of representation and due process that are beyond the scope of this paper.”⁵ The standard approach is correct in observing that defendant class actions are certainly more rare and, at present, more legally suspect in the eyes of courts than plaintiff class actions. But by stopping there,

cifically designed for this type of suit); Leighton Lee III, Comment, *Federal Rule of Civil Procedure 23: Class Actions in Patent Infringement Litigation*, 7 CREIGHTON L. REV. 50, 59–60 (1973) (noting the problem of adequate representation of defendants in patent infringement defendant class actions); Scott Douglas Miller, Note, *Certification of Defendant Classes Under Rule 23(b)(2)*, 84 COLUM. L. REV. 1371, 1371 (1984) (discussing how to determine when certification of a defendant class is appropriate and proposing a “test which minimizes heterogeneity by certifying only those classes whose members share a legal relationship that predates the litigation—a juridical link”); Note, *Statutes of Limitations and Defendant Class Actions*, 82 MICH. L. REV. 347, 347–50 (1983) (“[I]n defendant class actions the statute of limitations should be tolled as to all named and absent class members upon informal notice given by the plaintiff at the beginning of the suit.”); Randy Clarke, A Defendant Class Action Lawsuit: One Option for the Recording Industry in the Face of Threats to Copyrights Posed by Internet Based File-sharing Systems (Spring 2001) (unpublished Honors Scholar Seminar Paper, Chicago Kent College of Law), <http://www.kentlaw.edu/honorsscholars/2001students/writings/clarke.html> (exploring the use of defendant class actions to litigate cases of peer-to-peer file-sharing copyright infringement).

4. See generally Nelson Rodrigues Netto, *The Optimal Law Enforcement with Mandatory Defendant Class Action*, 33 U. DAYTON L. REV. 59, 59–60 (2007) (“The objective of this article is to suggest an enhancement of law enforcement through mandatory aggregation of defendants and improvement of the defendant class action to incentivize the class lawyer.”); Nicole L. Johnson, Comment, *BlackBerry Users Unite! Expanding the Consumer Class Action to Include a Class Defense*, 116 YALE L.J. 217, 217–18 (2006) (“This Comment takes the Hamdani and Klement proposal [“to allow certification of defense classes at the instigation of defendants”] a step further and suggests that the class defense has a more expansive applicability, not only for achieving economies of scale and overcoming collective action problems in litigation, but perhaps more importantly in obtaining settlements.”).

5. Shapiro, *supra* note 2, at 919. Shapiro also notes that, “As Stephen Yeazell has shown in his informative history of the class action, defendant classes with a pre-existing coherence were often litigants in the early stages of class action development . . .” *Id.* Nagareda, too, tables the question for another day:

Though the Supreme Court has yet to speak definitively to the matter, federal appellate courts have proven relatively unreceptive to defendant classes under Rule 23(b)(2).

Whether that chilly reception stands as either a proper reading of Rule 23 or otherwise a sensible conception of the class action is a question that I leave for another day.

Richard A. Nagareda, *The Preexistence Principle and the Structure of the Class Action*, 103 COLUM. L. REV. 149, 181 n.131 (2003) (citation omitted). Erichson makes the same move when he writes:

Defendant class actions are permitted by Rule 23(a), and are certified on rare occasion. This paper, however, considers only plaintiff class actions, which are far more common and offer a better foil for understanding mass non-class litigation. Although mass litigation sometimes involves hundreds of defendants, and defense lawyers often coordinate their efforts through joint defense agreements, the mass collective representations that resemble class actions occur almost exclusively on the plaintiff side.

Howard M. Erichson, *Beyond the Class Action: Lawyer Loyalty and Client Autonomy in Non-Class Collective Representation*, 2003 U. CHI. LEGAL F. 519, 531 n.37 (2003) (citations omitted).

the standard mode of analysis gives us little insight into how we should evaluate this present state of affairs.

Why do defendant class actions receive such little treatment? If they are seen as theoretically untenable or unfair, then the theory needs to be examined. If we ignore defendant class actions because they are fewer in number than plaintiff class actions, the question to ask is whether they should be used more often. If the argument is that they are not feasible in practice, then system design issues come to the forefront. These issues—theory, frequency, and feasibility—are related, but distinct from one another. This Article will address each of them, focusing most of its attention on the fundamental principles that should motivate courts to certify defendant classes. The goal of this Article is thus to lay out a general theory of defendant class actions.

In developing its general theory, this Article argues that courts and commentators have recognized the benefits of aggregation, but have overlooked the informational advantages of the defendant class device. Specifically, this Article argues that the class action device can serve an auction-like function of producing information about defendants' relative contributions to harm. In situations where the market is unlikely to produce such information, the value of defendant class actions is greater. This Article delineates a series of real-world situations in which these informational benefits can be gained through a defendant class action.

In developing its theory, this Article argues that three interrelated principles should guide the use and evaluation of defendant class actions:⁶

(1) Forward looking deterrence principle. The forward-looking deterrence principle holds that the utility of a defendant class action should be measured by its contribution to future deterrence of harms by the proposed defendant class.⁷ This principle stands in stark contrast to an existing strand of jurisprudence that looks backwards and attempts to determine pre-existing relationships (or “juridical links”) between members of the proposed defendant class.⁸

6. To be sure, similar principles can be, and have been, applied to traditional class actions as well. See CHARLES FRIED & DAVID ROSENBERG, MAKING TORT LAW: WHAT SHOULD BE DONE AND WHO SHOULD DO IT 37 (2003) (identifying optimal precautions, optimal insurance, and redistribution of wealth as primary goals of the tort system).

7. As will be discussed subsequently, the premise is that individuals in the future, whether potential defendants or potential plaintiffs, will adjust their behavior according to the court's actions. Thus, the court is not constantly shifting, but rather making a clear statement about what individuals can expect if they act in certain ways, e.g., they might expect to be included in a defendant class and stuck with joint and several liability for the harm caused by their class. Courts can still be flexible in administering the rule in different contexts as changes occur (social, technological, etc.). See *infra* Part II.A.

8. See generally Shafner, *supra* note 3; Miller, *supra* note 3.

(2) Dynamic effects principle. The dynamic effects principle holds that our evaluation of defendant class actions should include all secondary effects such as information generation, feedbacks, price adjustments, new incentive structures, and changing group dynamics. This includes the standard law and economics approach to examine incentive structures, but “effects” here are broadly defined to also include group dynamics related to psychological mechanisms. This principle stands in opposition to the position that the court should focus solely on the immediate effects for the named plaintiff and defendants.

(3) Aggregate analysis principle. Taking the dynamic effects principle one step further, the aggregate analysis principle holds that our evaluation of defendant class actions should ultimately rest on an aggregate, society-wide cost-benefit analysis. In situations where deterrence of harm simultaneously involves deterrence of a good, the aggregate analysis principle instructs the legal analyst to consider multiple cross-cutting effects at high levels of aggregation.

With these three background principles laying the foundation, the Article makes a series of more specific arguments. Drawing on an analysis of 177 cases where defendant class actions were contemplated, the Article argues that courts have failed to see that plaintiff and defendant class actions should not be distinguished on conceptual grounds, but rather on the different group dynamics that are likely to exist in defendant, as opposed to plaintiff, classes. Specifically, the incentives for intra-class information sharing between plaintiff and defendant class members is likely to be quite different without the class device in place.

In developing its general theory, this Article analyzes Hamdani and Klement’s proposal for “the class defense,” a device that would allow defendants to class themselves with others similarly situated.⁹ This Article argues that although Hamdani and Klement’s analysis is more thorough than previous work on defendant class actions, it still fails to go far enough toward a general theory. The paper also examines Netto’s recent argument for the use of defendant class actions in the case of illegal downloading. Netto provides a defense of aggregation, but like Hamdani and Klement, fails to recognize the informational benefits likely to arise out of some even small defendant classes.

In addition to a general discussion, two potential applications for defendant classes are considered at various points in the paper: (1) deterring illegal file sharing on the Internet, and (2) deterring corporate fraud and illegal dealing. In both contexts, this Article argues that existing literature and jurisprudence generally take a backwards-looking approach, do not properly account for dynamic effects, and too often ignore aggregate analysis. This Article argues that failure to follow these principles

9. Assaf Hamdani & Alon Klement, *The Class Defense*, 93 CALIF. L. REV. 685, 687 (2005).

makes it less likely that the existing solutions will achieve optimal deterrence. This Article also considers the hard case of copyright infringement, which challenges the feasibility of defendant class actions in cases where no group of defendants is readily identifiable as the group to lead the class defense.

This Article is organized into four sections. The first section of the paper reviews existing literature on defendant class actions. The second section develops a general theory, drawing in part on the psychology literature on group decision making. The third section then presents a system design based on the general theory, focusing in particular on the application of these systems to the case of illegal dealings by corporate executives, illegal file sharing on the Internet, and copyright infringement. The fourth section concludes with thoughts for future research directions in this area.

I. EXISTING LITERATURE

The existing literature on defendant class actions is comprised of a few journal articles, several Notes, and a handful of additional publications.¹⁰ Much of the literature on defendant class actions has considered how Federal Rules of Civil Procedure 23 (“Rule 23” or “the Rule”) can be applied to defendant class actions.¹¹ For example, Scott Douglas Miller, author of *Certification of Defendant Classes Under Rule 23(B)(2)*, discusses the “dispute over Rule 23's terminology” and provides an analysis of the text of the Rule.¹² Likewise, Randy Clarke moves through the language of the Rule in evaluating a potential defendant class action against music downloaders.¹³ In his commentary on defendant class actions, Robert Holo also proceeds with a formalist analysis, considering how the language of the Rule applies: “Despite *Doss*, it is clear that (b)(2) certification of defendant classes is always inappropriate because of the express language of the rule. Courts should not ignore the clear language of the rule in order to better serve their perceptions of justice or fairness.”¹⁴ This Article does not focus on formalist

10. See sources cited *supra* note 3.

11. Fed. R. Civ. P. 23. Interpretation of Rule 23 has been a challenge for courts and academics alike because it is open to varying readings. As Judge Posner noted, “The question whether there can be a defendant class in a Rule 23(b)(2) suit cannot be answered by reference to authority.” *Henson v. E. Lincoln Twp.*, 814 F.2d 410, 413 (7th Cir. 1987). Because of this potential latitude, federal appeals courts have moved to reign in the class mechanism. The Court of Appeals for the Eleventh Circuit has written that a rule to the contrary would “enable any action, with the possibility that it might be one of multiple actions, to be certified pursuant to Rule 23(b)(1)(B).” *Namoff v. Merrill Lynch*, 829 F.2d 1539, 1546 (11th Cir. 1987).

12. The language in 23(b)(2) is his concern: “Few actions for equitable relief are based on plaintiffs’ conduct; rather, plaintiffs initiate such suits in response to defendants’ conduct.” Miller, *supra* note 3, at 1375. Miller’s analysis of court cases proceeds to consider how they look at the language of the Rule. “Thus, all federal courts that have considered defendant class certification under Rule 23(b)(2) have done little more than superficially reviewed the rule’s terms.” *Id.* at 1376.

13. Clarke, *supra* note 3.

14. Holo, *supra* note 3, at 264.

concerns such as the best interpretation of the language of Rule 23. Rather, this Article adopts a functionalist framework and theorizes about when defendant class actions will best serve the goals of maximizing social welfare.

Although articles by Netto (2007), Johnson (2006), and Hamdani and Klement (2005) have begun to address more functionalist concerns in the past few years, the literature remains limited.¹⁵ My review of the literature argues that scholars have generally concentrated too much on proceduralist concerns (i.e., scrutiny of the language of Rule 23), and have failed to provide a thorough functionalist analysis. My purpose in reviewing this literature is to identify some of the most discussed market and incentive dynamics associated with defendant class actions. Once these dynamics are recognized, Section II of the paper develops a general theory to incorporate them.

A. All Defendant Classes are Not the Same

Defendant class actions originate out of the same legal history and Federal Rules of Civil Procedure as plaintiff class actions.¹⁶ Like plaintiff class actions, defendant class actions became more feasible after the 1966 amendments to Rule 23.¹⁷ Although defendant class actions are less frequent than plaintiff class actions, “[t]he use of a defendant class action is not a recent development.”¹⁸

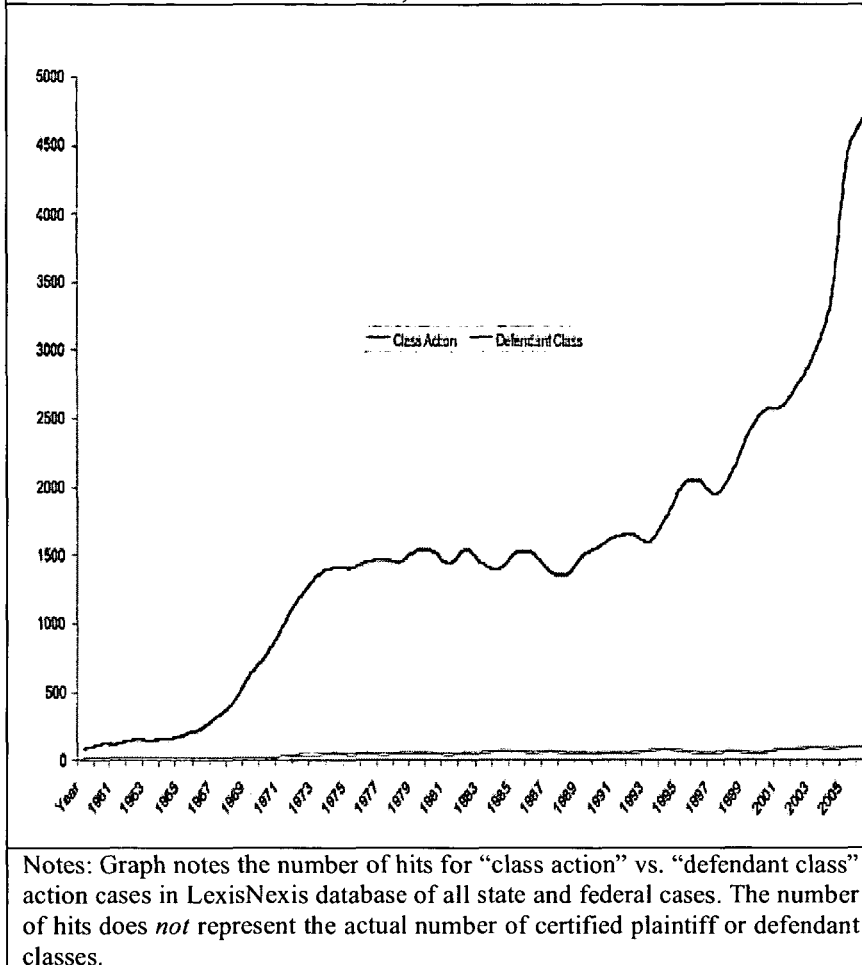
15. The literature also remains disconnected from previous studies. The literature, for instance, has yet to be synthesized in a single article. Even the more recent articles have not cited all previous works. In Hamdani & Klement’s analysis of defendant classes, they fail to cite several works on defendant class actions, including a short piece from three years earlier that had considered defendant class actions in the similar context of file sharing. The uncited work was Clarke, *supra* note 3.

16. See generally Netto, *supra* note 4, at 76–87 (providing a history of the defendant class action, and its development in the United States).

17. Howard Downs notes that “[w]hereas original Rule 23 restricted binding class actions to cases involving ‘joint or common rights’ or actions affecting ‘specific property,’ amended Rule 23 relaxed these restrictions, which extended the social and economic uses of the class device.” Howard M. Downs, *Federal Class Actions: Due Process by Adequacy of Representation (Identity of Claims) and the Impact of General Telephone v. Falcon*, 54 OHIO ST. L.J. 607, 608 (1993). “Although it appears that the modern-day class action was born probably some time during the Middle Ages, there are reports of ecclesiastical proceedings against numerous insects and animals dating as early as A.D. 824.” Shaw v. Toshiba Am. Info. Sys., Inc., 91 F. Supp. 2d 942, 946–47 (E.D. Tex. 2000). “These early ‘defendant class actions’ date from a very early period: in A.D. 824, against moles in Aosta; in A.D. 864, bees in Worms; in A.D. 886 locusts of Romagna; and in the same century, serpents of Aux-les-Bains.” *Id.* at 947.

18. Doss v. Long, 93 F.R.D. 112, 115 (N.D. Ga. 1981).

Figure 1. Number of “class action” and “defendant class” mentions in federal and state cases, 1960-2007



Nonetheless, the explosion of class action litigation has been overwhelmingly on the plaintiff side. To gain some historical perspective, I conducted a LexisNexis search of all Federal and State cases from 1960-2007 using the phrase “class action” or “plaintiff class.” I then ran the search again with the terms “defendant class action” or “defendant class.” These searches, while not providing an accurate count of the actual number of cases contemplating class actions, nevertheless serve as a proxy for the popularity of the class device in the courts. The number of hits per year, presented graphically in Figure 1, gives us a sense of the disparity between defendant and plaintiff class actions. While discussion of class actions generally has risen steadily since 1966—growing very significantly in the last decade—contemplation of defendant class actions has remained quite low throughout the forty years. While this class action term search produced over 1,000 hits starting in the 1970s, over

2000 starting in the late 1990s, and over 4,000 in the most recent years, defendant class mentions have never risen over 100 hits. The number of plaintiff class actions clearly dwarfs the number of defendant class actions.

One straightforward reason for such little use of the defendant class device is current jurisprudence on Rule 23. Defendant class actions are governed by Rule 23, and thus, as a preliminary matter courts look for satisfaction of the four Rule 23(a) prerequisites: numerosity, commonality, typicality and adequacy of representation.¹⁹ Analysis of these prerequisites explains much of the infrequency of defendant class actions, but tells us little about whether that infrequency is a useful (functional) outcome. I am not concerned with re-interpretation of Rule 23, but rather, I am primarily concerned with evaluating the outcome of its current interpretation, i.e., evaluating whether the defendant class action should be expanded on the grounds of improving social utility. For reasons to be discussed subsequently, I argue that in fact there should be such an expansion of defendant class action use.

Before moving to that argument, let us review the prerequisites that prevent many instances of efficient and socially desirable class certification. Courts currently do not depart radically from accepted views of Rule 23 jurisprudence. A recent 2003 decision from the District of New Jersey provides a concise summary of the state of the law:

There is a significant split of opinion as to whether Rule 23(b)(2) ever permits injunctive relief against a defendant class. The Fourth and Seventh Circuits, together with the leading treatise on federal procedure, take the view that defendant classes are not authorized by Rule 23(b)(2). These authorities are generally of the view that the text of 23(b)(2) itself forbids defendant classes. . . .

On the other hand, the Second Circuit, together with the leading class action treatise, take the view that defendant classes are permitted by Rule 23(b)(2). The Sixth Circuit appears to agree that defendant classes are permissible under Rule 23(b), but only if individual defendants are all acting to enforce a locally administered state statute or uniform administrative policy. The principal justification for permitting defendant classes under Rule 23(b)(2) seems to be that the device can be particularly useful to bind to a court decree a group of defendants who, out of recalcitrance or neglect, have refused to conform their conduct to settled substantive law or to eliminate the need for ancillary proceedings against a number of semi-autonomous defendants once the court has made a basic determination of legal issues applicable to all.²⁰

19. See Fed. R. Civ. P. 23(a).

20. Clark v. McDonald's Corp., 213 F.R.D. 198, 217. (D.N.J. 2003) (citations omitted).

Ultimately, the court concluded that:

A review of the foregoing district court decisions reveals that the certification of 23(b)(2) defendant classes has been implemented only tepidly in the Third Circuit, and has met success, if at all, only in cases where the individual defendants of the class are alleged to be acting in conformity with an illegal state statute, rule, or regulation.²¹

Commentary from other courts similarly note that “defendant classes seldom are certified,” and if they are certified, “such certification most commonly occurs[:] (1) in patent infringement cases; (2) in suits against local public officials challenging the validity of state laws; or (3) in securities litigation.”²²

To gain a broader perspective on defendant class actions, I examined cases in which a defendant class action was contemplated.²³ Utilizing the LexisNexis database of all federal and state cases, as well as previous academic and court citations, I identified 177 cases in which a defendant class was contemplated.²⁴ These cases, listed in the online appendix, were coded for subject. Table 1 provides a summary of the subject matter.

The analysis of these cases is consistent with the courts’ observations that defendant class actions have been used frequently for securities cases and for constitutional challenges. These two categories alone account for fifty three percent of the defendant class action cases. There are, however, more extensive uses of class actions than typically ac-

21. *Id.* at 220. In this particular case, plaintiffs sought to certify as a class all McDonald’s under Title III of the Americans with Disabilities Act. The court did not certify a defendant class because “the individual members of the defendant class have been non-uniform in their non-compliance with such policies.” *Id.* The court speculated that:

Had plaintiffs alleged, for example, that McDonald’s and its franchisees adhered to a company-wide policy of providing just one handicapped parking space in restaurant parking lots, or of installing no “grab bars” in restaurant toilet stalls, then one could imagine why injunctive relief—against the defendants as a class—might be appropriate to redress such violations.

Id. at 220–21.

22. *Thillens, Inc. v. Cmty. Currency Exch. Ass’n of Ill., Inc.*, 97 F.R.D. 668, 674 (N.D. Ill. 1983) (citations omitted). *Thillens* went on to read:

Several rules, useful in unilateral as well as bilateral defendant class actions, emerge from *In re Gap* and similar cases: (1) A defendant class will not be certified unless each named plaintiff has a colorable claim against each defendant class member; (2) A defendant class will not be certified under Fed. R. Civ. P. 23(b)(3) without a clear showing that common questions do *in fact* predominate over individual issues; (3) The requirement that each named plaintiff must have a claim against each defendant may be waived where the defendant members are related by a conspiracy or “juridical link.”

Id. at 675–76. *Netto* notes that the defendant class action device “is more frequent in lawsuits involving civil rights, disputes challenging constitutionality of state and local law and practices enforced by public officials, and suits against unincorporated associations, e.g., labor unions. Defendants’ classes have also been certified in other contexts, such as patent infringement, antitrust, securities, and environmental law.” *Netto*, *supra* note 4, at 87.

23. Defendant classes sometimes emerge out of counter-claims in plaintiff class actions. I have excluded them from this analysis, as they are not the focus of the paper.

24. The search was conducted in February 2008.

knowledge. While declaratory judgments on property rights and benefits are similar to the constitutional challenge and security cases, ten percent of the cases concerned damages.

Table 1. Summary of selected cases in which defendant class action was proposed

Case Subject Matter	Number	Pct.
Constitutional Challenge	63	35.6%
Securities	31	17.5%
Damages	18	10.2%
Property Rights	17	9.8%
Benefits - Insurance or Retirement	14	7.9%
Monopoly / Anti-Trust	7	4.0%
Taxes / Fees	6	3.4%
Patent	7	4.0%
Contractual	4	2.3%
Bankruptcy	4	2.3%
Other	4	2.3%
Copyright	2	1.1%

NOTES: Defendant classes were not certified in all cases. The 177 cases coded here were identified through searches in the LexisNexis database of All Federal and State cases. See text for details of search procedures.

Both academics and judges have paid close attention to the nature of the potential defendant class. Over twenty-five years ago, *The Harvard Note* recognized the functional nature of many defendant class actions: “The structure of certain types of defendant class actions virtually guarantees adequate representation. Suits against the members of a labor union or other unincorporated association, naming the officers as representative of the class, provide one example.”²⁵

When the relationship between defendants is clearly demarcated, the courts see fewer barriers to certifying defendant classes. Analyzing when courts are likely to certify defendant classes, Miller finds that “[c]orrectional institutions, county magistrates, county sheriffs, local prosecutors, and voting officials have all been certified and bound as defendant classes.”²⁶ Courts have developed the juridical links exception

25. *The Harvard Note*, *supra* note 3, at 642.

26. Miller, *supra* note 3, at 1379.

to understand connections between defendant members of the class. Courts have defined a juridical link “as ‘some [independent] legal relationship which relates all defendants in a way such that single resolution of the dispute is preferred to a multiplicity of similar actions.’”²⁷ Examples of such links include partnerships or joint enterprises, conspiracy, and aiding and abetting. These terms denote some form of relationship or activity on the part of the members of the proposed defendant class “that warrants imposition of joint liability against the group even though the plaintiff may have dealt primarily with a single member.”²⁸

In a similar vein, Holo sees defendant class actions as more likely when the defendants are connected through some superior authority.²⁹ Holo provides examples of courts certifying defendant classes in securities fraud cases, and suits against groups of state/local officials.³⁰ It is important to note here that in these cases, the courts look backwards to see if a relationship existed between the potential defendant class members prior to the allegations. When a juridical link already exists, courts are willing to see the group dynamics. But they do not see how they could actually *create* such links in the future via their judgments in the present case; there is no forward looking jurisprudence.

The courts’ analyses in these cases bear some resemblance to the search for a conspiracy or coordinated action. In a 1990 opinion, Federal District Judge D. Brock Hornby recognized this connection in a footnote, in which he quotes Holo and states that:

27. *Follete v. Vitanza*, 658 F. Supp. 492, 507 (N.D.N.Y. 1987) (alteration in original) (quoting *Thillens*, 97 F.R.D. at 676).

28. *Id.* at 508 (quoting *Akerman v. Oryx Commc’ns, Inc.*, 609 F. Supp. 363, 375 (S.D.N.Y. 1984)). In his Note, Miller stated: “The test suggested by this Note minimizes the dangers inherent in class heterogeneity by certifying only those defendant classes whose members share a relationship predating the litigation, and whose role in the litigation derives from their membership in the preexisting group. Courts have characterized such classes as ‘juridically linked.’” Miller, *supra* note 3, at 1394–95. “When the defendant class is juridically linked these courts miss the mark. In such cases individual relief is subordinate to class relief. Traditional party relationships should be far less significant than the general nature of the interclass dispute.” *Id.* at 1400–01. Courts do not always agree on whether sufficient juridical links exist. In *Funliner of Alabama, L.L.C. v. Pickard*, the Alabama Supreme Court focused on a lack of written agreement as determinative:

In *In Re Activision Securities* . . . the Court found that the defendants, who were all underwriters and members in a securities syndicate, had entered into a written agreement We do not find the facts of *Activision* analogous to those of the instant case. There has been no finding that the defendants in this case entered into a written agreement or that they agreed to be bound to a common course of conduct; the trial court did not even note that the plaintiffs alleged a conspiracy among the defendants. Thus, the juridical-link exception found in *Activision* is missing here.

873 So. 2d 198, 215–16 (Ala. 2003).

29. Holo, *supra* note 3, at 239 (“All the defendants are bound together because of their common obligation to adhere to a particular state law or policy.”).

30. “For example, modern securities fraud litigation often involves a plaintiff class of investors suing a defendant class of securities underwriters.” *Id.* at 227. Holo also notes the usefulness of defendant class action in the context of state/local officials who are illegally discriminating. “By binding all members of a defendant class to a single judgment, widespread discriminatory practices can be brought to a halt more quickly and efficiently.” *Id.* at 228.

I leave to the plaintiffs determination of how properly to join the dealers as named defendants. I recognize the complexities in joining a large number of defendants or, as suggested at oral argument, creating a defendant class. Commentators have wondered: "Can the existence of a conspiracy be proven in a single proceeding representing the entire defendant class, or does proof of a conspiracy depend upon proving each defendant's participation in the alleged conspiracy, an inherently individual question that must be answered separately for each defendant?"³¹

One additional rule courts have introduced in analyzing the relationship of potential members of a defendant class is a membership ratification theory.³² "Under [the membership ratification] theory dealing with individual proof of illegal conduct becomes unnecessary. Rather, a presumption arises that all members of the association joined in the alleged conspiracy."³³ It is essentially a 'guilty by association with the Association' rule. Functionally, this is telling individual defendants that they should have asked questions up front and should have monitored their association, or otherwise contracted *ex ante* to avoid this liability.³⁴ Like the juridical links rule, however, the membership ratification rule looks back to earlier relationships between potential class members. But even though the courts are backwards-looking here, we can see in their jurisprudence the roots for more functionally effective legal rules. For instance, laying down a 'guilt by association with the Association' rule would likely have a strong future deterrent effect on the behavior of individuals in that Association.

B. Financial Incentives & Free Riding

The most frequently noted motivational problem with defendant class actions is the lack of adequate incentive for defendant class representatives to fully litigate. This basic insight was offered over two decades ago:

Defendants generally oppose motions to certify them as class representatives. The major reason for their opposition presumably is a desire to avoid a possible increase in litigation expenses if they represent a class, in light of the fact that no source of funds is available to pay for any additional costs.³⁵

31. *In re New Motor Vehicles Can. Exp.*, 307 F. Supp. 2d 136, 141 n.7 (D. Me. 2004) (quoting Holo, *supra* note 3, at 258).

32. Holo, *supra* note 3, at 259.

33. *Id.*

34. *See Phelps Dodge Ref. Corp. v. Fed. Trade Comm'n*, 139 F.2d 393, 396-97 (2d Cir. 1943).

35. *The Harvard Note*, *supra* note 3, at 648.

This point has been reiterated since then in most discussions of defendant class actions.³⁶ As discussed by Hamdani and Klement, when the defendant class wins, “the defendants owe nothing to the plaintiff—no money changes hands.”³⁷ Thus, there is no money to pay counsel for the class representative because no single member of the defendant class has the proper financial incentives to litigate the defense fully.³⁸

The incentive problem is connected to a free-rider problem: defendant class members who are not litigating stand to benefit without cost from a successful class defense.³⁹ Unlike plaintiff classes, where litigation costs can be subtracted out of a settlement, it is more difficult to extract money from passive defendants in the class.⁴⁰ Analysts have been grappling with this problem—and how to correct it—for many years.⁴¹ Dwelling on the comment that it would be difficult, if not impossible, to “devise a method to tax such ‘free riders,’” the 1978 *The Harvard Note* observes that:

[A]ssuming that all the class members or collateral estoppel beneficiaries could be identified, there would still be problems of determining how much to charge each individual. Only the common issues will have been litigated if the defendant class prevails, and the court will therefore have no knowledge of the magnitude of total liability avoided or of the proportion attributable to each class member. . . .

36. See, e.g., Netto, *supra* note 4, at 92 (“There are three foremost concerns related to the choice of adequate representation in defendant class actions: (i) the choice of the representative is made by the plaintiff; (ii) the absence of incentive for any defendant to bear the expenses of defending a lawsuit on behalf of the entire class when the costs of litigation are disproportionate to the representative party’s stake; and (iii) the difficulty of compensating class counsel for the benefits conferred upon the class.”); see also Brandt, *supra* note 3, at 919–20 (“In comparison, a defendant class representative will seldom be able to take advantage of the same fee incentives as a plaintiff representative. . . . Consequently, the defendant representative must be prepared to assume some, if not all, of the economic burden of the litigation.”).

37. Hamdani & Klement, *supra* note 9, at 691.

38. An important exception, discussed *infra* Part II.B.1, is when there are “dominant players” in the class.

39. See *The Harvard Note*, *supra* note 3, at 648 (“[T]here might seem to be a certain unfairness to the defendant class representative even if his defense of the class entails no extra costs; if the common question is resolved in favor of the defendant class, absentee members will have received a benefit at the representative’s expense without having to compensate him for it.”); see also Miller, *supra* note 3, at 1385 (“Further, party heterogeneity increases the legal fees and administrative costs associated with coordinating a defense. The defendant class representative cannot expect to recoup these additional costs . . .”).

40. The ability to correct for the free-rider problem, as discussed in Part III.D, depends heavily on the nature of the group dynamics within the defendant class.

41. See *The Harvard Note*, *supra* note 3, at 652–53 (The Note argues for expanded use of what it terms “expanded common question defendant class action.” They suggest that courts frame the question “not in terms of what each individual class member owes but rather in terms of what formula should be used to allocate the total liability.” Unfortunately, after this interesting discussion, the Note suggests that, “[o]f course, in any of these ‘fully litigated’ defendant class actions a final stage of individualized hearings is needed—whether conducted along with the class suit or entirely separately from it.”).

[T]he class members would need to be taxed according to their potential liability, a figure difficult if not impossible to determine.⁴²

Aware of the incentive problems with defendant class actions, some courts have refused to certify defendant classes on the grounds that the parties representing the class do not have the proper incentives to litigate fully.⁴³ This issue of free riding and funding optimal defendant class representation is a topic I take up at length in the system design section of this Article.

C. Funding Defendant Class Actions

Recognizing the free-rider problem, several funding schemes have been proposed. Some of these proposals involve a tax-like levy on defendant class members. To fund the defendant class action, the court could choose “to tax the expenses attributable to the class action to the plaintiff, to tax them to the absentee defendants, or to refuse to certify the class on any questions not perfectly common to the class members.”⁴⁴ This proposed solution is to tax the absentees “with a proportionate share of at least the class-action-related expenses of the named defendant.”⁴⁵

A common alternative is to find some organization with deep pockets and make them a party as well.⁴⁶ Plaintiffs bringing the suit are typically in a position to identify the deep pocket class members on the other side. In the securities case *Northwestern National Bank of Minneapolis v. Fox & Co.*,⁴⁷ the plaintiffs sued the class of Fox partners in addition to Fox itself “in order to assure recovery of the substantial judgment likely to issue if plaintiffs succeed in proving their claims.”⁴⁸ Courts have recognized that financial stakes will motivate defendants to mount adequate defenses. In *Consolidated Rail Corp. v. Town of Hyde Park*,⁴⁹ the court held that “[b]y including as [defendant] class representatives the 10 highest tax collectors from Conrail . . . the district judge created a fair group

42. *Id.* at 648–49 & n.96.

43. *See, e.g., Nat'l Ass'n for Mental Health, Inc. v. Califano*, 717 F.2d 1451, 1458 (D.C. Cir. 1983) (The defendant university, U.S.C., said explicitly in testimony that “it was ‘unwilling to expend the effort and funds necessary to defend itself in this action, let alone represent the interests of a large group.’ . . . The school's position was supported by the affidavit of one of its administrators, who stated: ‘Due to the minimal amount of its alleged liability in this action, the University of Southern California does not intend to defend this action on behalf of itself or any others.’”).

44. *The Harvard Note, supra* note 3, at 656.

45. *Id.* at 657.

46. *See, e.g., Holo, supra* note 3, at 271 (Holo's solution is for the judge to bring in some defendant with the money: “Nevertheless, the judge may, in her discretion, assign additional defendants to act as corepresentatives, thus lessening the financial burden on any one defendant and at the same time preventing any defendant from shirking his duties.”); *see also The Harvard Note, supra* note 3, at 656 (arguing that adequate representation (aligning incentives) might be accomplished in some instances by requiring “the plaintiff to name as an additional defendant a trade organization whose membership coincided with that of the class”).

47. 102 F.R.D. 507 (S.D.N.Y. 1984).

48. *Id.* at 510.

49. 47 F.3d 473 (2d Cir. 1995).

of representative parties who presumably have the greatest financial motivation to defeat Conrail's case."⁵⁰ Where plaintiffs do not already include deep pocket defendants, the court can also find the necessary parties. Holo suggests that, "a court can require a plaintiff to join additional defendants as class representatives and can also permit associations or other institutional representatives to join as representative defendants."⁵¹ In other words, the court can look to kick a private market into motion to fund the class defense. In *In re Integra Realty Resources, Inc.*,⁵² the Tenth Circuit did just this, naming Fidelity as the defendant class representative against Integra because the Fidelity Capital Appreciation Fund was the largest Integra shareholder when Integra spun off (thus bringing on the litigation).⁵³

D. Aggregation, Opt-Out, and Deterrence

The benefits of aggregating claims in order to enjoy economies of scale is discussed at several points in previously published literature. Netto writes that amongst courts and academics today, "[i]t is a general consensus that the primary advantage of class actions is to override the transactional cost of low stake claims, which would not be individually prosecuted because the costs of litigation . . . supersede the expected utility from the adjudication."⁵⁴ The primary point, as noted by Holo, is that aggregation "allows the defendants to pool their resources, decide who among them would be the most fit representative, and present a strong, united front against their opponents."⁵⁵ The spirit of these comments, in favor of aggregation, is the same spirit animating David Rosenberg's arguments in *Mass Tort Class Actions: What Defendants Have and Plaintiffs Don't*.⁵⁶ In Rosenberg's analysis of plaintiff class actions he recognizes that defendants are able to enjoy the benefits of scale in defending themselves, while plaintiffs—unless they have a class device—cannot.⁵⁷ Here, in the case of defendant class actions, plaintiffs start with pooled resources that defendants do not have. The defendant class action serves as a tool to address this imbalance.

The majority of analyses on defendant class actions have argued for an opt-out option based on fairness and due process concerns.⁵⁸ But the

50. *Id.* at 484.

51. Holo, *supra* note 3, at 234.

52. 262 F.3d 1089 (10th Cir. 2001), *aff'd*, 354 F.3d 1246 (10th Cir. 2004).

53. *See id.* at 1096.

54. Netto, *supra* note 4, at 98; *see also* Hamdani & Klement, *supra* note 9, at 711–13.

55. Holo, *supra* note 3, at 268.

56. David Rosenberg, *Mass Tort Class Actions: What Defendants Have and Plaintiffs Don't*, 37 HARV. J. ON LEGIS. 393, 394–97, 399–402 (2000).

57. *See id.* at 393–94, 400–02, 407–08, 412.

58. *See, e.g.*, Brandt, *supra* note 3, at 911–13; *see also* Netto, *supra* note 4, at 98 ("In fact, some circumstances will actually create incentives not to opt out of a defendant class. For example, a plaintiff who commences a defendant class against a group of underwriters of a new stock offering may also threaten and be able to commence litigation against each of the underwriters individually. Given the certainty of having to make a choice between remaining in a defendant class or defending

cost of opt-out (and unraveling the defendant class) is significant. Simpson and Perra explain the rationale for not allowing opt out:

[O]rdinarily no one wants to be a defendant, so that defendant class members who have an opportunity to opt out can be expected to do so Massive opt-out undermines the breadth and finality of judgments, increases the possibility of duplicative litigation, and lessens the probability of giving plaintiffs full relief.⁵⁹

The empirical data on how the opt-out option is used in practice is lacking. As observed by Morabito, “there is little information available concerning the percentage of class members who have opted out of defendant class proceedings, after being offered the opportunity to do so following the certification of defendant classes.”⁶⁰ Morabito found only three U.S. cases in which opt-out rates were discernible: “3 defendants opted out of a class of 91; no one exited another defendant class; and in a third proceeding, 115 defendants opted out.”⁶¹

The deterrence objectives of class action litigation have also been raised several times in the existing literature.⁶² In the deterrence view, “the primary purpose of class litigation is not so much to redress injured plaintiffs as to deter wrongful conduct on the defendant’s part by forcing him to disgorge his unlawful gains or by restructuring his behavior through the use of injunctions.”⁶³ Hamdani and Klement have focused extensively on deterrence, and their proposal will be discussed more in depth in the next few sections.

individual litigation, the economics of a joint defense considerably outweighs those of defending an individual action, and defendant class members would have an incentive to remain in the class.”)

59. Simpson & Perra, *supra* note 3, at 1334 (alteration in original); *see also* Holo, *supra* note 3, at 266 (considering proposal of a no-opt-out rule before moving away from the suggestion). Although Holo doesn’t stick with it, he actually considers proposing a no-opt-out rule as well:

One more possible modification would be to eliminate the 23(c)(2) opt-out provision for proposed members of a defendant class. Some courts have worried that any defendant named in a 23(b)(3) defendant class action would promptly opt out, thus rendering the class action device useless, but this modification would successfully resolve that problem.

Id. In the next line, he moves away from this suggestion, but the logic was there. *Id.* (“In the final analysis, however, these measures also would be inadequate.”).

60. Morabito, *supra* note 3, at 226 (footnotes omitted).

61. *Id.*

62. *See* Simpson & Perra, *supra* note 3, at 1319 (suggesting the possibility of using defendant class actions to solve the problem of holding the firearms market liable). As they ask at the outset:

[H]ow can municipalities and other “representative organizations” summon each allegedly culpable firearms industry player to the table? How can these suits be structured to ensure that each participant in the manufacturing, advertising and distribution channels is held accountable for its tortious behavior? How can a plaintiff, who has suffered damages potentially caused by 191 different firearms manufacturers, hundreds of wholesalers and over 80,000 retailers nationwide, join these potential defendants in a manner that ensures that each suffers its proportional share of damages caused?

Id. Simpson & Perra structure their article, however, around the language of Rule 23, demonstrating how the four requirements can be met—not discussing why it would be a good thing to have defendant class actions. *Id.* at 1324–29.

63. *The Harvard Note*, *supra* note 3, at 654.

E. Formalist and Proceduralist Concerns

While there are strains of functionalist thinking throughout the literature on defendant class actions, the bulk of the literature still grounds itself in proceduralist concerns. Although some of these authors acknowledge deterrence objectives, they fall back on a position articulated by Miller, that the "usual incentive for defendant class certification rather is not economic utility but social justice."⁶⁴ This focus on social justice is accompanied by a focus on due process and fairness.

In the context of defendant class actions, the concerns of commentators and courts are often those of due process.⁶⁵ The court in *Thillens, Inc. v. Community Currency Exchange Association of Illinois, Inc.*⁶⁶ noted, "Fundamental fairness to absentee members must be balanced against judicial savings. Where representative adjudication occurs pursuant to a defendant class, due process concerns not inherent in plaintiff class actions arise. The crux of the distinction is: the unnamed plaintiff stands to gain while the unnamed defendant stands to lose."⁶⁷ The court in *Gaffney v. Shell Oil Co.*⁶⁸ arrived at the same point, arguing that "[i]n the final analysis, the propriety of a class action—plaintiff, defendant or both—depends upon a finding that due process will be accorded the members of the class who are not before the court."⁶⁹ This Article argues in the next Part that courts' analysis of gain and loss should include not only unnamed parties, but also future potential parties with deterrence in mind.

Exceptions, such as the juridical links exception just discussed, are used by courts to address due process concerns.⁷⁰ Fairness, usually to

64. Miller, *supra* note 3, at 1387 (footnote omitted).

65. See *In re the Gap Stores Sec. Litig.*, 79 F.R.D. 283, 291 (N.D. Cal. 1978) ("[Parsons and Starr have] reviewed the use of defendant class actions in environmental litigation and . . . carefully explored the due process problems posed by defendant class adjudications" and have observed, "The basic constitutional dilemma of defendant class actions arises out of the due process rights of absent members of the defendant class. Fundamental to due process is the notion that the authoritative determination of a personal liability, obligation or right of a defendant requires the court's in personam jurisdiction over that party.") (quoting Parsons & Starr, *supra* note 3, at 888); see also Netto, *supra* note 4, at 105-06 ("[M]andatory class actions aggregating damages claims implicate the due process principle . . . [and] deep-rooted historic tradition that everyone should have his own day in court.") (quoting *Ortiz v. Fibreboard Corp.*, 527 U.S. 815, 846 (1999) (internal quotation marks omitted)). See generally Downs, *supra* note 17, at 627-30 (discussing due process in class actions).

66. 97 F.R.D. 668 (N.D. Ill. 1983).

67. *Id.* at 674 (citation omitted).

68. 312 N.E.2d 753 (Ill. App. Ct. 1974).

69. *Id.* at 991.

70. Scott Douglas Miller states:

A defendant class member would consent to representative adjudication only if he perceived, or might reasonably be expected to perceive, that the savings resulting from another party's representation would exceed any liabilities—monetary or otherwise—resulting from the representation. An absent defendant would only prefer representative action where he perceived himself as adequately represented. The perceived probability of loss would then be no greater in representative than in individual adjudication, but there would be a net savings of litigation costs. Only if the defendant class is juridically linked would absent members be so confident.

absentee defendants, is another way of discussing due process.⁷¹ These fairness concerns are rooted in the belief that we should treat class actions in the same way we would treat one-to-one litigation. Bassett argues that:

[T]here is no reason to believe that a court has the power to issue a binding judgment upon a defendant—even if that defendant is part of a defendant class—where that defendant has no nexus to the forum and her purported consent to suit is based on her failure to opt out of the class. Accordingly, there is no reason to treat members of a defendant class any differently than a defendant in a non-class lawsuit⁷²

Due process issues can be summarized in what one court has labeled the ‘Rubik Cube’ puzzle: “[E]ach plaintiff does not have a cause of action against each defendant.”⁷³ When faced with this situation, courts may be hesitant to certify the defendant class because they look backwards for pre-existing connections.⁷⁴ I argue that this view, articulated in different forms by most courts, fails to recognize the intra-group dynamics that a class device introduces. I therefore argue that in cases where there are sizeable enough informational and incentive benefits to be gained from classing a group of defendants, there is *every* reason to treat members of the class differently—although collectively the same—than we would treat them if they were a stand-alone defendant.

Miller, *supra* note 3, at 1399. Brandt, trying to reconcile defendant class actions with due process concerns, proposes a complicated measure:

In order to protect the due process rights of absent defendant class members, Rule 23 should be revised in two respects. First Rule 23 should ensure that absent defendants will not be bound by a class judgment unless they receive actual notice of the pendency of the action. This protection should be extended so that it applies not only to actions under 23(b)(3) but also to defendant class actions maintained under 23(b)(1) and 23(b)(2).

Brandt, *supra* note 3, at 944–45.

71. The Harvard Note, for instance, introduces the subject by arguing that defendant class actions should not be “purchased at the expense of fundamental unfairness to persons who are not before the court that binds them.” *The Harvard Note, supra* note 3, at 632.

72. Bassett, *supra* note 3, at 76. Bassett continues that this means “that minimum contacts with the forum state would be necessary in order to bind the defendant class member to the judgment, and if minimum contacts were not established, the class judgment would be unenforceable with respect to that defendant.” *Id.*

73. *Doss v. Long*, 93 F.R.D. 112, 119 (N.D. Ga. 1981). The Rubik Cube problem can be considered “in terms of standing, typicality, or commonality,” but underlying it is concern with due process. *Id.* at 120. The *Thillens* court noted the same thing: “There is great judicial reluctance to certify a defendant class *when the action is brought by a plaintiff class*. The primary concern with bilateral actions, antitrust or other types, is a fear that each plaintiff member has not been injured by each defendant member.” *Thillens, Inc. v. Cmty. Currency Exch. Ass’n of Ill., Inc.*, 97 F.R.D. 668, 675 (N.D. Ill. 1983).

74. In *LaMar v. H.B. Novelty & Loan Co.* in 1973, the Ninth Circuit considered the issue: “[W]hether a plaintiff having a cause of action against a single defendant can institute a class action against the single defendant and an unrelated group of defendants who have engaged in conduct closely similar to that of the single defendant on behalf of all those injured by all the defendants sought to be included in the defendant class.

489 F.2d 461, 462 (9th Cir. 1973).

II. DEVELOPING A GENERAL THEORY OF DEFENDANT CLASS ACTIONS

With the groundwork now laid, the Article picks up on its three central principles, and develops a general theory of defendant class actions.

A. Forward Looking Deterrence

To build a general theory of defendant class actions, a preliminary question about the purpose of tort law must be addressed. This Article, like Netto (2007), adopts the initial position taken by Fried and Rosenberg, that “tort liability should be seen as part of the imperfect and partial system serving the goals of compensation and deterrence.”⁷⁵ This approach follows a line of scholarship that focuses on maximization of social welfare as the goal of law generally, and of tort law specifically.⁷⁶ In the context of mass torts and collectivized adjudication, the Article follows Rosenberg’s (2002) premise that when government and first-party insurance are not adequate, a “need exists for ‘optimal tort deterrence’ to prevent unreasonable risk of accident and for ‘optimal tort insurance’ to cover residual reasonable risk.”⁷⁷ This position has not gone uncontested; scholars such as Richard Epstein and Richard Nagareda have criticized this approach in exchanges with Rosenberg and others.⁷⁸

The Fried and Rosenberg approach rests on an appreciation of the *ex ante* perspective.⁷⁹ The *ex ante* perspective is one which seeks to un-

75. FRIED & ROSENBERG, *supra* note 6, at 2. The authors discuss these three functions at length in Chapter 3, and justify them in Chapter 2. In addition to deterrence, Fried and Rosenberg identify “optimal insurance, and related appropriate redistribution of wealth” as goals of the tort system. *Id.* at 37. I consider redistribution and insurance issues in Part III.A.1.

76. See generally David Rosenberg, *Mandatory-Litigation Class Action: The Only Option For Mass Tort Cases*, 115 HARV. L. REV. 831 (2002) [hereinafter Rosenberg 2002]. Rosenberg relies on several works for “theories of deterrence, insurance, law enforcement, rational choice analysis, and welfare economics.” *Id.* at 831 n.1; see generally GUIDO CALABRESI, *THE COSTS OF ACCIDENTS: A LEGAL AND ECONOMIC ANALYSIS* (1970); A. MITCHELL POLINSKY, *AN INTRODUCTION TO LAW AND ECONOMICS* (2d ed. 1989); RICHARD A. POSNER, *ECONOMIC ANALYSIS OF LAW* (5th ed. 1998); STEVEN SHAVELL, *ECONOMIC ANALYSIS OF ACCIDENT LAW* (1987); Louis Kaplow & Steven Shavell, *Fairness Versus Welfare*, 114 HARV. L. REV. 961 (2001).

77. Rosenberg 2002, *supra* note 76, at 832.

78. See, e.g., Richard A. Epstein, *The Consolidation of Complex Litigation: A Critical Evaluation of the ALI Proposal*, 10 J.L. & COM. 1, 2–5, 49–50 (1990); Richard A. Epstein, *Class Actions: Aggregation, Amplification, and Distortion*, 2003 U. CHI. LEGAL F. 475 (2003) [hereinafter Epstein, *Class Actions*]; Richard A. Nagareda, *Autonomy, Peace, and Put Options in the Mass Tort Class Action*, 115 HARV. L. REV. 747 (2002). In criticizing Rosenberg’s position, Epstein argues that:

Even if we reject (as current law manifestly does) the view that *ex post* compensation is irrelevant, powerful implications still flow for the governance of class action litigation. This position presupposes that the judgment should be collective and not individual, such that a person who objected to the strategies pursued by the class would be required to remain a class member on the ground that the economies of scale in running the class action would leave him better off than before. There is obviously a powerful paternalistic streak in this argument.

Epstein, *Class Actions*, *supra* note 78, at 494. Because the larger debate has been carried out elsewhere, this article will not review it in detail here.

79. Aside from this paragraph’s brief discussion, this Article does not elaborate on the details of the Fried & Rosenberg framework. Those details can be found in Chapter 2 of their book. FRIED & ROSENBERG, *supra* note 6, at 13–36.

derstand an individual's preferences "under conditions of uncertainty, at a point in time before the person knows which of possible alternative fates will come to pass."⁸⁰ In this *ex ante* state, "each individual internalizes all possible fates of all possible people."⁸¹ Because the individual internalizes all possible states of the world, the individual rationally desires a legal system that maximizes welfare in all possible situations the individual may find himself. In a 2002 article, Rosenberg emphasized the importance of the *ex ante* perspective as central to the argument for mandatory class action for mass torts:

Essentially, this argument addresses the fundamental disjuncture between an individual's preferences *ex ante*—that is, before knowing whether one will suffer tortious injury, and if so, how strong the related claim will be—and *ex post*—after learning the "luck of the draw." Understanding how individual preferences change over time, particularly as individuals acquire knowledge, is central to the argument for mandatory mass tort class action.⁸²

In the context of defendant class actions, the starting point for an *ex ante* approach is recognizing that *ex ante*, an individual does not know whether he/she will be on the plaintiff or defendant side, or whether he/she will be part of a large firm or in a large class of individuals. Thus, in the *ex ante* world, a rational, social-utility maximizing individual would have no reason to favor either 'plaintiff' or 'defendant' classes. In the context of music downloading, for example, an individual does not know if they will be an RIAA employee, a musician, a downloader of copyrighted music, a non-downloading user of the Internet, or some other individual that might be affected by a class action against those who download copyrighted music. In the context of corporate fraud, an individual does not know if they will be on the corporate board, working in the corporation's mailroom, holding stock in the corporation, or purchasing services produced by the firm. In the context of mass copyright violation (e.g., hundreds of thousands of pirated DVDs being sold across the globe), one does not know where in the supply chain they will be located.

Hamdani and Klement's analysis fails to consider this *ex ante* position. As a result, Hamdani and Klement's core thesis does not plant its roots as deeply as it could. Hamdani and Klement's "core thesis is that the fundamental justification for consolidating plaintiff claims applies with equal force to defendants."⁸³ Their fundamental justification is, "[i]n the plaintiff case, the cost of bringing a suit might dissuade victims from suing wrongdoers . . . [and this] failure to litigate undermines justice and

80. *Id.* at 14.

81. *Id.* at 15.

82. Rosenberg 2002, *supra* note 76, at 831.

83. Hamdani & Klement, *supra* note 9, at 689.

deterrence.”⁸⁴ This fundamental justification, however, is not adequate. Justice and deterrence *may* be undermined if plaintiffs cannot bring their case, but it may also be that something other than a plaintiff class action will generate optimal deterrence for similarly-situated defendants. We need a more general theory to understand in what contexts the defendant class action is likely to be effective for achieving optimal deterrence.

The lack of a general theory is evident in Hamdani and Klement’s choice to ground their analysis in the “standard justification for class actions.”⁸⁵ The authors implicitly acknowledge their choice of the standard justification in a footnote. Citing the work of Rosenberg, they note, “The standard justification for class actions focuses on claims for insignificant amounts that would not be filed individually. However, that class actions are desirable even for larger claims as long as the common defendants enjoy economies of scale”⁸⁶ Beyond this citation, however, the authors do not discuss the Rosenberg position and why even large claim class actions may be desirable.

Nicole Johnson’s recent extension of the Hamdani and Klement argument also fails to adequately consider fundamental principles. Johnson “takes the Hamdani and Klement proposal a step further and suggests that the class defense has a more expansive applicability, not only for achieving economies of scale and overcoming collective action problems in litigation, but perhaps more importantly in obtaining settlements.”⁸⁷ The new settlement possibilities produced by aggregation of claims are important, but we need more general discussion of when such possibilities are likely to occur, and thus, when courts should look toward defendant class certification.

Nelson Netto has advanced the defendant class argument on the basis of Rosenberg and Fried’s theory of collectivizing claims. Netto argues that “the optimal economy of scale for investment in litigation requires the compulsory reunion of the defendants and their defenses.”⁸⁸ Similar in spirit to Netto’s argument, I start from the *ex ante* perspective and build a series of propositions about what defendant class actions should seek to do.

84. *Id.* at 689–90.

85. *Id.* at 689 n.14.

86. *Id.* The authors cite David Rosenberg, *Mandatory-Litigation Class Action: The Only Option for Mass Tort Cases*, 115 HARV. L. REV. 831 (2002).

87. Johnson, *supra* note 4, at 218. Additionally, Johnson notes:

In the recently settled suit between NTP and RIM, a consumer class defense would have allowed consumers, including large corporate firms that rely on BlackBerry devices for critical communication, to protect their interests and take action in their own defense. BlackBerry users might have obtained an earlier settlement or might have been assured that they could reach a settlement regardless of a standoff between the parties.

Id. at 224.

88. Netto, *supra* note 4, at 98.

In light of great uncertainty in the *ex ante* world, what can we say about individual preferences for design of a legal system? First, we can say that an individual will desire to maximize his utility “*across all possible states of the world.*”⁸⁹ Since an individual could end up either as defendant or plaintiff, this leads to the corollary that in the context of class actions, the individual will seek to maximize utility by maximizing *total utility of defendant and plaintiff*. In the case of traditional plaintiff class actions, this means that we are not only concerned with the reduction in harm to the plaintiff class, but also the *cost of reducing harm* as paid by the defendant. In the case of defendant class actions, the same logic is applicable; we should consider not only the harm/risk-reduction to the plaintiff, but also the cost of precautions to the defendant class.⁹⁰

Second, we can say that defendant class actions should be considered in light of their future deterrent effect. I label this “forward looking” in order to distinguish it from jurisprudence and commentary that looks “backward” at pre-existing links between potential defendant class members. My position can also be seen, however, as going “all the way back” to the *ex ante* position. Regardless of which conception one uses—forward looking or a return to the *ex ante* world—the important point for defendant class actions is that we are not concerned primarily with *existing or previous* relationships between individuals/firms, but rather with the *likely future relationships between similarly situated individuals/firms that will result from a particular legal ruling.*⁹¹

A corollary of this second point is that courts should ask the following question: Will classing this group of individuals/firms be more effective for optimal deterrence than would the alternatives of individual proceedings or joining under Rule 20 of the Federal Rules of Civil Procedure? If the answer is “yes,” then the court should certify the defendant class. If the answer is “no,” then the court should deny certification.

By posing the question this way, the analysis invites a comparison to joinder. Rule 20 of the Federal Rules of Civil Procedure says that defendants can be joined if “any right to relief is asserted against them jointly, severally, or in the alternative with respect to or arising out of the same transaction, occurrence, or series of transactions or occurrences; and any question of law or fact common to all defendants will arise in the action.”⁹² Courts look to the number of defendants to determine whether

89. FRIED & ROSENBERG, *supra* note 6, at 17 (emphasis added).

90. In principle, this bears some resemblance to Learned Hand’s famous negligence calculus: finding someone negligent when $B < PL$, where B = the “burden of precautions,” P is the “probability of harm” and L is the “gravity of harm.” Both formulas emphasize a type of cost-benefit analysis.

91. Current or previous relationships between individuals and firms would be important to the extent that they help us predict what would happen in the future. But, they should not be, in and of themselves, the standard for evaluating a defendant class.

92. FED. R. CIV. P. 20(a)(2)(A)–(B).

joinder is impracticable.⁹³ Presently, if the number of defendants is greater than forty, then joinder will generally be presumed to be impracticable.⁹⁴ Courts often look to class devices as an alternative if joinder is not possible.⁹⁵ As the U.S. District Court reasoned in *Flying Tiger Line, Inc. v. Central States*,⁹⁶ “[b]efore the Court takes the drastic step of certifying a defendant class; however, the joinder alternative should be investigated more thoroughly.”⁹⁷ While courts have made the focus of their joinder analysis the number of defendants, I argue in the next section that we should compare the two options on the basis not only of numerosity, but also on the basis of more general group dynamics.⁹⁸

My proposed approach also makes clear that the defendant class action is not necessarily—as seems to be suggested by Hamdani and Klement—a device to go after the “little guy.”⁹⁹ In deciding whether or not to class the corporate executives of a failed financial firm, for instance, the approach advocated in this Article might well lead to the conclusion that they too should be classed. The reason would *not* be that they are too numerous or incapable of being joined under other rules, but rather that treating them as a class would better deter similarly-positioned executives in the future. If the executives know they will sink or swim as a class, then they have greater incentive to internally check up on one another. This would create a mechanism of self-governance that should improve deterrence. Forward-looking deterrence is not concerned with parceling out causation within the group. Critics might argue at this point that such an approach will fail to make the proper causal connections between harm-causing parties’ actions and sanctions. To see why this will not be the case, we need to consider the second guiding principle, which is dynamic effects.

93. See *Monaco v. Stone*, 187 F.R.D. 50, 64 (E.D.N.Y. 1999).

94. *Id.* at 66 (“[A] class of more than forty members raises a presumption that joinder is impracticable.”).

95. *Stewart v. Abraham*, 275 F.3d 220, 226 (3d Cir. 2001) (citing FED R. CIV. P. 23(a)).

96. No. 86-304 CMW, 1986 U.S. Dist. LEXIS 17409 (D. Del. Nov. 20, 1986).

97. *Id.* at *16.

98. This distinguishes my analysis from *Netto*, who writes that “[t]he defendant class action, certified on behalf of the defendant requirement, is superior to mandatory joinder, because mandatory joinder is impractical when the number of defendants is extent and a defendant class action does not need any drastic modification of actual statutes.” *Netto*, *supra* note 4, at 105 n.186 (citing Charles Silver, *Comparing Class Action and Consolidations*, 10 REV. LITIG. 495 (1991) and Edward Hsieh, Note, *Mandatory Joinder: An Indirect Method for Improving Patent Quality*, 77 S. CAL. L. REV. 683 (2004)).

99. While not explicit on this point, the tone of Hamdani & Klement’s article is that small, dispersed defendants need a device to help them fight a potentially over-bearing plaintiff. The language of their article is not neutral in this respect. For instance, in building what seems to the specter of groups like the RIAA, the authors write that “[m]ost alarmingly, plaintiffs can act strategically to exacerbate the problem confronting each defendant, further diminishing the incentives to go to trial.” Hamdani & Klement, *supra* note 9, at 698.

B. Dynamic Effects

The principle of dynamic effects holds that we should consider all likely effects of the court's legal ruling. In the context of defendant class actions, this means that we should pay particularly close attention to the *group dynamics* that would operate if a court decided to class a group of defendant individuals/firms. One of the most important, but overlooked, dynamic effects of the class device is the creation of a new market for information generation. Drawing on the work of Michael Abramowicz, who has reviewed and made the normative case for integrating market mechanisms into legal proceedings, this section focuses on how incentive structures change when individuals are made members of a class.¹⁰⁰

1. Group Dynamics

In determining whether it is marginally beneficial to class a group of individuals/firms as a defendant class, we have to know what the "baseline" group dynamics are; i.e., if the court did nothing to class the defendants, how would they likely act in the face of individual lawsuits? Up to this point in the Article, the proposed theory has laid out only similarities between plaintiff and defendant class actions. This is consistent with the argument that at a conceptual level, there is little to distinguish plaintiff and defendant classes. In contrast to the conceptual and theoretical similarities, however, at the level of group dynamics, defendant and plaintiff class actions have markedly different baselines. Specifically, I argue that individual plaintiffs are (without any judicial intervention) less likely than individual defendants to establish a "market relationship" with others in their group.

I define "market relationship" as broadly as possible. I take market relationship to mean any sort of relationship in which individuals/firms act (or react) either directly or indirectly in response to actions (or reactions) by other individuals/firms. This concept of market relationship considers not only traditional market elements such as collective action and price adjustments, but also social psychological elements such as herd mentality and the fundamental attribution error (where we fail to recognize the effects of situation in determining human behavior). It also emphasizes the ability of the market to produce information, and most importantly, information on relative contributions to harm by defendants or relative harm experienced by plaintiffs.

Defendant class actions have been promoted in the past few years as a solution to dispersed defendants each generating a small amount of damage through new technological means. Netto argues, for instance, in favor of mandatory defendant class actions as a response to mass produc-

100. See generally Michael Abramowicz, *The Law-and-Markets Movement*, 49 AM. U. L. REV. 327, 408-30 (1999).

tion and a "technologically savvy society with the propensity for massive unlawful behavior."¹⁰¹ While defendant class actions may be useful in this context, it is important not to view the defendant class device narrowly as only a response to technological innovation. A defendant class may be useful more generally as an auction-like mechanism to produce information about relative contributions to harm.

Auction mechanisms are already used in a variety of legal contexts.¹⁰² Auctions and exchange can serve important informational purposes. For instance, if plaintiffs are allowed to sell their claims to bidders, "[t]he price at which such shares trade in the secondary market provides an indication of the plaintiff's expected recovery at trial and thus may dampen parties' abilities to puff in pretrial settlement bargaining."¹⁰³ In the context of patent buy-outs, Michael Kremer has proposed that an auction be used to determine the value of the patent.¹⁰⁴ Applying similar reasoning to defendant class actions, the class action device may be useful as a means of generating information about relative harms.¹⁰⁵ That information can then be used for settlement purposes.

To illustrate how this information production might play out, consider a simple case in which two firms, A and B, are both defendants in a case where negligence has caused 100 units of damage. The plaintiff firm knows that it experienced damage of 100, but it does not know that Firm A caused thirty percent of the damage and Firm B is responsible for seventy percent of the damage. To see how collectivization can be useful even with just two firms as defendants, examine the pay-off matrices with and without the defendant class device that are presented in Table 2.

Without knowing relative contributions to harm, and without joint and several liability, Firm B will have an incentive in the settlement stage to settle for fifty percent of the damage because Firm B knows that if it goes to trial, it will be shown liable for seventy percent of the harm. Firm A, however, faces a different incentive structure. Firm A would rather litigate than settle for 50 because litigation will lead to liability for only 30 units of the harm. If Firm A and Firm B are treated separately, then the plaintiff (who we assume here knows nothing of the actual relative contributions) will likely settle with Firm B and proceed to litigate

101. Netto, *supra* note 4, at 59.

102. See generally Abramowicz, *supra* note 100, at 335-52. Over twenty years ago, Marc Shukaitis proposed a market for personal injury tort claims. Marc J. Shukaitis, *A Market in Personal Injury Tort Claims*, 16 J. LEGAL STUD. 329, 329-30 (1987).

103. Abramowicz, *supra* note 100, at 359-60.

104. Michael Kremer, *Patent Buyouts: A Mechanism for Encouraging Innovation*, 113 Q.J. ECON. 1137, 1146-47 (1998).

105. The informational benefits of defendant class actions were recognized by the Ohio Supreme Court in 1990, which noted that "[a] class suit may be especially useful in a case where putative class members refuse to identify themselves or deliberately act to avoid being controlled in law." *Planned Parenthood Ass'n of Cincinnati, Inc. v. Project Jericho*, 556 N.E.2d 157, 164 (Ohio 1990).

with Firm A. The non-class result, shaded in gray in Table 2, is thus a transfer of 80 from the two firms to plaintiff.

Now consider what happens if the two firms are considered a single class, held jointly and severally liable for the damage. Knowing that they face a total payout of 100 if they litigate or settle, the choice will be to settle. But now in the settlement stage, Firm A has an incentive to make clear its contribution to harm, either through proceedings against Firm B (more likely) or through negotiations with Firm B. Whichever route is taken, information will be generated about relative contributions to harm; information that would not have been generated in the world without class certification.

Table 2. Pay Off Matrices With and Without Defendant Class Action			
NO CLASS ACTION			
		<i>Firm A (30%)</i>	
		Litigates	Settles
<i>Firm B (70%)</i>	Litigates	-30, -70	-50, -70
	Settles	-30, -50	-50, -50
WITH DEFENDANT CLASS ACTION			
		<i>Defendant Class: A + B (100%)</i>	
		Litigates	Settles
		-100	-100

The 2 x 2 matrix is admittedly greatly over-simplified, but it suggests a general point that incentives *amongst the defendants* change when they are held liable *as a class*, and not just as individuals. For a group of N defendants, the N defendants in the class have an incentive to work out their proportional liability to the plaintiff. Of course, enforcement remains a challenge, and I will address that challenge in Part III of the paper on system design.

I should emphasize that my suggested approach does not always lead to defendant class action certification. Rather, it looks for the marginal value that the class device potentially offers. In cases where all defendants are jointly and severally liable, the class device will not significantly change the incentive structure already in place. A defendant class device may also not be useful if all defendants are already bound

through a single party. For instance, in *Gaunt v. Brown*,¹⁰⁶ the U.S. District Court correctly concluded that since the case was being brought against the Attorney General, there was not a need to certify a class of local boards of elections (in a case challenging the age requirement for elections).¹⁰⁷ In this case, since the entirety of the defendant class was bound by law to follow the Ohio Attorney General's directives, the marginal value of the class device was zero.¹⁰⁸

2. Comparing Defendant and Plaintiff Group Dynamics

I now consider a broader set of possible plaintiff and defendant dynamics. As a basis for discussion, Table 3 considers the possible combinations that might occur in a world where there are four types of groups: (1) single firms/individuals, (2) a single dominant firm/individual, (3) an intermediate number of firms/individuals, and (4) a large number of firms/individuals. I assume that each group could find themselves either on the plaintiff (harm bearing) or defendant (harm causing) side. This generates 16 scenarios to consider. I sketch out what I believe would be the "baseline" result; the likely result if there was no judicial certification of a class on either side. I then offer my suggested "class outcome." In other words, what would likely happen if the court decided to certify a defendant class, a plaintiff class, or both?

The table reinforces that our focus should be on the *difference between the baseline and class outcome* columns. This is the marginal value added by class certification. I have arranged the table so that every other row flips the defendant and plaintiff sides. To make the table easier to read, and to isolate the differences between defendant and plaintiff class actions, I have highlighted the rows where defendant class actions would be a possibility.

106. 341 F. Supp. 1187 (S.D. Ohio 1972).

107. *Id.* at 1193. The court argued:

We agree that if plaintiffs prevail this would be an appropriate case to designate as a plaintiff class action. However, we are not persuaded that it should be designated as a defendant class action if plaintiffs prevail, inasmuch as the Secretary of State of the State of Ohio is a party-defendant, and his duties are to advise members of local boards of elections as to proper methods of conducting elections. Also, the Secretary of State has the further duty to "compel the observance by election of officers in the several counties of the requirements of the election laws." Since the Secretary has the duty and power over all the members whom plaintiffs would have us include in a defendant class action, the need for a defendant class action is not apparent.

Id. at 1192-93 (citations omitted).

108. *See id.*

Table 3. Comparison of baseline and predicted class-outcomes for selected configurations of plaintiff and defendant groups

<u>No.</u>	<u>PLAINTIFF SIDE</u>	<u>DEFENDANT SIDE</u>	<u>BASELINE</u>	<u>CLASS OUTCOME</u>
	Who is suffering the harm/damage ?	Who is causing the harm/damage ?	With no judicial class certification, what do we expect to see?	What changes if the court classes defendants, plaintiffs, or both?
1	Single firm / individual	Single firm / individual	Traditional tort outcome: single party vs. single party	Optimal deterrence achieved at baseline; class certification provides no additional value
2	Single firm / individual	Dominant firm, controlling >50% market share	Case against the dominant firm, dominant firm will litigate fully	Optimal deterrence achieved at baseline; class certification provides no additional value
3	Dominant firm, controlling >50% market share	Single firm / individual	Dominant firm will prosecute fully, defendant the same	Optimal deterrence achieved at baseline; class certification provides no additional value
4	Single firm / individual	Intermediate number of firms, controlling <50% market share	Plaintiff will enjoy economies of scale; Defendants likely to bind together because they will be joined as named defendants (maybe conspiracy alleged), and will see benefits of collective defense	If court certifies defendant class action, optimal deterrence will be achieved; But even without court certification, defendants may bind together when they are sued

5	Intermediate number of firms, controlling <50% market share	Single firm / individual	If firms cannot overcome collective action problem, they will either drop the case, or will bring a case without enough resources to litigate fully; Defendant will be able to enjoy economies of scale	If court certifies plaintiff class action, optimal deterrence will be achieved ^a
6	Single firm / individual	Large number of firms / individuals, each controlling very small market share	If plaintiff cannot figure out who is causing the harm, may not be able to bring enough suits; Defendants, when sued, will not be able to match resources with the plaintiff ^b	If court certifies defendant class action, optimal deterrence achieved (so long as economic incentive issues are corrected for) ^b
7	Large number of firms / individuals, each controlling very small market share	Single firm / individual	Plaintiffs will not be able to overcome collective action problem (the traditional plaintiff class action); Defendant will enjoy economies of scale	If court certifies plaintiff class action, optimal deterrence will be achieved
8	Dominant firm, controlling >50% market share	Dominant firm, controlling >50% market share	Dominant firm on both sides should be able to kick their market into gear	Optimal deterrence achieved at baseline; class certification not necessary
9	Dominant firm, controlling >50% market share	Intermediate number of firms, controlling <50% market share	Dominant plaintiff has resources and incentive to bring suit; defendant firms	If court certifies defendant class action, optimal deterrence will be achieved; But

			will likely find it beneficial to work together as named defendants in the same suit	even without court certification, defendants may bind together when they are sued
10	Intermediate number of firms, controlling <50% market share	Dominant firm, controlling >50% market share	If firms cannot overcome collective action problem, they will either drop the case, or will bring a case without enough resources to litigate fully; Defendant firm will kick market into gear	If court certifies plaintiff class action, optimal deterrence will be achieved; but class certification may not be necessary
11	Dominant firm, controlling >50% market share	Large number of firms / individuals, each controlling very small market share	If plaintiff cannot figure out who is causing the harm, may not be able to bring enough suits; Defendants, when sued, will not be able to match resources with the plaintiff ^b	If court certifies defendant class action, optimal deterrence achieved (so long as economic incentive issues are corrected for) ^b
12	Large number of firms / individuals, each controlling very small market share	Dominant firm, controlling >50% market share	Plaintiffs will not be able to overcome collective action problem (the traditional plaintiff class action); Defendant will be able to defend itself and generate informational market	If court certifies plaintiff class action, optimal deterrence will be achieved

13	Intermediate number of firms, controlling <50% market share	Intermediate number of firms, controlling <50% market share	Indeterminate. Both sides may face collective action problems, but both have a chance to overcome them.	Class action certification, on either side, will promote optimal deterrence if collective action problems are serious.
14	Intermediate number of firms, controlling <50% market share	Large number of firms / individuals, each controlling very small market share	Large number of defendants makes it more difficult for plaintiffs to overcome collective action problems	Certification of both defendant and plaintiff classes may lead to optimal deterrence
15	Large number of firms / individuals, each controlling very small market share	Intermediate number of firms, controlling <50% market share	Plaintiffs are not likely to overcome collective action problems	Certification of plaintiff class would promote optimal deterrence; Defendants may need class certification as well
16	Large number of firms / individuals, each controlling very small market share	Large number of firms / individuals, each controlling very small market share	Neither side will be able to overcome collective action problems	Certification of both classes is required to obtain optimal deterrence

NOTES: a. See Rosenberg (2000), *supra* note 32. b. See Hamdani & Klement (2005), *supra* note 6.

Perhaps the most interesting (and contentious) action in Table 3 occurs when we compare rows 4-5 and rows 9-10. In each case, we are flipping the “intermediate” number of firms from the defendant to the plaintiff side. The crux of my argument is that it is more likely for this mid-size group to overcome collective action problems when they are on the defendant side. The reason for this logic is straightforward; on the defendant side, parties do not have to initiate the proceedings. In fact, if the plaintiffs name them all as defendants in a suit, they have had much of the informational work of identification done for them. To the extent that this happens, defendants already take concerted actions when sued by a plaintiff. The court’s class certification would be functionally redundant, and the marginal value of class certification would be minimal.

Defendant class actions are likely to have more value when defendants are less capable of somehow binding themselves together. This failure is most likely to happen in two scenarios: (1) when identification and monitoring is not possible or practical, or (2) when enforcement of group “rules” is not possible or practical. Both challenges open the door for significant free riding. In Section III, on system design, I consider both of these issues and possible legal remedies to correct for them.

3. A Closer Look at What Binds Individuals in a Potential Defendant Class

Another way to think about the difference between plaintiff and defendant class actions is to see that in the plaintiff class action case, the individual plaintiffs are passive harm-takers. In the defendant class action cases, the individual defendants are active harm-makers. This distinction leads to important differences between plaintiff and defendant classes in terms of the *ex ante* market relationships that may develop. Three types of relationships are likely to exist between individual defendants: (1) they are all conducting market transactions with a single (or small set of closely related) firms; (2) they are all legally bound in a government organization; (3) they are all voluntarily bound in an organization of their own making. In the first case, adjustments can be made via price levels. In the second and third cases, contracting can be worked out through the governing organizations. It is only when none of these relationships exist that we see a need for defendant class actions.

What distinguishes the harm caused by small defendants, as opposed to the harm caused by large firm defendants, is the indirect nature of the small defendants’ action. In almost every case where defendant class actions seem apt, there is a “market” intermediary. For instance, in the context of securities fraud, the defendant security underwriters were not hired by individual plaintiffs, but were working through some firm. In the context of other corporate fraud, middle managers and others in the firm who acted wrongly were all bound via contract to the same employer. In the context of state/local officials, they are causing harm by virtue of their role within the state government/legal system. In the context of music downloading, individuals are working with the help of several intermediaries: their Internet Service Provider, their software maker, etc.

To make this argument clearer, consider these two contrasting hypotheticals. First, consider a standard plaintiff class action in which a firm has a poorly constructed factory, which sits on the corner of a busy intersection. Everyday bricks fall off the building and cause damage to passing cars. Because the damage is always minor, the cars never stop, and no potential plaintiff ever brings a case. A plaintiff class action would be necessary here because there is likely no *ex ante* market relationship between those who have been harmed. They were each harmed

directly by the firm, with no intermediary; the brick fell directly on their car.

Now consider a second hypothetical. A big firm has an old factory that they no longer use. The factory, however, has bricks that are very valuable if taken and re-sold. Imagine that individuals go up to this factory and remove one brick at a time. No single person takes more than one brick. Setting aside, for now, the question of what precautions the firm could take to stop this, let's consider the relationship between these individual brick-stealers. It could be that each brick-stealer randomly wandered up to the factory, in the same way that the car drivers randomly drove past the brick-drop intersection. But it is more plausible that the brick-stealers share common traits; common traits that make them more likely to belong to one of the three types of *ex ante* markets laid out above. In this case, they are probably all selling their bricks on similar markets. They could also belong to a brick collector's society.¹⁰⁹

When relationships such as these exist between defendants, the defendant firm can find convenient entry points for litigation. It need not necessarily resort to a defendant class action because it can go after the agency, organization, or other binding agent between the defendants. For example, when authors and publishers of the American Society of Composers tried to move against the Girl Scouts for copyright infringement—for singing copyrighted songs around the campfire—the plaintiff authors and publishers did not have to go after thousands of young Girl Scout members nationwide.¹¹⁰ Instead, the plaintiffs went directly to the national organization that binds the girl scouts together.¹¹¹ The push toward potentially making Internet Service Providers (“ISPs”) liable in illegal music downloading can be understood in a similar vein.¹¹²

C. Aggregate Analysis

The aggregate analysis principle adds an extra layer to both the forward-looking deterrence and the dynamic effects principles. The aggregate analysis principle holds that we should look at deterrence and dynamic effects *at an aggregate, system-wide level*. In this section I will show how the analysts discussing both the Internet and corporate fraud examples have missed this aggregate picture.

109. The hard case, a version of which I consider in the system design section, would be if they each found the brick valuable for some reason that didn't require re-sale, e.g., as a mantle piece.

110. See Ken Ringle, *ASCAP Changes its Tune; Never Intended to Collect Fees for Scouts' Campfire Songs*, *Group Says*, WASH. POST, Aug. 28, 1996, at C03.

111. See *id.*

112. See, for example, *In re Aimster Copyright Litig.*, 334 F.3d 643, 652 (7th Cir. 2003), where Judge Posner upheld the grant of a preliminary injunction against a website that provided file-sharing services that were ultimately used for violation of federal copyright law by individual members of the public.

1. Cost Benefit Considerations

At the outset, a distinction should be made between (1) an overall cost-benefit valuation; i.e., do we want to reduce the activity or care levels of downloading of copyrighted material? And, (2) a comparison of the cost of precautions versus the benefit of harm reduction associated with that precaution. Conflating these two distinct evaluations may lead to some confusion. To make each stage clear, I will label the first cost-benefit analysis process “valuation” and the second (applying the Fried/Rosenberg framework), “determining optimal precautions.”

In both stages, an aggregate perspective is important. At the valuation stage, aggregation means we must determine overall how much utility is being lost, and how much utility is being gained from a particular activity which individuals or firms are engaging in. Class actions factor into this analysis in a preliminary way; it is more likely that we will have aggregate analysis when there is a class action than when there is not. The reason is that courts will have to consider welfare/utility across *all* members of the class, not just the ones listed on the court documents as representatives. When adjudicating, courts will weigh both sides at the aggregate level.

2. Aggregate Analysis of Internet Governance

When discussions of Internet governance are raised, popular (and to a large extent academic) discussion has focused on illegal file sharing.¹¹³ Jonathan Zittrain argues that such a narrow focus is greatly misguided: “Current scholarship about ‘Internet governance’ largely fails to appreciate this larger picture, rendering most of its deliberations absurdly narrow, with public policy recommendations that have a near-uselessly short shelf life”¹¹⁴ Zittrain is announcing an aggregate analysis principle, suggesting that analysts should be considering more than simply the issue immediately before them.

The aggregate analysis principle has great bite in the Internet context because of the Internet’s great “generativity.” Zittrain defines “generativity” as a function of (1) how deeply a technology leverages a set of possible tasks; (2) its “adaptability to a range of different tasks”; (3) its “ease of mastery”; and (4) its “accessibility.”¹¹⁵ The Internet provides a

113. For a summary of this literature, see generally JONATHAN ZITTRAIN, *THE FUTURE OF THE INTERNET AND HOW TO STOP IT* (2008). The three cases in this area cited most often are: *MGM Studios Inc. v. Grokster, Ltd.*, 545 U.S. 913 (2005); *Aimster*, 334 F.3d 634; *A&M Records, Inc. v. Napster, Inc.*, 239 F.3d 1004 (9th Cir. 2001).

114. Jonathan Zittrain, *The Future of the Internet—And How to Save It* 30 (Feb. 2005) (unpublished manuscript) (on file with the Denver University Law Review) (draft version 1.6 of the Zittrain’s book published in 2008).

115. *Id.* at 1981.

new “generative grid” whose potential is still being realized.¹¹⁶ What does talk of a generative grid, or of the Internet so generally, mean for defendant class actions? It means that our analysis of defendant class actions in the Internet context cannot rest solely on the costs of file-sharing. Rather, it must also consider how file sharing may contribute to generative goods.

Hamdani and Klement provide an example of analysis that stops short. They introduce considerations of overall social welfare in their analysis of a proposed class defense mechanism, but do not carry out an aggregate analysis. In considering a hypothetical lawsuit from the RIAA against an individual, for instance, Hamdani and Klement detail how an individual’s incentive will be to settle for \$3,000, even when they have done nothing illegal.¹¹⁷ They argue, correctly, that “the ex post settlement decisions of defendants impact the ex ante decisions of other Internet users” whether to download music.¹¹⁸ But it does not necessarily follow, as they argue in the next sentence, that “[w]hen defendants settle even when they may have a good defense, there is a considerable risk of excessively deterring music downloads by . . . Internet users.”¹¹⁹ The reason it does not necessarily follow is that optimal deterrence must be determined at an aggregate level. In other words, we may want to deter perfectly legitimate uses of file-sharing (and therefore make some innocents pay \$3,000) if we believe that it will benefit society overall (by keeping the bad guys out of the game). By the same logic, we may want to allow illegal file-sharing by some crooks, if we believe that it will benefit society overall (by letting the good guys stay in the game).

This Article takes no substantive position on what the legal rule should be about file sharing; i.e., whether we should hold Internet Service Providers (ISPs) liable, or whether the Digital Millennium Copyright Act (“DMCA”) properly assigns liability.¹²⁰ This Article does, however,

116. The generative grid phrase is Zittrain’s. *See id.* at 1975. Scholarship is emerging to try and assess the myriad of effects the Internet has had on our lives. *See, e.g.,* Eugene Borgida & Emily N. Stark, *New Media and Politics: Some Insights From Social and Political Psychology*, 48 AM. BEHAV. SCIENTIST 467, 467 (2004) (investigating “the extent to which the Internet is providing . . . an important and increasingly influential forum for acquiring politically relevant information”).

117. Hamdani & Klement, *supra* note 9, at 701. The reason is that they face a decision between settling for \$3,000 or going through a lawsuit for \$50,000 just to avoid payment.

118. *Id.*

119. *Id.*

120. The DMCA was signed into law in 1998, and among other things, holds ISPs liable for their users’ illegal actions if the ISPs do not follow guidelines laid out by the Act (e.g. removing offensive material, reporting violations, etc.). *See* 17 U.S.C. § 1201 (2006). I also take no view here as to whether it is in the Record Company’s best long term interest to prosecute file-swappers. Some have suggested that alternative strategies may be better suited:

Coverage of the lawsuits could hurt as much as help the anti-piracy crusade. Anthony Prapkanis, a University of California-Santa Cruz professor of social psychology, says that while people may be sympathetic to the music industry’s plight, “the image is out there of the bully ganging up on people with the least amount of money, the rich taking from the poor.”

Jefferson Graham, *RIAA Lawsuits Bring Consternation, Chaos*, USA TODAY, Sept. 10, 2003, at 4D.

argue that we should assess the DMCA, and related decisions such as *In re Aimster Copyright Litigation*,¹²¹ *A&M Records, Inc. v. Napster, Inc.*,¹²² and *MGM Studios Inc. v. Grokster, Ltd.*,¹²³ under the aggregate analysis principle. At a minimum, this will involve incorporation of several strands of literature such as economic analysis of the effects of individuals' copyright infringement,¹²⁴ as well as analysis of actual usage of a file-sharing program, especially estimates of usage for illegal versus legal purposes.¹²⁵ More importantly, such aggregate analysis also demands that courts take seriously the technological aspects of the cases they are dealing with. In the context of file-sharing, for instance, the future is not in limiting the ability to trade, but in limiting the ability to play, via Digital Rights Management ("DRM").¹²⁶ Mark Stefik has observed that despite the fact that "[e]veryday experience with computers has led many to believe that anything digital is ripe for copying . . . [b]ehind the scenes . . . technology is altering the balance once again."¹²⁷

121. 334 F.3d 643 (7th Cir. 2003).

122. 239 F.3d 1004 (9th Cir. 2001).

123. 545 U.S. 913 (2005).

124. In the context of music file-sharing, there remains an empirical debate over the effect of illegal file sharing on music sales. See, e.g., Kai-Lung Hui & Ivan Png, *Piracy and the Legitimate Demand for Recorded Music*, 2 CONTRIBUTIONS TO ECON. ANALYSIS & POL'Y (2003), available at <http://www.bepress.com/bejeap/contributions/vol2/iss1/art11/> ("[T]he demand for music CDs decreased with piracy, suggesting that 'theft' outweighed the 'positive' effects of piracy. However, the impact of piracy on CD sales was considerably less than estimated by industry."); Stan J. Liebowitz, *File-Sharing: Creative Destruction or Just Plain Destruction?* 32 (Ctr. for the Analysis of Prop. Rights, Working Paper No. 04-03, 2004), available at <http://som.utdallas.edu/centers/capri/documents/destruction.pdf> (finding that the evidence seems compelling that file-sharing is responsible for the recent large decline in CD sales for which it has been blamed); Felix Oberholzer & Koleman Strumpf, *The Effect of File Sharing on Record Sales: An Empirical Analysis* (Mar. 2004), available at http://www.unc.edu/~cigar/papers/FileSharing_March2004.pdf (unpublished working paper) ("Downloads have an effect on sales which is statistically indistinguishable from zero, despite rather precise estimates. [But], these estimates are of moderate economic significance and are inconsistent with claims that file sharing is the primary reason for the recent decline in music sales."); Rafael Rob & Joel Waldfogel, *Piracy on the High C's: Music Downloading, Sales Displacement, and Social Welfare in a Sample of College Students* (Nat'l Bureau of Econ. Research, Working Paper No. 10874, Oct. 2004), available at <http://www.nber.org/papers/w10874.pdf> ("[D]ownloading reduces their per capita expenditure (on hit albums released 1999-2003) from \$126 to \$100 but raises per capita consumer welfare by \$70."); Alejandro Zentner, *Measuring the Effect of Online Music Piracy on Music Sales* (2004), available at <http://economics.uchicago.edu/download/musicindustryoct12.pdf> (unpublished working paper) (finding that peer-to-peer usage reduces the probability of buying music by an average of 30 percent, and that without file sharing, sales in 2002 would have been around 7.8 percent higher).

125. Some evidence from Russia suggests that even amongst young people, use of the Internet for illegal file-sharing is not a common activity. Oxana Paless, Kasey Saltzman & Cheryl Koopman, *Internet Use and Attitudes Towards Illicit Internet Use Behavior in a Sample of Russian College Students*, 7 CYBERPSYCHOL. & BEHAV. 553, 553 (2004) ("Among Internet users, most reported having Internet access either at home or at a friends' home, and 16 % reported having Internet access from work, school, or a computer center. Among Internet users, the main purpose was for school-related activities (60%), followed by e-mail (55%), entertainment (50%), chatting (24%), and searching for pornography (6%).").

126. For an introduction, see ROB FRIEDEN & CHRISTY CARPENTER, *DIGITAL RIGHTS MANAGEMENT* 2, 6 (2004).

127. Mark Stefik, *Trusted Systems*, SCI. AM., Mar. 1997, at 78, 78.

If courts are not aware, or deliberately choose to avoid discussion of what's going on "behind the scenes," then their rulings and analyses are not only likely to be out-dated, but also could be seriously flawed. For instance, what if DRM technology had already advanced to a stage where recording artists could protect (with great assurance) everything they wanted to, but courts (unaware of this development) went ahead with a legal regime that severely limited file sharing? The result would be over-deterrence. On the other hand, if courts errantly believed that DRM had reached a point where the state-of-the-art was to produce files incapable of being pirated (when in fact this was not the case), they would under-deter file-swapping. The substantive analysis is beyond the scope of this Article, but I have aimed to demonstrate that if courts do not take technological considerations into account, they violate the aggregate analysis principle, and likely produce sub-optimal outcomes as a result.

3. Aggregate Analysis of Corporate Wrongdoing

At first glance, the high-profile corporate wrongdoing over the past few years may seem an odd place to think about defendant class actions. The defendants are not numerous, hard to identify, or judgment proof. Why, then, should we consider defendant class actions a potentially useful tool? The answer, as it did in the Internet context, centers on the realization that there is something more going on here than simply the actions of the named defendants. In the Internet case, that "something more" is more readily identifiable: complex and changing technologies are clearly tied into the cases at bar. In the corporate fraud cases, the "something more" is subtler.

Drawing on social psychology and research on the corporate environment, the "something more" that a defendant class action can aim its reach at is the "situation" or "corporate climate" that may contribute mightily to fraud and wrongdoing.¹²⁸ There is a longstanding consensus amongst social psychologists that we commit a "fundamental attribution error" in attributing actions to individual choices, rather than to situational pressures. As articulated by Phillip Zimbardo and Michael Leippe, "we tend to look for the person in the situation more than we search for the situation that makes the person."¹²⁹ The value of a defendant class action is that it has the potential to get at the "situation" because it will implicate virtually everyone working in the office.

128. See Jon Hanson & David Yosifon, *The Situation: An Introduction To The Situational Character, Critical Realism, Power Economics, And Deep Capture*, 152 U. PA. L. REV. 129, 201, 221-30 (2003) (providing an introduction to social psychology literature in the corporate law context); see also Christopher W. Williams, Paul R. Lees-Haley & J. Randall Price, *The Role of Counterfactual Thinking and Causal Attribution in Accident-Related Judgments*, 26 J. APPLIED SOC. PSYCHOL. 2100, 2109-10 (1996) (providing an introduction to the implications of the attribution theory in the legal arena).

129. PHILIP G. ZIMBARDO & MICHAEL LEIPPE, *THE PSYCHOLOGY OF ATTITUDE CHANGE AND SOCIAL INFLUENCE* 93 (1991).

Research and expert commentary on the corporate environment suggests that situational pressures to commit wrongs are indeed intense. When he talked about the “numbers game” that corporate executives sometimes play, former SEC chairman Arthur Levitt suggested “that almost everyone in the financial community shares responsibility . . . [and] [c]orporate management isn’t operating in a vacuum. In fact, the different pressures and expectations placed by, and on, various participants in the financial community appear to be almost self-perpetuating.”¹³⁰ One of the most comprehensive studies of moral action in the workplace is Robert Jackall’s study, *Moral Mazes*.¹³¹ Jackall engaged in extensive case studies of two firms, and found that most middle managers would sacrifice their own morals in order to fit in: “Team play also means . . . ‘aligning oneself with the dominant ideology of the moment,’ or . . . ‘bowing to whichever god currently holds sway.’”¹³²

If it is the case that it is not just a few top executives that are contributing to the harm caused by the firm, then a legal regime which points liability solely toward those CEOs is not likely to achieve optimal deterrence. Consider *Federal Insurance Co. v. Tyco International Ltd.*,¹³³ where separate actions were brought against former Tyco CEO Dennis Kozlowski, former chief lawyer Mark Belnick, and former CFO Mark Swartz.¹³⁴ From a deterrence perspective, members of society (and most especially Tyco shareholders) did not care who actually cooked the books. What society wants is for this sort of firm behavior not to happen again in the future, by Tyco, or by any other firm. In order to achieve that deterrence objective, we must have an understanding of the causal factors for the fraud. To the extent that it was not just a few “bad apples,” but instead is in part driven systematically by certain kinds of corporate cultures, we want a legal device that can possibly change those cultures. A defendant class action might do that. In operation, if future members of a firm knew that they could be held liable (as a defendant class member) for any harm caused by the firm, it seems more likely that they would stand up to their bosses when asked to do illegal tasks.

4. Additional Comments on Aggregate Analysis

In response to likely concerns, two additional comments should be made in regards to aggregate analysis. First, is aggregate analysis too much for the courts to handle? I believe not, as courts (themselves and in conjunction with administrative agencies) already engage in substantial,

130. Arthur Levitt, Chairman, Sec. & Exch. Comm’n, Remarks at the New York University Center for Law and Business (Sept. 28, 1998).

131. SIMON JACKALL, *MORAL MAZES: THE WORLD OF CORPORATE MANAGERS* (1988).

132. *Id.* at 52.

133. 422 F. Supp. 2d 357 (S.D.N.Y. 2006).

134. *Id.* at 360.

aggregate cost-benefit analysis.¹³⁵ It can also be said that even if courts at present are not well-equipped to handle these sorts of analyses, there may be other parts of the system that courts can out-source to carry out the analysis. The Government Accountability Office (“GAO”) frequently engages in these sorts of analyses.

My final comment is one that bends in a normative direction. When taken together as a pair, the Internet and corporate fraud examples make it clear that defendant class actions are not designed to go after a particular kind of group, i.e., “the little guy” or the “big, bad corporation.” Rather, the defendant class action is a neutral tool that can be employed whenever it is needed to kick-start informational markets into gear.

III. SYSTEM DESIGN

This section of the paper identifies the major challenges courts face in implementing defendant class actions. Although the challenges are significant, I build on the proposals made by Netto and put forth a number of system design elements which may make defendant class actions more feasible and more capable of achieving the objective of optimal deterrence.

In addition to the Internet and corporate fraud examples which I have already discussed, this section will also address a third, more difficult, type of case: the case where there are defendants who appear to have no connection to each other. To make this hard case concrete, let’s consider the following scenario. One-hundred thousand individuals across the world illegally sneak a camera into their local movie theatre and digitally record a blockbuster movie. They then show this digital movie to their friends and family, who consequently do not pay for either movie admission or for the DVD when it is released. This is a case where there is no discernible “market” relationship between any of the defendants. Note that it is not the size of the class that matters, but the relationship between them. There could be one million illegal tapers of the movie, but if they all acted independently there would still be no easy way to tie them together as a class. As I proceed with my discussion of system design, I will return to this hard case and how the general theory of defendant class actions should be applied to it.

A. Preliminary Considerations

A discussion of defendant class action implementation must begin with a discussion of principles. In this Section I lay out several funda-

135. See Robert W. Hahn, *Policy Watch: Government Analysis of the Benefits and Costs of Regulation*, 12 J. ECON. PERSP. 201, 201–10 (1998) (discussing the cost-benefit analysis in the government context); see also David Whiteman, *The Fate of Policy Analysis in Congressional Decision Making: Three Types of Use in Committees*, 38 W. POL. Q. 294, 297 (1985) (discussing aggregate principles used in the legislative decision-making process).

mental functions of tort law that the defendant class action must serve. To be sure, these are not the only functions of tort law. Nevertheless, they serve as a useful starting point for constructing, from the bottom up, a system in which the defendant class action can play a central role.

1. Insurance and Redistributive Functions of Tort Law

The tort system serves an insurance and redistributive function as well as a deterrence function.¹³⁶ In the context of defendant class actions, if the harm to the plaintiff can be identified, it does not seem that having a large number of small harms (as opposed to a single large harm) should affect insurance availability or premiums. If there were a market for these insurance claims, this situation might be different because having a larger number of smaller claims would make it more difficult for insurers to get paid.¹³⁷ Questions of redistribution are taken up again under the issue of fee-shifting and making sure that class defendants have proper economic incentives to fully litigate a defense for the entire class.

2. Deference to the Market and Legislative Bodies

I adopt the position that as a guiding principle, courts should be deferential to the market they find in operation. As Fried and Rosenberg observe, “[n]o logical impediment exists to the market’s serving as a full substitute for legal intervention to achieve the social objective of ensuring optimal precautions.”¹³⁸ Because the cost-benefit calculations, especially at the aggregate level, can be quite complicated, I also take the position that courts should be deferential to legislatures and administrative bodies that have conducted research on particular issues. Where courts see that legislatures are captured by interest groups whose goals may not be based on objective analysis and research, and when legislatures are not adhering to the principle of aggregate analysis, then they should take more independent actions.

3. Activity and Care Levels

Throughout considerations of system design, it is important to keep in mind the distinction between activity levels and care levels. This is a point seemingly missed by Hamdani and Klement. Using the Hamdani and Klement example, individuals may react to RIAA litigation in one of two general ways. First, they may simply reduce their activity level. This is the only possibility that the authors consider.¹³⁹ But second, individuals may react to RIAA litigation by increasing their care level. They may

136. See FRIED & ROSENBERG, *supra* note 6, at 55, 69–70.

137. David Rosenberg, *Deregulating Insurance Subrogation: Towards an Ex Ante Market in Tort Claims I* (Harvard John M. Olin Ctr. for Law, Econ., & Bus. Discussion Paper No. 395, 2002), available at http://www.law.harvard.edu/programs/olin_center/. I leave this question for another day, as currently such a market does not exist.

138. See FRIED & ROSENBERG, *supra* note 6, at 45.

139. See Hamdani & Klement, *supra* note 9, at 724.

take extra measures to insure that they are not found liable. This care level adjustment may take one of two forms. It may take the traditional form of trying to avoid the harm; i.e., downloading only with approved programs. But it may also take another form of trying to avoid detection. The distinct possibility of this “circumvention care” is particularly important to consider in the context of defendant class actions involving technology.

B. Identification & Monitoring

Identifying exactly who is generating the harm/risk may arise as an acute problem in the defendant class action context. Initially, there are several distinctions to make. First, in order to work effectively, class members need to identify not only who is causing the harm, but also how much marginal contribution is being made by each member. Monitoring can be introduced here as a form of “repeated identification”—re-evaluating on a regular basis who is in the market and what their market share is. Depending on the stability and fluidity of the market, this monitoring may be more or less costly.

A second distinction to make is between “ability” and “feasibility” to identify harm/risk producers. Prohibitively high identification costs may make it infeasible for identification to occur in some situations when it is theoretically possible (in a costless world). Putting these two concepts together, the identification problem can be considered along a continuum. Table 4 provides a rough outline of the scope of this problem.

Perfect ID	Strong ID	Mid-Strong ID	Mid-Weak ID	Weak ID	No ID
Know who caused the harm and each party's marginal contributions	Know who caused the harm, a little less sure of marginal contributions	Not entirely sure who caused harm, but can narrow it down, and can do the same for marginal contributions	Know the general “group” of people who caused the harm, but not the specific individuals in the “group,” and know nothing of marginal contributions	Not entirely sure which “groups” are responsible, and have no idea of marginal contributions to harm	Do not know who caused the harm

1. Legal Tools to Address the Problem of Identification

Looking at Table 4, the goal of the legal system should be to enable parties to move as far as possible to the left, toward the ideal of perfect identification. There are three plausible ways that the legal system might improve identification of defendants and their relative contributions to harm. As a first cut, the legal system can use sub-classes to reduce its workload. Sub-classes will be most beneficial when it is easier to identify the marginal causal contribution of some members of the defendant class, relative to others. In practice, courts have carved out sub-classes in larger defendant class actions since at least 1968.¹⁴⁰ By breaking up the larger class, the court reduces the number of individuals on the right hand side of the table. In an Alabama case, where all state registrars of voters were made into a defendant class, the court administered its ruling on the basis of different sub-classes.¹⁴¹ The “harm” in this Alabama case was to convicted felons who were thrown off the voter rolls.¹⁴² The court found that some counties had done more harm than others, and appropriately tailored their remedy.¹⁴³ The same logic can be applied by courts in other defendant class action contexts.

The second option courts can undertake is to create incentives for self-identification by adjusting presumptions on marginal contribution to harm, and then allowing for rebuttal of that presumption with sufficient evidence. To flesh this out, it is helpful to consider the numerical example in Table 5. Let’s assume that a plaintiff has experienced total harm of 500, and has won in court. The defendant class is composed of 100 individuals, and neither the plaintiff nor the court knows which defendants produced what amount of harm. Each individual defendant does not know the other defendant’s contribution to harm, but he knows his own. He knows how many people are in the class, so he knows that the average harm is 5. Let’s say that the distribution is as presented in Table 5.

140. See *Technograph Printed Circuits, Ltd. v. Methode Elecs., Inc.*, 285 F. Supp. 714, 725–27 (N.D. Ill. 1968) (finding a defendant class appropriate in a patent infringement case, and in administering it, creating several sub-classes).

141. *Hobson v. Pow*, 434 F. Supp. 362, 365 (N.D. Ala. 1977).

142. See *id.*

143. See *id.* at 367–68.

[A] Individual contribution to harm:	2	3	4	5	6	8	10	TOTAL
[B] Number of individuals:	5	25	25	15	10	10	10	100
[A] x [B] = [C] Sub-Total of Harm:	10	75	100	75	60	80	100	500

The puzzle is this: if we cannot directly observe their contributions to harm, how do we get the various sub-groups to volunteer, *ex post*, information about their contributions to harm? Courts may be able to use damage assignments as a carrot-and-stick. In this example, instead of setting the average damage payment for defendants at 5, courts could set it at 8. Initially such a move would strike off over-deterrence because total damages would equal 800. But courts could, at the same time they set damages to 8, offer defendant class members a chance to reduce their liability to 6 if they can show that they contributed less than 8 to harm. In this example, 80 people would rationally come forward to get their liability reduced by 2. The 10 in the “8 category” would break even, and the 10 in the “10” category would get away with 2. Total damages would thus be $800 - 160 = 640$. There is likely some over-deterrence here, but it should be noted that the over-deterrence is the cost of identification. Over time, courts could calibrate their carrot-and-stick game.

A third option, which is probably quite costly and therefore not as practical, is for the court to appoint a guardian or special master specifically for the purpose of determining marginal contributions to risk. Guardians have been a frequent topic of discussion in the class action context.¹⁴⁴ Here, “special master” may be a more appropriate title, but the person charged with the responsibility of looking at contributions to harm will also likely be faced with questions of settlement and infighting as well.

In addition to these mechanisms, courts must also recognize that their choice of representative can affect information production.¹⁴⁵ A

144. See Alon Klement, *Who Should Guard the Guardians? A New Approach for Monitoring Class Action Lawyers*, 21 REV. LITIG. 25, 26–28 (2002) (discussing private lawyers’ roles in the “guardian” class-action context and who should supervise those lawyers); see also Edward Brunet, *Class Action Objectors: Extortionist Free Riders or Fairness Guarantors*, 2003 U. CHI. LEGAL F. 403, 466 (2003) (“The theory of appointing a guardian ad litem is deceptively simple. The guardian will represent the interests of the absent class members and thereby monitor the behavior of class and defense counsel during settlement negotiations.”).

145. Courts have long recognized the problem of defendant class representation, but not usually through the lens of information production. In *In re the Gap Stores Sec. Litig.*, the court noted as follows:

common problem with large defendant classes is how many and which defendants should be assigned as class representatives. Courts have encountered what I call the “red rover” problem; just as in the game red rover, where kids seek to run through the weakest link on the other side, plaintiffs want to pick the weakest link as the defendant class representative. Such was the case in *Leon N. Weiner & Assocs., Inc. v. Krapf*,¹⁴⁶ where a corporate lot owner sought to name just one lot owner as representative of a class of 203 lot owners.¹⁴⁷ The corporate owner sought declaratory judgment that its property was not subject to restrictions, and the alleged “harm” the corporate owner experienced was the potential restrictions on the land as carried by other lot owners.¹⁴⁸

Faced with this situation, the court recognized that the single named defendant was not in a position to adequately produce information on the many possible restrictions that might arise from the deeds of other lot owners.¹⁴⁹ The court concluded that the plaintiff corporate owner “selected one neighbor to represent the property interests of 203 lot owners, many of whom will likely have different interests and views. The effect of Weiner’s motion is to place the costs of notice, discovery and litigation on the shoulders of the Krapfs.”¹⁵⁰ Such costs would make it virtually impossible for the defendant representative to engage his peers and kick-start the information market.¹⁵¹

C. Enforcement

Even in some situations in which identification and monitoring are practical, enforcement may not be. Here, “enforcement” means getting other defendant class members to contribute to (i) the litigation costs, and then (ii) if necessary, the damage costs as well. Enforcement is difficult because without a well-working network between defendants (i.e., without an umbrella organization), no single class member (or even a small pocket of class members who may be strongly connected) can achieve

Commentators have frequently criticized the potential for inadequate representation of defendant classes. Because the named defendant generally does not seek his representative status and often vehemently opposes it, a court may fear that an unwilling representative will necessarily be a poor one. Related to this concern is the fear that the plaintiff will exercise his power of selection to appoint a weak, ineffective opponent as class representative. “It is a strange situation where one side picks out the generals for the enemy’s army.”

79 F.R.D. 283, 290 (N.D. Cal. 1978) (citations omitted).

146. No. 8938, 1988 Del. Ch. LEXIS 8 (Del. Ch. Jan. 19, 1988).

147. *Id.* at *1.

148. *Id.* at *4.

149. *Id.* at *8–9.

150. *Id.* at *9.

151. A similar analysis was made in a case in Illinois where a single owner of a Shell gas station was proposed as representative of a class of all Shell gas owners in the state. In rejecting this proposed representative, the court reasoned, “The entire economic burden of defending the present suit was thrust upon one man, Razowsky. His financial stake in the outcome of the suit was not shown to be greater than that of any other of the hundreds of Shell dealers in Illinois.” *Gaffney v. Shell Oil Co.*, 312 N.E.2d 753, 759 (Ill. App. Ct. 1974).

the economies of scale required to effectively enforce group-wide policies. In the face of such an enforcement problem, individuals *ex ante* would look to the legal system to provide mechanisms for making enforcement feasible.

On this enforcement point Hamdani and Klement offer a useful analysis with their class defense proposal. They propose a "class defense" mechanism, a "defendant-initiated procedure designed to create parity between a single plaintiff and a group of similarly positioned defendants."¹⁵² With help from the court (via fee-shifting), a defendant could use Hamdani and Klement's class defense procedure to reach out and essentially force contributions from the entire class.¹⁵³ Hamdani and Klement's proposal allows defendants to class themselves with less judicial intervention than would currently be required. Legal tools that make it easier for aggregation of claims promote the aggregate analysis principle, and thus the forward-looking deterrence principle as well.

Hamdani and Klement's proposal runs into trouble, however, when we reach the hard hypothetical case of the blockbuster movie DVDs. Suppose that through some investigation, the movie's production studio is able to identify 100 of the 100,000 people who illegally taped the movie. Suppose too that the movie studio then asks for certification of a defendant class for all illegal recorders (which they have estimated at 100,000 based on lost revenue from movie tickets and DVD sales). The problem at this point is that even if the defendants "class" themselves, no single defendant is in a position to serve as a representative for the entire class. Even when the hundred identified defendants put their resources together, it is not going to scale up enough to match the movie studio's legal resources. This is a problem because the issues may not be fully litigated. For instance, perhaps the movie studio made some contribution to the harm, which would not come out unless the defendant class had better representation.

To deal with this hard case, it is helpful to recall that a forward-looking court hopes to minimize similar harms like these from arising in the future.¹⁵⁴ In order to arrive at optimal deterrence, we need to conduct aggregate analysis. In this hard case, the only way to achieve fully litigated aggregate analysis would be for the court to incur tremendous costs and essentially fund a legal team for the defendant class. The great majority of the defendant class remains anonymous, and thus would not contribute to a pool to fund the legal fees. Given these prohibitive costs, and the requirement of aggregate analysis which fails in this hard case,

152. Hamdani & Klement, *supra* note 9, at 710.

153. The procedure assumes that identification and monitoring are possible. If a defendant has no idea who else is in his class, he will not obtain maximum benefits from classing himself.

154. "Fairness" to this particular group of movie tapers or to the production company is not, in the general welfare framework of this article, at issue.

the general theory of this Article suggests that here, defendant class actions will not be an optimal legal tool.¹⁵⁵

While defendant class actions are not optimal in these hard cases, it should be emphasized that such cases are very rare in practice. The Judicial Panel on Multidistrict Litigation, for instance, usually seems to find a few “big players” or some other market mechanisms by which to identify representatives for the diverse parties involved in litigation. The actual cases where defendant class actions have been certified also point to consistent findings of links between defendants.¹⁵⁶ More generally, it is difficult to find frequently occurring instances in which there are no market relationships between defendants in a potential defendant class.

D. Free Riding

The free riding problem is the result of identification, monitoring, and enforcement failures. Examining the defendant class action, there are two types of free rider problems we need to consider. The first is most analogous to the hypothetical case already discussed in Section I. It is where a class-wide defense would be beneficial to all defendants, but no single defendant can fund the defense adequately because they cannot extract payments from the free-riders in their class. As Netto has pointed out, “Only economy of scale in investment in the lawsuit can overcome the problem of the reluctance of defendants to assume the litigation as class representative. This objective is achieved with incentives for the class counsel through an optimal mechanism of compensation for his performance.”¹⁵⁷ In these cases, an individual *ex ante* would desire that the legal system provide a means by which the defense can be properly funded. Individual defendants would desire a mast-tying device.

But a second sort of free-riding problem may also exist. This second type of free-riding problem arises when the defendants would not be better off if they all stopped causing the harm. Rather, it is society that would be better off because the utility that the defendants are deriving

155. Although they arrived at the conclusion by different means, the court in *Angel Music, Inc. v. ABC Sports, Inc.*, a copyright case with a large potential class of copyright infringers, denied class certification. 112 F.R.D. 70, 71 (S.D.N.Y. 1986). The *Angel* court based its ruling on the lack of connections between defendants, and issues of standing. *Id.* at 77. The plaintiff, Angel Music, argued that “the members of the defendant class have engaged in a common violation of the Copyright Act which places their actions within the juridical link exception to *LaMar*,” but the court recognized that no such relationship existed. *Id.* at 75–76. What the court could have also said was that when confronted with this hard case of copying infringement, a class device was not likely to create links between future defendants in similar situations.

156. In a defendant class action brought under the Sherman anti-trust laws, for instance, Columbia Broadcasting System, Inc. (CBS) targeted the American Society of Composers, Authors and Publishers (ASCAP) and Broadcast Music, Inc. (BMI) in order to get at the numerous defendant musicians and performers in the proposed class. *Broad. Music, Inc., v. Columbia Broad. Sys., Inc.*, 441 U.S. 1, 4 (1979).

157. Netto, *supra* note 4, at 93.

from their harmful behavior is not equal to the dis-utility they cause others (the plaintiff).

The *ex ante* perspective is crucial for understanding this second free riding problem. Once an individual knows if he will be in the defendant class, it is no longer in the individual's interest to maximize utility over both states (plaintiff and defendant) of the world. To see how these interests can diverge once we move out of the *ex ante* world, consider this numerical example.

One hundred defendants each cause 5 in harm to the plaintiff when they steal a brick, for a total of 500 harm. They derive only 3 in utility from each harm, by selling the brick, for a total of 300 utility. Plaintiff cannot identify every member of the class, but when they are identified, plaintiff knows that the marginal contribution to harm is 5. Overall, we want to deter the defendants if we can do it for less than 200. Let's say plaintiff can find 20 of the wrongdoers, and every time wins against them for their marginal contribution, 5. When we look overall at defendant and plaintiff (Table 6), we see that optimal deterrence is not achieved because the defendants wind up 200 better off, while the plaintiff is 400 worse off. The harm producers do not bear the loss.

	Defendant Class	Plaintiff	Society Overall
Initial gain / loss	100 people gaining 3 utility each from their wrong-doing = + 300	100 wrong-doers each causing plaintiff 5 in: -500	-200
Subsequent legal gain / loss	20 people get sued and lose 5 each: -100	Successfully suing 20 people for 5 gain each: +100	No change
Final Result	+200	-400	-200 with harm producers NOT bearing the loss, so sub-optimal deterrence

	Defendant Class	Plaintiff	Society Overall
Initial gain / loss	100 people gaining 3 utility each from their wrong-doing = + 300	100 wrong-doers causing 5 in harm a piece: - 500	-200
Subsequent legal gain / loss	20 people get sued, and get certified as Defendant Class, so must pay the entire harm, lose 500 total: - 500	Successfully suing the defendant class: + 500	No change
Final Result	-200	0	-200 with harm producers bearing the loss, so optimal deterrence

Now consider how a defendant class action would change the final results (Table 7). If the 20 defendants were certified as a defendant class, they would be liable not only for their marginal contribution (the 100), but for the entire 500 in harm. This would benefit society overall because it would create the proper deterrent effect, but it would not benefit the defendant class. Thus, one's desire for a defendant class would depend on whether one knows if they will be in the class or not.

Courts encountering this issue—making some defendants liable for the harms of the entire class—have been wary of pushing forward. In *In re the Gap Stores Securities Litigation*,¹⁵⁸ the U.S. District Court for the Northern District of California suggested:

[A] defendant class action may be simply an inappropriate method of adjudicating any case where the combination of punitive damages and joint and several liability threaten to transform a statutory scheme for personal accountability into ready martyrdom for the unlucky defendant whose deep pocket will pay for the sins of the multitude.¹⁵⁹

158. 79 F.R.D. 283 (N.D. Cal. 1978).

159. *Id.* at 295. A New Jersey court echoed a similar sentiment in a defendant class action case: [I]t is noted that the New Jersey Antitrust Act, under which relief is requested, contemplates joint and several liability. The accumulated damages, trebled pursuant to statute,

The court's focus solely on the "unlucky defendant" is misplaced, for there is also an "unlucky" plaintiff who has experienced harm. The court should look to the good of both plaintiff and defendant, using aggregate analysis to consider the overall social welfare implications of its legal rule.

My argument for aggregate analysis is distinct from Hamdani and Klement's approach. When they propose the "class defense" mechanism, they fail to recognize that whether it is a plaintiff who wants to certify a defendant class or defendants who want to certify themselves, our evaluation of the merits of that class certification should rest upon the determination of overall benefit to society. If one's primary social objective is maximizing overall utility, then focusing solely on maximizing plaintiffs' or defendants' utility is misguided.

1. Solving the Free Riding Problem with Fee Shifting

The free rider problem is one of the most difficult challenges to overcome in successfully carrying out a defendant class action. The problem, however, has been addressed through various fee-shifting proposals. Most on point is Netto's proposed solution, drawing on the English rule for attorney fees:

Defendant-favoring fee shifting is considered fee-shifting on a one-way (or one-side) basis, granting fees only to the defendant's attorney when the defendants prevail in the lawsuit, but not awarding fees to the plaintiff's lawyer even if he wins the case. . . .

. . . .

. . . The advantages of the defendant-favoring fee-shifting system include: (i) overcoming the asymmetric costs between separate litigation and collective suit, aggregating the multitude of defendants, (ii) compensating the class counsel by equalizing his investment in the litigation with the amount of the fees award; and (iii) precluding nuisance value suits.¹⁶⁰

The fee-shifting literature also provides other solutions relevant to defendant class actions. Particularly useful is Joseph Miller's work on the free rider problem faced by those who challenge the validity of a

recoverable by the entire class of mortgagors from the entire class of mortgagees, may aggregate many millions of dollars. Yet, if the class recovery were allowed, each member of defendant class, no matter how minor its participation in the scheme, would be individually answerable for the full amount of the judgment. We conclude that such a result would constitute a major alteration in the substantive legal relations between the parties and goes beyond the intent of class action policy.

Kronisch v. Howard Sav. Inst., 335 A.2d 587, 598 (N.J. Super. Ct. Ch. Div. 1975) (citing 3B JAMES WM. MOORE ET AL., MOORE'S FEDERAL PRACTICE ¶ 23.45[3] (2d ed. 1996)).

160. Netto, *supra* note 4, at 114-16.

patent.¹⁶¹ Miller begins his analysis by stating, “A court judgment that a patent claim is invalid is a public good. And obtaining such a judgment requires the expensive, up-front cost of patent litigation. These facts suggest that profit-maximizing firms will supply definitive patent challenges at a less-than-optimal rate.”¹⁶² A similar fact pattern is found in our context. When a defendant class is engaged in activity that (as determined by aggregate analysis) is good for society, that is a public good. Fully litigating such a stance and showing that you are engaged in a public good also involves substantial costs. Just as invalidating a patent invalidates it for everyone, so winning the right to continue engaging in your actions (i.e., file-swapping) allows everyone else to do the same. Given these similarities, what can we learn from Miller’s analysis? The first lesson is one about theoretical approach. Miller sets the stage in this way:

Any bounty mechanism—in the patent context or elsewhere—depends for its success upon when the bounty is awarded (or, put another way, what one must do to earn it), and of what the bounty consists (e.g., cash payment of \$X, or enough money to cover expense Y). A poor choice as to either feature reduces a bounty’s effectiveness at encouraging the desired result, making these features the best focus in assessing whether a proposed bounty is likely to succeed.¹⁶³

Miller’s analysis, not detailed further here, considers two existing bounty and fee-shifting proposals in the patent context.¹⁶⁴ Like Miller, I believe that, “[p]aying a successful patent challenger a cash bounty that need not be shared with others who benefit from the patent’s invalidation directly counteracts the free rider problem”¹⁶⁵ The questions then become: (i) *When* should the bounty be awarded, and (ii) *How much* should the bounty be?

For defendant class actions, the timing question is somewhat easier than the parallel question in patent law.¹⁶⁶ The bounty should be awarded at the litigation stage. A litigation stage bounty should be awarded to those defendants who step up to defend on behalf of the entire class. If too many lawyers step forward, the court can adjudicate between them, either on the merits or via a lottery. The timing of this bounty would encourage full litigation of the issues. To pay for the bounty, the court could mix-and-match between (i) fee shifting provisions in the event of a win by the defense, (ii) a mandatory “litigation tax” imposed on all members of the defendant class, and (iii) a sliding “litigation investment” in which defendant class members could contribute to the class defense,

161. Joseph Scott Miller, *Building a Better Bounty: Litigation-Stage Rewards for Defeating Patents*, 19 BERKELEY TECH. L.J. 667 (2004).

162. *Id.* at 688 (footnote omitted).

163. *Id.* at 695–96 (footnote omitted).

164. *Id.* at 696–704.

165. *Id.* at 704.

166. The reason for this is that the challengers to patent infringers must initiate the lawsuits.

with a promise that they would receive their investment plus a percentage of the second-stage bounty. The amount of the bounty is something that courts would have to determine based on the size of the class and the issues involved.

Legislatures can be a partner in establishing and revising fee-shifting programs. In Colorado in 1990, for instance, the company Terrestrial Systems sought to bring a class action suit against a class of television owners that they alleged were using certain equipment to gain unauthorized access to broadcasts.¹⁶⁷ Fee-shifting in the case was guided by legislative mandate.¹⁶⁸ Under Colorado Revised Statutes § 18-4-702(3), “in any action for civil theft of cable television service the prevailing party shall be entitled to an award for his reasonable attorney fees.”¹⁶⁹ The case illustrates the possibilities of fee-shifting to be designed for specific situations and to be put into practice. Legislatures thinking about social good for the state or country can produce background fee-shifting rules that address the free-rider concerns inherent in defendant class actions.

All of these funding options still leave open the possibility that lead defense lawyers might be quick to settle, or might work out a sweetheart settlement for themselves. Because they might be representing defendants who are not even known to the plaintiffs (thinking back to the identification problems), there seems a distinct possibility that whatever the bounty or fee shifting regime, settlement incentives will remain askew. To counter this, I propose making representation of defendant classes a *repeat game* by looking favorably upon legal defense teams that have successfully litigated in the past, and looking unfavorably upon those who have lost, and especially unfavorably at those who have struck deals that seemed to be of the sweetheart variety. Such repeat games are similar in spirit to proposals to use repeated auctions for informational purposes.¹⁷⁰ If law firms in these cases are one-time players, then this solution will do little. But in a world of consolidated firms, I suspect that we would see many repeat players. Because they are now maximizing revenue not just in this particular case, but across all future cases, firms will be less likely to engage in behavior that is not in keeping with the class as a whole.

2. Solving the Free Riding Problem with Command-and-Control

If all else fails, full-blown government regulation in the form of command-and-control may be necessary. This approach is likely to be incredibly expensive. Terry Fisher has proposed such an approach for

167. Terrestrial Sys., Inc. v. Fenstemaker, 132 F.R.D. 71, 73 (D. Colo. 1990).

168. *Id.* at 73–74.

169. *Id.* at 73 (citing Colo. Rev. Stat. § 18-4-702(3) (2004)).

170. See Abramowicz, *supra* note 100, at 351–52, 378–79.

copyright.¹⁷¹ In his proposal, Fisher suggests that ISPs pay royalties, based on the level of downloads of particular pieces, into a government-run fund, which would then disperse those royalties to individual artists.¹⁷²

It should be observed that many potential defendant class actions have already been addressed by government regulation. The “tragedy of the commons” cases preempt class action lawsuits by using regulatory agencies (fines, taxes, etc.) to deter socially detrimental conduct such as littering. The government may be in the best position to identify, monitor, and deter the risk-creation of the large number of defendants. Where the legislature has not already stepped in, however, courts may be more hesitant to push for such regulation.¹⁷³

E. Liability rules

While the legal rule may vary in some situations, the default rule should be strict liability for the defendant class, with contributory negligence. Strict liability would have the benefit of eliminating in-fighting within the defendant class. For instance, none of the members of the brick re-sellers association could show that they had *not* stolen bricks from this particular factory. This should theoretically create very strong self-monitoring and self-policing incentives. The logic is that if you do something illegal, we all pay for it, so we’re going to try and make sure that you do not do anything illegal. Or, perhaps more realistically, we are going to take more care and screen our members to make sure that we reduce our risk.

The tool of vicarious liability could also be used to bring in an existing organization that has been standing on the sidelines or to generate the creation of a new organization that no one had the incentive to start yet.

171. WILLIAM W. FISHER III, *PROMISES TO KEEP: TECHNOLOGY, LAW, AND THE FUTURE OF ENTERTAINMENT* (2004).

172. *Id.* at 202–03. Fisher provides an overview of his compensation alternative and then uses the rest of the chapter to elaborate in detail how such a system would operate.

173. A moderate, and potentially more cost-effective path for legislatures to take is to mandate defendant class actions in certain circumstances. An illustration is a Missouri law that required certain annexation proceedings to proceed via a class action. MO. REV. STAT. § 71.015(1)(5)(c) (2010). In *City of St. Ann v. Buschard*, the court explained this law as follows:

[The] Sawyer Act passed by the 67th General Assembly . . . provides that before a city may proceed to annex any area otherwise authorized by law, it must file an action in the Circuit Court of the County in which such unincorporated area is situated praying for a declaratory judgment authorizing such annexation. According to the Sawyer Act: “The petition in such action shall state facts showing:

1. The area to be annexed;
2. That such annexation is reasonable and necessary to the proper development of said city; and
3. The ability of said city to furnish normal municipal services of said city to said unincorporated area within a reasonable time after said annexation is to become effective. Such action shall be a class action against the inhabitants of such unincorporated area under the provisions of Section 507.070 RS Mo.”

299 S.W.2d 546, 547 (Mo. Ct. App. 1957) (citation omitted).

In thinking at the aggregate level about deterrence—even though it might be too late for the particular group on trial to create an organization that could have better protected their interests—future groups in similar situations will look to this court's ruling and realize that the threat of individual liability is so great that they are not going to even enter the market (i.e., not going to take a single brick) unless they are sure that there is some sort of organization/agency/binding agreement that they can become a party to.

Allowing for contributory negligence makes sure that plaintiffs do not get off the hook. It might be the case, for instance, that recording artists made their work too easy to illegally obtain. Contributory negligence could be assessed to the extent that a firm is not up to the state-of-the-art with certain technological precautions.

IV. CONCLUSION

This Article has synthesized existing knowledge about defendant class actions and proposed a general theory of defendant class actions. The argument of the paper rests on three principles: (1) forward looking deterrence; (2) dynamic effects; and (3) aggregate analysis. Of these three, it is the aggregate analysis principle that overshadows the other two in importance. The Article provides some illustrations of these principles, and sketches out some ways in which these principles can be applied in system design. The proposals made in this Article challenge courts and legislatures to broaden the scope of their legal reasoning beyond purely formalist concerns about the language of Rule 23.

There is much more to be considered in the defendant class action context. It remains to be seen, for instance, how the proposed tools of system design will hold up in practice. Because of the aggregate analysis principle, more work needs to be done on bringing in additional data and perspectives on the substantive issues at hand.

Despite these unanswered questions, it is my hope that this Article has contributed to the literature by calling for scholars to frame their discussion of defendant class actions within a broader theoretical framework. What is it that one wants a defendant class action to do? Which parties should we think about when adjudicating defendant class actions? How much marginal value do we expect defendant class actions to have in particular situations? Continuing to answer these questions in more detail will enable courts to feel more confident in their ability to certify defendant classes. That, ultimately, will lead to greater social welfare.

APPENDIX

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
Broad. Music Inc. v. Columbia Broad. Sys., Inc.	441 U.S. 1	1979	CBS	American Society of Composers, Authors and Publishers (ASCAP) and Broadcast Music, Inc. (BMI), and their members and affiliates	Decided in favor of defendant class on basis of Sherman Act
Zablocki v. Redhail	434 U.S. 374	1978	All Wisconsin residents who have minor issue not in their custody and who are under an obligation to support such minor issue by any court order or judgment and to whom the county clerk has	All county clerks in Wisconsin	Civil rights suit, statute struck down on equal protection grounds

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			refused to issue a marriage license without a court order		
Trainor v. Hernandez	431 U.S. 434	1977	Those "who have had or may have their property attached without notice or hearing upon the creditor's mere allegation of fraudulent conduct pursuant to the Illinois Attachment Act."	Various Illinois state officials	Civil rights suit, the Court held that the case ought to have been dismissed for other reasons and the question of constitutionality never addressed by the district court
<i>In re</i> Integra Realty Res., Inc.	354 F.3d 1246 (10th Cir.)	2004	Creditors' trust	Seven large shareholders in bankrupt Integra company (instead of 6,000 individual shareholders)	The case was reviewed on appeal, and the district court settlement agreement was upheld.
Tilley v. TJX Cos.	345 F.3d 34 (1st Cir.)	2003	Graphic artist	557 retailers who sold artist's work	Appeals Court overturned District Court's

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					certification of defendant class on the grounds that the court erred in certifying a defendant class under Rule 23(b)(2)
S. Ute Indian Tribe v. Amoco Prod. Co.	2 F.3d 1023 (10th Cir.)	1993	Indian tribe	Oil companies, lessees, and well operators.	Dispute concerning the ownership of coalbed methane
Henson v. E. Lincoln Twp.	814 F.2d 410 (7th Cir.)	1987	People denied due process when applying for welfare	770 Illinois local welfare departments not receiving state aid	Certification of defendant class not allowed under 23(b)(2)
AFP Imaging Corp. v. Ross	780 F.2d 202 (2d Cir.)	1985	AFP Imaging Corporation	Twenty-nine shareholders of Xenon	Securities fraud case under 10(b) of the Securities Exchange Act of 1934
Baker v. Wade	769 F.2d 289 (5th Cir.)	1985	Donald F. Baker, a homosexual	"[A]ll district, county and city attorneys in the State of Texas responsible for the	Challenged constitutionality of TX law that proscribes "en-gag[ing] in deviate

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				enforcement of Texas Penal Code Ann. § 21.06”	sexual intercourse with another individual of the same sex” as unlawful
Thompson v. Bd. of Educ. of the Romeo Cmty. Sch.	709 F.2d 1200 (6th Cir.)	1983	“All female teachers of such school boards who have been since March 24, 1972 or will be in the future, denied the benefits of a sick leave policy which treats pregnancy related disabilities the same as other temporary disabilities.”	“All school boards in the State of Michigan which, since March 24, 1972, have treated or now treat pregnancy related disabilities differently than other temporary disabilities, limited to the school boards in districts wherein the MEA has female members who have been or will be subject to such policies or practices.”	District Court certified, but Appeals Court reversed

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Kerney v. Fort Griffin Fandangle Ass'n	624 F.2d 717 (5th Cir.)	1980	Individual injured during a theatrical performance	Officers and members of unincorporated theatrical association	Suing individuals and the class for injuries	
Greenhouse v. Greco	617 F.2d 408 (5th Cir.)	1980	Black children attending parochial schools in defendant diocese	Parish corporations holding title to parochial schools in the diocese; Bishop of the diocese, the superintendent of diocese schools, and the diocese itself	Appeals Court affirmed the District Court's ruling that the lack of appropriate representatives precludes the suit from moving forward as a defendant class action	
Marcera v. Chinlund	595 F.2d 1231 (2d Cir.)	1979	Pre-trial detainees in county jails	42 county sheriffs who denied contact visits in their jails	Detainees wanted more contact visits allowed	
Brooks v. Flagg Bros.	553 F.2d 764 (2d Cir.)	1977	Individuals who had storage in defendant's warehouse	"[W]arehousemen doing business in the State of New York and who impose liens and subject goods to sale pur-	Due process related to liens on stored materials	

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				suant to New York Uniform Commercial Code ss 209-210 (sic) without affording the owner of the goods a prior opportunity to be heard."	
Anastasia v. Cosmopolitan Nat'l Bank of Chi.	527 F.2d 150 (7th Cir.)	1975	"Those persons in Chicago, Illinois, except for the owners, managers and operators of hotels, whose personal property is now detained by a hotel pursuant to the Illinois Innkeepers' Lien Law."	"Those owners, managers, and operators of hotels in Chicago, Illinois, who now have the personal property of the class of plaintiffs detained pursuant to the Illinois Innkeepers' Lien Law."	Plaintiffs challenged the seizures as violations of both the Fourteenth and Fourth Amendments.
Appleton Elec. Co. v. Advance-United Expressways	494 F.2d 126 (7th Cir.)	1974	"Appleton Electric Company and all other persons similarly situated who . . . have	1,400 carriers who "shipped goods in interstate commerce between May 20,	Shippers wanted refunds from carriers under Interstate Commerce Commis-

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Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
			shipped goods through interstate commerce via the facilities of the defendants”	1968 through August 29, 1969 within a region covered by tariff rates involved in Interstate Commerce Commission Docket No. 34971”	sion rules
Brown v. Kelly	244 F.R.D. 222 (S.D.N.Y. 2007), <i>aff'd in part, vacated in part</i> , 609 F.3d 467 (2d Cir. 2010)	2007	All persons arrested, charged or prosecuted for a violation of loitering for the purpose of begging in the State of New York from October 7, 1992 onward	“[A]ll political subdivisions and all law enforcement/prosecutorial policy-making officials in the State of New York with authority to arrest, charge or prosecute a person with a violation under New York Penal Law.”	Case on 1 st , 4 th , and 14 th amendment grounds; bilateral statewide classes and city subclass certified
Baksalary v. Smith	No. Civ.A. 76-429, 2005	2005	Plaintiff employees,	“[A]ll insurance carriers	Court granted the insur-

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	WL 1941319 (E.D. Pa.)		"whose workers' compensation benefits had been terminated under the § 413(a) automatic supersedeas provision"	and self-insured employers who had invoked, or would in the future invoke, the automatic supersedeas procedure of section 413(a)."	ers' motion to vacate the consent decree.
Pension Transfer Corp. v. Benef. Under Third Amend. to Fruehauf Trailer Corp. Ret. Fund No. 003	319 B.R. 76 (D. Del.)	2005	Pension Transfer Corporation	All the beneficiaries of an amendment to a bankruptcy by Fruehauf Trailer Corporation	Bankruptcy; alleged that amendment to the plan was a fraudulent transfer
Matte v. Sunshine Mobile Homes, Inc.	270 F. Supp. 2d 805 (W.D. La.)	2003	Owners of mobile homes alleged to be inherently defective	282 manufactured home builders	Certification not allowed; plaintiff claims dismissed
Wyandotte Nation v. City of Kansas City	214 F.R.D. 656 (D. Kan.)	2003	Indian tribe	All individuals and entities ... who claimed an interest in any portion of those sections of land at	Seeking declaratory judgment, recovery of possession of real property

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				issue in Wyandotte County, Kansas	
Clark v. McDonald's Corp.	213 F.R.D. 198 (D.N.J.)	2003	Disabled individuals who were "denied the full and equal enjoyment of the goods, services, programs, facilities, privileges, advantages, or accommodations of any of the McDonald's"	"[A]ll owner/operators of McDonald's brand restaurants throughout the United States."	Certification not allowed
Mayo v. Hartford Life Ins. Co.	193 F. Supp 2d 927 (S.D. Tex.), <i>aff'd</i> , 354 F.3d 400 (5th Cir. 2004)	2002	Employees (and former employees) living in Texas who are (or were) insured under the COLI policies owned by any of the defendant employers	"Companies that bought insurance policies written by AIG Life Insurance Company, Mutual Benefit Life Insurance Company or Hartford Life Insurance Company, that insure or insured	Argument was that company-owned life insurance policy in the employee's name violated the Texas insurable interest doctrine

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				the lives of Texas employees."	
Silva v. County of Los Angeles	215 F. Supp. 2d 1079 (C.D. Cal.)	2002	Attorney	All Los Angeles Superior Court judges, court commissioners and California Court of Appeal justices	Dismissed; alleged that the County's payment of benefits to judges and the judges' failure to disclose such payment deprived Silva of his rights to due process, equal protection
Monument Builders of Pa., Inc. v. Am. Cemetery Ass'n	206 F.R.D. 113 (E.D. Pa.)	2002	Monument Builders of Pennsylvania, Inc., a trade association	All cemeteries and cemetery associations throughout the Commonwealth of Pennsylvania	Alleged that cemeteries inflated the prices of monuments
Canadian St. Regis Band of Mohawk Indians v. New York	146 F. Supp. 2d 170 (N.D.N.Y.)	2001	Descendants of the Village of St. Regis	New York State defendants, St. Lawrence and Franklin Counties, Village of Massena, Town of	Dismissed (Land claim case for 200 years of dispossession)

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				Massena, Town of Bombay, Town and Village of Fort Covington, Key Bank of Northern New York, the Nation-wide Mutual Insurance Company, Niagara Mohawk Power Corporation and Canadian National Railways, individually and on behalf of all other persons who claimed an interest in any portion of the subject lands	
Oneida Indian Nation of New York State v. County of Oneida	199 F.R.D. 61 (N.D.N.Y.)	2000	Oneida Indian Nation	Proposed a class of "approximately 20,000 or more persons" who "occupy or have or claim an	Class not certified; amendment to add 20,000 or more individual defendants

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
				interest in any of the subject lands . . . and their successors and assigns"	denied (Land claim case for 200 years of dispossession)
E.R. Squibb & Sons, Inc. v. Accident & Cas. Ins. Co.	82 Civ. 7327 (JSM), 1999 U.S. Dist. LEXIS 8333 (S.D.N.Y.), <i>aff'd in part, rev'd in part sub nom.</i> E.R. Squibb & Sons, Inc. v. Lloyd's & Cos., 241 F.3d 154 (2d Cir. 2001)	1999	Squibb	Lloyd's Underwriters and Lloyd's Underwriting Syndicate # 210 (and the thousands of individuals underwriting)	Insurance case, seeking declaratory judgment; Appeals court recommended defendant class action, saw a 23.2 uninformed association
Monaco v. Stone	187 F.R.D. 50 (E.D.N.Y.)	1999	Gregory Monaco	All local criminal court judges; "all sheriffs or other individuals who transport incompetent defendants from jail to OMH psychiatric institutions"	Constitutional challenge of NY law under which defendants found incompetent to stand trial for minor felonies and misdemeanors in New York State are

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					involuntarily committed to state-operated psychiatric hospitals.
United Cos. Lending Corp. v. Sargeant	20 F. Supp. 2d 192 (D. Mass.)	1998	United Companies Lending Corporation	Defaulting borrowers	Sought declaratory judgment that a Mass. law was void and unenforceable
K. Bell & Assocs. v. Lloyd's Underwriters	92 Civ. 5249 (AJP)(KT D), 1998 U.S. Dist. LEXIS 7798 (S.D.N.Y.)	1998	K. Bell & Associates	"[C]onsortium of individual investors, known as 'Names,' that are severally, but not jointly, liable for their fraction of the risk on [Lloyd's] insurance policy."	Dismissed for lack of subject matter jurisdiction
Leer v. Wash. Educ. Ass'n	172 F.R.D. 439 (W.D. Wash.)	1997	All non-member public school district employees who were or are "represented exclusively for purposes	"[A]ll UniServ Councils and local associations affiliated with Defendant WEA . . . which collect agency	Court found certification inappropriate under Fed. R. Civ. P. 23(b)(1)(A) because there was "no contract,

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			of collective bargaining by Defendants and were subject to demands for or collections of agency fees for the WEA and any of its affiliates."	fees from nonmembers." (at least 100 such local affiliates)	agreement, or enforced system between" the defendants that would support a finding of a juridical relationship.
Coal. for Econ. Equity v. Wilson	122 F.3d 692 (9th Cir.)	1997	The Coalition For Economic Equity, et. al.	All state officials, local government entities or other governmental instrumentalities bound by Proposition 209.	Challenging the constitutionality of Proposition 209.
Capital Cit-ies/ABC, Inc. v. Ratcliff	No. 94-2488-GTV, 1996 U.S. Dist. LEXIS 14798 (D. Kan.), <i>aff'd</i> , 141 F.3d 1405 (10th Cir. 1998)	1996	"All persons who have been home delivery or single copy agents for The Kansas City Star Company pursuant to an agency agreement since the delivery agent	"All persons engaged . . . in the delivery in the states of Kansas and/or Missouri of The Kansas City Star and/or The Kansas City Times pursuant to an	Underlying question: whether carriers were entitled to employee benefits under the Employee Retirement Income Security Act of 1974 (ERISA),

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			system implemented by The Star" after November 30, 1984, and on or prior to November 30, 1994.	agency agreement with the Kansas City Star Company that provides or provided that the person is a self-employed independent contractor and not an employee or servant of The Star."	
Nat'l Union Fire Ins. Co. v. Midland Bancor, Inc.	158 F.R.D. 681 (D. Kan.)	1994	National Union Fire Insurance Company of Pittsburgh, Pa.	Class I: "all persons who are or ever were directors or officers of the Institutions, who have or may in the future make claims which might fall within the scope of coverage of the Policy." Class II: "all person or entities who have	Defendant class not certified; wanted declaratory judgment on liability policy

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
				made or may in the future make claims against the directors and officers of the Institutions which might fall within the scope of coverage of the Policy."	
United States v. Local 1804-1, Int'l Longshoremen's Ass'n.	90 Civ. 0963 (LBS), 1993 U.S. Dist. LEXIS 15083 (S.D.N.Y.), <i>aff'd in part, vacated in part</i> , 44 F.3d 1091 (2d Cir. 1995)	1993	United States	Water-front Employer Class (associations and 18 companies which specialize primarily in the maintenance and repair of marine containers and chassis and securing and unsecuring of cargo aboard ships)	RICO action
Amnesty Am. v. County of Allegheny	822 F. Supp. 297 (W.D. Pa.), <i>aff'd</i> ,	1993	Amnesty Intl., on behalf of Jane Does	Two classes: (1) all employees	Certification not granted; Alleged

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	172 F.3d 40 (3d Cir. 1998)			(approximately 25 employees) of the County and City who were assigned to take custody of and process protestors; (2) employees (approximately 10 employees) who were assigned to take into custody and process female protestors	violations of 4 th , 13 th , and 14 th amendments; related to anti-abortion protesting
Heffler v. U. S. Fid. & Guar. Ins. Co.	No. 90-7126, 1992 U.S. Dist. LEXIS 3090 (E.D. Pa.)	1992	All Pennsylvania residents who purchased from ISO members, subscribers and service purchasers motor vehicle bodily injury liability insurance with provisions at issue	All ISO members, subscribers and service purchasers that issued motor vehicle insurance policies in PA with certain provisions at issue	Motion denied; alleged that companies unlawfully restricted the availability of intra-family coverage by introducing a family limitation
Terrestrial Sys., Inc.	132 F.R.D. 71	1990	Terrestrial Systems	Television owners	Case dismissed in

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
v. Fenstermaker	(D. Colo.)			using unauthorized equipment	favor of defendants in pre-trial
Hammond v. Hendrickson	No. 85 C 09829, 1990 U.S. Dist. LEXIS 11071 (N.D. Ill.)	1990	James Hammond	Underwriters represented by Kidder Peabody & Co	Securities case, alleged misrepresentations contained in a prospectus
Alvarado Partners, L.P. v. Mehta	130 F.R.D. 673 (D. Colo.)	1990	Alvarado Partners, L.P.	34 Underwriters	Securities fraud case
Winder Licensing, Inc. v. King Instrument Corp.	130 F.R.D. 392 (N.D. Ill.)	1990	Winder Licensing Inc.	Manufacturers of the patented product at issue	Patent infringement case; class certification denied
Luyando v. Bowen	124 F.R.D. 52 (S.D.N.Y.), <i>rev'd sub nom.</i> Luyando v. Grinker, 8 F.3d 948 (2d Cir. 1993)	1989	NY Individuals receiving benefits from Aid to Families with Dependent Children, but have not received first \$ 50 of each month's support payment collected periodically by HRA	"All persons who are commissioners of social services districts in New York State."	Challenging \$50 pass through law
Williams v. State Bd. of Elections	696 F. Supp. 1574 (N.D. Ill.)	1988	Illinois voters	Five classes: All persons	Voters' suit about judicial elections

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defen- dant Class	Notes
				<p>elected (1) in county at-large elections, (2) elected in suburban-wide at-large elections, (3) in the city-wide at-large elections to seats on the Circuit Court of Cook County; (4) All persons elected or appointed to the Appellate Court of Illinois, First District; (5) All candidates for judicial vacancies in Cook County on the November, 1988 ballot.</p>	
United States v. Rainbow Family	695 F. Supp. 294 (E.D. Tex.)	1988	United States	Rainbow Family and its members	Seeking preliminary injunction against congregation without permit in national

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
					forest
Follette v. Vitanza	658 F. Supp. 492 (N.D.N.Y.), <i>vacated in part sub nom. Follette v. Cooper</i> , 671 F. Supp. 1362 (N.D.N.Y. 1987)	1987	Debtors whose wages were garnished	Enforcement officer class: all sheriffs, marshals, constables, or others empowered to enforce income executions upon the wages or other earnings of judgment debtors in NY	Suit based on Consumer Credit Protection Act
Flying Tiger Line, Inc. v. Cent. States	No. 86-304 CMW, 1986 U.S. Dist. LEXIS 17409 (D. Del.)	1986	Flying Tiger Line, Inc.	Pension funds to whom Tiger may be liable because of its prior ownership of Hall's Motor Company (up to 26 class members)	Tiger sought declaratory and injunctive relief that Tiger is not an "employer" and is therefore not subject to the MPPAA
<i>In re</i> Activision Sec. Litig.	No. C-83-4639(A) MHP, 1986 U.S. Dist. LEXIS 18834 (N.D. Cal.)	1986	Stockholders	Underwriters	Securities action

Appendix Table 1. Defendant Class Actions						
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes	
Davis v. Crush	646 F. Supp. 1192 (S.D. Ohio), <i>rev'd</i> , 862 F.2d 84 (6th Cir. 1988)	1986	Owner of medical clinic where abortions are performed	"Persons picketing [the area at issue] who have been personally served with this order as well as their officers, agents, servants, employees, attorneys and those persons in active concert or participation with them who receive personal service of the order."	Preliminary injunction overturned, no class certified	
Angel Music, Inc. v. ABC Sports, Inc.	112 F.R.D. 70 (S.D.N.Y.)	1986	Class of music publishers and music copyright owners	"[T]elevisi on networks, television stations, syndications such as motion picture studios and their television production affiliates, independent television program	Class certification denied; Alleged violation of the Copyright Act, 17 U.S.C. § 101	

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
				producers and others in the business of creating and selling television programs."	
Emp'rs. Ins. of Wausau v. FDIC	112 F.R.D. 52 (E.D. Tenn.)	1986	Insurers	Federal Deposit Insurance Corporation (FDIC) and individual directors and officers against whom claims were made by the FDIC	Class action motion denied
Akron Ctr. for Reprod. Health v. Rosen	110 F.R.D. 576 (N.D. Ohio), <i>rev'd sub nom.</i> Ohio v. Akron Ctr. for Reprod. Health 497 U.S. 502 (1990)	1986	Reproductive health clinic	City prosecutors throughout the state of Ohio	Constitutional challenge to parental notification by physicians who intended to perform certain abortions
Vargas v. Calabrese	634 F. Supp. 910 (D.N.J.)	1986	All qualified black and Hispanic voters in Jersey City who were re-	All district board workers employed throughout Jersey City on June 11,	Defendant class certification denied

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
			quired to produce several different forms of identification in order to vote.	1985 and all McCann challengers employed then.	
Mechigian v. Art Capital Corp.	612 F. Supp. 1421 (S.D.N.Y.)	1985	Purchaser of original artwork	"[A]ll former and present investors in the investment plan or plans conducted by defendants."	Brought as a securities case; claims dismissed
Green v. Harbin	615 F. Supp. 719 (N.D. Ala.)	1985	Judgment debtor	Alabama's circuit and district court clerks	Dismissed as to some defendants, but not all; alleged that the state's garnishment laws violated the Due Process Clause
<i>In re</i> Consumers Power Co. Sec. Litig.	105 F.R.D. 583 (E.D. Mich.)	1985	Investors who purchased common stock in Consumers Power Company	Three classes of underwriters (approximately 300 total)	Securities case
Rodriquez v. Twp. of DeKalb	No. 80 C 1509, 1984 U.S. Dist. LEXIS	1984	Applicants for welfare in DeKalb and Joliet	27 Illinois townships	Due process claim related to receiving general

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
	22302 (N.D. Ill.)		townships		assistance, defendant class not certified
Akerman v. Oryx Commc'n s, Inc.	609 F. Supp. 363 (S.D.N.Y.), <i>aff'd</i> , 810 F.2d 336 (2d Cir. 1987)	1984	Investors in Oryx Communications	All underwriters of Oryx	Securities case
Harris v. Graddick	593 F. Supp. 128 (M.D. Ala.)	1984	All black citizens of Alabama	All officials responsible for the appointment of poll officials (approximately 198 members)	Alleged that state appointed disproportionately too few black persons as poll officials, in violation of § 2 of the Voting Rights Act of 1965
Nw. Nat'l Bank of Minneapolis v. Fox & Co.	102 F.R.D. 507 (S.D.N.Y.)	1984	Banks making loans to Saxon Securities	All partners in auditing firm Fox & Company in designated time period	Alleged misrepresentations about Saxon (which went bankrupt)
<i>In re</i> Victor Techs. Sec. Litig.	102 F.R.D. 53 (N.D. Cal.), <i>aff'd</i> , 792 F.2d 862 (9th Cir. 1986)	1984	Purchasers of stock in question	Securities underwriters	Securities case
Klein v. Council of Chem. Ass'ns	587 F. Supp. 213 (E.D. Pa.)	1984	Individual exposed to chemical used in	"[M]anufacturers, distributors, and	Defendant class not certified

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
			printing process	suppliers of the offending carcinogens, acting individually or in concert or conspiracy with one another as members of various trade associations and lobbying groups."	
<i>In re</i> Fortune Sys. Sec. Litig.	No. C 83-3348(A), 1984 U.S. Dist. LEXIS 18090 (N.D. Cal.)	1984	Investors in Fortune Systems	Underwriters of Fortune Systems	Securities case
O'Connell v. David	35 B.R. 146 (E.D. Pa.), <i>aff'd</i> , 740 F.2d 958 (3d Cir. 1984)	1983	Chapter 13 trustee	"[I]ndividuals or business entities not licensed to practice law who were alleged to be counseling or advising debtors on the preparation and filing of bankruptcy petitions."	Bankruptcy action
Coleman v. McLaren	98 F.R.D. 638 (N.D. Ill.)	1983	Illinois Taxpayers	All Illinois counties other	Due process and equal

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
				than Cook County; all Illinois judges who do not sit in Cook County	protection claims
Cayuga Indian Nation of N.Y. v. Cuomo	565 F. Supp. 1297 (N.D.N.Y.)	1983	Cuyaga Indian Nation	"[A]ll other persons who assert an interest in any portion of the Original Reservation lands" (approximately 7,000 individuals and entities)	Land rights case
Thillens, Inc. v. Cmty. Currency Exch. Ass'n of Ill., Inc.	97 F.R.D. 668 (N.D. Ill.)	1983	Check cashing service	"17 named individual defendants, approximately 350 unnamed individual past and current members of the [Community Currency Exchange Association of Illinois, Inc.,] and	Charged conspiracy under anti-trust and RICO

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
				the more than 500 community currency exchanges owned by those members and represented by the Association."	
Wiggins v. Enserch Exploration, Inc.	743 S.W.2d 332 (Tex. Ct. App.)	1987	Corporation and company	The royalty interest owners in the Opelika Gas Unit	Seeking declaratory judgment on meaning of a royalty provision
Wash. Educ. Ass'n v. Shelton Sch. Dist. No. 309	613 P.2d 769 (Wash.)	1980	Statewide organization representing teachers in the K-12 public school system, local education associations, public school women coaches, several parents of school-age daughters.	Statewide organization of junior and senior high schools for interscholastic athletic competition, and 14 local school districts	Sex discrimination suit
Gellantly v. Chelan Cnty.	534 P.2d 1027 (Wash.)	1975	Washington taxpayers	Six WA counties and their officers	Class not certified, challenging levy

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
					limit of taxes
State <i>ex rel.</i> Erie Fire Ins. Co. v. Madden	515 S.E.2d 351 (W. Va.)	1998	Individuals who signed releases with the other insurance companies without court approval.	Insurance companies in West Virginia (approximately 300 companies)	Dismissed, no jurisdictional links
Planned Parenthood Ass'n of Cincinnati, Inc. v. Project Jericho	556 N.E.2d 157 (Ohio)	1990	Health clinic offering abortion services	"[P]ersons picketing [area at issue] who have been personally served with this order as well as their officers, agents, servants, employees, attorneys and those persons in active concert or participation with them who receive personal service of the order."	Seek to enjoin class from interfering with clinic's work
Dayton Women's Health Ctr. v. Enix	555 N.E.2d 956 (Ohio)	1990	Health clinic offering abortion services	Protestors of clinic	Seeking permanent injunction and damages assessed

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
					against the protestors
Carlson v. Indep. Sch. Dist. No. 283	370 N.W.2d 51 (Minn. Ct. App.)	1985	Female teachers who have been denied use of accumulated sick leave during periods of disability relating to pregnancy or child birth	"[A]ll school districts in Minnesota who are or were the employer of the plaintiff class."	Alleged discrimination by denying the use of sick pay for pregnancy and child-birth related disability during maternity leaves
Excelsior Springs v. Elms Redevelopment Corp.	18 S.W.3d 53 (Mo. Ct. App.)	2000	City and redevelopers	Timesharers in a local hotel	Suit to eliminate timesharers' property rights in hotel
State <i>ex rel.</i> Ashcroft v. Kansas City Firefighters Local No. 42	672 S.W.2d 99 (Mo. Ct. App.)	1984	State of Missouri	Members of Kansas City Firefighters Local No. 42. (approximately 700 members)	Seeking civil remedy for damages against a labor union to redress a strike by public employees, only applied to 12 named defendants not class
Exxon Corp. v. East Brunswick	470 A.2d 5 (N.J. Super. Ct. App. Div.)	1983	Exxon	"[A]ll taxing jurisdictions within the State in which	Tax court, related to taxing on storage tanks

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
				plaintiff owns or leases service stations having underground fuel storage tanks."	
Kronisch v. Howard Savs. Inst.	335 A.2d 587 (N.J. Super. Ct. Ch. Div.)	1975	Mortgagors	Mortgagees under federally insured residential mortgages	Class certification denied, seeking treble damages arising from an alleged conspiracy in restraint of trade under the New Jersey Anti-trust Act
Rochester v. Chiarella	448 N.E.2d 98 (N.Y.)	1983	City of Rochester	Real property taxpayers in Rochester	Suit to prevent a multiplicity of lawsuits concerning its prior levy of taxes in excess of constitutional limits
Leon N. Weiner & Assocs., Inc. v. Krapf	No. 8938, 1988 Del. Ch. LEXIS 8 (Del. Ch.)	1988	Corporate lot owner	203 lot owners of North Hills Subdivision,	Class not certified, seeking a declaratory

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
				New Castle County	judgment that the property was not subject to any restrictions
Regal Entm't Grp. v. Amaranth LLC	894 A.2d 1104 (Del. Ch.)	2006	Regal Entertainment Group, the issuer of a series of convertible notes	Noteholders (approximately 90 persons), represented by hedge fund	Dispute over method for calculating the number of shares of common stock
Glosser v. Cellcor Inc.	No. 12725, 1995 Del. Ch. LEXIS 16 (Del. Ch.)	1995	Investors	Underwriters	Securities case
<i>In re</i> Broadhollow Funding Corp.	66 B.R. 1005 (Bankr. E.D.N.Y.)	1986	Debtor (Broadhollow Funding Corp)	Investor-creditors of the brokerage business	To determine ownership
Funliner of Ala., LLC v. Pickard	873 So. 2d 198 (Ala.)	2003	All persons who played the video gaming machines over a period of time	Two classes: (1) owners of arcades in which there are 20 or more video-gaming machines for the public's use; (2) entities that lease the video-gaming machines to certain	Class not certified

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
				businesses throughout Alabama	
Kadish v. Ariz. State Land Dep't	747 P.2d 1183 (Ariz.)	1987	Arizona taxpayers	"All present and future mineral lessees of state lands."	Seeking declaratory judgment related to revenues from royalty on minerals
<i>In re</i> Dehon, Inc.	298 B.R. 206 (Bankr. D. Mass.)	2003	Plan administrator	All current and former direct or indirect holders of shares of common and/or preferred stock of Dehon, Inc. (1,000+ members).	Bankruptcy proceedings to subordinate the Stock Repurchase Claims to the claims of general unsecured creditors
<i>In re</i> Rusty Jones, Inc.	128 B.R. 1001 (Bankr. N.D. Ill.)	1991	Insurance company	Wisconsin auto rust-proofing warranty holders	Certification denied for lack of standing and adequate representation, sought declaratory judgment.
<i>In re</i> Cardinal Indus., Inc.	105 B.R. 834 (Bankr. S.D. Ohio)	1989	Debtors	"[A]ll persons and entities who have or obtain a	Certified defendant class for the sole issue of declara-

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
				mortgage or other security interest in property of a limited partnership in which CII or a wholly-owned subsidiary is a general partner."	tory relief
Mojica v. Automatic Emps. Credit Union	363 F. Supp. 143 (N.D. Ill.)	1973	Debtors	Creditors	Dismissed; sought declaratory judgment on automobile repossession and resale provisions in Illinois Commercial Code
Samuel v. Univ. of Pittsburgh	56 F.R.D. 435 (W.D. Pa.)	1972	Two female graduate students	21 named University defendants plus all other state and state-related universities and colleges in PA (71 members)	Challenging financial aid rulings when husband is deemed to be out-of-state
Hodgson v. Hamilton Mun.	349 F. Supp. 1125	1972	United States Depart-	Ohio courts, judges,	Related to OH law on gar-

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
Court	(S.D. Ohio)		ment of Labor	and clerks of court	nishment
Smith v. United Bhd. of Carpenters and Joiners of Am.	No. C 75-177, 1976 U.S. Dist. LEXIS 15980 (N.D. Ohio)	1976	Black citizens who were denied employment opportunities within the carpenter construction industry	All employers and/or contractors within the territorial jurisdiction of the union defendants	Alleged discriminatory employment practices
<i>In re</i> Bourns Patent Litig.	385 F. Supp. 1260 (J.P.M.L.)	1974	Patent owner	Companies accused of patent infringement	Certification not granted
Pennsylvania v. Local Union 542, Int'l Union of Operating Eng'rs	469 F. Supp. 329 (E.D. Pa.)	1978	"[M]inority workers involved in or desiring admittance to the operating engineer trade in Eastern Pennsylvania and Delaware."	Local union, 1400 construction contractors and employers receiving referrals through union; construction trade associations for the induction of new operating engineers.	Employment discrimination suit
<i>In re</i> the Gap Stores Sec. Litig.	79 F.R.D. 283 (N.D. Cal.)	1978	Investors	Underwriters	13 cases in multidistrict securities litigation
Institu-	78 F.R.D.	1978	Institu-	"[D]irecto	Class

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
tionalized Juveniles v. Sec'y of Pub. Welfare	413 (E.D. Pa.)		tionalized juveniles in Pennsylvania hospitals	rs of all mental health and mental retardation facilities in Pennsylvania which are subject to regulation by the defendant, Secretary of Public Welfare."	certified
United States v. Trucking Emp'rs, Inc.	75 F.R.D. 682 (D.D.C.)	1977	United States	"[C]omm on carriers of general commodity freight by motor vehicle that employed over-the-road drivers, were parties to or were bound by the national master freight agreement . . . employed at least 100 persons, and had annual gross revenues of at least \$1,000,00	Employment discrimination case

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
				0.”	
Mashpee Tribe v. New Seabury Corp.	427 F. Supp. 899 (D. Mass.)	1977	Mashpee Tribe	Landowners in the town of Mashpee	Property rights
Continental Nat'l Bank v. Mohr & Sons	No. 80 C 2642, 1980 U.S. Dist. LEXIS 13040 (N.D. Ill.)	1980	Debtors	Creditors	After bankruptcy proceedings
Marchwinski v. Oliver Tyrone Corp.	83 F.R.D. 606 (W.D. Pa.)	1979	Women cleaning personnel	Named defendants plus owners throughout the city who have employed members of the putative plaintiff class.	Class certification denied; Title VII claim and the Labor Management Relations Act claim
Payton v. Abbott Labs	83 F.R.D. 382 (D. Mass.)	1979	All women exposed in utero to a chemical supplied by defendants	All companies that manufactured DES.	Defendant class certification denied on typicality and representativeness
Lynch Corp. v. MII Liquidating Co.	82 F.R.D. 478 (D.S.D.)	1979	Lynch Corporation	MIJ shareholders of M-Tron Industries (290 members)	Defendant class certified
Mississippi United States v.	490 F. Supp. 569 (D.D.C.)	1979	State of Mississippi	U.S. and all black citizens and black registered	Pre-clearance for statutory reapportionment

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
				voters in Mississippi qualified to vote in state legislative elections	ment
Marcera v. Chinlund	91 F.R.D. 579 (W.D.N.Y.)	1981	Detainees held in county jails that did not have a contact visitation program	The sheriffs in charge of the jails	Defendant class certified.
Joseph L. v. Office of Judicial Support of the Court of Common Pleas of Del. Cnty.	516 F. Supp. 1345 (E.D. Pa.)	1981	"[A]ll individuals whose real property has been sold pursuant to the Act at a Delaware County tax sale."	All purchasers, heirs, and assigns, of lands sold at Delaware County Treasurer's tax sales pursuant to 72 P.S. §§ 5971a ff., who had not consummated a quiet title action against the property owners at the time that this action was instituted	Class not certified
<i>In re</i> Itel Sec. Litig.	89 F.R.D. 104 (N.D. Cal.)	1981	Purchasers of securities	Underwriters	Securities case
Stewart v. Winter	87 F.R.D. 760 (N.D. Miss.)	1980	All county jail prisoners statewide	MS sheriffs, boards of supervi-	Classes not certified

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
			in MS	sors, and county health officers	
McFarland v. Memorex Corp.	96 F.R.D. 357 (N.D. Cal.)	1982	Purchasers of common stock of Memorex Corporation	Underwriters	Securities case
<i>In re</i> Arthur Treacher's Franchise Litig.	93 F.R.D. 590 (E.D. Pa.)	1982	Franchisor	All franchisees who had executed written contracts with the company and failed to make royalty payments pursuant to the terms of the written contracts	Refused to certify under 23(b)(2)
Doss v. Long	93 F.R.D. 112 (N.D. Ga.)	1981	"[A]ll those who are now or will in the future be civil defendants in Georgia courts operating under the fee system, and also those threatened with actions in those courts."	State judges (1,000+)	Challenging fee system of paying judges by the case

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
Diamond v. Charles	476 U.S. 54	1986	Physicians who performed abortions	State's Attorneys in all the counties of the State of Illinois	Challenging abortion law
Bank of N.Y. v. Janowick	470 F.3d 264 (6th Cir.)	2006	Bank of New York	Employee-claimants of stock	To settle claims
Robinson v. Tex. Auto. Dealers Ass'n	387 F.3d 416 (5th Cir.)	2004	Car buyers	Texas car dealerships	Class not certified
S. Ute Indian Tribe v. Amoco Prod. Co.	151 F.3d 1251 (10th Cir.)	1998	Ute Indian Tribe	All persons, except the Tribe and governmental entities, who claim an ownership interest in coalbed methane	Resolve ownership of coalbed mine
Socialist Workers Party v. Leahy	145 F.3d 1240 (11th Cir.)	1998	Socialist Workers Party and Florida Green Party	All sixty-seven Florida county supervisors of elections	Constitutional challenge
Consol. Rail Corp. v. Hyde Park	47 F.3d 473 (2d Cir.)	1995	Interstate railroad, Conrail	Assessing jurisdictions and taxing districts around the state	Alleging violations of the Railroad Revitalization Act and Regulatory Reform Act
League of	999 F.2d	1993	Voters	Texas	Voting

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
United Latin Am. Citizens, Council No. 4434 v. Clements	831 (5th Cir.)		and citizens' league	officials responsible for enforcing a statute	Rights Act
Bachelier v. Hamilton Cnty., Ohio	No. 90-3725, 1991 U.S. App. LEXIS 8829 (6th Cir.)	1991	Planned Parenthood	Abortion protestors outside clinic	Seek to enjoin class from interfering with clinic's work
Real Estate Alliance, Ltd. v. Sarkisian	No. 05-cv-3573, 2007 U.S. Dist. LEXIS 70339 (E.D. Pa.)	2007	Patent holder	Realtors accused of patent infringement	Class certification denied
Albrecht v. Treon	No. 1:06cv274, 2007 U.S. Dist. LEXIS 18613 (S.D. Ohio)	2007	Next of kin of deceased	"[A]ll county coroners and/or medical examiners in the State of Ohio that have removed, retained, and disposed of body parts without prior notice to next of kin." (87 counties)	Class certified
Moffat v. Unicare Midwest Plan Grp. 314541	No. 04 C 5685, 2006 U.S. Dist. LEXIS	2006	Individuals insured under Unicare Midwest	"Unicare Defendants and ERISA Plans that	Class not certified

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Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
	16348 (N.D. Ill.)		Plan Group	received claims from participants and beneficiaries for Infusion Therapy from Participating Providers and who did not pay that part that exceeded Covered Expenses.”	
Iowa Ass’n of Bus. & Indus. v. Efcu Corp.	No. 4:04-cv-40270, 2005 U.S. Dist. LEXIS 2382 (S.D. Iowa)	2005	Trade association	Underwriters	Dismissed, claim was under Employee Retirement Income Security Act (ERISA)
Aid for Women v. Foulston	327 F. Supp. 2d 1273 (D. Kan.)	2004	Health care workers	All Kansas county and district attorneys	Seeking declaratory judgment on reporting requirements
Doe v. Miller	216 F.R.D. 462 (S.D. Iowa)	2003	Sex offenders currently living in Iowa	All county attorneys in Iowa	Constitutional challenge to Iowa statute
Forbes v. Woods	71 F. Supp. 2d 1015 (D.	1999	Arizona physicians	All County Attorneys	Constitutional challenge

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Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
	Ariz.)			who have the authority to enforce A.R.S. § 36-2303	of law related to fetal research
Sebo v. Rubenstein	188 F.R.D. 310 (N.D. Ill.)	1999	Patients	Urologists and shareholders	Conspiracy
N.C. Right To Life, Inc. v. Bartlett	No. 5:96-CV-835-BO(1), 1998 U.S. Dist. LEXIS 6443 (E.D.N.C.)	1998	Political organizations and officers	District attorneys from all 39 state prosecutorial districts	Certification denied
<i>In re</i> Chambers Dev. Sec. Litig.	912 F. Supp. 822 (W.D. Pa.)	1995	"All persons who purchased or acquired Chambers Development Company, Inc., securities from March 18, 1988, through October 20, 1992, inclusive."	All persons who are or were partners of Grant Thornton during the class period.	Securities case
<i>In re</i> Marion Merrell Dow Inc., Sec. Litig.	No. 92-0609-CV-W-6, 1994 U.S. Dist. LEXIS 10053 (W.D. Mo.)	1994	Purchasers of securities of Marion Merrell Dow Inc	Underwriters	Securities case
Deloitte Noraudit A/S v.	148 F.R.D. 523	1993	Deloitte Noraudit	All member firms of Deloitte	Contractual case after

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
Deloitte Haskins & Sells	(S.D.N.Y.)			Haskins & Sells International; Deloitte Ross Tohmatsu International	merger
Endo v. Albertine	147 F.R.D. 164 (N.D. Ill.)	1993	Stock purchasers	Underwriters	Securities case
Resolution Trust Corp. v. KMPG Peat Marwick	No. 92-1373, 1992 U.S. Dist. LEXIS 16670 (E.D. Pa.)	1992	Resolution Trust Corporation	All persons who were partners of either Main Hurdman or KMG Main Hurdman in designated time periods	Suit alleging wrongful preparation of financial documents
<i>In re</i> Phar-Mor, Inc. Sec. Litig.	875 F. Supp. 277 (W.D. Pa.)	1994	Equitable Life Assurance Society, et al	Coopers & Lybrand partners and principals	Fraudulent financial activities
Pabst Brewing Co. v. Corrao	161 F.3d 434 (7th Cir.)	1998	Pabst Brewing Company	Retirees	Declaratory judgment on pensions under ERISA
Dale Elecs., Inc. v. R.C.L. Elecs., Inc.	53 F.R.D. 531 (D.N.H.)	1971	Electronics business	Electronics corporations	Patent infringement
LaMar v. H&B	489 F.2d 461 (9th	1973	Customers of pawn	All the pawn	Certification de-

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Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
Novelty & Loan Co.	Cir.)		brokers in Oregon	brokers licensed to conduct business under the laws of Oregon	nied
<i>In re</i> Catawba Indian Tribe Of S.C.	973 F.2d 1133 (4th Cir.)	1992	Catawba Indian Tribe	Occupants and holders of disputed land	Certification denied, sought writ of mandamus
Technograph Printed Circuits, Ltd. v. Methode Elecs., Inc.	285 F. Supp. 714 (N.D. Ill.)	1968	Holder of patents in dispute	"Six subclasses of potential patent infringers; Class 1: All parties who have been or are manufacturing printed circuits by any process claimed in United States Patent No. 2,441,960 or who have been hereafter and before September 5, 1967, notified that they have infringed."	Patent infringement
Weiner v. Bank of King of	358 F. Supp. 684 (E.D. Pa.)	1973	Customers and/or borrowers	Named banks plus all other	Motion dismissed

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Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
Prussia			of national banks in this court's jurisdiction	national banks within jurisdiction	
Coniglio v. Highwood Servs., Inc.	60 F.R.D. 359 (W.D.N.Y.)	1972	All persons who held season tickets for regularly scheduled football games presented by defendant football team	All NFL teams which require their season ticket holders to purchase tickets to exhibition games as well as to regular season games	Defendant class not certified
Ross v. Gerung	69 So.2d 650 (Fla.)	1954	Individual who made repairs to church building	All members of unincorporated religious association	Seeking damages for unpaid bill
O'Connell v. David	35 B.R. 141 (Bankr. E.D. Pa.)	1983	Bankruptcy trustee	"[I]ndividuals and variously styled business entities, none of which are licensed or regulated practitioners of law, nor members in good standing of the Bar of this	Unauthorized practice of law

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
				Court or any other court in the Commonwealth of Pennsylvania or the District Court for the Eastern District of Pennsylvania, who have engaged, or in the future will engage, in any of the activities set forth in our Opinion."	
Marchwinski v. Oliver Tyrone Corp.	81 F.R.D. 487 (W.D. Pa.)	1979	Female employees	"[T]hirty to fifty employers in the City of Pittsburgh who are similarly situated to Oliver Tyrone."	Certification not allowed on Title VII claims as matter of law
Research Corp. v. Pfister Associated Growers, Inc.	301 F. Supp. 497 (N.D. Ill.)	1969	Holder of patent	Over 400 seed corn producers	Patent infringement
<i>In re</i> Hotel Tel. Charges	500 F.2d 86 (9th Cir.)	1974	Hotel guests (approximately 40	Hotels (hundreds)	Class not certified

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defen- dant Class	Notes
			million)		
Pipkorn v. Village of Brown Deer	101 N.W.2d 623 (Wis.)	1960	Resident	Beneficiaries of a water trust	Concerning illegal transfer of water trust
Mgmt. Television Sys., Inc. v. NFL	52 F.R.D. 162 (E.D. Pa.)	1971	Operator of closed circuit television systems	Football clubs who are members of the National Football League	Antitrust suit. Defendant class certified.
Kline v. Coldwell, Banker & Co.	508 F.2d 226 (9th Cir.)	1974	Residential home sellers	All real estate brokers who were members of the Los Angeles Realty Board during the 4-year period prior to the filing of the action	Class not certified
Danforth v. Christian	351 F. Supp. 287 (W.D. Mo.)	1972	Attorney General of Missouri	"[A]ll officers and other officials of the state and its political subdivisions charged with enforcement and application of the challenged state laws."	Seeking declaratory judgment related to voting eligibility
Mudd v.	68 F.R.D.	1975	Criminal	All judi-	Defense

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
Busse	522 (N.D. Ind.)		pre-trial detainees	cial officers in Indiana	class not certified
Washington v. Lee	263 F. Supp. 327 (M.D. Ala.)	1966	Current or former prisoners of Alabama state, county, or municipal penal institutions	Wardens, jailers and sheriffs in the State of Alabama	Challenging racial segregation of prisoners
Turpeau v. Fid. Fin. Servs., Inc.	936 F. Supp. 975 (N.D. Ga.)	1996	Borrowers and life insurance insureds	Lenders and life insurers	Defendant class not certified
City of Lebanon v. Holman	402 S.W.2d 832 (Mo. Ct. App.)	1966	City of Lebanon	Property owners of land in dispute	Class not certified, seeking to annex land
City of St. Ann v. Buschard	299 S.W.2d 546 (Mo. Ct. App.)	1957	City of St. Ann	Property owners of land in dispute	Annexation case
Kane v. Fortson	369 F. Supp. 1342 (N.D. Ga.)	1973	Married women who are affected by law in question	All members of Boards of Registrars throughout Georgia.	Challenging law that denies married women in Georgia the right to establish a domicile and residence for voting purposes independent of that of her husband
Adashu-	626 F.2d	1980	School	State and	Classes

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
nas v. Negley	600 (7th Cir.)		children with specific learning disabilities who were not receiving adequate special education	local educational agency members	not certified
Osborn v. Pa.-Del. Serv. Station Dealers Ass'n	94 F.R.D. 23 (D. Del.)	1981	All persons residing in Delaware and Pennsylvania who attempted unsuccessfully to purchase gasoline from a member of the defendant class during the boycott	All service station members of the Pennsylvania-Delaware Service Stations Dealers Association (3,700 members)	Anti-trust
United States v. Truckee-Carson Irrigation Dist.	71 F.R.D. 10 (D. Nev.)	1975	United States	Truckee River Permittees and Newlands Project certificate holders who are members of the TCID	Water rights case
Contract Buyers League v. F & F Inv.	48 F.R.D. 7 (N.D. Ill.)	1969	Minority buyers of houses under land	Home sellers and mortgage lenders	Defendant class not certified, alleged

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
			contracts		fraud in the sale of houses under land contracts.
Paxman v. Campbell	612 F.2d 848 (4th Cir.)	1980	Pregnant public school teachers in VA	"[A]ll persons who were or are, during the period December 6, 1969 to June 25, 1975, members of a public county or city school board of the Commonwealth of Virginia which required that a pregnant school teacher cease her teaching at some time during the period of pregnancy other than a time of her own choosing."	Class action reversed on appeal
Benzoni v. Greve	54 F.R.D. 450 (S.D.N.Y.)	1972	Buyers of shares in Sequoyah Industries	There are three actions in this case: 1) Ben-	Securities case

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
				zoni: Sequoyah, Merrill Lynch and 15 members of the syndicate of Underwriters, and ten of the selling stockholders who signed the registration statement. 2) Goldman No. 1: Sequoyah, Merrill Lynch, and ten of	

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
				the selling stockholders who signed the registration statement. 3)Goldman No. 2: Sequoyah, Greve personally and as a representative of the selling stockholders, and Merrill Lynch individually and as a representative of the under-	

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
				writers.	
Tucker v. City of Montgomery Bd. of Comm'rs	410 F. Supp. 494 (M.D. Ala.)	1976	Indigent prisoners	Mayors and recorders throughout the state of AL	Challenging constitutionality of the practice authorized by state statute of confining indigent prisoners to jail in order to allow them to work out fines which they were unable to pay
Guarantee Ins. Agency Co. v. Mid-Cont'l Realty Corp.	57 F.R.D. 555 (N.D. Ill.)	1972	Buyers of stock	Underwriters	Securities case
Hopson v. Schilling	418 F. Supp. 1223 (N.D. Ind.)	1976	All indigent persons in the state	All township trustees in the state that were responsible for administering the state's welfare laws	Certification of defendant class of township trustees is granted based on common juridical link.
Ragsdale v. Turnock	625 F. Supp. 1212 (N.D. Ill.)	1985	Physicians performing or	State's attorneys for all of the coun-	Challenging state law

Appendix Table 1. Defendant Class Actions					
Case	Cite	Year	Plaintiff / Plaintiff Class	Defendant Class	Notes
			desiring to perform abortions in the state of Illinois	ties in the state.	
Endo v. Albertine	147 F.R.D. 164 (N.D. Ill.)	1993	Stock purchasers	Underwriters	Defendant class certified only as to the issue of materiality of the alleged misstatements and omissions
Ruocco v. Brinker	380 F. Supp. 432 (S.D. Fla.)	1974	All real property owners in the State of Florida whose real property has or may be encumbered by a Claim of Lien under the Mechanics' Lien Law of Florida	All clerks of the judicial circuits in the State of Florida	Bilateral class action is granted. Plaintiff and defendant classes are certified.
Dudley v. Se. Factor & Fin. Corp.	57 F.R.D. 177 (N.D. Ga.)	1972	Receiver for the Insurance Investors Trust Company	All present and former shareholders of SEFAF who re-	Case may proceed as a class action; defendant class certified.

Case	Cite	Year	Plaintiff / Plaintiff Class	Defen- dant Class	Notes
				ceived preferred shares of stock in Atlantic Services	

