



Notre Dame Law Review

Volume 88 | Issue 1 Article 5

11-1-2012

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Recommended Citation

Jane Y. Bambauer, *The New Intrusion*, 88 Notre Dame L. Rev. 205 (2012). Available at: http://scholarship.law.nd.edu/ndlr/vol88/iss1/5

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THE NEW INTRUSION

Jane Yakowitz Bambauer*

The tort of intrusion upon seclusion offers the best theory to target legitimate privacy harms in the information age. This Article introduces a new taxonomy that organizes privacy regulations across four key stages of information flow—observation, capture (the creation of a record), dissemination, and use. Privacy scholars typically propose placing constraints on the dissemination and re-use of personal information, and these dominant models are at the heart of President Obama's Consumer Privacy Bill of Rights. But these restrictions conflict with the First Amendment and other important shared values. Instead, observation is the most promising stage for legal intervention.

Intrusion imposes liability for conduct—offensive observations. The tort is theoretically coherent and constitutionally sound because an individual's interests in seclusion co-exist comfortably with society's interests in data dissemination. This puts intrusion in stark contrast with other privacy models, where the alleged harm is a direct consequence of an increase in knowledge. The classic intrusion tort can adapt sensibly to new technologies when it is reduced to two essential elements: (1) an observation, (2) that is offensive. This approach vindicates privacy law's historical roots in torts and offers a path to principled privacy regulation.

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Introduction

Before Ralph Nader became a household name for his exposé of the American automobile industry, Unsafe at Any Speed, General Motors caught wind of the project and mounted an ill-fated intimidation campaign.1 GM's agents interviewed Nader's friends and acquaintances to gather information that might be embarrassing for the activist—"his political, social, . . . and religious views, . . . sexual proclivities, . . . and [odd] personal habits."2 GM hired people to shadow Nader incessantly. At one point, an agent followed Nader into a bank and got sufficiently close to see the exact denomination of bills Nader received from the teller.3 GM also arranged for young women to proposition him with the hopes of entrapping him into an affair.4 Nader sued the car manufacturer. The New York Court of Appeals found the surveillance practices of GM's agents could be intrusive and tortious.⁵ In assessing GM's conduct, the court famously opined that "[a] person does not automatically make public everything he does merely by being in a public place."6

The tort of intrusion imposes liability on anyone "who intentionally intrudes . . . upon the . . . seclusion of another . . . if the intrusion would be highly offensive to a reasonable person." The interest protected by the tort is the right to respite from observation and judgment so that, when we do participate socially, we can be more engaged and ethical participants. Importantly, liability for intrusion has nothing to do with the content of the information discovered. When GM's spy leaned in to observe the exact denominations of bills that Nader was receiving from the bank teller, it constituted an intrusion regardless of whether Nader received twenty dollars, two thousand dollars, or a kitten. The tort's focus on behavior, as opposed to

¹ Nader v. Gen. Motors Corp., 255 N.E.2d 765, 767 (N.Y. 1970).

² *Id*.

³ Id. at 771.

⁴ Id. at 767.

⁵ *Id.* at 771. The other conduct, while relevant to Nader's claim for Intentional Infliction of Emotional Distress, did not constitute intrusion upon seclusion. *Id.* at 770

⁶ Id. at 771.

⁷ Restatement (Second) of Torts § 652B (1977).

⁸ $\,$ $\it See infra$ Part II for a discussion of the theoretical underpinnings of a right to seclusion.

^{9 &}quot;Where there is intrusion, the intruder should generally be liable whatever the content of what he learns." Pearson v. Dodd, 410 F.2d 701, 705 (D.C. Cir. 1969). The tort "consists solely of an intentional interference with his interest in solitude or seclusion, either as to his person or as to his private affairs or concerns, of a kind that would be highly offensive to a reasonable man." Restatement (Second) of Torts

content, allows intrusion to coexist comfortably with the First Amendment and other core liberal values that safeguard information exchange. The intrusion tort penalizes conduct—offensive observations—not revelations.

Intrusion has great, untapped potential to address privacy harms created by advances in information technology. Though the tort is associated with conduct in real space, its principles apply just as well to operations in the era of Big Data. Suppose GM's agents followed Nader into a large retail store. There, they observed not only Nader's general movement throughout the store, but his specific shopping habits. Suppose they made note of every product Nader browsed, even if he did not put them in his shopping cart. They recorded that he replaced the box of (generically branded) Colossal Crunch with Cap'n Crunch after seeing that the name brand cereal was on sale. And, inexplicably, they knew he decided to come to the store after seeing an advertisement in a newspaper he had been reading earlier in the day. Outlandish as this scenario would be in the physical world, it is entirely consistent with common practices in e-commerce.

Mind-boggling quantities of personal data are logged and collected every time we use our iPhones, tablets, and other gadgets. As companies have increasing access to our data exhaust—data detailing what we have looked at, where we have been, and what we have bought—scholars have become understandably concerned that the

§ 652B cmt. a (1977). "The intrusion itself makes the defendant subject to liability, even though there is no publication or other use of any kind of the photograph or information outlined." Id. cmt. b. A few courts and jurisdictions have gotten this wrong, and have found that seclusion cannot be intruded if the same information could have been learned through proper means. See, e.g., Fletcher v. Price Chopper Foods of Trumann, Inc., 220 F.3d 871, 876 (8th Cir. 2000) (holding that "unauthorized release of medical information does not constitute highly offensive conduct when that information could have been obtained by proper means"); Remsburg v. Docusearch, Inc., 816 A.2d 1001, 1009 (N.H. 2003) (holding that because work address information is "readily observable by members of the public," no cause of action for intrusion upon seclusion can be maintained). These opinions miss the heart of the tort, and are anomalous. Some courts also use the tort of intrusion to address harassing behavior that fits the tort of intentional infliction of emotional distress better, as when a debt collector makes incessant, hostile phone calls to a person believed to be the debtor. See, e.g., Norris v. Moskin Stores, Inc., 132 So. 2d 321, 323 (Ala. 1961) (recognizing a claim for invasion of privacy based on wrongful intrusion when a creditor takes unreasonable actions to collect on a debt). These, too, are not representative of the tort. Moreover, statutes that outlaw similar behavior (so-called "trespass by telephone" statutes) are on constitutionally infirm ground. See, e.g., People v. Pierre-Louis, 2011 N.Y. Slip Op. 21254, at *4 (2011) (holding that repeated calls to a district attorney could not be banned because of the First Amendment's free speech guarantee).

information economy has thrust consumers into a new frontier with very little rule of law or consensus of ethics to guide the treatment of personal data.

Contemporary privacy scholarship shuns the old common law privacy torts, contending they are not relevant in the era of ubiquitous computing.¹⁰ Instead, privacy scholars aim to give consumers control over the information that describes them. Paul Schwartz advocates for a right to limit the dissemination of our personal information through quasi-property rights and, in some circumstances, to claw it back from the companies that have it.¹¹ Joel Reidenberg argues that the United States should pass comprehensive data privacy legislation comparable to the European Union's Data Protection Directive.¹² And anticipating a First Amendment challenge to expansive privacy laws, Neil Richards argues that policymakers can (and should) regulate personal information the way they regulate any other commodity.¹³ Efforts by the legal academy and consumer advocates have inspired lawmakers, including the Obama Administration, to put forward new laws creating property interests in our personal information.¹⁴ President Obama's Consumer Bill of Rights aims to give consumers "the right to control personal information about themselves."15 But these laws and

¹⁰ Neil M. Richards, The Limits of Tort Privacy, 9 J. on Telecomm. & High Tech L. 357, 359 (2011); see also Danielle Keats Citron, Mainstreaming Privacy Torts, 98 Cal. L. Rev. 1805, 1805 (2010); Jerry Kang, Information Privacy in Cyberspace Transactions, 50 Stan. L. Rev. 1193, 1231 (1998); Jessica Litman, Information Privacy/Information Property, 52 Stan. L. Rev. 1283, 1304 & n.94 (2000); Neil M. Richards & Daniel J. Solove, Prosser's Privacy Law: A Mixed Legacy, 98 Cal. L. Rev. 1887, 1918 (2010); Paul M. Schwartz, Privacy and Democracy in Cyberspace, 52 Vand. L. Rev. 1607, 1634 (1999).

 $^{11\,\,}$ Paul M. Schwartz, Property, Privacy, and Personal Data, $117\,\,\mathrm{Harv}.$ L. Rev. 2055, 2095 (2004).

¹² Joel R. Reidenberg, Restoring Americans' Privacy in Electronic Commerce, 14 BERKELEY TECH. L.J. 771, 788 (1999).

¹³ Neil M. Richards, *Reconciling Data Privacy and the First Amendment*, 52 UCLA L. Rev. 1149, 1165, 1171–72 (2005). The First Circuit adopted Richards's strategy, and ruled that prescription data held by a large data aggregator could be regulated for the same reasons that beef jerky can. IMS Health Inc. v. Ayotte, 550 F.3d 42, 53 (1st Cir. 2008). The opinion was effectively overruled by the Supreme Court's decision in *Sorrell v. IMS Health Inc.*, 131 S. Ct. 2653 (2011). *But see* Richards, *supra* note 10, at 376 (noting that First Amendment rights must trump privacy interests, at least in the context of the public disclosure tort, because free speech is the more important value).

¹⁴ Commercial Privacy Bill of Rights Act of 2011, S. 799, 112th Cong. (2011); Press Release, White House, Fact Sheet: Plan to Protect Privacy in the Internet Age by Adopting a Consumer Privacy Bill of Rights (Feb. 23, 2012) [hereinafter Consumer Privacy Bill of Rights], available at http://www.whitehouse.gov/the-press-office/2012/02/23/fact-sheet-plan-protect-privacy-internet-age-adopting-consumer-privacy-b?utm_source=wh.gov&utm_medium=shorturl&utm_campaign=shorturl.

¹⁵ Consumer Privacy Bill of Rights, supra note 14.

proposals create rigid restrictions on the dissemination and re-use of accurate information without fully accounting for the significant social costs of propertizing facts.

This Article makes two contributions to the scholarly discourse—one organizational and one normative. First, it develops a new taxonomy that tracks the flow of data. Personal information passes through four distinct states where regulation can apply: observation, capture (when a record is created), dissemination, and use. While existing taxonomies organize the theories of information privacy across the harms experienced, the framework introduced here flips the orientation. First it determines *how* information can be regulated, and then it analyzes the nature of the harm. By focusing on the practical effects of regulation, the competing interests in privacy and information flow can be evaluated in a consistent manner.

Second, the Article employs the taxonomy to make normative claims about the current and future state of American privacy law among private actors.¹⁷ Popular privacy proposals, though politically expedient, will undermine the public's interests in innovation and knowledge-production. In contrast, regulation targeting information flow at its source—at the point of observation—can be significantly expanded without running into conceptual pitfalls.

The intrusion tort is the quintessential example of a restriction on observation.¹⁸ This Article proposes an expansion of the intrusion tort to fit the modern technological landscape. Intrusion should provide recourse not for the creation of personal data, which is a necessary byproduct of well-functioning technologies, but for the *observation*

¹⁶ Daniel J. Solove, Conceptualizing Privacy, 90 CAL. L. REV. 1087, 1151 (2002).

¹⁷ Future work will use the taxonomy to assess privacy policies for information in the state's possession.

Jay McClurg touted the virtues of intrusion tort, though none fully develop it. Andrew Jay McClurg touted the virtues of intrusion and gave definition to the aims of the tort, but ultimately gave up on the tort as helpful for any actions taken in public that are voluntarily revealed. Andrew Jay McClurg, *Bringing Privacy Law Out of the Closet: A Tort Theory of Liability for Intrusions in Public Places*, 73 N.C. L. Rev. 989, 1054 (1995). Lyrissa Lidsky proposes the expansion of the intrusion tort through the creation of a newsgatherer's privilege, which could take pressure off courts that might be reluctant to impose intrusion liability for fear of interfering with the news media's important functions. Lyrissa Barnett Lidsky, *Prying, Spying, and Lying: Intrusive Newsgathering and What the Law Should Do About It*, 73 Tul. L. Rev. 173, 173 (1998). More recently, in describing the limitations on the tort of public disclosure, Neil Richards has concluded that "the law should focus on preventing unwanted collections or accumulations of information, rather than preventing the dissemination of already-collected information" and recommends turning to the tort of intrusion to do so. Richards, *supra* note 10, at 383.

of that data. Since the intrusion tort is conceptually adaptable to changing technology, legal enforcement of the right to seclusion can expand sensibly, outlawing the most disconcerting data practices without imposing unrealistic demands on industry and regulatory enforcement agencies.¹⁹

A valuable side effect of this project is its vindication of American privacy law's origins in tort.²⁰ Because the contours of tort law are designed in reference to broader societal interests rather than the interest of a single particular victim, tort is in the best position to address new information problems. It can target and deter practices that eventually reveal themselves to be truly harmful without taking a premature position on how much data is "too much."²¹ The Article joins a new wave of pragmatic privacy scholarship bringing precision and rigor to the discourse.²² It does not recycle the First Amendment

- 20 See generally Richards, supra note 10 (discussing the impact of Richards & Solove, supra note 10); Samuel D. Warren & Louis D. Brandeis, The Right to Privacy, 4 HARV. L. REV. 193 (1890) (arguing that the common law allowed for a general right to privacy).
- 21 The HEW Report, drafted in 1973 and heralded as the seminal source of fair information practices, has a subsection titled "Too Much Data." U.S. Dept. of Health, Educ. & Welfare, Records, Computers and the Rights of Citizens 13 (1973) [hereinafter HEW Report].
- 22 See M. Ryan Calo, The Boundaries of Privacy Harm, 86 Ind. L.J. 1, 9 n.41 (2011); see also Jacqueline D. Lipton, Mapping Online Privacy, 104 Nw. U. L. Rev. 477, 482–84 (2010) (acknowledging that many privacy responses, including the European Union's Data Protection Directive are ill equipped to respond to privacy issues inherent to user-generated Web content); Felix T. Wu, Privacy and Utility in Data Sets, 84 U. Colo. L. Rev (forthcoming 2013).

¹⁹ Europe is experiencing increasing difficulty enforcing its strict data privacy laws without forcing European websites and devices to adopt needlessly clunky interfaces. Marisa Taylor, Europe Approves New Cookie Law, Wall St. J. (Nov. 11, 2009, 11:13 AM), http://blogs.wsj.com/digits/2009/11/11/europe-approves-new-cookie-law/ ?mod=. The European Union is struggling to enact and make sense of the Privacy and Electronic Communications Directive (E-Directive), which requires all European countries to enact laws requiring websites to obtain consent before placing cookies on computer users' machines. Implementation of the Directive has been so difficult that the Information Commissioner's Office in the United Kingdom issued a press release announcing that enforcement would not begin for another year. See Press Release, Information Commissioner's Office, ICO Gives Website Owners One Year to Comply with Cookies Law (May 25, 2011), available at http://www.ico.gov.uk/~/media/documents/pressreleases/2011/enforcement_cookies_rules_news_release_20110525.pdf; see also Siobhain Butterworth, Cookie Law Shambles Really Takes the Biscuit, Guardian (May 27, 2011, 10:31 AM) http://www.guardian.co.uk/law/butterworth-and-bowcotton-law/2011/may/27/cookie-law-shambles-web-browsers. Some commentators have criticized the cookie law, arguing that enforcement is bound to be either arbitrary and capricious or a fool's errand. See, e.g., The Stupid EU Cookie Law in 2 1/2 Minutes, http://www.youtube.com/watch?v=ARWJA0jVPAc (last visited Sept. 11, 2012).

critiques of Eugene Volokh²³ or the skepticism of Richard Posner.²⁴ Rather, it recognizes that if privacy proposals continue to eschew rigorous analysis and to ignore countervailing commitments to the free flow of facts, they will dilute the salience of concrete problems.

We proceed in four Parts. Part I introduces the taxonomy and shows why the dominant, property-based privacy law approach has floundered. Part II articulates the virtues of regulating personal information at the source of information flow—the point of observation. The tort of intrusion is already conceptually flexible and is poised to be adapted to new types of invasive observations. Part III shows how intrusion can be applied to modern settings such as Web tracking technologies and GPS. Part IV shows why American law will have difficulty crafting principled regulations on information flow after a legitimate, legal observation has been made.

I. Personal Information Problems

This Article starts from the assumption that true personal information can cause problems. That is, the subjects described by accurate personal information can suffer losses that satisfy Ruth Gavison's definition of "actionable violations of privacy" because they are predictable in advance and undesirable for society.²⁵

This Part organizes the potential risks and harms caused by personal information into a model of information flow. It then summarizes the most common scholarly responses, and concludes by showing that the privacy law scholars' attachment to a property-style theory of privacy protection has blinded the Academy to better solutions that sound in tort.

A. The Four Regulable States of Personal Information Flow

Personal information flows pass through four regulable stages: observation, capture, dissemination, and use. *Observation* occurs when information is perceived by another. *Capture* is the creation of a record of the information in any medium, such as a photograph, an audio recording, a writing, or a digital log. *Dissemination* is the transmission of the information from one person or entity to another. And *use* occurs when a piece of information directly affects an outcome or

²³ See generally Eugene Volokh, Freedom of Speech and Information Privacy: The Troubling Implications of a Right to Stop People from Speaking About You, 52 Stan. L. Rev. 1049 (2000) (arguing that broad information privacy rules are not easily defensible under existing free speech law).

²⁴ RICHARD A. POSNER, THE ECONOMICS OF JUSTICE 272 (1981).

²⁵ Ruth Gavison, Privacy and the Limits of Law, 89 YALE L.J. 421, 423 (1980).

determination about the person described by the information.²⁶ These four stages need not occur in any particular order. In fact, a stage need not occur at all. If a police officer sees a man selling narcotics (observation), he will likely arrest the man (use), and only later complete a police report documenting the incident (capture). If Annie observes Lucy with a piece of toilet paper stuck to her shoe, she might tell Candice, who then tells Lindsay. The information will have been observed and disseminated, but it can dissolve into the ether without ever having passed through the stages of capture and use.

Privacy regulations place restrictions on personal information at one or more of these four stages of information flow. For example, the Wiretap Act prohibits the observation of other peoples' telephone conversations.²⁷ Video voyeurism laws prohibit certain types of video capture.²⁸ The Health Insurance Portability and Accountability Act of 1996 ("HIPAA") restricts the dissemination of health records.²⁹ The Americans with Disabilities Act of 1990 prohibits the use of disability information in employment decisions.³⁰ Some privacy laws craft complex restrictions over multiple stages, but the varied parts of these regulations nevertheless can be organized across these four stages.³¹

²⁶ This matches the European Union Data Protection Directive, which imposes limitations when data is "used for taking measures or decisions regarding any particular individual." Directive 95/46/EC, of the European Parliament and of the Council of 24 October 1995 on the Protection of Individuals with Regard to the Processing of Personal Data and on the Free Movement of Such Data, art. 13(2), 1995 O.J. (L 281) 31, 42, available at http://eur-lex.europa.eu/LexUriServ/LexUriServ.do?uri=CELEX: 31995L0046:en:HTML (last visited Oct. 11, 2012) [hereinafter EU Data Protection Directive].

^{27 18} U.S.C. §§ 2510–2522 (2006).

²⁸ Video Voyeurism Prevention Act, id. § 1801.

²⁹ Pub. L. No. 104-191, 110 Stat. 1936 (codified as amended in scattered sections of 18, 26, 29, and 42 U.S.C.).

³⁰ Pub. L. No. 101-336, 104 Stat. 327 (codified in scattered sections of 42 U.S.C.).

³¹ The EU Data Protection Directive bans the "processing" of data without the subjects' consent. Processing is "any operation or set of operations which is performed upon personal data, whether or not by automatic means, such as collection, recording, organization, storage, adaptation or alteration, retrieval, consultation, use, disclosure by transmission, dissemination or otherwise making available, alignment or combination, blocking, erasure or destruction." EU Data Protection Directive, *supra* note 26, art. (2) (b). Processing could constitute a distinct stage in the information flow, along with observation, capture, dissemination, and use. But while processing might mark a distinct phase, it is not one that is "regulable" under the First Amendment or the American normative commitments to information. Regulations proscribing the analysis of accurate data do not weed out inferences and heuristics. Instead, they invite inferences based on hunch. Moreover, if a relationship between two characteristics is very strong, processing can be so unavoidable as to be indistinguishable

The stages are natural points for regulation because the risk of harm associated with a piece of information changes when it enters each new stage. A personal fact can only cause so much damage if it is never captured in a medium that can be easily shared and stored. Likewise, the chance of harm is limited if a piece of information is constrained from flowing beyond a narrow set of people (such as a person's attorney or physician). These four stages thus provide us with sensible points at which to assess the risk of privacy harms and the wisdom of public laws that might operate on each stage.³²

B. The Privacy Law Solutions

Privacy scholarship promotes the use of law to protect interests in dignity, autonomy, and self-determinism. These interests are served by giving people some control over others' acquaintance with their personal affairs.³³ By exercising control over others' knowledge of ourselves, we can avoid judgment, ridicule, or stereotyping (preserving dignity) while we comfortably pursue the activities we would like (maintaining autonomy).

Given this orientation, it is not surprising that the solutions put forward by privacy scholars tend to impose stringent restrictions at the

from thought. Since processing is so difficult to detect, as a practical matter privacy laws are better off operating earlier or later in the information stream.

32 Daniel Solove's taxonomy of privacy problems can map directly onto these four stages. Surveillance (clandestine observation), identification, and fruitful interrogations occur at the "observation" stage. Daniel J. Solove, A Taxonomy of Privacy, 154 U. Pa. L. Rev. 477, 491-99 (2006) (explaining that "identification" is the attachment of an identity to a previously anonymous piece of information, so it allows an observation about the identified person for the first time, even if the information were already observed in anonymized form). Aggregation occurs at the "capture" stage since the stage includes the presumed indefinite storage of a record. Id. at 506-11. Exclusion and security occur at the "dissemination" stage, as do all of the privacy problems in Solove's "information dissemination" family—breach of confidentiality, disclosure, exposure, increased accessibility, blackmail, appropriation, and distortion. Id. at 522-52. Secondary uses are, obviously, "uses" under my framework. Id. at 520-21. Solove's interference family of privacy problems do not map cleanly onto my framework because "intrusions," as Solove categorizes them, include harassing acts that are best treated as something other than information-related. "Decisional interferences" are actually observation harms—the chilling effects that can result from government inquiry or surveillance of certain types of acts. Id. at 557-62.

33 Gavison, *supra* note 25, at 426 (quoting Hyman Gross's definition of privacy). Gavison finds this definition unhelpful and puts forward her own definition of privacy interests, which break into the categories of secrecy, anonymity, and solitude. *Id.* at 428.

dissemination and use stages of information flow.³⁴ They demand that ultimate control over the fate of personal information be left in the hands of the information subject. In Code, Lawrence Lessig asks what presumptive controls consumers should have over the data that they deliberately reveal to others.³⁵ His legal proposals include a ban on the sale of consumer data unless the customers expressly consent to the transfer.³⁶ In some cases Lessig suggests privacy should be inalienable; that is, consumers should be legally incapable of consenting to the dissemination of information.³⁷ Paul Schwartz has argued that Americans should have a sort of property right in information that describes them—that is, they should have an exclusive right to determine where their personal information goes, and how it is used.³⁸ Recognizing that a simple property model could lead rationally ignorant consumers to sell their information for too little compensation, Schwartz also argues that government regulation should provide a mechanism for the data subject to claw back information they had previously consented to release. In Schwartz's scheme, certain types of especially sensitive information should be subject to inalienable prohibitions on the reuse or dissemination.³⁹ Jerry Kang's proposals are very similar.40

These proposals and others coming out of the privacy literature reflexively reach for the broad-sweeping prohibitions on disclosure and repurposing incorporated into the European Union's Data Protection Directive.⁴¹ Use limitations, notice, and consent are central

³⁴ See generally Solove, supra note 32, at 564 ("Modern privacy problems emerge not just from disclosing deep secrets, but from making obscure information more accessible (increased accessibility) or from consistent observation or eavesdropping (surveillance)."). Fully half of the privacy problems identified in Daniel Solove's influential privacy taxonomy take place at the dissemination stage, which implies that the regulatory solutions would have to constrain these disseminations. *Id.* at 525–552.

³⁵ Lawrence Lessig, Code Version 2.0, 6–8 (2d ed. 2006).

³⁶ Id. at 223.

³⁷ Id. at 227.

³⁸ Schwartz, *supra* note 11, at 2058; *see also* Lessig, *supra* note 35, at 142–63 (arguing property rights should be used to protect Internet privacy); Jerry Kang & Benedikt Buchner, *Privacy in Atlantis*, 18 Harv. J.L. & Tech. 229, 232 (2004) (indicating that the property right approach would result in personal data being exchanged through free market interactions).

³⁹ Schwartz, supra note 11, at 2098.

⁴⁰ Kang & Buchner, supra note 38, at 255–56.

⁴¹ See Lessig, supra note 35, at 227–28; A. Michael Froomkin, The Death of Privacy?, 52 Stan. L. Rev. 1461, 1461 (2000); Litman, supra note 10, at 1290; Marc Rotenberg, Fair Information Practices and the Architecture of Privacy (What Larry Doesn't Get), 2001 Stan. Tech. L. Rev. 1, 33 (2001) (noting the effort to protect an individual's privacy); see also Kang & Buchner, supra note 38, at 246, 255. Kang notes several

tenets in European data privacy laws.⁴² These tenets were originally developed by the U.S. Department of Health, Education, and Welfare in the influential Fair Information Practice Principles (FIPs), but American law has never required private (non-state) actors to adhere to FIPs.⁴³ Both the EU's Data Protection Directive and FIPs require notice and consent before information may be disseminated or used for any purpose other than the one for which the information was collected, so regulations that implement these rules necessarily place near-complete restrictions on the regulable stages of *dissemination* and *use.*⁴⁴

The differences between the American and European treatments of information privacy are essentially differences in initial entitlements. In Europe, information *about* a person is *theirs*. The EU Data Protection Directive and President Obama's proposed Consumer Privacy Bill grant a property entitlement over personal information to the person described by it. The entitlement does not necessarily incorporate the full "bundle of sticks" we have in our chattels and real property, but it does include the most important ones—exclusive control over use and transfer. An entity is required to obtain consent or

differences between the property model and the EU Data Protection Directive, believing that the former springs from an orientation toward market solutions while the latter is designed to protect dignity. *Id.* at 231–36. But Kang recognizes that the two models both place initial entitlements in the hands of the individuals described in the data. *Id.* at 255. The property proposals from the privacy literature incorporate other protections to prevent the completely free alienability of personal information, so in practice the difference between these approaches would not be as distinct as Kang suggests.

- 42 EU Data Protection Directive, *supra* note 26. The European Commission's recently released draft regulations would amend the EU Data Protection Directive to add a new right to data deletion, a "right to be forgotten," which requires data controllers to delete information upon request, even if the data subject had consented to the collection of the information. Proposal for a Regulation of the European Parliament and of the Council on the Protection of Individuals with Regard to the Processing of Personal Data and on the Free Movement of Such Data, at 9, COM (2012) 56 draft (Nov. 29, 2011).
- 43 HEW Report, *supra* note 21; Rotenburg, *supra* note 41. Rotenburg laments that industry lobbyists do not appreciate and account for the fact that Fair Information Practices were developed by American congressmen. *Id.* at 15. This is an odd criticism since, as Rotenburg acknowledges, FIPs were designed to be an agreement about how the federal government should treat personal data, not private parties. *Id.* at 3 & n.11. Some sectors of American enterprise are governed by industry-specific privacy regulations such as the Video Privacy Protection Act and the Health Insurance Portability and Accountability Act (HIPAA). These are discussed at length in Part IV, *infra*.
- 44 EU Data Protection Directive, *supra* note 26, at 41; HEW REPORT, *supra* note 21.

negotiate a license before storing, sharing, or reusing personal information, even when that information is revealed in the course of a transaction. Current American privacy law, by contrast, was developed through tort, where privacy interests are protected only when courts recognize an actionable injury and fault-worthy behavior outweighs other public policy considerations.⁴⁵

The property rights trend in the literature shows that scholars have grown frustrated with American privacy law's roots in tort.⁴⁶ Though the earliest vindications of privacy rights emanated from common law tort claims and coalesced, eventually, into the recognizable set that William Prosser dubbed the "privacy torts,"⁴⁷ the most influential American privacy scholars have become increasingly frustrated by the void in uniform, overarching privacy policy.⁴⁸ They fear that courts are standing idly by as "[t]he Internet guarantees a Nietzschean 'eternal return' of damaging disclosures."⁴⁹ They advocate for a fundamental shift in the model for privacy protection to combat a perpetual threat. As Jacqueline Lipton puts it, "We may not have time to develop expectations of privacy that are reasonable before the new wave of privacy-threatening technologies develops and overtakes those expectations."⁵⁰

⁴⁵ See generally William L. Prosser, Privacy, 48 Cal. L. Rev. 383 (1960) (describing four types of privacy invasion); Warren & Brandeis, supra note 20 (contemplating several restrictions on the right to privacy, including the need to show special damages).

⁴⁶ See, e.g., Citron, supra note 10, at 1809–10 (criticizing the privacy torts for failing to recognize new, increased quantities of harm, but also encouraging privacy law to expand from its common law tort roots); Kang, supra note 10, at 1231; Litman, supra note 10, at 1304; Richard S. Murphy, Property Rights in Personal Information: An Economic Defense of Privacy, 84 Geo. L. Rev. 2381, 2397 (1996); Richards, supra note 10, at 357; Richards & Solove, supra note 10, at 1918; Schwartz, supra note 10, at 1634; see generally Daniel Solove, The Future of Reputation 122–29 (2007) (arguing that tort law continues to play an important role as a deterrent for individuals who spread rumors or spill secrets); Patricia Sánchez Abril, Recasting Privacy Torts in a Spaceless World, 21 Harv. J.L. & Tech. 1 (2007) (reconstructing the tort of public disclosure to avoid the "scattershot" nature of existing precedent).

⁴⁷ Prosser, supra note 45, at 389.

⁴⁸ Froomkin, *supra* note 41, at 1523–24; Kang & Buchner, *supra* note 38, at 235–36; Richards, *supra* note 10, at 359–61 (suggesting that other torts and the expansion of confidentiality duties can be used to meet new privacy demands); Solove, *supra* note 32, at 477–78.

⁴⁹ Citron, *supra* note 10, at 1813 (citing FRIEDRICH NIETZSCHE, THE GAY SCIENCE 194–95 (Bernard Williams ed., Josefine Nauckoff trans., Cambridge Univ. Press 2001) (1887)).

⁵⁰ Lipton, supra note 22, at 501.

The property approach certainly has its appeal. A property rule would allow consumers who have strong preferences for privacy to opt out of data aggregations. This works well if society prefers for Americans to decide for themselves what the value of their privacy may be.⁵¹ And, as with real property, personal information property would allow some Americans to be data holdouts if it is important to them, even if that choice seems irrational.⁵² A property system favors the autonomy and self-determination of information subjects over competing interests, such as information access and economic efficiency. It prioritizes privacy, so it is naturally attractive to anyone believing that privacy is not sufficiently guarded today.

Another attractive feature of a property right is its imposition of transaction costs. If an entity must provide notice and obtain consent before collecting or reusing personal data, it will incur non-negligible costs in the process. The data collected must meet some threshold amount of value to be worth the bother of collecting it. As long as transaction costs are non-zero, they will dampen the overall amount of data collected (even from willing consumers).⁵³ Privacy scholars who are interested in harnessing the power of defaults, and in using transaction costs to curb overall collection efforts, are obviously interested in something other than consumer autonomy. Paul Schwartz argues that, since consumers cannot be expected to understand the full extent of the privacy consequences when they are asked to consent to data collection, they are likely to trade away their personal information for too little in return.⁵⁴ Transaction costs can indirectly counter-

⁵¹ A property rule would avoid what privacy scholars perceive to be unjust enrichment; since information has value, privacy scholars view the collection of data to be a sort of theft. Eugene Volokh describes and responds to this argument. Volokh, *supra* note 23, at 1074. Empirical research suggests this value will be quite small for most Americans, anyway. IAN AYRES, SUPER CRUNCHERS 197 (2007) (citing studies that found most people were willing to disclose their social security numbers in exchange for fifty-cent-off coupons); Eric Goldman, *The Privacy Hoax*, Forbes, Oct. 14, 2002, at 42, *available at* http://www.forbes.com/forbes/2002/1014/042.html. But as with real property, a right to information property would allow some Americans to be data holdouts.

⁵² Murphy, *supra* note 46, at 2397 ("Given anonymity, people will do what they want.").

⁵³ Cf. Froomkin, supra note 41, at 1535 ("Ironically, the advances in technology that are reducing the transactions [sic] costs . . . also work to facilitate the sale of personal data, potentially lowering the cost enough to make the purchase worthwhile."). But see Litman, supra note 10, at 1299 (voicing skepticism that transaction costs will be significant, and noting that the real issues at stake are the allocations of the entitlements).

⁵⁴ Schwartz, supra note 11, at 2091.

act the information asymmetries that operate between companies and their customers.

The property model has gained traction. Virtually every lawsuit testing the legality of information collection, including legal challenges against Google, Netflix, DoubleClick, AOL, and Apple, has included claims based on trespass to chattels on the theory that information *about* a person is their personal property. The Federal Trade Commission (FTC) is influenced by current privacy scholarship, and has incorporated the dissemination and re-use limitations from the Fair Information Practice principles directly into its proposed framework for protecting consumer privacy.⁵⁵ The legal settlements the FTC has negotiated with major data aggregators like DoubleClick include strict prohibitions on dissemination and repurposing of personal data, suggesting that dissemination and reuse are per se unfair consumer practices.⁵⁶ But even if this shift to a subject-control model has the support of the FTC at present, the control model is inherently unstable and unlikely to work long-term.

C. The Problems With Privacy Law Solutions

Americans and Europeans have historically had very different relationships to information.⁵⁷ Our enduring commitment to liberalism automatically places great value on unfettered access to facts.⁵⁸

JOHN STUART MILL, ON LIBERTY 39 (1869).

⁵⁵ See FTC Staff Rep., Protecting Consumer Privacy in an Era of Rapid Change 6–7 (2010), available at http://www.ftc.gov/os/2010/12/101201privacy report.pdf. This is particularly odd since the Federal Trade Commission's consumer protection duties requires the FTC and the plaintiffs' bar to detect fraud and identify likely victims, both of which are improbable without the aid of data.

⁵⁶ See Official Court Notice of Settlement In re DoubleClick Inc. Privacy Litig., Master File No. 00-CIV-0641; see also Press Release, Fed. Trade Comm'n, FTC Announces Settlement with Bankrupt Website, Toysmart.com, Regarding Alleged Privacy Policy Violations (July 21, 2000), available at http://www.ftc.gov/opa/2000/07/toysmart2.shtm.

⁵⁷ James Q. Whitman, *The Two Western Cultures of Privacy: Dignity Versus Liberty*, 113 Yale L.J. 1151, 1155–60 (2004).

⁵⁸ The inherent value of information is expressed by the influential writings by John Stuart Mill:

Wrong opinions and practices gradually yield to fact and argument: but facts and arguments, to produce any effect on the mind, must be brought before it. Very few facts are able to tell their own story, without comments to bring out their meaning. The whole strength and value, then, of human judgment, depending on the one property, that it can be set right when it is wrong, reliance can be placed on it only when the means of setting it right are kept constantly at hand.

In contrast, the Fair Information Practice principles (FIPs) that form the bedrock of European privacy law grew out of a distrust of data.

FIPs were developed in the 1970s, in an era when computational power and data storage did not have great presence outside the federal government. Though the Department of Health, Education & Welfare's (HEW) report drafting committee had hoped Congress would apply its recommendations to all systems of personal data collection,⁵⁹ the harms anticipated by the report were distinctly governmental.⁶⁰ While political processes are appropriate tools to constrain how the state collects and uses data, those same processes, when directed at facts in private hands, are troubling. Consider, for example, the purpose limitations of FIPs, which constrain a holder of data from using it for any purpose other than that for which it was collected. This rule allows privacy interests to trump other important societal values. Imaginative repurposing of data is now common practice for public health⁶¹ and security,⁶² sports and entertainment,⁶³

⁵⁹ The HEW Report recommended the submission of legislative proposals to Congress to "establish a code of fair information practice for all automated personal data systems maintained by agencies of the Federal government or by *organizations within reach of the authority of the Federal government.*" HEW REPORT, *supra* note 21, at 136 (emphasis added).

⁶⁰ The examples in the chapter titled "Latent Effects of Computer-Based Record Keeping," which describes privacy harms, include fears of dragnet-style investigation processes, inaccurate welfare distributions, and the FBI's clearinghouse of criminal files. *See id.* at 12–30.

⁶¹ Internet search terms can reveal epidemiological trends faster than the Center for Disease Control. *See* Alexis Madrigal, *Google Could Have Caught Swine Flu Early*, Wired (Apr. 29, 2009, 3:40 PM), http://www.wired.com/wiredscience/2009/04/google-could-have-caught-swine-flu-early; Melinda Wenner, *Google Flu Trends Do Not Match CDC Data*, Popular Mechanics (May 17, 2010, 9:15 AM), http://www.popular mechanics.com/science/health/med-tech/google-flu-trends-cdc-data. The flu can infect an area without causing the fever and respiratory problems that are typically Googled. What Google Flu Trends tracks is better understood as tracking flu-like symptoms rather than actual confirmed influenza outbreaks.

⁶² Backlogs of crime victim reports and other data have allowed experimental law enforcement programs to use analytics to predict more accurately where larceny and other crimes are most likely to happen and when. The most cutting-edge programs can provide predictions as focused as a one square-block area. *See* Erica Goode, *Sending the Police Before There's a Crime*, N.Y. Times, Aug. 15, 2011, at A11, *available at* http://www.nytimes.com/2011/08/16/us/16police.html.

⁶³ Baseball, which has rewarded fans and team owners who have the patience and aptitude for statistics, is about to undergo another data renaissance with the help of a new technology called Fieldf/x, which records every single motion of each player at every game. If it works as promised, the corrective statistics made popular by *Moneyball* may prove to be completely outmoded. Also, baseball's league awards and pay structure might become one of the most meritocratic systems known to exist. Ira

and even core political activities, as demonstrated by the role of Digital Strategy Analysts in the 2012 Obama campaign, who will analyze web traffic data, email results, social media, SMS data, and other digital information to provide insights for the President's reelection team.⁶⁴ FIPs, though American in origin, are foreign to the regulatory environment that produced the hyper-efficiency of Walmart and the crowdsourced machine learning of Google.

This Subpart first examines constitutional limitations on treating personal information as property, and then demonstrates why a property model is unwise as a matter of public policy.

1. Constitutional Constraints

If a property model for privacy is incorporated into law, it will face a constitutional challenge. Restrictions on the flow of facts—even dry, unadorned facts about people—will receive heightened First Amendment scrutiny from the current Supreme Court.⁶⁵ A default rule that automatically assigns one person exclusive control over another's ability to spread accurate information is likely to be treated as a restriction on speech, and will have to be justified by, and narrowly tailored to, a compelling state interest.⁶⁶

Defenders of a property rule for personal information might be able to avoid constitutional scrutiny by exploiting a loophole. Infor-

Boudway, Baseball Set for Data Deluge as Player Monitoring Goes Hi-Tech, BLOOMBERG (Mar. 31, 2011, 5:00 PM), http://www.bloomberg.com/news/2011-03-31/baseball-is-set-for-deluge-in-data-as-monitoring-of-players-goes-hi-tech.html.

- 64 See Jim Rutenberg & Jeff Zeleny, Obama Mines for Voters with High-Tech Tools, N.Y. Times, Mar. 8, 2012, at A1, available at http://www.nytimes.com/2012/03/08/us/politics/obama-campaigns-vast-effort-to-re-enlist-08-supporters.html?pagewanted= all.
- 65 Sorrell v. IMS Health, Inc., 131 S. Ct. 2653, 2667 (2011) ("Facts, after all, are the beginning point for much of the speech that is most essential to advance human knowledge and to conduct human affairs. There is thus a strong argument that prescriber-identifying information is speech for First Amendment purposes."). Lawrence Lessig and Neil Richards have argued that personal data is not "expression" and therefore should not be the basis for First Amendment protection. See Richards, supra note 13, at 1154–55. As a descriptive matter, IMS Health has put these arguments in doubt. As a normative matter, I agree with the broader views of the First Amendment, articulated by Derek Bambauer and Eugene Volokh, among others, that in deciding whether a First Amendment protection applies in the first place, we ought not allow the courts to decide which types of information count as "speech" and which do not. Derek E. Bambauer, Orwell's Armchair, 79 U. Chi. L. Rev. (forthcoming 2012). Moreover, a test that assigns less protection to expressions that have a higher proportion of dry factual information puts undue emphasis on the proportion of an expression that is made from opinion and point-of-view.
 - 66 See Bartnicki v. Vopper, 532 U.S. 514, 527–28 (2001).

mation is frequently propertized without running afoul of the First Amendment when it is cast as intellectual property. After all, copyright, trademark, the right to publicity, and trade secrets laws restrict the flow of accurate information. The field might have room for privacy rights, too. An extension of the right of publicity, traditionally a celebrity's claim, to a right to personal information property requires but one small hop in reasoning.⁶⁷ Consider the precedent set by Rosa Parks, icon of the American Civil Rights Movement. Parks brought a right of publicity claim against OutKast's record label for the reference to her story in their song "Rosa Parks." The chorus to the OutKast song repeats the words:

Ah ha, hush that fuss

Everybody move to the back of the bus

Do you want to bump and slump with us

We the type of people make the club get crunk.⁶⁹

Parks claimed that OutKast's song exploited the commercial value of her identity.⁷⁰ Surprisingly, the Sixth Circuit did not believe that the record label was entitled to summary judgment on their First Amendment defense. According to the court, Parks presented a genuine issue of material fact over the relevance of her name to the song's meaning.⁷¹ The *prima facie* case for a right to publicity claim is quite easy to establish,⁷² so without a strong First Amendment limita-

⁶⁷ Rochelle Cooper Dreyfuss, Warren and Brandeis Redux: Finding (More) Privacy Protection in Intellectual Property Lore, 1999 Stan. Tech. L. Rev. 8, ¶¶ 14–23 (1999); Diane Leenheer Zimmerman, Information As Speech, Information As Goods: Some Thoughts On Marketplaces and the Bill of Rights, 33 Wm. & Mary L. Rev. 665, 717 (1992) (discussing the effect the right of publicity has on speech). Right of publicity claims are often lumped under the banner of "misappropriation." I distinguish for the purposes of this Article between the tort claim of misappropriation, which protects ordinary people from receiving unwanted and unconsented exposure when their images or names are used to sell commercial products, from intellectual property claims for the right of publicity, which are concerned with the commercial mining and exploitation of celebrity's fame without the celebrity's permission. For the contrast, see, for example, Carson v. Here's Johnny Portable Toilets, Inc., 698 F.2d 831, 836 (6th Cir. 1983) (permitting recovery when Johnny Carson's celebrity was exploited to market port-apotties).

⁶⁸ Parks v. LaFace Records, 329 F.3d 437, 441 (6th Cir. 2003).

⁶⁹ Id. at 442-43.

⁷⁰ *Id.* at 461.

⁷¹ *Id.* at 442.

⁷² *Id.* at 460 ("All that a plaintiff must prove in a right of publicity action is that she has a pecuniary interest in her identity, and that her identity has been commercially exploited by a defendant.").

tion, a non-celebrity might be able to claim a property interest in the value of references to her, and facts about her experiences.⁷³

But courts are unlikely to make the leap from celebrity rights of publicity to consumer rights of publicity, small as it may be. Intellectual property rights are justified as exceptions to First Amendment restrictions because they work in service of the First Amendment's goals—the production of information and ideas. In theory, intellectual property rights provide economic incentives for the labor required to produce new information goods.⁷⁴ The incentive theory doesn't work for privacy rights. Privacy-motivated information property rules attempt to *curb* the production of information, not to foster it.⁷⁵ Moreover, the *Parks* case notwithstanding, intellectual property rights propertize the form or expression of an idea, not the idea itself.⁷⁶ Raw facts generally cannot be propertized.⁷⁷ Intellectual property scholars are often reluctant to endorse a property entitlement over these last vestiges of free speech limitations, even in the pursuit of privacy.⁷⁸

2. Normative Constraints

Even putting aside First Amendment limitations, privacy scholars have not explained why a property right to control the dissemination

⁷³ This extension of the right of publicity would correspond to Rochelle Dreyfuss's descriptive theory of intellectual property—that courts assign property rights wherever there is value. Dreyfuss, supra note 67, at ¶ 16.

⁷⁴ See Zimmerman, supra note 67, at 667–68; see also Eldred v. Ashcroft, 537 U.S. 186, 205–06, 214–15 (2003); Diamond v. Chakrabarty, 447 U.S. 303, 307 (1980).

⁷⁵ Under a labor desert theory, it is very likely the data aggregator who will be seen to invest effort in creating a usable and probative set of personal information since personal information is only as valuable as its data quality. To understand the effort required to create and maintain usable data, see Thomas C. Redman, Data Driven 53–86 (2008).

⁷⁶ Zimmerman, supra note 67, at 682.

⁷⁷ Kang & Buchner, *supra* note 38, at 233; Volokh, *supra* note 23, at 1066. Hot news misappropriation is an exception to the general proposition that facts cannot be property. *See* Int'l News. Serv. v. Associated Press, 248 U.S. 215, 216 (1918). But again, this exception rests on a labor desert theory that aims to reward the production of information.

⁷⁸ Even Rochelle Dreyfuss, who enunciated the clearest jurisprudential path to propertization of personal information, advised against widening the scope of intellectual property since the recent expansions of intellectual property have been unprincipled. Dreyfuss, supra note 67, ¶ 25; see also Lawrence Lessig, Free Culture 10 (2004) (arguing that the change in creative property laws aimed at eliminating piracy can also eliminate "our culture of values"); Zimmerman, supra note 67, at 667 (worrying that the expansion of intellectual property theories is "cannibalizing speech values at the margin").

and use of truthful personal information would improve social welfare instead of detracting from it. To illustrate, consider a map graphically illustrating the proportion of African-Americans by census tract. This map would fall short of the definition of "political discourse" that privacy scholars acknowledge must be immunized by the First Amendment.⁷⁹ Moreover, by reporting information on race, the map would violate the more aggressive privacy proposals requiring consent from data subjects even before aggregated, de-identified information may be disseminated.⁸⁰ But it takes just one small addition—the inclusion of voting district boundaries—to turn a dry collection of data into a message teeming with political meaning. It was, after all, a map that led to the coining of the term "gerrymandering." The bounds of Essex County, Massachusetts, were molded into a shape that resembled a salamander and was politically convenient for the reelection of Governor Elbridge Gerry.⁸¹ Why should we risk granting exclusive property rights in facts like those to the individuals described in the map?

Usually property entitlements and liability rules are assigned in a way that best ameliorates market information problems. In fact, scholars often attempt to design entitlement systems that have the effect of *forcing* information disclosures since information, by assumption, helps correct market inefficiencies.⁸² To understand why property entitlements do not work very well with personal information, first consider why they do work so well with tangible objects.⁸³ Lisa owns a coffee mug, and knows what it is worth to her better than a court, or the state, or some objective third party does. Likewise, Milhouse, a putative buyer, is in the best position to estimate what the coffee mug is worth to him. If Milhouse values the mug more than Lisa, then a transaction should occur, the buyer and seller will both experience an increase in utility, and overall social welfare will improve. A third party's judgment couldn't possibly be superior because Lisa and

⁷⁹ Richards, supra note 10, at 376-77.

⁸⁰ Lee Tien, the staff attorney for the Electronic Frontier Foundation, proposes a statute requiring consent to be obtained before de-identified data can be released. Natasha Singer, *Data Privacy, Put to the Test*, N.Y. Times, May 1, 2011, at BU3, *available at* http://www.nytimes.com/2011/05/01/business/01stream.html.

⁸¹ The Birth of the Gerrymander, Mass. Hist. Soc. (Sept. 2008), http://www.masshist.org/objects/2008september.cfm.

⁸² Louis Kaplow & Steven Shavell, Fairness Versus Welfare 411 (2002); Ian Ayres & Eric Talley, Solomonic Bargaining: Dividing a Legal Entitlement to Facilitate Coasean Trade, 104 Yale L.J. 1027, 1031–32 (1995).

⁸³ Much of this example is borrowed from Richard Posner. Richard Posner, Economic Analysis of Law 37–38 (5th ed. 1998).

Milhouse have significant private information about how they would use the mug, and about their tastes and preferences.

A market for information, or more precisely, a market for rights to disseminate information, has a number of quirks and difficulties. First, information is a nonrivalrous good—everybody can have it at once. If Lisa could keep her mug *and* give it to Milhouse at the same time, it is no longer obvious that Lisa should have exclusive rights to it. Also, information problems are definitional. The value of a piece of personal information is very difficult for the information subject to determine, and it is impossible for the would-be purchaser, since the utility of new facts are hard to predict and are diffused across the entire population who may eventually come into contact with it. Two illustrations will help show why the property model is a poor fit.

First, consider the easy, Posnerian case against property rights.⁸⁴ Suppose a man desires to conceal his marriage to the women he meets on Match.com. A woman who uncovered his secret after several dates wishes to describe his behavior on TrueDater.com, a website that allows people to report complaints about members of online dating services.85 The married man will demand a high price for a license to TrueDater to distribute this information. Under these facts, the holdout problem is obvious. The people who might value the information most-Match.com users who are looking for truthful partners-don't know what they are missing, and are unlikely to be organized enough to purchase his consent.86 The social value of information dissemination—both to the specific Match.com users who have the misfortune of dating him and to the general public, which would prefer to deter adultery through disapproval—would easily outweigh the man's utility in secrecy. In fact, we might even think that a preference for secrecy in these circumstances is an "objectionable preference" that should not be accorded any weight in the social welfare calculus (or put differently, that notions of justice and fairness ought to trump the adulterer's privacy interests).87 But under a prop-

⁸⁴ This example is similar to Richard Posner's example of the sexually abusive school teacher. Richard Posner, *The Economics of Privacy*, 71 Am. Econ. Rev. 405, 406 (1981).

⁸⁵ Lizette Alvarez, (*Name Here*) *Is a Liar and a Cheat*, N.Y. Times, Feb. 16, 2006, at G1, *available at* http://www.nytimes.com/2006/02/16/fashion/thursdaystyles/16 WEB.html?pagewanted=all.

⁸⁶ Even if there were a business model for TrueDater, similar to the CarFax model, the married man will charge an exorbitant price or hold out entirely. These problems do not plague businesses like CarFax that rely on records that are not under the control of the individuals selling the cars.

⁸⁷ Kaplow & Shavell, *supra* note 82, at 427. Kaplow and Shavell would object to characterizing these valuation decisions as decisions driven by concerns for fairness,

erty model, the information exchange would not happen, and the bulk of social costs would fall on a few "local losers" who end up dating him without knowing his true motivations.

The potential for fraud, deceit, and other perverse incentives is the most commonly deployed critique of privacy coming out of the law and economics literature.⁸⁸ But this critique is too facile; just because privacy *could* be abused does not necessarily mean that the model is deeply theoretically flawed. After all, opportunistic holdouts in real estate markets are a known and difficult problem, but they do not merit the abolishment of property rights.⁸⁹ The relevant question is whether even the ethical and reasonable personal information holdouts would tend to detract from overall social welfare. Indeed they would.

Consider the much more sympathetic facts of *Sipple v. Chronicle Publishing Co.*90 In 1975, Oliver Sipple was living an openly gay life in San Francisco, but like so many men in the gay community at the time, his sexual preference was not known to his family. When President Gerald Ford visited San Francisco that year, Oliver Sipple saved his life by thwarting an assassination attempt. He struck the gun out of the hand of Sara Jane Moore, who was standing near Sipple during President Ford's public appearance. Sipple instantly became a national hero, but his story took a sad turn when several newspapers printed quotes from Harvey Milk suggesting that President Ford's hesitation to call or telegram Sipple with an expression of gratitude was caused by homophobia. The news reached Sipple's family in Detroit, and they subsequently disowned him. He passed away just five years after his unsuccessful lawsuit against the *San Francisco Chronicle* and other newspapers, penniless and devoid of valuable possessions save

but the authors struggle, as others had before them, to find any pure economic rationale for dismissing and ignoring certain types of idiosyncratic preferences, such as preferences for sadism. *Id.* Richard Murphy preferred not to count the utility derived from deceit in his social utility calculus. Murphy, *supra* note 46, at 2386. I agree with this impulse, but note that it highlights a larger problem with utilitarian theories that command the analyst to make decisions, based on ethics, about what types of pleasure should and should not count as utility.

⁸⁸ Posner, supra note 84, at 406.

⁸⁹ Moreover, sometimes property rights *are* extinguished. Eminent domain provides relief when hold-outs are judged to be counter-productive. *See* Monongahela Nav. Co. v. United States, 148 U.S. 312, 326–27 (1893); *see also* Sara Rimer, *Some Seeing Crimson at Harvard's 'Land Grab*, 'N.Y. Times, Jun. 17, 1997, at A16, *available at* http://www.nytimes.com/1997/06/17/us/some-seeing-crimson-at-harvard-land-grab.html.

⁹⁰ Sipple v. Chronicle Publ'g Co., 201 Cal. Rptr. 665 (Ct. App. 1984).

for the framed copy of his letter from President Ford (which was post-marked three days after the assassination attempt).⁹¹

Given Sipple's accurate estimation that his family would react very badly to news about his homosexuality, Sipple would have valued a property right in his personal information highly. But the utility of the story to social welfare would likely be greater still. This was, after all, a culture-changing story. Sipple was one of America's first strong, openly gay, heroic figures.⁹² A wide range of people may have benefited from the Chronicle's story—those whose perception of homosexuality improved, those who valued knowing more about President Ford's potential prejudices, those in the gay community who experienced pride, or who faced a very slightly smaller amount of hostility because of Oliver Sipple's story. The San Francisco Chronicle, too, received reputational rewards for its newsgathering.⁹³ These benefits are unmeasurable and uncertain, but they receive considerable presumed weight. At least, that is the reasoning behind the core belief that "[f]reedom of discussion, if it would fulfill its historic function in this nation, must embrace all issues about which information is needed or appropriate to enable the members of society to cope with the exigencies of their period."94

Under a property model, the *San Francisco Chronicle* would not have bought the rights to Sipple's personal information. The story would not have increased the prestige of the *Chronicle* enough to be worth the high price tag. Though the story was valuable to a wide range of other people, a sale of the information license would have required the coordination of an impossible network of transaction and valuation costs. ⁹⁵ The fate of these facts was better off in the hands of the *Chronicle* and the other journalists, even though this rule sacrifices Sipple at the altar of social progress.

Sipple's losses were quite weighty since he was a member of a minority group that was heavily and irrationally stigmatized at the time.⁹⁶ Still, even under these very sympathetic circumstances, a right

⁹¹ Dan Morain, *Private Lives*, L.A. Times, Feb. 13, 1989, § 5, at 1, *available at* http://articles.latimes.com/1989-02-13/news/vw-1568_1_gay-big-deal-jerry-ford.

⁹² RANDY SHILTS, THE MAYOR OF CASTRO STREET 122 (1982).

⁹³ If not, providing Sipple with an entitlement of any sort (let alone a property right) would not be economically efficient. Guido Calabresi & A. Douglas Melamed, *Property Rules, Liability Rules, and Inalienability: One View of the Cathedral*, 85 Harv. L. Rev. 1089, 1122 (1972). Speculation about the value of personal information also suffers from the problem of assessment costs.

⁹⁴ Thornhill v. Alabama, 310 U.S. 88, 102 (1940).

⁹⁵ KAPLOW & SHAVELL, supra note 82, at 410.

⁹⁶ Guido Calabresi and Douglas Melamed warn against any analysis that favors economic efficiency and treats all costs with equal weight without regard for other

to hold out, or scrape back, information will frustrate attempts to seize teachable moments and allow information to slowly winnow the misimpressions that caused so much grief in Sipple's day. *Sipple* illustrates the general point that privacy losses are the negative externalities from an otherwise productive and worthwhile activity—information flow.

Information flow should be deterred through liability rules when, and only when, the foreseeable privacy harms outweigh the benefits of free-flowing facts.⁹⁷ This is not to say that privacy must succumb to information absolutism.⁹⁸ Balances must be struck. Tort law is optimally suited to this task; property entitlements are not.

D. Personal Information Problems Are (Still) Tort Problems

The privacy law approach to information harms is misguided because it prioritizes the autonomy and self-determinism of an information subject over competing autonomy interests of the information-holders and the societal interests in unencumbered information flow. Very few rights are absolute, and our rights to privacy and to information-access are not among them. A defensible system of privacy must analyze whether the social costs of free information flow outweigh the

considerations such as distributional effects and social justice. Calabresi & Melamed, *supra* note 93, at 1122. Likewise, Kaplow and Shavell encourage models other than equal distribution when aggregating utility, including Rawlsian models that might weight the interests of the poor and underprivileged more heavily. Kaplow & Shavell, *supra* note 82, at 28–29 & n.27.

97 Low stakes scenarios lead us to the same result. Suppose Hulu.com viewers were able to exercise a property right and withhold consent to use their viewing history information for directed advertising (or for any purpose other than serving the television shows they would like to watch). In the best case scenario, the privacy-seekers would absorb the costs of forcing the site to supply a different business model—either in the form of having to watch more advertisements or by having to pay to watch the Hulu content. But since differentiating between viewers and creating different platforms imposes transaction costs on Hulu, it is more likely that Hulu will keep a single platform and force all viewers to absorb the additional costs—in the form of more advertisements, for example—that result from the privacy-seekers' withheld information. The property interest creates a free rider problem.

98 Eugene Volokh makes the descriptive claim that a restriction on the flow of personal information would not survive constitutional scrutiny even if the restriction did maximize aggregate social utility. Volokh, *supra* note 23, at 1076. This may well be true, but this Article asks how information *should* be regulated. As a practical matter, since the utility of privacy and speech cannot be measured, one could argue that First Amendment strict scrutiny (requiring a compelling state need and tailoring) is a utilitarian test—one that assumes a high value in speech and looks searchingly for evidence of countervailing factors.

expected benefits. 99 Thus, an optimal collection of privacy regulations will deter the sorts of information flows that tend to create more disutility than utility. This is exactly what common law tort rules aspire to do. 100

A tort treatment of information harms has the virtue of assessing the new risks of personal data aggregation without committing to a certain predetermined end state. While privacy law scholars automatically code all increases in personal data accumulation as a threat, tort scholars are open-minded about the appropriate activity level, so long as the activity is not posing undue risk.¹⁰¹ Thus, while privacy law scholars want a particular end state—less data shared with fewer people—tort law scholars are indifferent about the end state so long as the law deters harmful and objectionable acts.

Privacy scholars have given up on tort in part because they have become preoccupied with controlling the dissemination of data. The tort addressing personal information flows at this stage—the tort of public disclosure of private facts—has been chiseled away by case law.¹⁰² But in their haste to find a new means of controlling dissemination, privacy scholars have overlooked a tort that operates at the stage of observation—the tort of intrusion.

By way of example, consider a hypothetical posed by Patricia Sanchez Abril:

Fiona is gay but has not told her co-workers or professional acquaintances. George, one of Fiona's co-workers, secretly obtains her MySpace password so as to snoop around her profile. On her profile, he finds information that leads him to believe that she is leading a gay lifestyle. George instantly divulges this information to

⁹⁹ This is the basic welfare economics model. Louis Kaplow & Steven Shavell, Fairness Versus Welfare, 114 Harv. L. Rev. 961, 977 (2001). Paul Ohm, too, uses a utilitarian model and advises regulators to compare the risks of unfettered information flow to its likely costs in privacy. Paul Ohm, Broken Promises of Privacy: Responding to the Surprising Failure of Anonymization, 57 UCLA L. Rev. 1701, 1768 (2010). Note that this model is flexible as to what types of "harm" are accounted. Thus, it is not necessary to come up with one unifying theory of what constitutes a privacy harm. I tend to agree with Daniel Solove that this is a futile task. Daniel Solove, Understanding Privacy ix (2008).

¹⁰⁰ Risk-utility models were originally anticipated by Samuel Warren and Louis Brandeis, whose groundbreaking article on privacy cautioned that privacy rights should not interfere with access to valuable information. Warren & Brandeis, *supra* note 20, at 214–16.

¹⁰¹ Compare Kaplow & Shavell, supra note 82, at 85, with Litman, supra note 10, at 1303, and Richards, supra note 10.

¹⁰² See, e.g., Richards, supra note 10, at 373–74. As Richards points out, much of this chiseling has been done for good reason in light of the speech interests implicated by the tort. For a full discussion, see *infra* Part IV.

the rest of the office staff. As a result, Fiona suffers a great amount of stress and is ostracized by some of her colleagues. Her work and her career are subsequently jeopardized.¹⁰³

Abril focuses on the fact that George *divulges* the information and causes suffering to Fiona—suffering that is not recoverable under the tort of public disclosure of private facts since Fiona's sexual preferences are neither private facts nor highly offensive to a reasonable person.¹⁰⁴ To fix this injustice, Abril recommends a major overhaul of the public disclosure tort, despite that tort's inherent inconsistency with free expression and unobstructed information flow.¹⁰⁵

Abril overlooks the more compelling fact that George broke into Fiona's MySpace account. This behavior fits quite comfortably within existing routes of recovery under the tort of intrusion and intrusion-style statutes. ¹⁰⁶ By casting Fiona's cause of action as an uncontroversial, straightforward application of the intrusion tort, Fiona's recovery will avoid what Anita Bernstein calls the "novelty paradox"—the reluctance of courts to compensate new forms of injury precisely because they are new. ¹⁰⁷ Moreover, the intrusion tort allows Fiona to recover from George based not only on the injuries *his* disclosures caused, but all the disclosures springing from it. Just as trespassers are liable for the full spectrum of damages they cause regardless of their intentions, ¹⁰⁸ George will be liable for the mental distress caused by hacking into Fiona's account, for the distress caused by those others' spreading the information further.

The tort of intrusion and its potential for expansion are explored in the next two Parts.

¹⁰³ Abril, *supra* note 46, at 39-40.

¹⁰⁴ Id. at 40.

¹⁰⁵ Id.

¹⁰⁶ George's behavior is a criminal violation of the federal Computer Fraud and Abuse Act, 18 U.S.C. § 1030 (2006). A Michigan resident is facing a possible five year sentence for using his wife's password to log into her Gmail account, in violation of Michigan state anti-hacking law. Sara Wilson, *Clara Walker: Leon Walker Violated My Privacy*, 'HUFFINGTON POST (Jan. 5, 2011, 4:14 PM), http://www.huffingtonpost.com/2011/01/05/clara-walker-leon-walker-_n_804924.html.

¹⁰⁷ Anita Bernstein, How to Make a New Tort: Three Paradoxes, 75 Tex. L. Rev. 1539, 1544-47 (1997).

¹⁰⁸ See, e.g., Van Alstyne v. Rochester Tel. Corp., 296 N.Y.S. 726, 730–31 (App. Div. 1937) (imposing liability for the poisoning of two dogs when telephone company trespassed by leaving small bits of cable insulation containing lead, which were then consumed by the dogs).

II. OBSERVATION AND CAPTURE

We begin at the source of personal information flow by assessing the harms caused by observation and information capture, and the typical legal responses to them. Observation and capture are traditionally analyzed together, as "data collection," 109 but observation and capture raise distinct and interesting problems that can be profitably explored by disentangling the two stages. The recent spate of state wiretap act prosecutions charging citizens who recorded their interactions with police officers on cell phones 110 shows the obvious tension between observation and capture: if somebody is allowed to observe something, why is he not allowed to make a record of it? When do the acts of observation and capture raise sufficiently different privacy risks? This Part begins by analyzing observation alone, and then considers the nature of information harms caused by capture.

A. Observation

Suppose an obstetrician invites a friend to watch him perform a childbirth. The expectant mother mistakenly assumes that the friend, dressed in scrubs and introduced as a "helper," is a medical student or surgical assistant.¹¹¹ The friend's observation may have been quite valuable to him personally. Perhaps it indirectly improved the world by inspiring the friend to attend nursing school. Nevertheless, the observation was tortious.

The tort of intrusion imposes liability on anybody who intentionally intrudes on the seclusion of another if the intrusion would be "highly offensive to a reasonable person." The intrusion tort protects an interest in respite from observation and judgment (when the expectation of seclusion is reasonable). A right to seclusion is justified by a number of theories: seclusion allows us to engage in "productive secrets"—surprises may be planned, plots may be concocted, and

¹⁰⁹ Richards, *supra* note 13, at 1181–82.

¹¹⁰ David Rittgers, Wiretap Law Needs Update, Balt. Sun, June 1, 2010, at A13, available at http://articles.baltimoresun.com/2010-06-01/news/bs-ed-maryland-wiretapping-20100601_1_wiretapping-search-warrant-mr-graber; Heidi Reamer Anderson, The Mythical Right to Obscurity: A Pragmatic Defense of No Privacy in Public, 7 ISJLP (forthcoming 2012), available at http://papers.ssrn.com/sol3/papers.cfm?abstract_id=175 9374.

¹¹¹ See De May v. Roberts, 9 N.W. 146 (Mich. 1881) (presenting the factual basis of this example); see also Sanchez-Scott v. Alza Pharmaceuticals, 86 Cal. App. 4th 365 (2001), in which a pharmaceutical sales representative intruded on a patient's seclusion when he observed a breast examination because the patient's consent to his presence was predicated on the false assurance that the sales representative was a doctor.

¹¹² Restatement (Second) of Torts § 652B (1977).

new aspects of our individuality can be tried out without censure. Richard Posner promotes a right to seclusion on the theory that the effectiveness of communications will diminish if we worry that uninvited intruders are listening in. Ulie Cohen argues that zones of limited access promote individuality and noncomformity. Seclusion is where we groom ourselves, both literally and figuratively. It's where a person can practice and fail in peace. In the words of Ralph Waldo Emerson, [s] olitude, the safeguard of mediocrity, is to genius the stern friend "116"

The intrusion tort avoids conflict with information flows because the psychic harms and chilling effects caused by intrusions are independent from the production of new knowledge. Though recognition of "seclusion" sometimes depends on the likelihood that sensitive information could be generated, such as behind the drawn curtain in a hospital emergency room or inside a hanging file marked "Private," strictly speaking an intrusion has nothing to do with the content of the information that was discovered. A voyeur who peers through the windows and observes a mundane family scene has intruded upon the family's seclusion even though he has not learned any secrets.

Observation is a natural and necessary part of the human experience, so liability must be reserved for behavior that incorporates a sufficient amount of intent and effort. Intrusion guards our affairs from the "prying eyes or ears of others." It only offers a remedy when the eyes and ears are *prying*—that is, when an intruder has notice of a person's reasonable expectation of seclusion and intentionally makes an observation anyway. An intrusion requires a deliberate investigation. But by the same token, when a deliberate, obnoxious observation has taken place, liability is appropriate even in instances where the information learned ends up being highly valuable or newsworthy.¹¹⁸

Because the intrusion tort regulates behavior, its connection to speech, news, and the free flow of information is tenuous enough to

¹¹³ Gavison, *supra* note 25, at 443; Joel R. Reidenberg & Francoise Gamet-Pol, *The Fundamental Role of Privacy and Confidence in the Network*, 30 WAKE FOREST L. REV. 105 (1995) (arguing that privacy on the internet is necessary in order to promote trust and exploration); Solove, *supra* note 32, at 553.

¹¹⁴ Posner, supra note 84, at 408.

¹¹⁵ Julie E. Cohen, Examined Lives: Informational Privacy and the Subject as Object, 52 Stan. L. Rev. 1373, 1377 (2000).

¹¹⁶ RALPH WALDO EMERSON, CONDUCT OF LIFE 134 (1860).

¹¹⁷ Nader v. Gen. Motors Corp., 255 N.E.2d 765, 768 (N.Y. 1970).

¹¹⁸ Barber v. Time Inc., 159 S.W.2d 291 (Mo. 1942) (imposing liability and punitive damages on *Time Magazine* for taking and publishing a photograph of a patient with a rare physical ailment after she explicitly denied consent).

avoid conflict with the First Amendment. Intrusion-style provisions in federal statutes like the U.S. Wiretap Act¹¹⁹ (prohibiting the interception of conversations), the Stored Communications Act¹²⁰ (prohibiting the unauthorized access of e-mail and other electronic communications), and the Computer Fraud and Abuse Act¹²¹ (prohibiting hacking into another's computer accounts and personal files) have avoided coming into conflict with the First Amendment jurisprudence.

Intrusions are in the class of activities that tort law attempts to deter completely.¹²² It is in the public's interest to penalize intruders even if the subject is unaware that he is being observed. Indeed, many intrusion-based laws (like the Wiretap Act) assign criminal liability for intrusion, irrespective of the observed's awareness that his seclusion had been violated. But given the heavy sanctions that can be applied to intrusive acts, courts are under significant pressure to craft a definition of "seclusion" that serves the best interests of the community. This is no easy task.

If seclusion is defined too narrowly, intrusion will be little more than an extension of trespass law, protecting places only. A narrow version of seclusion might prevent parabolic microphones, binoculars, and other sense-enhancing technologies that effectively transport the intruder into the home, but this is little more than a conceptual extension of a property line, and leaves out many contexts where the observed might expect and profit from respite.

On the other hand, an expansive version of "seclusion" could inappropriately constrain everyone else. It could hamper our own information-gathering practices that we instinctively rely on in order to learn from the experiences of others. Observation also plays an important role in the class structure of American society.¹²³ Unseemly tabloid stories, so reviled by Warren and Brandeis, tear down the barriers that separate elites from the rest.¹²⁴ These barriers are com-

^{119 18} U.S.C. §§ 2510–2522 (2006).

¹²⁰ Id. §§ 2710-2712.

¹²¹ Id. § 1030.

¹²² Like other intentional torts, intrusion aims to penalize anyone who evades the information market and intentionally observes without permission. Since the optimal activity level for intentional torts is zero, we should embrace any enforcement and deterrent that proves to be cost-effective. *See* Posner, *supra* note 83, at 226–27.

¹²³ See generally Whitman, supra note 57 (explaining the difference between the American and European approaches to privacy).

¹²⁴ Ryan Linkof elegantly makes this point in a recent op-ed in the *New York Times*. Watching the painfully choreographed, and highly policed, red-carpet arrival of Prince William and Kate Middleton at a recent Los Angeles polo match reminded me why intrusive journalistic tactics are often called upon. They exist to break down the

posed of etiquette and social norms. They are, in other words, made from the same things that forge expectations of privacy and seclusion. Courts face a dilemma when having to decide which of these norms of etiquette to enshrine into the right of seclusion, and which to leave unprotected by the rule of law.

The paparazzi scandals surrounding the death of Princess Diana and the wiretapping scandals of Rupert Murdoch's *News of the World* tabloid are reminders that some acts of observation cross a line that even news-lovers find unethical and repugnant. On the other hand, the aggressive newsgathering that helped break stories about the sexual exploits of John Edwards and the investigative reporting tricks that helped expose abusive medical facilities are reminders that nosiness should be tolerated all the way up to that line.¹²⁵ Thus, the definition of seclusion must find a balance between the remoteness every human legitimately counts on and the curiosity that every human legitimately explores.

Difficult as it may be to elucidate the definition, courts have not had too much trouble knowing seclusion when they see it. A strip search invades seclusion. Cameras mounted in holding cells at a city jail do not. A public restroom provides seclusion most of the time, but when a long masturbation session is interrupted by a janitor with a duty to oversee the safety of the restrooms, there is no violation of seclusion. A wife does not have seclusion from her husband in their bedroom when her husband is there with her, but she does have seclusion, even from her husband, when she is alone in the same bedroom. The site of a bad automobile accident does not

barriers of access that keep social elites at a remove from ordinary people. The tabloids, throughout history, on both sides of the Atlantic, have been predicated on chipping away at that division. They play a fundamental role in democratic cultures, especially in societies characterized by the pull between the demands of a mass society and the persistence of social and economic inequality. Ryan Linkof, Op-Ed., *Why We Need the Tabloids*, N.Y. Times, July 20, 2011, at A27, *available at* http://www.nytimes.com/2011/07/20/opinion/20linkof.html?_r=0.

- 126 Helton v. United States, 191 F. Supp. 2d 179 (D.D.C. 2002).
- 127 DeBlasio v. Pignoli, 918 A.2d 822, 825 (Pa. Commw. Ct. 2007).
- 128 Kjerstad v. Ravellette Publ'ns, Inc., 517 N.W.2d 419, 422–23 (S.D. 1994).
- 129 Hougum v. Valley Mem'l Homes, 574 N.W.2d 812, 818 (N.D. 1998).
- 130 In re Marriage of Tigges, 758 N.W.2d 824, 827 (Iowa 2008).

¹²⁵ Emily Miller, Op-Ed., John Edwards Indictment a Vindication for National Enquirer, Wash. Times, June 3, 2011.http://www.washingtontimes.com/news/2011/jun/3/miller-john-edwards-indictment-vindication-nationa/.

offer seclusion to the accident victims, but the inside of the rescue helicopter does. 131

Seclusion can be found in public spaces, as when a scorned lover conducts constant surveillance from exclusively public places. But courts require public surveillance to be unusually dogged before assigning liability. As described in the Introduction, intentionally leaning in to observe the money that Ralph Nader withdrew from his account is an intrusion. But if Nader kept his bills out and flaunted them as he walked through the bank, then the same intentional observation (even if performed for malicious purposes) would not be intrusive. Seclusion cloaks our documents and affairs as well. If a person accesses a foe's bank records or medical records through fraud, he has intruded upon his foe's seclusion.

The distinction between the rights enforced by the intrusion tort and the rights enforced by the broad-sweeping data privacy regulations proposed by privacy scholars is not simply a difference between tort and property. Indeed, the line between property and intentional torts is blurred. This is easiest to see with the tort of trespass, which enforces property rights to exclusively control access to land and tangible property. Likewise, exclusive control over our seclusion is in some sense a property-like entitlement that we are free to horde or share as we please. Countless Facebook posts have proven that we are free to give away our seclusion if we do not value it highly. When we do maintain seclusion, our right to exclusive control over it is enforced through the intrusion tort. The main distinction between intrusion and the other privacy proposals is the object of the exclusive control. With the latter, the object of exclusive control is information;

¹³¹ The quiet conversation between the accident victim and the doctor that came to the scene is afforded seclusion, because the conversation might have been heard only with the help of microphones. Shulman v. Group W Prods., Inc., 955 P.2d 469, 491 (Cal. 1998).

¹³² The *Nader* line of reasoning has been followed in other jurisdictions as well. Kramer v. Downey, 680 S.W.2d 524 (Tex. App. 1984) (holding that incessant observation by a scorned ex-lover, even though she stayed on public property to do so, was an intrusion upon seclusion justifying a jury damages award).

¹³³ Id.

¹³⁴ Nader v. Gen. Motors Corp., 255 N.E.2d 560, 570-71 (N.Y. 1970).

¹³⁵ Zimmerman v. Wilson, 81 F.2d 847 (3d Cir. 1936); State *ex rel.* Clemens v. Witthaus, 228 S.W.2d 4 (Mo. 1950) (*en banc*); Frey v. Dixon, 58 A.2d 86 (N.J. Ch. 1948); Bednarik v. Bednarik, 16 A.2d 80 (N.J. Ch. 1940); Brex v. Smith, 146 A. 34 (N.J. Ch. 1929).

^{136~} William M. Landes & Richard A. Posner, The Economic Structure of Tort Law 30~(1987).

with the former, it is not. This is why intrusion coexists so comfortably with other normative commitments.

The tort of intrusion reinforces norms by tracking social consensus, which means that most people will recognize what is and is not seclusion, even in new contexts. This makes the tort especially flexible and appropriate for application to new technologies. New applications of the tort will be discussed in Part III. To make the discussion fruitful, we next consider regulations of information capture.

B. Capture

The capture stage of personal information flow presents a number of puzzles. Occasionally law forbids recording a person or event even if observation of the event is legal. These laws apply to mechanical capture—photographs, videos, audio recordings, and other means of capture that are sufficiently automated.

For example, some state wiretapping statutes contain an important deviation from the federal analog, the Wiretap Act. Federal law penalizes anyone who intercepts a private conversation, but if one party to the conversation chooses to record the conversation (or to have some third party listen in and record it for them), that capture is lawful.¹³⁷ The Wiretap Act is a "one-party consent" statute: if one party to the conversation consents to recording or interception, the penalties do not apply. Several states have enacted wiretap laws imposing civil or criminal penalties unless *all* parties to a conversation consent to the recording. These statutes have sparked public debate and criticism recently because citizens in Massachusetts, Illinois, Pennsylvania, and Maryland have been charged or prosecuted under the wiretap statues for recording their own interactions with state police officers. 138 However well-intentioned legislators may have been when the laws were adopted, the inexorable inference is that state police forces are exploiting the laws to evade public accountability. 139

Courts have not created First Amendment safeguards for the use of recording devices. Photographs, video capture, and audio recordings are often found to lack the authorship or expressive character necessary to be considered speech, 140 and recording equipment is not

^{137 18} U.S.C. § 2511(2)(c) (2006).

¹³⁸ Anderson, supra note 110.

¹³⁹ Ia

¹⁴⁰ See Kelly v. Borough of Carlisle, 622 F.3d 248 (3d Cir. 2010); Pomykacz v. Borough of W. Wildwood, 438 F. Supp. 2d 504, 513 n.14 (D.N.J. 2006) ("An argument can be made that the act of photographing, in the abstract, is not sufficiently expressive or communicative and therefore not within the scope of First Amendment protection—even when the subject of the photography is a public servant." (citing

among the "indispensable tools of newsgathering" that receive derivative protection under the First Amendment.¹⁴¹ The iPhone and the citizen-blogger might make one question whether the law accurately reflects today's news media landscape.¹⁴² To take just one recent example, a bystander's photographs of Lt. John Pike pepper spraying Occupy movement protesters on the U.C. Davis campus catapulted the story into the national headlines and sparked a satirical Internet meme wherein the Lieutenant appears in famous works of art, casually pepper spraying the subjects.¹⁴³ Recent case law has begun to recognize a constitutional right to film public officials performing their official duties.¹⁴⁴ We may see this narrow right to capture expand in due time.

Putting aside the First Amendment's application, when does mechanical capture alone, *without* observation, create serious risks? In the uncommon instances where a plaintiff has sued for intrusion

Tenafly Eruv Ass'n, Inc. v. Borough of Tenafly, 309 F.3d 144, 160 (3d Cir. 2002))); C. Thomas Dienes, *Protecting Investigative Journalism*, 67 Geo. Wash. L. Rev. 1139, 1146 (1999). Perhaps in light of Justice Kennedy's reasoning in *Sorrell v. IMS*, the right to mechanical capture can be tested again. Sorrell v. IMS Health Inc., 131 S. Ct. 2653, 2667 (2011) ("Facts, after all, are the beginning point for much of the speech that is most essential to advance human knowledge and to conduct human affairs. There is thus a strong argument that prescriber-identifying information is speech for First Amendment purposes.").

- 141 Dietemann v. Time, Inc., 449 F.2d 245, 249 (9th Cir. 1971) (internal quotation marks omitted); Shulman v. Group W Prods., Inc., 955 P.2d 469, 495 (Cal. 1998) (internal quotation marks omitted); Shevin v. Sunbeam Television Corp., 351 So. 2d 723, 727 (Fla. 1977).
- 142 Seth Kreimer makes a powerful case for First Amendment protection of image capture. Seth F. Kreimer, *Pervasive Image Capture and the First Amendment: Memory, Discourse, and the Right to Record*, 159 U. PA. L. REV. 335, 337 (2011).
- 143 Robin Wilkey, John Pike Memes Go Viral: Pepper-Spraying UC Davis Cop Becomes Internet Sensation, The Huffington Post (Nov. 21, 2011, 8:22 PM), http://www.huffingtonpost.com/2011/11/21/john-pike-memes-go-viral_n_1106616.html.
- 144 See Glik v. Cunniffe, 655 F.3d 78, 82 (1st Cir. 2011) ("Gathering information about government officials in a form that can readily be disseminated to others serves a cardinal First Amendment interest in protecting and promoting 'the free discussion of governmental affairs.'" (quoting Mills v. Alabama, 384 U.S. 214, 218 (1966))). The U.S. District Court for the Eastern District of Pennsylvania recognized a First Amendment right to videotape public officers performing their public duties. Robinson v. Fetterman, 378 F. Supp. 2d 534, 541 (E.D. Pa. 2005). The Third Circuit declined to follow *Robinson* when a recording was made during a traffic stop because these stops are inherently dangerous for police, and because the recording was not clearly made for a political or expressive purpose. Kelly v. Borough of Carlisle, 622 F.3d 248, 262 (3d Cir. 2010); see also Pomykacz v. Borough of W. Wildwood, 438 F. Supp. 2d 504, 513 n.14 (D.N.J. 2006) ("[V]ideotaping or photographing the police in the performance of their duties on public property may be a protected activity." (emphasis added) (quoting Gilles v. Davis, 427 F.3d 197, 212 n.14 (3d Cir. 2005))).

based on capture alone, without alleging an offensive observation, the act of capture implied that the information would, eventually, be used for some lascivious or inappropriate purpose. For example, the plaintiffs in *Hamberger v. Eastman* were tenants who discovered that their landlord had installed hidden video cameras in the bedroom of their apartment. The landlord attempted to evade liability for intrusion by arguing that the plaintiffs could not prove he actually viewed the video footage, but the court was not impressed with this argument. 146

Suppose, though, that the landlord had installed the video camera so that it monitored only the inside of the front door, and had a practice of not reviewing the footage unless a crime or emergency warranted it. The outcome of the case under those alternative facts is less certain. The recordings that were actually made, though, were so unlikely to be useful for any purpose other than the landlord's recreation that the court was compelled to impose liability even without evidence of an offensive *observation*.¹⁴⁷

Law addressing capture on its own, untethered from observation, is sparse, but two factors seem necessary. First, the subjects must have insufficient opportunity to prevent the intentional observation, and second, the record must have no redeeming social value. The facts of *Hamberger* satisfy both of these elements, as do video voyeurism laws, which prohibit surreptitious capture of other people's "private areas" irrespective of whether the images are ever observed. 148

The Video Voyeurism Prevention Act imposes a penalty only if the individual has a reasonable expectation of privacy, and her body parts are captured surreptitiously, so the first element is met.¹⁴⁹ The second element is incorporated into the Act, too, because the Act prohibits only recordings that are made with the *intent* to capture an image of private areas. If a hidden surveillance camera, installed for the purposes of security, were to capture an image of a female breast when a gust of wind flips up a shirt, this capture would not violate the Act. Footage created for the purpose of security provides significant utility, even if it also incidentally captures the occasional private part. Images intentionally capturing private areas do not tend to add significant social value.¹⁵⁰

¹⁴⁵ Hamberger v. Eastman, 206 A.2d 239, 242 (N.H. 1964).

¹⁴⁶ Id

¹⁴⁷ Id.

¹⁴⁸ See, e.g., Video Voyeurism Prevention Act, 18 U.S.C. \S 1801 (2006); Ala. Code \S 13A-11-32 (2005); Fla. Stat. Ann. \S 810.145 (West 2012).

^{149 18} U.S.C. § 1801.

¹⁵⁰ The tort of public disclosure of private facts has been used to effect a limitation at the point of capture when a momentary accidental nudity was captured without

Before the era of rapid data growth, observation took place before, or concurrent with, capture. Sally Mann observed her family through the lens of her camera just before she captured them.¹⁵¹ And Linda Tripp recorded her conversation with Monica Lewinsky as they were having it.¹⁵² Today, information capture is a ubiquitous and unavoidable part of ordinary modern life. The geo-location data created and transmitted by our cell phones, the routing information logged by our Internet service providers, and even the data generated by our hotel doors, 153 are part of the data exhaust we produce simply by going about our business. While it might seem convenient to consider all acts of capture to be acts of observation as well, doing so would severely shrink the scope of seclusion. The reason is a bit counterintuitive: if we consider all captures of data to be observations, then we would have to expect, and consent to, the observation of our data anytime we use a technology that must produce a data trail to function properly. This would eliminate any possible expectations we might have in seclusion to that data.

A critical insight for our purposes is that, except in the rare instances described above, it is *observation*, and not capture, that is at the heart of an intrusion. By recognizing that intrusion protects us from excessive and overzealous observations, we can distinguish between innocuous data capture and inappropriate, focused investigation. This permits courts to expand the intrusion tort amid the data exhaust.

consent. Daily Times Democrat v. Graham, 162 So. 2d 474 (Ala. 1964). *But see* McNamara v. Freedom Newspapers, Inc., 802 S.W.2d 901 (Tex. App. 1991) (finding that the First Amendment provided immunity to a newspaper that published a photograph of a high school soccer player whose genitalia were accidentally exposed). The exposure of nude body parts may be a necessary (but not sufficient) condition for recovery based on images of people in sexually compromising positions. *See* Borton v. Unisys Corp., 1991 WL 915, *9 (E.D. Pa. 1991) (where a photograph taken while an employee cupped his hands over another employee's breast without consent was not depicting anything sufficiently "private" because none of the crucial body parts were exposed).

151 Lyle Rexer, Marriage Under Glass: Intimate Exposures, N.Y. Times, Nov. 19, 2000, at AR1, available at http://www.nytimes.com/2000/11/19/arts/art-architecture-marriage-under-glass-intimate-exposures.html?pagewanted=all&src=pm.

152 The Prosecution of Linda Tripp, Editorial, N.Y. Times, Dec. 19, 1999, at WK12, available at http://www.nytimes.com/1999/12/19/opinion/the-prosecution-of-linda-tripp.html.

153 Hotel door data was expected to play a role in the rape prosecution of Dominique Strauss-Kahn, the Chief of the International Monetary Fund. Angelique Chrisafis & Ed Pilkington, *Hearing is Likely to Hinge on the Question of Consent*, Guardian (London), May 19, 2011, at 23, *available at* http://www.guardian.co.uk/world/2011/may/18/strauss-kahn-defence-likely-consent.

III. THE NEW INTRUSION

In 2000, as privacy scholars began to convene, anticipate, and collectively fret over the mounting privacy troubles in the age of the Internet, Michael Froomkin suggested that the community might have to consider whether modern data collection practices "constitute an invasive tort of some type." He recognized that, if privacy law can address invasive collection techniques, that will relieve the need for regulation to address problems downstream. This Part takes up Froomkin's challenge. It will show how the intrusion tort can be clarified and modernized to tackle the most troubling data collection practices.

A. Ubiquitous Data Exhaust

Recall the fictional General Motors spy from the Introduction who followed Ralph Nader down every aisle of a store, taking note of every product he examined or put, temporarily, into his cart, somehow managing to collect all this information without being detected.¹⁵⁷ This crudely describes the type of information collected by web tracking technologies like cookies and web bugs. Websites are not particularly unique in this regard; nearly all machines and gadgets

¹⁵⁴ A. Michael Froomkin, *The Death of Privacy*?, 52 Stan. L. Rev. 1461, 1542 (2000). Froomkin did not believe that existing tort laws, including intrusion upon seclusion, could be expanded to meet privacy demands such as closed circuit television monitoring because the tort traditionally excluded any surveillance or observations performed in public spaces. *Id* at 1538–39. He also believed expansion of the tort into public spaces would directly conflict with the First Amendment, but the tort is in fact in less tension with the right to free speech and access to information than the other reforms Froomkin considers. However, Froomkin and I are in agreement that the creation of records in the course of a business transaction is immune from tort liability, and therefore puts limits on the aggressiveness with which the intrusion tort may defend and define privacy rights.

¹⁵⁵ Id. at 1542.

¹⁵⁶ For a more detailed description of the technology, see $\it In~re$ DoubleClick Inc. Privacy Litig., 154 F. Supp. 2d 497, 503–04 (S.D.N.Y. 2001).

¹⁵⁷ One military court opinion suggested that people cannot have a subjective expectation of privacy in data files that they do not know exist. "The military judge concluded the appellant had no expectation of privacy in the contents of the computer. We find no abuse of discretion in his ruling. There is no evidence the appellant was aware the Internet history files existed, and we are unconvinced the appellant could entertain a subjective expectation of privacy in them without such knowledge." United States v. Larson, 64 M.J. 559, 563 (A.F. Ct. Crim. App. 2006). This poor reasoning is probably an example of bad facts making bad law. Since the defendant was sanctioned for soliciting sex from somebody he believed to be a fourteen-year-old (but was in fact a law enforcement officer), the court was motivated to make every determination against him.

produce data about their users for some functional purpose. But since web tracking incorporates most of the issues that arise from other forms of data exhaust, an understanding of intrusion's application to website data provides an instructive template.

Suppose Arthur visits the website Pandora.com for the first time. Pandora streams music based on bands that Arthur identifies as "seeds." Arthur is able to listen to the customized radio station and create an account for free; Pandora's business model relies on advertising, which is serviced by DoubleClick (now a subsidiary of Google). 158

When Arthur types pandora.com into his browser, his computer sends packets of data through the network of networks that constitutes the Internet until the packets reach their destination—Pandora's servers. Pandora's servers reconstruct the packets into the request message (essentially, "I want to see your home page").

Pandora automatically sends a response to Arthur's computer containing three elements. First, the response includes the HTML or Javascript code and other files like JPEGs of pictures so that Arthur's computer can build and display the webpage. Now, Arthur's computer will have everything he needs to view the page except for the advertisements. Second, the response includes cookies and, perhaps, action tags or web bugs, which are additional files stored on Arthur's computer that keep track of his online activities. Third, the response includes an IP address link that directs Arthur's computer to communicate with DoubleClick's server so DoubleClick can send the files needed to fill in the ad space. When that happens, DoubleClick places its own cookie on Arthur's computer, if he does not already have a DoubleClick cookie. (He probably does, in which case the IP address link would also contain his unique DoubleClick cookie ID.) DoubleClick will then send a targeted ad to Arthur.

The cookies—both Pandora's and DoubleClick's—record limited categories of information, sometimes including the user's passwords and browsing histories. But most crucially, the cookies contain a unique ID string of characters which will enable the cookie-placing entity to look up details collected from previous visits and stored on their own servers. For example, if Arthur had a preexisting Pandora cookie, it may have recorded content that Arthur typed into his browser to transmit to Pandora in past visits—his name and password, or the names of the bands he used to seed his radio station, for example. Cookies can be used to look up any content once communicated

¹⁵⁸ Matthew Lasar, *The Perils of Being Pandora*, Ars Technica (Feb. 15, 2011), http://arstechnica.com/media/news/2011/02/the-perils-of-pandora.ars.

between the user and the website, so if a user has provided their name, e-mail address, search terms, or credit card information to the website they are visiting, the website and the third party intermediary advertisers may have logged the information so that it could be associated later with the unique cookie ID.

Pandora can also store location information about the pages Arthur visited within the Pandora website. This may be of limited interest in the context of an online radio station website, but location information is more consequential when one considers a cookie placed by WebMD (and the cookies of its third party advertising affiliates). WebMD might record that Arthur's computer visited the site's gonorrhea page. Action tags (also known as "web bugs" or "clear gifs") work with cookies to record even more particularized information, such as the user's mouse movements across the website, and keystrokes that were entered into fields on the webpage but never actually sent (because the user deleted the content or decided not to submit the information). The action tag is loaded directly onto the HTML page as the user views it, though it is not visible, and it writes the keystroke and mouse movement details onto the user's cookie profile.¹⁵⁹

The creators of Web browsers (like Microsoft's Explorer, Mozilla's Firefox, and Google's Chrome) implement a number of industry standards developed by the Internet Engineering Task Force. The standards are referred to as Requests for Comments ("RFCs") to show the Task Force's commitment to consensus, adaptation, and non-stasis. The RFCs specify that information recorded on one party's cookie must be encrypted, cannot be observed by others, and must not contain malicious code (designed to inspect or tamper with the computer user's files). Though the RFCs are technically industry selfregulation and, in theory, a new browser could ignore the standards, the RFCs have the force of network effects. If a browser does not implement one or more of the RFCs, it could have compatibility problems with other servers and users on the Internet and fail to function properly. Some of the RFCs are also supported by public law. If a third-party website or entity attempted to access a cookie without the authorization of the computer user or the website that placed the cookie, this act would presumably violate the Stored Communications

¹⁵⁹ Stefanie Olsen, Nearly Undetectable Tracking Device Raises Concern, CNET (July 12, 2000, 3:05 PM), http://news.cnet.com/2100-1017-243077.html. For a description of current cookie-setting practices, see Chris Jay Hoofnagle et al., Can Advertisers Learn That "No Means No"?, BNA Privacy & Security Law Report (2011).

Act.¹⁶⁰ And if a cookie was programmed with malicious code designed to vandalize the computer user's files, the cookie would violate the Computer Fraud and Abuse Act.¹⁶¹

While web tracking technologies are capable of capturing granular detail about computer users, the details are often accessed to improve visitors' experiences. These are benefits web users have come to expect. For example, the cookie can store the Arthur's login information and password, and it can recall which pages on the site Arthur has viewed so that the hyperlinks appear in a different color. Even mouse and keylogging data can be aggregated across a site's users and analyzed to assess whether the information architecture of the site is causing confusion or inefficiency.

The cookie databases of third party intermediaries like DoubleClick cannot claim to have the same aim of helping the user's experience, and they record the same types of details. Moreover, they capture data during the interactions the user has with all of the intermediary's affiliated websites. Thus, DoubleClick's cookie has far more information about Arthur than Pandora's cookie. DoubleClick has all of the information on Pandora's cookie, as well as all the information on Toys R Us's cookie, as well as all the information on the New York Times' cookie, and so forth. A quick session of websurfing could increase the detail in the DoubleClick cookies significantly because of DoubleClick's aggregation of market power. Neil Richards has characterized these "über-databases" as inherently problematic. 162 The vast scale differences between what was once known about people and what can be known about them today is also at the heart of Paul Ohm's critique of the accretion of information in our personal "databases of ruin." 163 But it is not analytically rigorous to say that a difference in scale is a difference in kind. Without a coherent theory of harm, accretion is merely a description of the information ecosystem we live in today and not, necessarily, a threat.

¹⁶⁰ The computer user and the website (or its advertising intermediaries) are "users" under the Electronic Communications Privacy Act, and the communications recorded by the cookies are covered communications; thus, accessing the cookies without consent would be an offense under 18 U.S.C. § 2701(a) (2006). *In re DoubleClick*, 154 F. Supp. 2d at 507–08.

¹⁶¹ The Computer Fraud and Abuse Act outlaws the intentional access of information and causing damage to an end user's computer. 18 U.S.C. \S 1030(a)(5)(B), (2)(C) (2006).

¹⁶² Richards, supra note 13, at 1158.

¹⁶³ Ohm, supra note 99, at 1762.

Offensive observations, on the other hand, are fully realized privacy harms as soon as they occur. A legal challenge that focuses on these harms has the most likelihood of success.

B. Failed Attempts

So far, every legal challenge to Web tracking has tried to force-fit the facts into federal statutory schemes that were designed to prevent something else. 164 Attempts to recover using the Computer Fraud and Abuse Act (CFAA) falter on the \$5000 damages and economic loss requirement—a threshold chosen by Congress to ensure that only the most malicious incidents of hacking are ensnared by federal criminal and civil liability. 165 Challenges based on the Wiretap Act fail because the website tracking the user is a party to the communication. Even the website's third party intermediaries, such as DoubleClick, fall outside the scope of the Wiretap Act because of the one-party consent rule; so long as one party to the conversation consents to a recording or interception, the statute's prohibitions do not apply. 166 Since Pandora authorizes DoubleClick to access its communications with Arthur, DoubleClick's data capture has the same legal consequences that Pandora's does. 167

The plaintiffs' bar has not made a serious attempt to deter web tracking through tort law. State causes of action were alleged in major web tracking cases like *In re DoubleClick* and *Avenue A*, but after the federal courts dismissed the statutory claims and withdrew ancillary

¹⁶⁴ In re Pharmatrak, Inc. Privacy Litigation, 329 F.3d 9 (1st Cir. 2003); Chance v. Avenue A, Inc., 165 F. Supp. 2d 1153 (W.D. Wash. 2001); In re DoubleClick, 154 F. Supp. 2d at 497; Valdez v. Quantcast Corp., CV10-05484 (Cal. 2010).

¹⁶⁵ Avenue A, 165 F. Supp. 2d at 1160; In re DoubleClick, 154 F. Supp. 2d at 522.

¹⁶⁶ The Stored Communications Act exempts interceptions that are authorized "(1) by the person or entity providing a wire or electronic communications service; [or] (2) by a user of that service with respect to a communication of or intended for that user." 18 U.S.C. § 2701(c)(1)–(2) (2006). The Wiretap Act states that "[i]t shall not be unlawful under this chapter for a person not acting under color of law to intercept a wire, oral, or electronic communication where such person is a party to the communication or where one of the parties to the communication has given prior consent to such interception" *Id.* § 2511(2)(d); United States v. Caceres, 440 U.S. 741, 750 (1979) (confirming the Wiretap Act adopts the one-party consent rule). The Wiretap Act does outlaw interceptions that are made for a tortious purpose, regardless of whether a party has consented to the interception, but courts have distinguished between tortious *purposes* and tortious *means*. The interception cannot be the basis for relief under the "tortious purpose" clause. Sussman v. Am. Broad. Co., 186 F.3d 1200, 1202–03 (9th Cir. 1999).

¹⁶⁷ Avenue A, 165 F. Supp. 2d at 1161; In re DoubleClick, 154 F. Supp. 2d at 510, 519.

jurisdiction over the state claims,¹⁶⁸ the cases evaporated. The state claims were never fully litigated—probably a reflection of the trial lawyers' confidence in the likelihood of winning based on a novel interpretation of privacy torts. Recent lawsuits against Google, Clearspring Technologies, and Disney that challenge the use of flash cookies and respawning cookies attempt to use the same ill-fitting federal statutes rejected in DoubleClick and Pharmatrak and will probably duplicate their fate.¹⁶⁹

With a careful understanding of the intrusion tort, and the interests it is meant to protect, state courts are in the best position to address the perils of web tracking. Courts can identify circumstances in which we should be able to expect seclusion while surfing the World Wide Web, even if the web is considered to be public. Next, the Article describes how they should do so.

C. A New Intrusion

The intrusion tort is applicable to many contexts, but we will continue to use web tracking to explore its form and function, making only the occasional detour to consider how the tort could work with GPS data, security footage, and other personal data.

1. The Elements

Intrusion can benefit from some conceptual clarification before it is applied to new contexts. Even in real space, intrusion has only two aspects to its design: there must be an observation, and that observation must be highly offensive to a reasonable person.¹⁷⁰

A new restatement of the tort might look something like this:

¹⁶⁸ Avenue A, 165 F. Supp. 2d at 1163.

¹⁶⁹ Greg Sandoval, Suit Alleges Disney, Other Top Sites Spied on Users, CNET (August 14, 2010, 3:33 PM), http://news.cnet.com/8301-31001_3-20013672-261.html; Christopher Sheean on the Latest Google Class Action, POINT OF Law (December 8, 2010, 9:41 PM), http://www.pointoflaw.com/archives/2010/12/chris-sheean-on.php.

¹⁷⁰ This is a collapsed version of the Second Restatement definition of intrusion upon seclusion. The Restatement defines the tortfeasor as: "[o]ne who intentionally intrudes, physically or otherwise, upon the solitude or seclusion of another or his private affairs or concerns, is subject to liability to the other for invasion of his privacy, if the intrusion would be highly offensive to a reasonable person." Restatement (Second) of Torts § 652B (1977). Here, the observation event incorporates the intentionality and the intrusion elements, and the requirement that the observation event be offensive incorporates both the "offensiveness" element as well as considering whether the plaintiff had "seclusion" in the first place.

XXOne who intentionally observes another is subject to liability to the other if the observation would be highly offensive to a reasonable person.

As in real space, not every observation is offensive. Information that is voluntarily shared with an individual or the public can be observed without offense by that individual, in the case of the former, and by any individual in the case of the latter. The offensiveness element winds up turning on whether the observed could have and should have expected their information to be exposed to the observer. If a piece of information was not voluntarily exposed, liability will attach to any observation.

Identifying an "observation" is a surprisingly difficult and uncharted task. Recall that the creation and capture of data does not, on its own, mean that observation has taken place. In the classic intrusion cases, one human being observed another when they shouldn't have. Today many challenging privacy problems have little to no human involvement.

An observation requires personal information to be recognized in some meaningful way. If a human being reads a line of data about somebody and comprehends its context, knowing whom the data is describing, then the data is "observed." But we should not limit the definition of observation to events involving human cognition. Algorithmic and automated processes can violate a sense of seclusion, too. Suppose, for example, the website WebMD collects the IP addresses of web users who visit its page on depression and automatically submits them to a reverse-lookup service to obtain names and mailing addresses. Next, the WebMD program automatically transmits the names and mailing addresses to a business affiliate which, without allowing any employee to open the file, uses the data to fill out a form letter reading, "Dear Mr. Smith, I understand you have been coping with depression. Our offices are here to help " Business practices are increasingly automated. While human recognition is sufficient to create an observation, it is not necessary.¹⁷¹ Thus, we must determine for the first time what constitutes machine observation. The results map quite neatly onto the Fair Information Practices concept of purpose limitation.

The "offensiveness" and "observation" elements are explored in more detail below. This constitutes a first attempt to mark rough boundaries for each of the two elements. Given the significance of

¹⁷¹ M. Ryan Calo has stressed the importance of defining privacy without reference to a human observation. Calo, *supra* note 22, at 1134 ("Privacy harm can and does occur in the absence of a human perpetrator.").

the legal rights protected by a new intrusion and the competing interests in information, the framework sketched out here leaves open the exact definitions of "offensiveness" and "observation". These will be fertile areas for future research.

We start with "offensiveness" because, although it might seem ancillary to the observation element, it actually provides a helpful prerequisite sorting mechanism. We need not worry about what it means to observe data if the data has been voluntarily exposed. The function of the right to seclusion, as Part I has described, is to hash out a compromise between an individual's interests in privacy and others' interests in information. The contours of our right to seclusion are determined by the "offensiveness" element. Observations penetrate that seclusion.

a. Offensive Observations of Unexposed Data

During the consideration of an intrusion claim, juries and lawmakers will have to decide whether the defendant's observation is sufficiently offensive to trigger liability. Put another way, the fact-finder must decide whether a computer user was justified in expecting seclusion. This requires the fact-finder to determine whether an observation would interfere with solitary exercises that are important to personal development and self-determination.

Some observations have long been treated as per se inoffensive, and there is no reason to believe the case law should be reversed. Transaction data created in the course of a purchase, for example, is precisely the sort of information the user has willingly exposed to the entity in order to purchase goods or services.¹⁷² Likewise, most communications of content made by a computer user in order to interact with a company are willing exposures.¹⁷³ If Arthur tells Pandora that he wants to hear Astrud Gilberto, it would not strike ordinary jurors as offensive that Pandora knows, and remembers, that he requested Pandora to serve up bossa nova music. The analogy to the brick and mortar world is instructive. A skilled waiter remembers the preferences

¹⁷² *In re* Northwest Airlines Privacy Litig., 2004 WL 1278459, at *5 (D. Minn. 2004) (finding that the plaintiffs' intrusion claim failed because "[i]n this instance, Plaintiffs voluntarily provided their personal information to Northwest"); Dwyer v. Am. Express Co., 652 N.E.2d 1351, 1354 (Ill. App. 1995) ("By using the American Express card, a cardholder is voluntarily, and necessarily, giving information to defendants").

¹⁷³ Searches within a site, while technically communications between the computer user and the website, might be treated differently from other types of communications. These searches might be distinguished from transactions with the website because they are a means of orientation only, and not part of the quid pro quo of a purchase.

and ordering habits of regular customers. Since organizations routinely maintain business records, it is not particularly disconcerting that a company can access information voluntarily submitted by the user in the course of obvious interaction. For these types of transaction data, restrictions on future dissemination and use would have to be justified on some other ground.¹⁷⁴

This is not to say that transaction data is a total free-for-all. A third party can still intrude on the transaction data if he has accessed the data without permission from either the user or the transaction company; a hacker is no different from the snoop who peeks at a person's medical records without permission from the patient or the health provider.¹⁷⁵ But the website itself can observe with impunity the transaction records it maintains.

What about the detailed web tracking data? Has a visitor voluntarily exposed the precise HTML pages accessed within the domain, or the search terms used to find a page within the domain, or the items browsed in an online store, or the movements of a user's mouse? Ultimately, the answers will require juries or lawmakers to forge a rule based on expectations that are reasonable in context. The specific expectations of a particular plaintiff are not determinative; after all, hidden security cameras are designed to thwart expectations of surveillance, but they are not, categorically, offensive when the observed is in a so-called public space.¹⁷⁶ The "public" is a social construction, but it is one on which intrusion law has rested.

A number of factors could persuade a fact-finder or rule-maker that web tracking cookie data has been exposed to the websites. Americans might have a sophisticated understanding about the revenue models for free web content and may not want to disturb them by recognizing a right to seclusion that conflicts with Internet usage, or they might affirmatively prefer tailored advertising. But it is plausible if not probable that rule-makers charged with the task of delineating the boundary between private and public spheres would agree that, without explicit consent, observations of detailed web tracking are overzealous and exploitative.

¹⁷⁴ Dissemination and use restrictions are discussed in the next Part. See infra Part IV. Uses of legitimately observed information that seem obnoxious, such as price discrimination or employment screens, can be prohibited through tailored use restrictions

¹⁷⁵ See supra note 135 for intrusion cases based on unauthorized access to records.

¹⁷⁶ Cameras installed in a restroom, or used to take up-skirt photographs, would be another matter. *See, e.g.*, Video Voyeurism Prevention Act, 18 U.S.C. § 1801 (2006); Speer v. Ohio Dept. Rehab. & Corr., 624 N.E.2d 251 (Ohio Ct. App. 1993).

Illustration 1. Carol purchases a book on Amazon. Amazon records the date and time of Carol's transaction, the items Carol purchased, and Carol's method of payment. **Carol's purchase information has been exposed.** Amazon's observation of this data cannot be offensive.

Illustration 2. Ben browses a few books on Amazon but decides not to purchase anything. Amazon records the identities of the products that Ben has browsed. **Ben's browsing information has not been exposed**. Amazon's observation of this data will be offensive.

The approach set forward here aligns the definition of seclusion with the larger goals of privacy. Sometimes this comes at the cost of abstraction. It requires us to draw distinctions between actions that are not very different technologically. The distinction between data transmitted in the course of a purchase with Amazon and data transmitted when the visitor loads a page for nose hair trimmers makes little difference in terms of the HTTP messages exchanged between the user's computer and Amazon's servers, but the conceptual distinction is great.

The New Intrusion's non-technical approach to defining seclusion is more of a strength than a limitation. The Internet has caused doctrinal quagmires in other areas of the law—is content stored in a computer's Random Access Memory (RAM) considered a "copy" for the purposes of copyright infringement? And do the contents of emails, which technically are revealed to Internet service providers, fall within the third party doctrine exception to the Fourth Amendment? In both cases, the most recent, better reasoned approaches have treated RAM copies as something other than a "copy," 177 and the body of an e-mail as private, unexposed "inside the envelope" information, even though these treatments are divorced from the technical realities. The New Intrusion can be similarly pragmatic. Because we are more interested in how the Web seems to work than how it actually works, judges and juries are in a good position to decide what sorts of seclusion we instinctively expect to have while browsing the web or using our gadgets.

Seclusion is only half the story. Nothing prevents a website from collecting unexposed tracking data; indeed, Hypertext Transfer Protocol (HTTP) code must be transmitted to a website in order to load a particular page; although the data privacy literature often refers to "data collection," this collection is more accurately a failure to expunge data. The motive for separating the concepts of observation

¹⁷⁷ Aaron Perzanowski, Fixing RAM Copies, 104 Nw. U. L. Rev. 1067, 1083–84 (2010).

and capture was to allow websites and technology to use captured data to function more efficiently. High functionality often requires automated processing of historical data. But a device-user who has not voluntarily exposed her data should be able to expect that her data will not be *observed*.

b. Observation in the Digital Age

What is an observation? When do we feel we are being studied? Human recognition of a person's data is a sufficient condition, but as the Web MD auto-generated letter example shows, it is not necessary one.

A natural starting point is to designate all data access as observation. While conceptually clean, this definition quickly leads to a dead end. Data is generated in the first place to be accessed for *some* purpose. A Web user's request to a website's server to deliver an HTML page must be accessed in order to deliver it. Likewise, an HTML page might use code that instructs a computer user's web browser to access data on his cookie in order to display the page properly—e.g. to load the user's previously customized display. If this sort of access is determined to be an observation, there is no material distinction between observation and capture. To have any meaning at all, observation must be distinct from the data processing that is intrinsic to the browsing experience or functioning of a device. The next illustration provides an example outside the webtracking context.

Illustration 3. Vicki's GPS device, manufactured and serviced by TomTom, automatically stores and analyzes Vicki's location data, and is programmed to periodically recalculate her estimated time of arrival based on the location logs. **TomTom has not observed Vicki's location data.**

Websites also access personal data in order to aggregate and analyze it for general trends. Analytics are used to build predictive models about a generalized population and to analyze and refine the functionality of a website. When poor information architecture leads a sizeable percentage of a website's visitors to click on the wrong link, the backtracking leaves an impression in the aggregated data.

There are cogent reasons to treat the pooling and processing of data as a non-observation, so long as the data is processed without overt reference to the data subject.¹⁷⁸ First, since the data is used without reference to the data subject, to the extent there is observa-

¹⁷⁸ That is, processed without direct identifying information such as name, address, or full IP address. If the aggregated data is going to be shared for research purposes it will need to undergo additional scrubbing to ensure that reidentification

tion at all it is of a fact unleashed from its generator, like footprints in the snow. If the anonymized data are related back to the original device-user at some later point, the analytic exemption would expire. But so long as data is used without interaction with, or knowledge of, the particular data subjects, the subjects have not been observed.¹⁷⁹

Second, the vast new accumulations of data can be extremely useful for research purposes. We are only just beginning to understand the value of these grand new sources of information. Researchers at MIT, the London School of Economics, and Harvard have used cell phone data to track mental illness, political discourse, obesity, happiness, and stock market fluctuations. And GPS data can be used to improve traffic planning and to monitor congestion in real time, so that drivers can avoid delays. For these purposes—whether they

of a subject is not too easy to do. See Ohm, supra note 99, at 1744–48; Jane Yakowitz, Tragedy of the Data Commons, 25 Harv. J. L. & Tech. 1, 3–4 (2011).

179 Privacy advocates, the advertising industry, and the Federal Trade Commission are locked in debate over whether an IP address, or the information contained in a cookie, is "personally identifiable information." Fed. Trade Comm'n, Protecting Consumer Privacy in an Era of Rapid Change: Recommendations for Businesses and Policymakers 18 (2012), available at http://ftc.gov/os/2012/03/120326privacy report.pdf. The New Intrusion sidesteps this debate because, once a party accesses a cookie in order to communicate or interact with the end user for a purpose collateral or in tension with the original purpose for which it was generated, it is irrelevant that the advertiser does not know the name of the user, or does not know the user in a meaningful way. This is consistent with the goals that underlie the intrusion tort; since intrusion protects a person's seclusion from observation, it makes no difference whether a peeping tom actually knows the person he observes. It is the act of observing that violates the rights of the observed.

180 Robert Lee Hotz, *The Really Smart Phone*, Wall St. J. (Apr. 22, 2011, 7:34 PM), http://online.wsj.com/article/SB10001424052748704547604576263261679848814. html?KEYWORDS=%22The+Really+Smart+Phone%22 ("[Cellphone] data can reveal subtle symptoms of mental illness, foretell movements in the Dow Jones Industrial Average, and chart the spread of political ideas as they move through a community ").

Thus far, GPS studies have relied on vehicles carrying GPS logging devices with the intent that the data would be analyzed by the municipality or city conducting the studies. But the studies are enormously useful for studying travel time and delays, for assessing the effects (in traffic time) of construction or route alterations, and for evaluating whether traffic signals are timed correctly. These types of studies could become inexpensive and widespread standard practices for all jurisdictions if researchers are able to access the log data of commercial GPS providers. *See* GEOSTATS, *TravTime*, http://www.geostats.com/product_trav.htm (last visited Oct. 11, 2012) (discussing the use of GPS to collect, analyze, and report traffic data). However, aggregated data is used for law enforcement purposes, such as to help determine where to establish speed traps. Such use is often perceived as violating the privacy of the GPS device-users. Tim Stevens, *TomTom User Data Sold to Dutch Police*, *Used to Determine Ideal Locations for Speed Traps*, Engadget (Apr. 27, 2011, 1:53 PM),

are as mundane as improving a website or as profound as understanding the determinants of happiness—researchers do not care who is in the database and who is not. Statistical analysis strikes a very safe balance, enriching the accumulation of knowledge and the proverbial marketplace of ideas without posing risk of repercussion or misuse to the individuals described in the data. But the data has to be processed in order to anonymize and prepare the data for research use. The New Intrusion can be aligned with societal interests by exempting processing from the definition of observation, much like the European Union exempts processing for statistical research from the purpose limitations of the Data Protection Directive. 183

Illustration 4. Verizon pools together its subscribers' cell tower data to analyze which geographic areas require the construction of additional towers. Verizon has not observed the subscribers' tower data. Illustration 5. Alexander regularly views television shows on Hulu. Hulu gathers viewer usage data and anonymizes it in preparation for release to researchers. Hulu has not observed Alexander's televiewing habits.

Having carved out the more obvious exceptions, the harder question remains: what *does* count as an algorithmic observation? It is worth reflecting for a moment on the objectives of the right to seclu-

http://www.engadget.com/2011/04/27/tomtom-user-data-sold-to-danish-police-used-to-determine-ideal (discussing how the Dutch police force is using TomTom navigation devices to determine where speed traps and cameras should be placed). It is possible that the issue underlying the privacy concerns is that law enforcement might have the wrong motivation in establishing speed traps. Data-assisted speed traps might do more to increase revenues and citation rates than they do to improve traffic safety. In that case, a person might feel tricked for his or her unwitting contribution to the dataset that enabled the police to create the speed trap. There are categories of government data uses that can be carefully cabined or prohibited altogether through use restrictions, but the capture of anonymized GPS data is not inherently harmful

182 If an entity with access to personal data exhaust wishes to analyze it in aggregated form (and without any future reference back to the data subjects), it is sufficient to strip direct identifiers such as names, IP addresses, contact information, and credit card numbers. If the entity wishes to share the data for research purposes to third parties, the data will need to go through additional anonymization procedures, or must be disseminated only through restricted licensing agreements. *See* Yakowitz, *supra* note 178, at 6–8.

183 "Further processing of data for historical, statistical or scientific purposes shall not be considered as incompatible provided that Member States provide appropriate safeguards." Council Directive 95/46, art. 6(1) (b), 1995 O.J. (L 281) 40 (EU). Note, though, that the required "safeguards" demand that the data pose no risk of reidentification—a standard that is impossible to meet—and forces data holders to choose between risking sanction or halting standard practices. *Id.* art. 13(2).

sion. Seclusion gives people the breathing space to be and to act without having to worry about social or economic consequences. Data accessed for some purpose that is different and inconsistent with the product or service for which the data was generated will generate many of the same justified anxieties over the dissemination and potential implications as an intrusive observation. The user can no longer feel alone with his device.

For unexposed data—data for which a user maintains a right to seclusion—the goals and designs of the Fair Information Practices are quite apt. When the personal data is used or disclosed for some purpose inconsistent with its original collection without advance notice and consent, an observation has occurred. This definition of automated observation is nearly identical to the "respect for context" incorporated into President Obama's proposed Consumer Privacy Bill of Rights.¹⁸⁴

Context, or "purpose," is not self-defining. At the very least it would include uses collateral to the service the user had accessed that have the potential to significantly disadvantage the user. The next illustrations provide examples of such uses.

Illustration 6. Anthony visits Amazon.com in order to purchase a book after reading a review on a blog. Research shows that customers who linked into Amazon from another website reviewing a product are less likely to perform price comparisons before making a purchase. Amazon uses a pricing algorithm that automatically offers Anthony a price \$1.00 higher than the standard price based on his link-in data. **Amazon has observed Anthony's link-in data**.

Illustration 7. (Based on the same facts as Illustration 6.) Amazon uses link-in and web-tracking data to construct a creditworthiness index. Amazon has observed Anthony's link-in and web-tracking data.

Illustration 8. (Based on the same facts as Illustration 6.) Amazon discloses the link-in and web-tracking data to a third party data aggregator that uses the data to construct, among other things, interest profiles and employability indices. **Amazon has observed Anthony's link-in and web-tracking data**.

^{184 &}quot;Respect for Context" is defined as so: "[c] onsumers have a right to expect that organizations will collect, use, and disclose personal data in ways that are consistent with the context in which consumers provide the data." Press Release, The White House, Office of the Press Sec'y, We Can't Wait: Obama Administration Unveils Blueprint for a "Privacy Bill of Rights" to Protect Consumers Online (Feb. 23, 2012), http://www.whitehouse.gov/the-press-office/2012/02/23/we-can-t-wait-obama-administration-unveils-blueprint-privacy-bill-rights.

The New Intrusion framework intersects with Fourth Amendment law in at least one important way. The expansive third party doctrine, which allows law enforcement officers to access business records without obtaining a warrant, is premised on the assumption that business records contain information that the suspect "voluntarily turns over to third parties." Personal data that has not been exposed, and which cannot be observed by a company without triggering intrusion liability, has no logical place in the third party doctrine exception to the search warrant requirement. 186

Less obvious, however, is the New Intrusion's implication on behavioral advertising. Given the current, dominant business model for the most popular web services and online content providers, advertising is arguably intrinsic to the purposes for which web tracking data is created. If the *raison d'être* for Facebook, Hulu, Google, and other popular websites is to attract visitors by creative (and expensive) content in exchange for the display of advertising, advertising is a key, obvious component of the web service. Along this line of reasoning, the use of data to facilitate advertising would not be inconsistent with the purpose for which the data was created in the first place. This may be especially defensible in cases like Gmail targeted advertising, where the scanning of the body of one's email, and the prominent display of all the free storage and service provision the user gets in exchange for the advertising program, provides clear visceral notice of Google's practice of scanning contents to deliver ads.¹⁸⁷

On the other hand, tracking practices extend well outside a user's experience with each particular website because of the frequent use of third party cookies. A user's visit to website A on day one is arguably wholly unrelated to the advertisement he is served on website B on day 30. There is no definitive classification for behavioral marketing as an observation. Much will depend on whether one views advertising as the Internet's backbone or as its parasite.¹⁸⁸

¹⁸⁵ Smith v. Maryland, 442 U.S. 735, 744 (1979).

¹⁸⁶ The more lenient warrant requirements adopted in the Stored Communications Act (SCA) that apply to routing data do not require probable cause. 18 U.S.C. \S 2703(d) (2006). If web-tracking data is "unexposed" and deserving of full Fourth Amendment protection, the procedural protections of the SCA will not be constitutionally sufficient.

¹⁸⁷ For a description of visceral notice, see M. Ryan Calo, Against Notice Skepticism, in Privacy (and Elsewhere), 87 NOTRE DAME L. REV. 1027, 1034–35 (2012).

¹⁸⁸ I do not wish to speculate about social norms with respect to behavioral advertising since the empirical evidence is so mixed. Survey after survey confirms that, considered in isolation, Americans want to surf the Internet without creating a record of their transactions and activities. One study reports that ninety-two percent of Americans believe there should be a law requiring "websites and advertising compa-

2. Consent

Intrusion rules can always be modified through private agreements. Today private industry places considerable faith in their privacy policies and End User Licensing Agreements ("EULAs") to define the scope of their duties. Boilerplate formalities of this sort might suffice to limit the scope of contract liability, but they are not sufficient to constitute consent to conduct that would otherwise be tortious. Consent is not assent. Consent requires acts that manifest an objective expectation that the would-be tort victim is willing for the tortious conduct to occur. Qualitative research conducted by Chris Hoofnagle and Jennifer King indicates that web users rarely have

nies to delete all stored information about an individual, if requested to do so." Joseph Turow et al., Americans Reject Tailored Advertising and Three Activities That Enable It, 3 (2009), http://ssrn.com/abstract=1478214; see also Aleecia M. McDonald & Lorie F. Cranor, Americans' Attitudes About Internet Behavioral Advertising Practices, WPES '10: PROCEEDINGS OF THE 9TH ANNUAL ACM WORKSHOP ON PRIVACY IN THE ELECTRONIC Society 63 (2010), available at http://dl.acm.org/citation.cfm?id=1866929. However, these studies repeat a flaw that undermines the credibility of the findings: they do not ask respondents whether they would prefer an alternative reality where the same online content contains about twice the amount of (non-targeted) advertising, or where they pay for content. The handful of studies that do force survey respondents to state their preferences in the context of privacy tradeoffs find that a majority of Internet-users prefer free content with targeted ads over other types of privacy-protecting options like pay walls or increased quantity of advertising, though some of these studies too have methodological flaws. Karl W. Lendenmann, PreferenceCen-TRAL, CONSUMER PERSPECTIVES ON ONLINE ADVERTISING—2010, at 2-3, 11 (2010), available at http://www.slideshare.net/mfredactie/preference-central-surveyfull report. Note that the phrasing of the question, and the ordering of the answer options, are objectionable. The survey does not offer respondents the option to view the same content with *more* advertising; the closest is an option for "somewhat limited online information or less functional services." Id.; see also Jacqui Cheng, 53% of Mobile Users Happy to Hand Over Location Data For Discounts, Ars Technica (Aug. 17, 2011, 1:25 PM), http://arstechnica.com/gadgets/2011/08/53-of-mobile-users-happyto-hand-over-location-data-for-coupons ("[M]ore than half of all consumers are willing to exchange their mobile location data for content that is relevant to them at the moment "); David Hallerman, Behavioral Targeting Attitudes, EMARKETER (July 29, 2008), http://www.emarketer.com/Article.aspx?1006456&R=1006456 (finding that fifty-five percent of respondents are "very" or "somewhat" comfortable with behavioral

189 See Litman, supra note 10, at 1311; John H. Mansfield, Informed Choice in the Law of Torts, 22 La. L. Rev. 17, 31 (1961) ("Consent is the right term to use when the plaintiff was willing that a certain event occur, probably some conduct on the part of the defendant, because he desired an invasion of a normally protected interest."). However, in light of the recent Supreme Court holding in Concepcion, websites might enjoy de facto immunity from intrusion claims by requiring all visitors to arbitrate their claims individually. AT&T Mobility LLC v. Concepcion, 131 S. Ct. 1740, 1753 (2011).

actual notice of a website's policies; in fact, the mere existence of a privacy policy prompts web users to assume, inaccurately, that the website promises not to re-use or share its transaction data. Notices and agreements that expand the scope of observation beyond what courts would otherwise consider to be appropriate leave open a number of important questions. Are there circumstances in which the courts should demand heightened forms of notice for intrusive observations? Are there circumstances in which, for public policy reasons, courts should not recognize consent at all? This Article reserves for future research consideration of what form of notice is sufficient to convert an intentional tort into a consented activity.

However, standard privacy policies and user agreements may interact with New Intrusion liability. When an entity makes promises that data will not be tracked or maintained, these promises can define the contours of a user's objectively reasonable expectations of seclusion. Thus, if a website observes data that it claims is not even being captured, the observation will violate an expectation of seclusion created by the website itself.¹⁹⁴

In the past, lawsuits alleging that a website violates its own privacy policies have proceeded under contract theory. Because the resulting contract damages are speculative, the lawsuits have been unsuccessful. A claim for intentional intrusion upon seclusion could better deter privacy policy gaming because plaintiffs would have access to tort damages based on emotional distress and punitive damages, or

¹⁹⁰ Chris Jay Hoofnagle & Jennifer King, What Californians Understand About Privacy Online (Sept. 3, 2008) (unpublished article), *available at* http://papers.ssrn.com/sol3/papers.cfm?abstract_id=1262130.

¹⁹¹ Groundwork for these questions has already been laid by Andrea Matwyshyn. Andrea Matwyshyn, *Technoconsen(t)sus*, 85 Wash. U. L. Rev. 529, 551–54 (2008).

¹⁹² For example, should job applicants be able to consent to observed urinalysis drug testing when applying for jobs for which drug use is not particularly predictive of incompetent or unsafe performance?

¹⁹³ Christine Jolls has begun this very inquiry. Christine Jolls, Rationality and Consent in Privacy Law, (Dec. 10, 2010) (unpublished article), *available at* http://www.law.yale.edu/faculty/CJolls.htm.

¹⁹⁴ For example, the privacy policy for AudienceScience claims that the site will replace any cookie of a user who opts out of information-collection with a new cookie instructing the website to stop collecting information. What *actually* happens, according to Stanford researchers, is that AudienceScience keeps a highly unique cookie in place that tracks the user's interests, and continues to add information to this interest cookie. Jonathan Mayer, *Tracking the Trackers: Early Results*, STANFORD CENTER FOR INTERNET & SOCIETY (July 12, 2011, 12:12 AM), http://cyberlaw.stanford.edu/node/6694.

¹⁹⁵ *In re* JetBlue Airways Corp. Privacy Litig., 379 F. Supp. 2d 299, 330 (E.D.N.Y. 2005); Dyer v. Northwest Airlines Corp., 334 F. Supp. 2d 1196, 1200 (D.N.D. 2004).

even nominal damages multiplied by large numbers of class members. 196

3. The Gap Between Tort Theory and Application

A primary goal of tort law—and especially the law of intentional torts—is to deter socially repugnant behavior. Since privacy claims are based on psychic harms and emotional distress, compensatory damages and even exemplary damages rely on evidence that distress has, indeed, occurred. 197 In theory, courts should allow juries to compensate plaintiffs generously based on any credible evidence of distress in order to supply the basis for punitive damages, and in order to effect deterrence. Far from being an amorphous approach to the law, compensation for emotional distress in instances of intentional, offensive behavior is soundly within the canonical law and economics vision of tort law. The harms, though they are noneconomic and difficult to count, easily outweigh the negligible benefits of the intentional, offensive conduct. But many scholars have noted judges' skepticism when overseeing cases based on psychic injuries. 198 This Article does not attempt to explore or resolve the gap between tort theory and its application in the courtroom, but the hesitancy of the plaintiffs' bar to bring novel privacy cases, and the jurists to allow them to proceed to the jury, must be acknowledged. 199

However, there are reasons to be guardedly optimistic that courts might embrace the New Intrusion as a conservative response to a mounting problem. Intrusion liability rules will create much-needed clarity of law and policy, allowing businesses to use cookies without risk so long as they stay within the bounds of per se objectively reasonable observation. Companies would not have to provide opt-out procedures or a "do not track" cookie, though they might choose to do so

¹⁹⁶ In the context of trespass, which has a number of theoretical similarities to intrusion, courts have allowed plaintiffs to recover punitive damages even though the plaintiff suffered only nominal damage from the trespassing act. *See* Feld v. Feld, 783 F. Supp. 2d 76, 78 (D.D.C. 2011).

¹⁹⁷ Alternatively, even nominal damage spread over a large enough class—such as the class of Californians with DoubleClick cookies on their computers—would expose web trackers to significant liability.

¹⁹⁸ Citron, *supra* note 10, at 1809; Danielle Keats Citron, *Law's Expressive Value in Combating Cyber Gender Harassment*, 108 MICH. L. REV. 373, 393 (2009).

¹⁹⁹ Another potential impediment is the recent U.S. Supreme Court case AT&T Mobility v. Concepcion, 131 S. Ct. 1740 (2011), which held that class action waivers in standard-form contracts are enforceable. *Id.* at 1753. The parameters of that holding are still quite unclear. *See* Myrium Gilles & Gary Friedman, *After Class: Aggregate Litigation in the Wake of* AT&T Mobility v. Concepcion, 79 U. Chi. L. Rev. 623, 639–40 (2012).

to respond to market pressures.²⁰⁰ Intrusion law would put an end to many problematic practices without forcing online businesses to significantly alter their websites, and without undermining the revenue model that currently supports much of the free online content. The intrusion approach is also readily enforceable because, by definition, the tort applies only to offensive behavior. Thus intrusion avoids the problems facing European privacy enforcement agencies, which are forced to choose between ignoring blatant violations of the EU cookies laws by nearly every website (including those of most EU governments) or cracking down arbitrarily.²⁰¹ Finally, if the common law can deter offensive observation of personal data, lawmakers will not have to consider restricting downstream dissemination and use of data which, for reasons articulated in the next Part, will be more difficult.

IV. PRIVACY AFTER OBSERVATION: DISSEMINATION AND USE

Once information is collected through legitimate means, policy-makers face an uphill climb to justify the regulation of its dissemination. Laws restricting the disclosure or reuse of truthful, legitimately observed information proceed on the counterintuitive theory that having more facts is bad for society. However, there are times when the spread of information does cause great, avoidable harm, and laws deterring the spread of truthful facts can be the best course in these instances. Again, tort law has already laid much of the foundation for sensible restrictions on dissemination.

This Part begins by considering the nature of harms that flow from the dissemination of information that was lawfully observed and collected. The subsections that follow describe workable dissemination restrictions on two categories of information: information revealed in the context of a special relationship, and information that is "predictably explosive." These categories roughly map onto the common law torts of breach of confidentiality and public disclosure of private facts. These categories are not meant to be exhaustive; there

²⁰⁰ A new firm called Evidon is offering the behavioral marketing industry's first "assurance platform." It organizes industry best practices that would, if followed, receive Evidon's trusted seal of approval. *Turn Names Evidon Preferred Provider of Compliance Services*, PRWEB (May 4, 2011), http://www.prweb.com/releases/prweb2011/5/prweb8377655.htm.

²⁰¹ Mike Butcher, Stupid EU Cookie Law Will Hand the Advantage to the US, Kill Our Startups Stone Dead, TechCrunch Europe (Mar. 9, 2011), http://eu.techcrunch.com/2011/03/09/stupid-eu-cookie-law-will-hand-the-advantage-to-the-us-kill-our-startups-stone-dead/. The European cookie law would require any website that uses Google Analytics to keep track of the number of visitors to a website, who would also have to comply with the opt-in consent requirements. See also discussion supra note 19.

may very well be other types of dissemination restrictions that tend to promote social welfare. But by analyzing confidentiality and public disclosure laws, it will become apparent that restricting the dissemination of truthful information is sound public policy only in a limited number of contexts. This Part ends with a case study on dissemination and use regulations from the credit reporting context.

A. Conceptions of Harm

Some of the losses routinely identified as "harm" do not look like redressable injuries after sober reflection. This is particularly true for reputation-related injuries. Since harm, and risk of harm, are necessary prerequisites for tort liability, these infirmities are important and merit explication.

1. Reputation Damage

Reputational harm and shame are among the most commonly cited privacy harms.²⁰² The information age has undeniably increased the availability of reputation-damaging content. In his book *Delete*, Viktor Mayer-Schöenberger argues that the vast collections of digital information keep us from forgetting the embarrassing things we've done.²⁰³ Websites that catalog mug shots²⁰⁴ or highlight moments of embarrassment²⁰⁵ deny us the comfort we once had that our mistakes and failings would evaporate from collective memory. This new state of affairs has motivated the European Union to define a right to be forgotten, requiring websites to destroy any personal information at the request of the subject.²⁰⁶

²⁰² See Jeffrey Rosen, The Unwanted Gaze 120 (2000) (discussing shame as a basis for harm); Daniel Solove, The Future of Reputation 114–17 (2007) (discussing damage to reputation); Lipton, *supra* note 22, at 503 (discussing gossip and embarrassment); Murphy, *supra* note 46, at 2385 (discussing reputation protection with privacy claims).

²⁰³ Viktor Mayer-Schönberger, Delete 2 (2009).

²⁰⁴ David Kravets, Mug-Shot Industry Will Dig Up Your Past, Charge You to Bury It Again, Wired (Aug. 2, 2011, 1:52 PM), http://www.wired.com/threatlevel/2011/08/mugshots/.

²⁰⁵ Sex List Rating Female University Student's Lovers Becomes Internet Sensation, MAILONLINE (Oct. 8, 2010, 11:49 PM), http://www.dailymail.co.uk/news/article-131 8575/Duke-University-alumni-Karen-Owens-sex-list-internet-sensation.html ("[A] student has been left devastated after an elaborate sex list she created . . . became an internet sensation.").

²⁰⁶ Matt Warman, Online Right "To Be Forgotten" Confirmed by EU, The Telegraph (Mar. 17, 2011, 12:53 PM), http://www.telegraph.co.uk/technology/internet/83880 33/Online-right-to-be-forgotten-confirmed-by-EU.html ("Under the new [EU] legisla-

Privacy scholars are puzzled that shame and reputational harms are only reluctantly, if ever, vindicated by U.S. courts.²⁰⁷ Jacqueline Lipton speculates that lawmakers may fear chilling truthful speech, and that individuals who have suffered shame and humiliation are unlikely to demand legal redress, since the process would put their facts in the spotlight once again.²⁰⁸ Danielle Citron argues that courts should be more likely than ever to recognize reputational injuries since the Internet creates a permanent, searchable record of embarrassing personal facts.²⁰⁹ But shame, while undoubtedly unpleasant to the person feeling it, is not always socially undesirable.²¹⁰

2. Harm Versus Consequence

Reputational damage is usually either a collateral consequence of past behavior (as when a bad credit history prevents a person from obtaining a loan²¹¹) or the accidental loss produced by an otherwise functioning system (as when a person's story is used as a cautionary tale).²¹² Take, for example, the woman who is known worldwide as Dog Poop Girl after she rebuffed the pleas of her fellow subway-riders to pick up after her dog, which had just made a deposit in the subway car.²¹³ If her fellow passengers had called her selfish and entitled, the insults, while stinging, could not possibly require redress. The insults

tion, users could sue websites for invading their privacy and would have a right to be entirely "forgotten" online.").

- 207 Lipton, supra note 22, at 504; Citron, supra note 10, at 1809.
- 208 Lipton, supra note 22, at 504.
- 209 Citron, *supra* note 10, at 1808, 1810. Citron's argument makes real sense if the Internet allows a large number of micro-invasions to add up to real, actionable psychic costs. The question, though, is whether each revelation of embarrassing information is a small harm, too trivial to be redressable on its own but adding up to a real psychic harm due to repetition over the Internet (a summation of epsilons), or whether instead each revelation is not a legal harm at all (a summation of zeroes).
- 210 But see Laura A. Heymann, The Law of Reputation and the Interest of the Audience, 52 B.C. L. Rev. 1341 (2011) (arguing that legal frameworks for reputational interests must account for the public's interest in access to the information).
- 211 Bad credit histories are a surprising mainstay among privacy scholars' examples of privacy harm. *See* Citron, *supra* note 10, at 1814 (coding a client's decision not to work with somebody in debt as a "privacy invasion"); Lori Andrews, *Facebook Is Using You*, N.Y. Times, Feb. 5, 2012, at SR7, *available at* http://www.nytimes.com/2012/02/05/opinion/sunday/facebook-is-using-you.html?_r=1&pagewanted=all.
- 212 See Eric Goldman, The Regulation of Reputational Information, in The Next Digital Decade: Essays on the Future of the Internet 293, 295–96 (B. Szoka & A. Marcus eds., 2010) (discussing in detail the value that reputational information adds to consumer trust and well-functioning markets).
- 213 Jonathan Krim, Subway Fracas Escalates Into Test of the Internet's Power to Shame, WASH. POST (July 7, 2005), http://www.washingtonpost.com/wp-dyn/content/arti-

would not be "harm" at all, at least not in the sense that we use that term colloquially.²¹⁴ They burden her, but they are the natural social consequence of her actions.

What happened instead was slightly different. Dog Poop Girl became the target of a shaming campaign. Koreans pored over the pictures of the incident posted on the Internet via cell phone camera. Soon her identity, place of employment, and family members' names were attached to the story. She left her job in humiliation, and for the rest of her life, searching Google for her real name will reveal her epithet.

Dog Poop Girl's story is a sad one. Despite her transgression, she did not deserve to bear the full brunt of the world's contempt for litterers. This, however, does not make her loss a compensable one. Stories like hers feed the engine of cultural norm-making, and as unfortunate as the damage might be for her, the deterrent effect on incivility and inconsiderate behavior will outweigh that damage. Dog Poop Girl was the unlucky victim in a properly functioning system. Though her penalty was out of proportion to her fault, she could have avoided it by picking up after her dog. She was the cheapest cost avoider, and so her aberrational penalty is equivalent to the tort defendant who is liable for the full costs of an eggshell plaintiff's injury. She was the cheapen of the full costs of an eggshell plaintiff's injury.

This system, callous as it is, is superior to the alternatives. A generic right to be forgotten allows an information subject to insist that existing, truthful information about her must be destroyed. Such a right imposes serious costs on the public.²¹⁷ It plucks out of the public domain information that people have determined to be pertinent to the evaluation of a person, supplanting instead that person's

cle/2005/07/06/AR2005070601953.html; see also Daniel Solove, The Future of Reputation 1–2 (2007).

²¹⁴ For strict utilitarians, the disapprobation would be harm. It would count against Dog Poop Girl's utility in the overall calculation of social welfare. But her decrease in utility is easily overcome by the deterrent effect that shaming and social norms have on litterers and dog-owners, by the avoidance of the sizable cost that would be imposed on the subway passengers if they were constrained from expressing their opinions, and by the justice and satisfaction the subway passengers would get from retribution. Kaplow & Shavell, *supra* note 82, at 12, 18–19.

²¹⁵ Privacy scholars have argued that Dog Poop Girl deserves legal recourse. See Lipton, supra note 22, at 511.

 $^{216\,}$ Vosburg v. Putney, $50\,$ N.W. $403\,$ (Wis. 1891). Or, perhaps she is more similar to the accident victim whose loss of life or limb was caused by non-negligence. Either way, we traditionally let the chips fall where they may.

²¹⁷ See Heymann, supra note 210 (arguing that access to reputations helps reduce search costs).

own (self-interested) judgment about what facts should inform public perception.²¹⁸ Descriptions and empirical claims would have to give way to opinion and conjecture. Credible proof and certainty of knowledge would be replaced with rumor, speculation, and deniability. Social class would be less dynamic; any information that would tend to blemish a person's reputation and relative social standing will be erased, thereby hardening the status quo.²¹⁹ (Upward social mobility is, after all, dependent on social downward mobility.) Also, the risk of moral hazard is not negligible. A decision to exercise the right to be forgotten can be driven by perverse incentives, as when an abusive spouse seeks to have his domestic violence record shielded from public disclosure.²²⁰

This is not to say that concrete privacy harm cannot arise from the dissemination of information. In circumstances where the ex ante expected losses to an information subject are greater than the expected societal gains, disclosure of personal information can and should lead to redress. Reasonable minds are bound to differ when deciding whether the likely psychic harms outweigh the social gains. The values on both sides of the scale are inordinately difficult to measure. But privacy legal scholars tend to demand avenues of redress in every instance where a person has suffered a psychic loss. Conceived of this way, a right to privacy would be stronger even than a right to bodily integrity.

The overarching concern motivating reputational harm arguments is that, with rapidly changing technologies and capabilities to store and process personal data, negative consequences to individuals' wellbeing are overlooked by courts and lawmakers. Implicit in this concern, though, is a strong assumption that losses in the era of big data automatically count as privacy *harm*. Many are simply collateral consequences.

Nevertheless, just as intrusion constitutes an injury with coherent theoretical underpinnings, certain types of disclosures also can cause predictable direct and indirect injury. In the next two sections, we

²¹⁸ Robert Post raises a similar objection to Jeffrey Rosen's claim that Bill Clinton's sexual exploits ought to have been kept private. Robert C. Post, Review Essay, *Three Concepts of Privacy*, 89 Geo. L.J. 2087, 2089–90 (2001) (reviewing Jeffrey Rosen, The Unwanted Gaze (2000)).

²¹⁹ Whitman, *supra* note 57, at 1169–70 (heralding, however, the expressive value of dignity-based privacy protections).

²²⁰ See Sheetz v. The Morning Call, Inc., 946 F.2d 202 (3d Cir. 1991). Another example, discussed in Part II, *supra*, is a police officer's use of a state wiretap statute to prevent a citizen from recording an interaction the citizen believes to be corrupt or unethical. Am. Civil Liberties Union of Ill. v. Alvarez, 679 F.3d 583 (7th Cir. 2012).

explore restrictions on dissemination that successfully target appreciable harm.

B. Confidences

When personal information is revealed to a professional in a special, fiduciary relationship with the subject, as when a client tells a lawyer an unflattering fact about himself, disclosure restrictions function like an extension of the zone of seclusion. When the lawyer learns the secrets of his client, the client has not abandoned his seclusion. Instead, he has let the lawyer into it. The private facts, at least as disclosed to the lawyer, are still in the client's control, as if he had never exposed them in the first place. The client's conversation with his lawyer is different from other private conversations because the client has reserved, through express agreement or by implication, a right to confidentiality.

Arguably, dissemination restrictions could be left to private law, since express agreements of confidentiality can be worked out between private parties. However, individuals and society at large benefit so routinely from candor in certain types of relationships that law has stepped in to create default duty of confidentiality rules.²²¹ Placing stringent restrictions on doctors to keep their patients' confidences will on balance serve the public interest by encouraging candor and minimizing gawking. But the duty is qualified: in circumstances when disclosure *would* be better, as when others are in foreseeable danger, the common law either permits disclosure or requires it.²²²

Relationships were historically regulated through tort duties and professional codes of ethics,²²³ but now a host of federal and state

²²¹ McCormick v. England, 494 S.E.2d 431, 435 (S.C. Ct. App. 1997) ("Being a fiduciary relationship, mutual trust and confidence are essential."). Courts look for a degree of kinship between the parties, or disparities in age, health, or mental conditions, or disparities in training and experience in order to determine whether two people are in a fiduciary relationship. *See* Pottinger v. Pottinger, 605 N.E.2d 1130, 1137 (Ill. App. Ct. 1992).

²²² Tarasoff v. Regents of Univ. of Cal., 551 P.2d 334, 347 (Cal. 1976) (invoking duty to warn likely victim of psychotherapy patient); Pate v. Threlkel, 661 So. 2d 278, 282 (Fla. 1995) (invoking duty to warn patients' children about genetic conditions). 223 The tort of confidentiality does not enjoy the recognition that Prosser's privacy torts do, and it does not appear in the Second Restatement. But many jurisdictions recognize and enforce the duty of confidentiality in contexts ranging from doctors to bankers to accountants. Neil M. Richards & Daniel J. Solove, *Privacy's Other Path: Recovering the Law of Confidentiality*, 96 Geo. L.J. 123 (2007). I am in agreement with Richards and Solove, and with Susan Gilles and Danielle Citron as well, that a clearer and more robust tort of breach of confidentiality could allow the common law to

statutes impose some confidentiality rules. They usually regulate relationships where the information-receiver has an express or implied fiduciary responsibility to the information-provider. The major sector-specific federal privacy regimes are examples of confidentiality-style statutes, covering medical providers,²²⁴ creditors,²²⁵ educators,²²⁶ communications service providers,²²⁷ banks,²²⁸ and entertainment geared toward children.²²⁹

The harm caused by the dissemination of information held in confidence is three-fold: first, the dissemination constitutes an invasion of seclusion. If a doctor provided his patient's medical file to a curious snoop, the revelation would cause at least as much distress as if the snoop had stolen a glance without the doctor's permission (a traditional intrusion upon seclusion).²³⁰ Second, the professional's breach of trust may be an independent source of distress. And third, because confidentiality duties are imposed in contexts to promote the candid transfer of inherently sensitive information, dissemination of confidential information is likely to be used against the subject in some way.

Scholars focus on the third form of privacy harm as a means of understanding the goals of laws like HIPAA. On that basis, they advocate for recognition of dissemination harms for more, or even all, cat-

react to harmful disseminations of personal information. *Id.*; Citron, *supra* note 46, at 1848–50; Susan Gilles, *Promises Betrayed: Breach of Confidence As a Remedy for Invasions of Privacy*, 43 Buff. L. Rev. 1, 4 (1995). The tort of public disclosure of private facts occasionally provides recourse for confidentiality-style harms. The disclosure tort has imposed responsibility on the police force to hold information about accident and crime victims in confidence, as well as the information from cooperative witnesses. *See* Catsouras v. Dep't of Cal. Highway Patrol, 104 Cal. Rptr. 3d 352 (Ct. App. 2010) (providing recovery to a decedent's family when a paramedic took pictures at the scene of a deadly accident and sent the pictures to friends and acquaintances on Halloween). On the other hand, police are not expected to keep the confidences of suspects. Wilson v. Freitas, 214 P.3d 1110 (Haw. Ct. App. 2009).

- 224 Health Insurance Portability and Accountability Act of 1996, Pub. L. No. 104-191, \S 1173, 110 Stat. 1936, 2024–26 (codified as amended in scattered sections of 18, 26, 29, and 42 U.S.C.).
- 225 Fair Credit Reporting Act, 15 U.S.C. § 1601 (2006).
- 226 Family Educational Rights and Privacy Act, 20 U.S.C. § 1232g (2006).
- 227 Telecommunications Act of 1996, 47 U.S.C. \S 222 (2006); Stored Communications Act, 18 U.S.C. \S 2702 (2006) (stating that business records may be disclosed to non-government third parties, but the contents of electronic communications may not).
- 228 Gramm-Leach-Bliley Act, 15 U.S.C. § 6801.
- 229 Children's Online Privacy Protection Act of 1998, id. § 6502.
- 230 See records-based intrusion cases, supra note 135.

egories of information.²³¹ But this second form contains an inherent tension between society's interest in having probative information and a person's desire to keep information secret precisely because it is probative. The first form of harm, by contrast, allows confidentiality-style regulations to fit comfortably with our commitments to the free flow of information because, like intrusion, injury from a breach of confidentiality is independent from the utility of the divulged information. If a doctor talked about a particular patient's routine appendectomy at a party, he would violate his patient's privacy even if the facts were not particularly embarrassing.

American privacy law is criticized for being fragmented,²³² but the existing statutory schemes typically apply to sectors in which an imbalance in training or experience justifies the imposition of fiduciary responsibilities. For sectors that do not have a quasi-fiduciary responsibility with the consumer, assigning a duty of confidentiality unduly encumbers relationships that are not ones of unusual trust.²³³ In addition to lost information, the public would bear the costs of administering a strong privacy system. These costs are considerable. A small hospital with only 400 beds can spend upwards of \$500,000 on HIPAA compliance each year, and for large hospitals the direct administrative costs are in the millions of dollars.²³⁴ Arguably, it is appropriate to impose these costs on doctors and spread them across

²³¹ Richards, *supra* note 13, at 1194–1201. Neil Richards and Daniel Solove suggest that, if the tort of confidentiality were adopted in the United States to the same extent it is embraced in the United Kingdom, nearly every relationship could be considered the basis for a duty of confidentiality—ordinary citizens could be expected to refrain from divulging information about their friends, and airlines could be expected to maintain the confidences of their customers. Richards & Solove, *supra* note 223, at 176–78. *But see* Litman, *supra* note 10, at 1308–09 (proposing the expansion of the breach of confidence tort on the basis of the first source of harm—distrust). Litman predicted that without robust confidentiality-style protection for all consumer transactions, we would "think twice before making embarrassing purchases or watching certain pay-per-view movies." *Id.* at 1308. Consumer behavior in the twelve years that have elapsed since her writing this has proven otherwise.

²³² See Lipton, supra note 22, at 510; Lior Jacob Strahilevitz, Reunifying Privacy Law, 98 Cal. L. Rev. 2007, 2007 (2010).

²³³ I disagree with scholars who explain the current collection of statutes as imposing privacy restrictions when some forms of information are "regarded as more sensitive than others." Lipton, *supra* note 22, at 510. Bartenders, personal trainers, and friends end up with a lot of special information about the most sensitive aspects of their customers' and colleagues' lives. It is the nature of the relationship, and not the nature of the information, that justifies a different treatment for the information held by doctors and financial advisors.

²³⁴ Peter Kilbridge, *The Cost of HIPAA Compliance*, 348 N. Eng. J. Med. 1423, 1424 (2003).

the base of health care consumers because the confidentiality duty promotes truthful medical consultations and leads to optimal care, but the same reasoning does not hold for our merchants.²³⁵

Some existing privacy laws unwisely create confidentiality duties for relationships with only marginal amounts of trust. California's carpooling privacy statute, for example, imposes criminal liability for divulging carpool or ridesharing information.²³⁶ The Video Privacy Protection Act (VPPA) imposes criminal and civil liability upon video rental stores and their employees who disclose customer rental information.²³⁷ These statutes are often the products of legislation by anecdote, as when the release of Judge Robert Bork's video rental records during his Supreme Court confirmation hearings prompted the passage of the VPPA.238 The VPPA now demonstrates how overreaching confidentiality-style statutes can frustrate a regulated industry's attempts to expand services or use data in innocuous ways. Netflix has expended considerable energy, and billable hours, to find a lawful way for its members to report that they "like" a movie on Facebook. The VPPA's written consent requirements for re-disclosure of video rental information are so onerous that Netflix has resorted to lobbying for a change in the law.239 Duties of confidentiality should be imposed only in the instances where the benefits are known to outweigh the considerable costs.

C. Disclosure of Highly Volatile Information

The tort of public disclosure of private facts has an uncertain future. Liability for public disclosure is triggered when somebody gives "publicity" to a private fact, if the matter is highly offensive, and if the fact is not of legitimate concern to the public.²⁴⁰ Scholars have struggled to make sense of the public disclosure tort's interaction with the First Amendment for decades. The tort is constructed with a number of safety valves to ease the inherent tension between the right to

²³⁵ Confidentiality duties might be expanded to cover relationships of trust in the online space. An online support group, or a website offering customized medical or legal advice, arguably should have the same responsibilities that apply in real space.

²³⁶ Cal. Penal Code § 637.6 (West 2010).

²³⁷ Video Privacy Protection Act of 1988, 18 U.S.C. § 2710 (2006).

²³⁸ Michael Dolan, *The Bork Tapes Saga*, THE AM. PORCH, http://www.theamerican.porch.com/bork2.htm (last visited Oct. 24, 2012).

²³⁹ Adam Clark Estes, Why Robert Bork (Indirectly) Kept Netflix Off Facebook, ATLANTIC WIRE (July 26, 2011), http://www.theatlanticwire.com/technology/2011/07/why-robert-bork-indirectly-kept-netflix-facebook/40408 (discussing how the VPAA discouraged Netflix from launching Facebook integration in the U.S.).

²⁴⁰ Restatement (Second) of Torts § 652D (1977).

speech and the right to not have one's story told. It avoids roping in gossip and ordinary conversation by requiring the plaintiff to show that the defendant disclosed the private fact to a broad audience.²⁴¹ And it also immunizes disclosures of newsworthy information, an exemption much bemoaned by privacy scholars as the exception that swallows the rule.²⁴² These exceptions may be helpful for avoiding constitutional challenges, but they only make it more difficult to understand what the tort is attempting to accomplish. If a person is not at liberty to communicate a piece of information he has, why do we not constrain this person through confidentiality laws? And if this person is too distant from the tort victim to formalize their relationship through confidentiality laws, then what is it that makes the fact "private"?

Notwithstanding these puzzles, the public disclosure tort serves important and unique functions. Consider this hypothetical, based loosely on the facts of *Doe v. Borough of Barrington*.²⁴³ A heated argument at a bar in 1987 led to a physical confrontation between Arthur and Billy. Arthur said, "Careful! I'm HIV positive." At this time, the AIDS epidemic was not well understood by the general public. Later that night, Billy told Arthur's neighbors about Arthur's serostatus. One of Arthur's neighbors had young children who attended public school with Arthur's children. She phoned the parents of all of the other students in the class and spread the news that Arthur has HIV. Panicked, the other parents decided to keep their children home from school, fearing they might somehow contract the disease. Arthur's children arrived at school to find empty classrooms and social stigmatization.

These facts demonstrate that the public disclosure tort can target harm outside the ambit of confidentiality laws. The disclosure cases that tend to overcome the default assumptions favoring information flow usually share two characteristics: first, there is some modicum of implied use restriction;²⁴⁴ and second, the public will have a predict-

²⁴¹ In most jurisdictions the "publicity" element requires disclosure to the general public, but in some states disclosure to an especially important audience will suffice. *See* Miller v. Motorola, Inc., 560 N.E.2d 900, 903 (Ill. 1990) (finding that disclosure to the plaintiff's work colleagues was sufficient to fulfill the "publicity" element).

²⁴² Citron, supra note 10, at 1829.

^{243 729} F. Supp. 376 (D.N.J. 1990). In the case, the plaintiff's HIV status was initially disclosed to a police officer, who then told other people in his department for no health—or public safety—related reason.

²⁴⁴ Lior Jacob Strahilevitz has shown that courts' determinations in disclosure cases tend to track theories of social networks. If a personal fact is shared with a support group made up of 20 members, the fact is treated as more private than if it is shared with 20 unconnected friends. Strahilevitz's social network theory is quite use-

ably irrational reaction to the disclosed facts. These types of highly volatile facts lead to consistent overreaction and discrimination.²⁴⁵ Disclosure liability under these conditions avoids conflict with net public knowledge because highly volatile facts degrade public knowledge instead of improving it.²⁴⁶

Courts face a difficult task in identifying which types of personal facts are highly volatile. The lawmakers must have confidence that the public's response is not only overwhelmingly negative, but irrationally so. Sexually transmitted disease (especially HIV and AIDS) marks one example where the public's perception of the risks of transmission and fault of the carriers are not in line with reality.²⁴⁷ Homosexuality might be another.²⁴⁸

The trouble is that classifications are unlikely to stay static over time and are sometimes defused in a single generation. A strong regulation that makes sense at one point in time can cause unexpected problems later. As an example, California's HIV privacy law prohibits the disclosure of HIV test information for *any* reason, including through compelled discovery with protective orders.²⁴⁹ At the time of the law's passage, this seemed like a wise way to protect HIV-positive patients and their supportive communities. However, as the stigma of positive serostatus diminished, the law began to produce unintended

ful in explaining which contexts might have a modicum of implied use restriction. *See* Lior Jacob Strahilevitz, *A Social Networks Theory of Privacy*, 72 U. Chi. L. Rev. 919 (2005).

245 Richard Murphy makes the sound argument that overreactions to AIDS and other phenomena are not necessarily irrational. Overreaction can occur when the population remains rationally ignorant about a disease that is difficult to understand and relatively rare. Murphy, *supra* note 46, at 2401.

246 And, because of the first factor, disclosure torts would avoid imposing liability when the plaintiff puts no effort into keeping the information private. This reasoning lines up with Judge Frank Easterbrook's argument that reasonable restrictions on information will limit certain types of information that have the effect of diminishing the overall quality and quantity of publicly available information. Frank H. Easterbrook, *Insider Trading, Secret Agents, Evidentiary Privileges, and the Production of Information*, 1981 Sup. Ct. Rev. 309, 313 (1981).

247 See Cal. Health & Safety Code § 120975 (West 2006); Doe v. Se. Pa. Transp. Auth., 72 F.3d 1133, 1140 (3d Cir. 1995); Doe v. Borough of Barrington, 729 F. Supp. 376, 381 (D.N.J. 1990); Margo Kaplan, Rethinking HIV-Exposure Crimes, 87 Ind. L.J. (forthcoming 2012).

248 See Sipple v. Chronicle Publ'g Co., 201 Cal. Rptr. 665, 670 (Ct. App. 1984) (finding the disclosure of Sipple's sexual orientation was a matter of public concern because the newspaper story was exploring the possible homophobia of President Ford). Sipple's parents disowned him after the national news coverage broke, showing the high stakes when this sort of information is released.

249 Cal. Health & Safety Code § 120975.

consequences. For example, the plaintiff in *Children's Hospital v. Workers' Compensation Appeals Board* mysteriously contracted HIV during her time working at a hospital.²⁵⁰ She presented convincing evidence to the Workers' Compensation Board that she did not contract HIV from her husband, her only sexual partner, but the Board demanded evidence affirmatively supporting her claim that she contracted the disease at work.²⁵¹ The plaintiff subpoenaed her former employer hospital for a statistical record reporting the number of patients that passed through her particular hospital ward each year during her employ.

California's HIV privacy statute prevented the hospital from complying with her demand. Because a record of this sort did not yet exist, the hospital would have to order a member of its staff to go through patients' charts to count the number of HIV cases, and even a staff member could not do so without first securing explicit consent from every hospital patient.²⁵² At the time of the law's passage, even hospital employees may have had a morbid curiosity in the serostatus of patients, but today it is difficult to believe that a hospital administrator would be unable to maintain professionalism while compiling a statistical record of this sort. Since the plaintiff's claim for worker's compensation depended on her access to this evidence, the privacy statute quashed her chances of receiving pay and, as a result, harmed a member of the very HIV-positive community it had intended to help. State laws regarding homosexuality as a category of libel per se exhibit a similar problem.²⁵³ The common law might be better suited than legislatures to recognize highly volatile facts without letting that status ossify and outlast its usefulness.

Privacy advocates and scholars champion dissemination restrictions, but when the regulations do not follow the confidentiality model or the highly volatile fact model, they are usually ill-advised. The next subsections discuss the problems that can result from overzealous dissemination bans using credit markets as a case study.

D. Dissemination Restriction Case Study: Credit Markets

Many Americans have difficulty accessing credit for the first time. Banks and credit card issuers use debt payment histories to determine

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²⁵⁰ Children's Hosp. & Res. Ctr. Oakland v. Workers' Comp. Appeals Bd., 2010 WL 3936050, at *1 (Cal. Ct. App. Oct. 8, 2010).

²⁵¹ Id. at *2.

²⁵² *Id.* at *7.

²⁵³ Klepetko v. Reisman, 839 N.Y.S.2d 101 (App. Div 2007). *But see* Yonaty v. Mincolla, 945 N.Y.S.2d 774 (N.Y. App. Div. 2012) (declining to follow *Klepetko*).

credit-worthiness, so without debt histories, college students and low socio-economic status (SES) individuals are frequently shut out of mainstream credit markets.²⁵⁴ This is not in the best interests of reliable low-SES applicants who might benefit from a line of credit, nor is it in the credit issuers' interests. But creditors have a difficult time distinguishing low-risk applicants who lack credit history from those who pose a high risk of default. The credit market suffers from an information problem. By leaving a significant portion of the American population un-assessable and unscorable, the information problem does a disservice to creditors and would-be debtors alike.

A recent study by the Political & Economic Research Council found a new source for measuring creditworthiness: utility bills. 255 Utility bill payment histories correlate well with loan repayment, so adding data on utility payment histories to the calculation of credit scores improves the scores' predictive power. More importantly, utility bills provide a means of *creating* credit scores for 10% of the previously unscorable population. 256

Privacy advocates have objected to the disclosure of utility bill data for this purpose because some applicants' credit scores might decrease on account of payment histories they did not know were being tracked.²⁵⁷ It is an odd argument: because consumers are not given the opportunity to game the credit markets through strategic behavior, a creditor's use of a fuller, more accurate set of information constitutes a privacy violation. This is another example where collateral consequences of past behavior are mistaken for privacy harm. Moreover, privacy regulations outlawing the transfer of utility bills in this context would hinder class mobility.

Better measures of creditworthiness *help* the poor. They allow traditionally overlooked credit applicants to access credit lines, and just as importantly, they weed out higher-SES credit applicants who score well on traditional measures but are actually more likely to

²⁵⁴ Ylan Q. Mui, A Deep Dive into Consumers' Habits: Unregulated Firms' Use of Shadowy Tactics can Upend Credit Scores, Wash. Post, July 17, 2011, at A1.

²⁵⁵ MICHAEL TURNER ET AL., YOU SCORE, YOU WIN: THE CONSEQUENCES OF GIVING CREDIT WHERE CREDIT IS DUE, POL. & ECON. Res. COUNCIL (July 2008), available at http://perc.net/files/downloads/web_layout-you-score.pdf (discussing the use of utility bills in assessing creditworthiness).

²⁵⁶ Id. at 12.

²⁵⁷ Mui, supra note 254.

default.²⁵⁸ Without the utility credit scores, lower-SES applicants would cross-subsidize higher income applicants.²⁵⁹

Utility payment history reporting for credit scoring is a novel repurposing of data. If all business records operated under the same dissemination restrictions that our medical records do, this new use would have been overlooked.²⁶⁰ Dissemination restrictions are rarely the best means of balancing privacy and information interests. Restrictions that prohibit all uses other than the ones for which the information was collected are equally problematic.²⁶¹ On the other hand, regulations targeting specific misuse can work quite well.

E. Use Restriction Case Study: Credit Reports

Laws prohibiting specific uses of personal information can achieve the goals of privacy law without significantly curtailing the flow of truthful information. If we have reason to believe that a particular use diminishes social welfare, we can and should craft prohibi-

258 Perhaps this point is best illustrated if we imagine an alternative universe where credit lenders were not allowed to access *any* credit or consumer data on their applicants. In this case, the creditor would use existing assets and income in order to determine who got a loan and who did not. In other words, lower-income applicants would systematically be denied credit due to lack of collateral. This would not serve creditors well, either. Because of the noise in their algorithm, default rates would rise, and interest rates would have to increase.

259 This phenomenon is completely overlooked by the National Consumer Law Center, which concluded that utility credit reporting would adversely affect lowincome credit applicants. John Howat, Full Utility Credit Reporting: Risks to Low Income Consumers, Nat'l Consumer Law Ctr. 1 (December 2009), available at http://www.nclc.org/images/pdf/credit_reports/credit_reports_full_utility_dec 2009.pdf. The report argues that, because fourteen percent of households in the lowest income quintile missed a payment on their utility bill (compared to just over two percent for the highest income quintile), a credit measure that takes utility bills into account will disproportionately harm the poor. Id. at 5. It is true that utility data, like all measures of creditworthiness, does not fall uniformly across income classes. But the consumer organization overlooks the fact that credit scores will rise for the eighty-six percent of the lowest quintile who did not miss a payment. The report also concludes that incorporating utility bills into credit scores will have the effect of pushing utility bills to the top of the priority list for low-income households, and as a result these households will reduce their purchases of necessities like food and medical care. Id. at 4. This claim is not supported by data in the report, but is an interesting empirical question.

260 Utility credit reports, like all reports used to make credit and hiring decisions, ought to be paired with regulation allowing for consumers to check for the accuracy of their records, and to challenge any report believed to contain inaccurate information. The Fair Credit Reporting Act serves as a model for such a scheme. 15 U.S.C. §§ 1681e(b), 1681i(a) (1) (2006).

261 EU Data Protection Directive, supra note 26.

tions on those specific uses. Antidiscrimination laws are prime examples of narrow use restrictions. Antidiscrimination laws restrict the use of race, age, sex, or medical information for hiring, housing, and lending decisions because the biases that result from use of this information, whether statistically rational or not, run against the public interest. These laws work well on the risk-utility calculator because they allow information to be exploited for all purposes except the ones that have been determined to be harmful or risky. The large, rich scholarship on discrimination law explores and debates the soundness of anti-discrimination measures. Curiously, the privacy and discrimination fields often work in isolation, without overt awareness that regulations called "privacy laws" and those called "antidiscrimination laws" often aim to prevent the same harms.

To observe how privacy goals can be achieved through antidiscrimination policies, consider the utility credit reports described in the last subsection. We might wonder whether employers should be proscribed from using these new utility credit scores. As a general matter, we would like employers to differentiate between job applicants on the basis of characteristics that have a relationship to job performance. If employers are enjoined from making hiring considerations based on likely performance ability, the redistribution of jobs and wealth will take place within a pool of applicants such that it will be slightly harder for higher-performers to obtain the job, and

²⁶² Title VII of the Civil Rights Act of 1964, 42 U.S.C. § 2000e (2006).

²⁶³ Occasionally these laws will override pragmatism, as when the Americans with Disabilities Act requires employers to incur additional costs by hiring disabled applicants who require an accommodation, and whose inclusion in the employer's health plan may drive up fees. We do so for expressive and equitable reasons, but such laws require some forethought and caution, since use regulations of this sort will localize large costs that might be better spread across society. *Id.* at §§ 12111–12117.

²⁶⁴ I include just a smattering of the scholarship here. See generally Richard Epstein, Forbidden Grounds (1991) (discussing the application of the antidiscrimination principle to employment relationships in the public and private sectors); Kimberlé Williams Crenshaw, Race, Reform, and Retrenchment: Transformation and Legitimation in Antidiscrimination Law, 101 Harv. L. Rev. 1331 (1988) (arguing that antidiscrimination law, has been fairly successful in eliminating the symbolic manifestations of racial oppression, but has not been able to preclude the continued subordination of Blacks); John J. Donohue, Anti-Discrimination Law, The New Palgrave Dictionary of Economics (Steven N. Durlauf & Lawrence E. Blume eds., 2d ed. 2008).

²⁶⁵ The one exception seems to be the topic of genetic privacy, which inspires privacy and discrimination scholars to synchronize their efforts. *See, e.g.*, Michael S. Yesley, *Protecting Genetic Difference*, 13 Berkeley Tech. L.J. 653, 659–63 (1998) (discussing various states' laws regarding genetic privacy and genetic discrimination).

slightly easier for lower-performers.²⁶⁶ However, employers, like all humans, are susceptible to biases or unexamined assumptions leading them to adopt a hiring criterion that does not actually predict future job performance. When this happens, wealth and employment are distributed within the class of job applicants in a way that is capricious at best, discriminatory at worst, and in any case unmoored from merit and desert. Under which of these models do credit reports fall? Do credit reports make the labor market more meritocratic or less so?

The federal Fair Credit Reporting Act permits employers to access credit reports during hiring processes.²⁶⁷ Considering that federal law prohibits just about everyone else from accessing credit reports,²⁶⁸ one would think there is abundant evidence that credit scores correlate strongly with worker competency and job performance. While there is evidence that present financial stress correlates with absenteeism,²⁶⁹ there is little evidence that credit reports predict the likelihood of success among job applicants.

Even if credit reports were somewhat predictive of job performance, if the effect is small, social welfare could benefit from limiting an employer's access to credit information. A person who is already struggling to pay bills and regain control over their finances is vulnerable to sliding into bankruptcy or poverty if he cannot obtain employment. If he does, he will impose negative externalities on others, including unemployment insurance, the cost of uninsured health care, and at the extreme, welfare programs. We also might be concerned about disparate impacts on the disabled and working mothers since financial crises are often caused by medical or family emergencies. We might classify the financially insecure as a protected class, and prevent discrimination on the basis of financial security. However, this puts employers in a difficult spot. They are under pressure to avoid hiring risky employees not only for financial reasons, but to avoid liability under Title VII and for the tort of negligent hiring.²⁷⁰

²⁶⁶ George J. Stigler, An Introduction to Privacy in Economics and Politics, 9 J. Legal Stud. 623, 630 (1980).

^{267 15} U.S.C. § 1681b(a)(3)(B) (2006).

²⁶⁸ *Id.* § 1681b(a) ("[A]ny consumer reporting agency may furnish a consumer report under the following circumstances and *no other*." (emphasis added)).

²⁶⁹ So-hyun Joo & E. Thomas Garman, The Potential Effects of Workplace Financial Education Based on the Relationship Between Personal Financial Wellness and Worker Job Productivity, 2 Pers. Fins. & Worker Productivity 163 [pincite] (1998).

²⁷⁰ See John E. Matejkovic & Margaret E. Matejkovic, Whom to Hire: Rampant Misrepresentations of Credentials Mandate the Prudent Employer Make Informed Hiring Decisions, 39 Creighton L. Rev. 827, 840–42 (2005); Cathie A. Shattuck, The Tort of Negligent Hiring and the Use of Selection Devices: The Employee's Right of Privacy and the Employer's Need to Know, 11 Indus. Rel. L.J. 2, 5–8 (1989). See generally Meredith J. Fried, Note, Helping

An information-forcing law might provide a reasonable middle ground, obligating employers to disclose to their job applicants all personal information accessed in the course of making a hiring decision. Accurate information, and the influence it has on the choices of both employers and job applicants, is one of the three means of transferring power identified in Mary Graham's *Democracy by Disclosure*.²⁷¹ Transparency laws are in direct tension with personal privacy, but they can be unexpectedly consonant with the aim of respectful and dignified treatment.

The credit report case study shows that, with careful consideration for competing public policy concerns, information harms can be reduced using carefully tailored use restrictions. But these restrictions have little in common with the blunt and comprehensive restrictions proposed by privacy scholars.²⁷²

V. CONCLUSION

Tort law holds the solution to vexing problems in privacy law. Yet it has been neglected by privacy law scholars, who are on a misguided quest to constrain the quantity, spread, and repurposing of personal data. The extensive regulations they propose come into direct conflict with traditional American normative commitments to the free flow of information. Rather than questioning the wisdom of their proposals, privacy scholars pursue the dubious goal of changing America's normative commitments.

We do not yet understand the benefits and consequences of living in a world of unlimited quantities of accurate data—bad portraits, precise records of e-mails, web search histories, recordings of our own voices, and nearly every other interaction we have with a computer. Undoubtedly we know more about each other and ourselves because of these new information troves. It is natural, even if it isn't rational, to regard change as a presumptive threat. Privacy scholars, like all humans, are wired to believe that the existing state of affairs has struck a good balance between remembering and forgetting, and that technologies tipping the scale in one direction or the other are more likely to damage the information ecosystem than to improve it.²⁷³

Employers Help Themselves: Resolving the Conflict Between the Fair Credit Reporting Act and Title VII, 69 FORDHAM L. REV. 209 (2000) (discussing employer liability for sexual harassment and employer obligations under the Fair Credit Reporting Act).

²⁷¹ Mary Graham, Democracy by Disclosure 140 (2002).

²⁷² Lessig, *supra* note 35, at 325–34 (2006); Kang & Buchner, *supra* note 38, at 251–53; Richards, *supra* note 13, at 1149, 1221–22.

²⁷³ Jessica Litman argues that the mere fact that most Americans deplore the collection and selling of personal data is reason enough to regulate or prohibit the prac-

Behavioral psychologists and economists refer to this as status quo bias,²⁷⁴ and Lawrence Lessig more vibrantly refers to it as "is-ism": what is, is what must be.²⁷⁵ Technology shocks significantly alter the world, and predictions about the future state will be more pessimistic than the valuation of the current state, of what we have to lose.

To this point, American lawmakers have been wisely reluctant to condemn the accumulation of personal information until we fully understand its consequences. It is tempting to think that controlling the production of records so that we have not-too-many-more than we used to will keep intact the best balance between the virtues of information and secrecy, but this is emotion-driven rationalization of the status quo. Consider the similarities to the fable of King Thamus, originally told by Plato and retold in Neil Postman's *Technopoly*.²⁷⁶ Theuth, an inventor, approached Thamus with a new invention he hoped to introduce to the Egyptian people: the written word. Claiming that the use of letters could make Egyptians wiser by improving their memories, King Thamus responded:

[Y]ou, who are the father of letters, have been led by your affection to ascribe to them a power the opposite of that which they really possess. For this invention will produce forgetfulness in the minds of those who learn to use it, because they will not practise their memory. Their trust in writing, produced by external characters which are no part of themselves, will discourage the use of their own memory within them. You have invented an elixir not of memory, but of reminding; and you offer your pupils the appearance of wisdom, not true wisdom, for they will read many things without instruction and will therefore seem to know many things, when they are for the most part ignorant and hard to get along with, since they are not wise, but only appear wise.²⁷⁷

The comparison between distrust of personal data and Plato's distrust of the written word is all the more chill-inducing when we consider the history of personal data collection. The progenitor of Big Data was the early accounting records scratched into clay tablets six thousand years ago by traders in Uruk, an ancient Mesopotamian

tices, though she does not attempt to define what, exactly, is so deplorable. Litman, *supra* note 10, at 1303. Orin Kerr posits that an unconscious quest to maintain the existing equilibrium in relative information power explains the outcomes of Fourth Amendment cases. Orin S. Kerr, *An Equilibrium-Adjustment Theory of the Fourth Amendment*, 125 HARV. L. REV. 476, 525–42 (2011).

²⁷⁴ Daniel Kahneman et al., Anomalies: The Endowment Effect, Loss Aversion, and Status Quo Bias, 5 J. Econ. Persp. 193, 197–99 (1991).

²⁷⁵ Lessig, *supra* note 35, at 31–37

²⁷⁶ Neil Postman, Technopoly 3–4 (1992).

^{277 1} Plato with an English Translation 563 (Harold N. Fowler trans., 1913).

city.²⁷⁸ These clay accounting tablets are also one of the first forms of writing.²⁷⁹ Records really are the building blocks of ideas and expression.

Though the United States stands alone among developed countries without omnibus data protection laws, our preference for tort principles over property rights is eminently sensible. The sweeping restrictions of Europe's Data Protection Directive allow individuals to control the flow of information regardless of the impact on the rest of the public. Tort doctrines find rules that favor the well-being of society over the preferences of any one individual. They begin with a presumption that private actors may gather and distribute information freely. This presumption is overcome in circumstances where privacy rights improve social welfare.²⁸⁰ Courts and lawmakers are desperate to find a privacy response suited to the ambiguity and risks of new technologies without imposing too many restrictions on information flow. Even Justice Kennedy, who is not by any stretch of the imagination a privacy advocate, acknowledges that technology "presents serious and unresolved issues with respect to personal privacy and the dignity it seeks to secure."281 Fortunately, tort has already developed an attractive, pragmatic option.

Privacy scholars have overlooked the potential of the old common law intrusion tort to meet new privacy challenges in the information age. Because the interests protected by the intrusion tort are independent from the public's interest in probative information, the tort is more stable than other types of privacy laws. By clarifying that the intrusion tort imposes liability for obnoxious observations, as opposed to the creation of data, this Article has demonstrated that the intrusion tort is apt to deter offensive, targeted observations, and to protect the sense of seclusion that people have come to expect even in a world brimming with data. Intrusion offers a principled way to penalize space invaders without unduly taxing the benefits society enjoys from open information exchange.

²⁷⁸ MATT RIDLEY, THE RATIONAL OPTIMIST 160 (2010).

²⁷⁹ Id.

²⁸⁰ Tort and privacy scholars alike have doubted the viability of tort law to make a significant impact in the information frontier, especially since tort is regarded as the disfavored branch of common law, inviting accusations of litigiousness and uncertainty that do not seem to attach to the doctrines of property and contract. This is what Anita Bernstein calls the "tort paradox." Bernstein, *supra* note 107, at 1547–52. 281 Sorrell v. IMS Health Inc., 131 S. Ct. 2653, 2672 (2011).