

2012

Asymmetries and Incentives in Evidence Production

Saul Levmore

Ariel Porat

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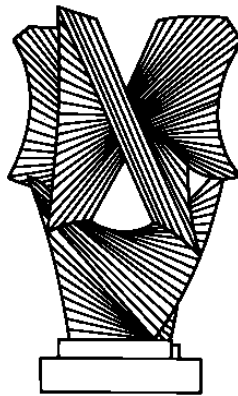
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JOHN M. OLIN LAW & ECONOMICS WORKING PAPER NO. 592
(2D SERIES)

PUBLIC LAW AND LEGAL THEORY WORKING PAPER NO. 379



ASYMMETRIES AND INCENTIVES IN EVIDENCE PRODUCTION

Saul Levmore and Ariel Porat

THE LAW SCHOOL
THE UNIVERSITY OF CHICAGO

March 2012

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ASYMMETRIES AND INCENTIVES IN EVIDENCE PRODUCTION

Saul Levmore and Ariel Porat*

Legal rules severely restrict payments to fact witnesses, though the government can often offer plea bargains or other nonmonetary inducements to encourage testimony. This asymmetry is something of a puzzle, for most asymmetries in criminal law favor the defendant. The asymmetry seems to disappear where physical evidence is at issue, though most such evidence can be compelled and need not be purchased. Another asymmetry concerns advance payment for likely witnesses, as opposed to monetary inducements once the content of the required testimony is known. One goal of this Article is to understand the various asymmetries—monetary/nonmonetary, prosecution/defense, ex ante/ex post, and testimonial/physical—and another is to suggest ways in which law could better encourage the production of evidence, and thus the efficient reduction of crime, with a relaxation of the rule barring payment.

* *Saul Levmore* is the William B. Graham Distinguished Service Professor, University of Chicago Law School. *Ariel Porat* is the Alain Poher Professor of Law, Tel Aviv University, and Fischel-Neil Distinguished Visiting Professor of Law, University of Chicago Law School. We thank David Pi for excellent research assistance as well as Richard McAdams and participants at workshops at the University of Toronto and University of Chicago for stimulating questions and discussion.

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INTRODUCTION

The law of evidence is full of puzzles. Many of these revolve around admissibility and, more narrowly, the rules forbidding or restricting payment to a fact witness.¹ Presumably, the dangers of self-interest and perjury are thought to dominate the benefits normally associated with remuneration for hard work. At the same time, the government—but not the defense—is able to reward witnesses in criminal cases with certain nonmonetary inducements, including agreements to seek reduced penalties, or even not to prosecute at all in both related and unrelated cases. If a witness is already incarcerated, the government can offer to improve the conditions of confinement.² This asymmetry is something of a

¹ See ABA Rules of Professional Conduct 3.4(b) (“A lawyer shall not . . . falsify evidence, counsel or assist a witness to testify falsely, or offer an inducement to a witness that is prohibited by law.”). The “comments” section of Rule 3.4(b) states: “[I]t is not improper to pay a witness’s expenses or to compensate an expert witness on terms permitted by law. The common law rule in most jurisdictions is that it is improper to pay an occurrence witness any fee for testifying and that it is improper to pay an expert witness a contingent fee.”

² See George C. Harris, *Testimony for Sale: The Law and Ethics of Snitches and Experts*, 28 PEPP. L. REV. 1 (2000) (“According to U.S. Sentencing Commission studies, one of every five federal defendants receives a sentencing reduction for ‘substantial assistance’ to the government, which is just one form of compensation that prosecutors can offer to cooperating witnesses. Many more seek such reductions. As observed by one Assistant United States Attorney, “[i]t is a rare federal case that does not require the use of criminal witnesses—those who have pleaded guilty to an offense and are testifying under a plea agreement, or those

puzzle, for most asymmetries in criminal law favor the defendant. The asymmetry seems to disappear where physical evidence is at issue. Both prosecutors and defendants, and even potential defendants, can within limits encourage the production of physical evidence with monetary rewards, though of course pieces of evidence (like testimony) can also be judicially compelled and thus need not be purchased.³ The ability of even interested defendants to pay for physical evidence is sensible rather than doubly puzzling if one regards the dangers of bias and false testimony as much reduced in the case of physical evidence. At the same time, this permissiveness with respect to one kind of evidence raises the question of why we do not see more payments (or requests for payment) for things like privately owned surveillance devices that could generate important evidence.

One goal of this Article is to develop the idea that a better understanding of the particular distaste for monetary incentives and also of the asymmetry in favor of the government leads to a conclusion that law could better encourage the production of evidence. Law's focus has been on the rules of evidence-gathering in the investigation of crimes and accusations. We suggest that optimal crime fighting, as well as individual rights' preservation, likely involves greater private investment in strategies that are set in motion before specific crimes are committed. Our positive theorizing about several asymmetries regarding inducements to produce evidence—monetary/nonmonetary, prosecution/defense, testimonial/physical—has a payoff for the normative question of how to encourage the production of evidence and thus the accuracy of verdicts and the efficient reduction of crime.⁴ In the process, we offer a number of explanations for the existing and superficially troubling asymmetries.⁵

who are testifying under a grant of immunity.”) (citing Ian Weinstein, *Regulating the Market for Snitches*, 47 BUFF. L. REV. 563, 564, 580 n.58 (1999); also citing, Mary Wisniewski Holden, *Questions Remain After 10 Years of Sentencing Guidelines*, CHI. LAW., Dec 1997; and Ann C. Rowland, *Effective Use of Informants and Accomplice Witnesses*, 50 S. C. L. REV. 679, 697 (1999)).

³ See Fed. R. Crim. P. 17.

⁴ We do not pretend to know the correct tradeoff between hiring more police and installing surveillance cameras, for example, but our strategy is to better understand the hurdles to better evidence gathering embedded in current law, and then to suggest some changes or investments that are likely to improve the efficiency of evidence gathering and production.

⁵ Eugene Kontorovich & Ezra Friedman, *An Economic Analysis of Fact Witness Payment*, 3 J. LEGAL ANALYSIS 139 (2011), highlights the monopoly power of fact witnesses and argues for regulated payments rather than zero payments under a kind of liability rule. We reach a different conclusion, and we point to new problems associated with payments to witnesses. We also explore the asymmetrical bargaining power of the prosecution and defendant in criminal cases, the choice between early and late payments to witnesses, and the possibility of unregulated (market) payments for testimony and physical evidence.

Part I analyzes the first two asymmetries. Part II begins with the apparent distinction between a payment made before particular testimony is sought and that made *ex post*, when it is known to concern a particular accused or to favor one side in a specific criminal case. This distinction turns out to play an important role in understanding where monetary payment is permitted. The analysis then incorporates physical evidence, and thus the third asymmetry, and develops the idea that the law of takings, as well as that of salvage, can partly inform the law of evidence. We make the case for greater investment in the production of evidence, and especially for advance payments for physical evidence. The Article concludes with a summary of policy implications and limitations.

I. LIMITS ON INDUCEMENTS TO TESTIFY

A. *The Ban on Payment for Testimony*

Criminal laws pertaining to bribery and to the rules of evidence and of professional responsibility combine to limit payments to witnesses.⁶ At one end of the spectrum, expert witnesses can be paid for their time, and in this manner earn a return on their training.⁷ Even run-of-the-mill fact witnesses can generally be compensated for time and travel.⁸ But at the other end, no payment can be conditioned

⁶ See ABA Rules of Professional Conduct 3.4(b), cited *supra* note 1; see also, 18 U.S.C. §201 (the federal bribery statute); and Jeffrey S. Kinsler & Gary S. Colton, Jr., *Compensating Fact Witnesses*, 184 FEDERAL RULES DECISIONS 425 (1999) (discussing the permissible level of payment to witnesses for their time and travel expenses); and Harris, *supra* note 2, at 5-13 (2000) (describing the “ethical rules and criminal sanctions regarding compensation to witnesses”).

⁷ See Harris, *supra* note 2, at 34-46 (describing the history and practice of compensating expert witnesses).

⁸ Many states are guided by the ABA Model Rules of Professional Conduct, which establishes that “it is not improper to pay a witness’s expenses or to compensate an expert witness on terms permitted by law.” See Rule 3.4(b) of ABA Model Rules of Professional Conduct. The “terms permitted by law” are in turn guided by the federal bribery law, which states that the prohibitions on paying witnesses “shall not be construed to prohibit the payment or receipt of witness fees provided by law, or the payment, by the party upon whose behalf a witness is called and receipt by a witness, of the reasonable cost of travel and subsistence incurred and the reasonable value of time lost in attendance at any such trial, hearing, or proceeding, or in the case of expert witnesses, a reasonable fee for time spent in the preparation of such opinion, and in appearing and testifying.” See 18 U.S.C. 201(d); see also, John K. Villa, *Paying Fact Witnesses*, ACCA DOCKET, October 2001, at 112 (“Although the common law rule survives in some jurisdictions, most states have now modified the rule to permit fact witnesses to be reimbursed for expenses incurred and compensated for time lost with respect to litigation.”), citing *Centennial Management Services, Inc. v. AXA Re Vie*, 193 F.R.D. 671 (D. Kan. 2000); also citing *New York v. Solvent Chemical Co.*, 166 F.R.D. 284 (W.D.N.Y. 1996); and Kinsler & Colton, *supra* note 6, at 427-428).

on “the giving of testimony in a certain way,” none can be made to prevent or discourage a witness from testifying, and none can be contingent on the outcome of the case.⁹

One can imagine a legal system’s permitting payments in order to encourage fact witnesses, especially if they have reason to be afraid, or where the truth to which one testifies is unpopular. But it is plain that most legal systems, and certainly relevant U.S. law, reflect the view that profit will dangerously generate falsehoods.¹⁰ The nearly universal strategy is to permit both sides to enlist the help of a court in order to compel witnesses to testify, but not to use money or similar compensation to encourage unidentifiable witnesses to step forward, to encourage reluctant witnesses to be more forthcoming, or to encourage the production of physical evidence that would not otherwise come into being.

One source of exception might be the convention, or sporadic practice, of offering a reward for information leading to the arrest of a perpetrator, or for information leading to the return of a stolen item. In the process of collecting the reward, a potential witness might be identified and in this way, even if eventually compelled to testify, effectively paid for testimony. At a minimum, rewards for information rather than testimony could be challenged at trial as part of an objection to the admissibility of evidence, including a prior approval of an intrusive search. It is, therefore, somewhat surprising that these rewards do not appear to have generated litigation when the information encouraged in this manner had an impact on actual testimony.

The information-testimony connection is not entirely overlooked. A lawyer in search of an alibi witness would probably not dare post the advertisement: “I will pay \$1,000 for a witness who

⁹ See Villa, *supra* note 8, at 112, 113 (“Any condition attached to the payments that may be viewed as influencing the testimony of the witness is suspect. For example, in a case in which payment is (1) conditioned on the giving of testimony in a certain way, even if conditioned on ‘truthful testimony,’ (2) is made to prevent the witness’s attendance at trial, or (3) is contingent to any extent on the outcome of the case, the payment will be deemed unethical.”) (citations omitted).

The claim that no payment can be conditioned on “the giving of testimony in a certain way” is somewhat exaggerated. There are situations in which a plea bargain or other nonmonetary promise is withdrawn because a witness has misled the prosecution or reversed course about his or her intention to testify. To some degree, the witness who has bargained must keep one end of the bargain in order to enjoy the other...Alternatively, the statement in the text can be understood as limited to monetary payments; this version underreports the interesting fact that even nonmonetary inducements may not be offered either in return for a promise not to testify or in a manner that depends entirely on the outcome of a criminal trial.

¹⁰ A more cynical theory is that the legal system is designed to reduce costs, and to capitalize on the power to compel witnesses and physical evidence without compensation. See discussion *infra* section I.B.1.

saw the person pictured below in East Los Angeles on Friday, the 3rd of March.” But, of course, lawyers and investigators regularly grease information pathways, so that there are some payments that lead to testimony. Moreover, the hypothetical advertisement just sketched would be conventional rather than daring if it avoided the word *witness* and simply asked for information about its featured subject. Unfortunately, it is difficult to obtain systematic information about related practices. Attorneys report that information from many sources is evaluated by both sides and sometimes offered by the defense to the police in order to change the course of an investigation. But it seems safe to proceed under the assumption that the world of criminal trials would look different if payments for testimony were explicitly permitted. As we will see, both sides might offer payments ex post, and the government (and perhaps insurers) would likely offer payments ex ante in order to increase the production of evidence. Under current law, however, only some *indirect* payments to fact witnesses are permitted. Each side can offer these ex ante rewards for information, but only the government can induce a witness with a promise to reduce criminal charges or to improve the terms of confinement.¹¹

Another source of exceptions to the doctrinal claim that neither party may directly influence fact witnesses with monetary payments, is the availability of rewards to whistleblowers, whether because of public law or private law, which is to say statutes or promises. The private promises might arise out of corporate governance and ethics initiatives—though in fact these systems rarely offer rewards. Whistleblowers who respond to promised rewards can receive flat payments or calibrated commissions, and there is obviously some danger of false claims. Moreover, inasmuch as there is rarely, if ever, a promise of matching compensation for contrary information, the arrangements are structurally asymmetrical. When the reward is authorized by statute, there is no legal problem—short of a

¹¹ Plea bargains are not quite universal, but it is noteworthy that even civil law jurisdictions, like France and Germany, have come to embrace them, though with a requirement that the judge be firmly in control of the process. See Maike Frommann, *Regulating Plea Bargaining in Germany: Can the Italian Approach Serve as a Model to Guarantee the Independence of German Judges?*, 5 HANSE L. REV. 197 (2009). In some countries, plea arrangements are limited to reductions in time served, so that once the prosecutor brings charges, they cannot be withdrawn. Of course, this might simply accelerate the timetable for bargaining because it is hard to force the prosecutor to bring charges in the first place.

Note that the government can also offer a kind of ex ante plea bargain, in the form of immunity from prosecution. Again, that is something only the government is empowered to wield. Similarly, the government can encourage witnesses by promising not to deport—or even to help in the quest for legal status and then citizenship—illegal immigrants who step forward to testify. See <http://www.usimmigrationsupport.org/visa-u.html> (explaining U visa and requirement of certification by a law enforcement authority).

constitutional objection—though the asymmetry can be instructive. Within broad constitutional limits, the government is simply permitted to set the rules of the game. For example, Section 7623 of the U.S. Internal Revenue Code rewards “specific and credible” information that substantially leads to the collection of more than \$2 million of tax. The whistleblower receives between 15% and 30% of the amount the Internal Revenue Service collects. There is, of course, no corresponding reward for witnesses who help a taxpayer *defeat* a claim by the government and, presumably, no taxpayer could pay a witness in this manner without violating the norm and rule against paying for testimony.¹² In most cases, the rewarded informant will not need to testify, because the information will have generated an audit and the government can proceed on its own, but even where testimony is eventually sought from, or actually compelled of, the informant, the statutory authority overcomes the more general doctrinal objection to paid testimony.

More generally, legislation can specifically authorize rewards for direct testimony and information, and most posted rewards are indeed protected by statutes. As already intimated, a court might break new ground and rule that such payment, perhaps because of its asymmetric nature, was a violation of the defendant’s due process right, or somehow amounted to a miscarriage of justice. Absent more specific evidence of bias or fraudulent testimony, the defendant might as well argue that it was unfair or unconstitutional that the police who arrested him worked for the government, while he had no subsidized investigators of his own. Of course, that “claim” is further weakened by the argument that the police do in fact look for evidence of innocence as well as guilt, and that the government is indeed asymmetrically obliged to turn over evidence that might exculpate a defendant. One asymmetry might offset the other, though we hesitate to deploy such arguments especially where the starting point involves an asymmetrical burden of proof.¹³ Still, the offset is incomplete or metaphorical; the government is not in the habit of promising rewards for information leading to the exoneration of a suspected wrongdoer. There are, however, private-sector whistleblower plans that are not directly authorized by statute. When these schemes guaranty confidentiality, an investigator who follows up on information provided by a whistleblower must develop

¹² For some discussion of the idea that the government’s reward simply offsets the implicit reward available, say, to the defendant’s loyal employee, see *infra* text accompanying notes 28-29.

¹³ Thus, plea bargaining for testimony might be acceptable because it offsets a witness’s ability to invoke the right against self-incrimination. Our intuition is that such a witness is as likely to help the defense as the prosecution, but the larger point is that there is no shortage of asymmetries about. Our strategy is identify some that seem puzzling in order to reveal underlying themes and incentives.

evidence without the direct participation of the original informant. If there is an asymmetry here, it is brought about by the fact that only one “side” will have funded the infrastructure that supports the reporting system.

Even where whistleblowing systems do offer rewards and lead to voluntary or compelled testimony, a lawyer could surely argue that there was no direct payment for testimony. In any event, our purpose here is not to argue that whistleblowing rewards ought to be exposed and quashed. They surely ought to be transparent, in the sense that a criminal defendant is entitled to know that information used against him might have been encouraged by the promise of reward, because that might give the defense some clue as to where to look for evidence of perjury, for the foundation of a claim that the government deployed an unconstitutional warrant, or simply for the basis of an argument to a jury that some information it heard may be unreliable.¹⁴

A notable feature of all these arrangements—private or public, episodic or standing (which is to say occasionally posted rewards as opposed to longstanding whistleblower arrangements), and even authorized or spontaneous—is that the more the monetary encouragement is provided *ex ante*, well before it is clear whether testimony at trial will be sought, the more it seems to be legally accepted. It is not immediately obvious why this should be so; paying for someone to come forward and provide information regarding tax fraud does not present different hazards from those associated with paying someone who is already identified as having information about a particular defendant. The distinction, or rationale for different legal treatment, might simply be that the more the witness is identifiable, the more he or she can be compelled, so that there is less need for payment. Moreover, late-in-time bargains with identifiable witnesses will often be vulnerable to the holdout power of these witnesses.¹⁵ In contrast, earlier and broader offers create a kind of competitive market for testimony, where holdouts are less likely. These observations about the advantages of *ex ante* offers¹⁶ may well explain the incentives and asymmetries associated with the production and subsequent gathering of evidence, and it is something

¹⁴ It is possible that a defendant never discovers the details of the whistleblowing. But law may be less concerned where A gives information leading investigators to talk to B or to audit B than where A directly informs on B. A may have his own motives, but where there is an independent source for the evidence, less attention is likely paid to the role motives play in discovering that source.

¹⁵ This monopoly power figures importantly in Kontorovich & Friedman, *supra* note 5, as it does below.

¹⁶ Note that by *ex ante* we refer to offers made before a crime occurs. The offer could be for all material of a certain kind or for testimony in the event of a crime. The payment need not be made before, or independent of, the commission of a crime.

to which we return.

B. Monetary versus Nonmonetary Inducements

1. The Holdout Problem and other Dangers

It is plain that the ban on payments, or perhaps ex post payments, but not on plea bargains with witnesses, requires more of a defense. This is especially so because even though the defendant also enjoys the court's power to compel testimony and evidence, that capacity is not a perfect substitute for the ability to pay. One can compel witnesses known to have relevant information, while the promise of payment might go much further; it might encourage persons otherwise unknown, and also encourage the production of evidence currently not produced. It is possible that some of these unknown witnesses could be encouraged by a legal rule that created an affirmative obligation to come forward with information—and also penalized persons who failed to comply. But even this rule would miss witnesses who did not know they had information relevant to a given trial (while well-advertised rewards might find such witnesses) and, in any event, no modern legal system appears to impose this sort of duty to rescue in systematic fashion. The discussion in Part II below focuses on just such a pool of information, distinguished by the fact that it is accessible by persons who might not on their own take control of the relevant information and whom the state does not know to compel.

A different perspective on the ban on payments focuses not on what might be compelled but rather on the dangers associated with payments. One danger is the loss of civic virtue; the ban on direct monetary inducements has a great deal in common with the ban on organ sales and military duties. On the other hand, inasmuch as rewards and other ex ante payment are permitted, the explanation is a limited one. Another danger is that money will induce false testimony, so that it must be allowed only in exceptional circumstances. Thus, experts may be compensated at reasonable, discoverable, professional rates because it is apparent that if payments were forbidden there would be few professionals of the kind often needed. Of course, the more confidence we have in the law of perjury, the more it might be sensible to pay even nonexperts in order to encourage reluctant witnesses or those who can invest in the production of evidence. In between is the compromise position, or question, of why law does not permit payments so long as they are fully disclosed to adversaries and to the court. The expert's fee is, for example, fully discoverable, and either side can suggest or warn that the fee paid to the other side's expert makes that witness's opinion

less reliable or unbiased. Thus, a well-compensated psychiatrist who had interviewed fifty defendants and testified at their respective trials that they were all insane would find that this testimonial history was admissible as evidence and, then, that the present testimony was perceived as less reliable than it would be if coming from one who often declined to support an insanity defense.

The fear that payments to witnesses would encourage false testimony, undeterred by perjury charges, is exacerbated by the likelihood that unregulated payments would often be substantial. At the same time, a requirement that payments to witnesses be fully disclosed is only effective if undisclosed payments, as well as false testimony, are easily exposed.¹⁷ An acquittal is of great value to a defendant, and sometimes a substantial cost to the prosecutor, so that payments for testimony might be expected to be quite high and to invite falsehoods.¹⁸ On the other hand, a jury might be quick to doubt nonexperts who were highly compensated and, presumably, a high fee will also signal an adversary to invest more in an attempt to impeach the witness.

The problems with monetary inducements for testimony are not limited to veracity. Even a truthful fact witness would frequently enjoy monopoly power and could command a high fee in a free market, where there is no compulsion, because the witness might know that no one else observed an event or could provide an alibi for the defendant.¹⁹ In contrast, there is normally a modest upper bound on what an expert witness can command because other experts can be brought in to do such things as interview defendants and compare laboratory samples. In this respect, the expert is like the witness who is encouraged *ex ante*, when there is still a competitive market, and is bound to testify in the event that he witnesses an event at a price that was determined beforehand. The legal system, as well as the parties in a given trial, would be ill-served if witnesses were allowed to

¹⁷ The discussion proceeds on the assumption that perjury would be prosecuted and that an exception to the double jeopardy protection would apply, as it does in many jurisdictions, where perjury was found to have brought about a mistaken acquittal.

Note that disclosure is promising only if juries can be counted on to discount testimony in appropriate fashion, depending on the incentives received by witnesses. Cognitive biases come into play here, especially because jurors will have little experience in these matters.

¹⁸ With or without disclosure, there is also the moral hazard that crimes will be encouraged or even undertaken by those who hope to prosper as witnesses.

¹⁹ When the witness is the sole source of information, the analysis can unravel because an opportunistic “witness” might not bother to encourage a crime but might simply aver that one did or did not occur in order to get payment from a defendant (or prosecutor). Inasmuch as such a wrongdoer must fear exposure, we prefer to dwell on witnesses who might exaggerate or be biased when substantial compensation is available, but who will not manufacture events out of whole cloth. One who only exaggerates or selectively recalls events is less likely to be exposed as a perjurer.

extract the monopoly value of their testimony.²⁰

One antidote to holdouts and monopolists is to compel transfers. We can think of testimony as compelled much as citizens are drafted to serve in the armed forces or as property can be taken for the public good. And the ban on payments to the monopolist is, perhaps, similar to the fact that a brilliant general or successful politician cannot normally bargain for an extraordinary salary, though of course that provider's services cannot be compelled. None of these analogies is perfect. The government can choose to pay a great deal to acquire private property, and it can pay high compensation to the very individuals whose services it cannot compel (like doctors or professors in its hospitals and universities). The property analogy is perhaps the more useful one because the rule that just compensation need only incorporate pre-takings value avoids the windfalls and holdouts that are similarly avoided by the government's ability to compel fact witnesses. Moreover, because the witness knows that the government cannot choose to pay for testimony, there is no point in holding out. The witnesses cannot extract the high value of information for a given trial but is rather limited to something like the value of the witness's time in a pre-accusation world. This takings perspective is useful, and developed further in the next Part, but it should not obscure the reality that neither side can subpoena or otherwise compel a witness unless it knows of the witness's existence and, perhaps, of the information the witness possesses. When they do not know whom to compel, it is plausible that a significant reward—though likely less than the monopolist's price—will often be necessary to produce the information.

The preceding analysis omitted the government's ability to plea bargain, as well as to change the terms or length of confinement applicable to a cooperative witness, and thus pay for testimony with nonmonetary means. Once these inducements are included, it is apparent that the law of evidence cannot possibly be described as designed to deny monopoly power. Some witnesses are obviously able to hold out for monopoly payments, in the form of reduced prison sentences or criminal charges. The inconvenient point is that the government might offer a generous bargain to a valued witness, even exacting no punishment for a past crime and relocating the witness, in order to gain testimony that helps to convict another, perhaps more dangerous, criminal. When induced in this manner, the witness receives something of much greater value than the pre-accusation value of his or her time. There is not only an asymmetry

²⁰ See Kontorovich & Friedman, *supra* note 5 (arguing that the monopoly power of the fact witness, as opposed to expert witnesses, may justify our system, which grants property rule protection of expert testimony but compels fact witnesses to testify).

as to the parties' ability to pay for testimony, because the government can use nonmonetary incentives, but also there is the likelihood of a windfall to the witness. These nonmonetary payments raise the risk of bias and perjury, and are puzzling. If the risk is great, then plea bargains for testimony ought to be disallowed; if the risk is controlled, then defendants ought to be able to make nonmonetary or monetary payments as a countermeasure.²¹

2. *Holdouts and Ex Ante Payments*

A nice explanation for the ban on some payments begins with the recognition of the fact that both sides can pay employees who might in the matter of course take to the witness stand. Police officers are paid by the state, though presumably not for testimony to be given "in a certain way," and some defendants' employees might end up testifying in ways that benefit their employers. Some of these employees might not be hired, or might receive lower salaries, if they could bargain for extra payments when it became clear that their testimony was valuable. Law might, therefore, bar payments in order to prevent any de facto renegotiation of the original employment contracts. A watchman has no monopoly or holdout power when hired, but once he has information about a crime he will know that he possesses such power and can try to hold out for additional payment by conveniently suffering from some memory lapse. The law might overcome this holdout power, to the long-run benefit of potential watchmen as a group, by decreeing that ex post payments are unenforceable or that testimony fueled by such payments is inadmissible.²² In short, the rule against direct (ex post) payments preserves, or raises the value of, ex ante contracts.

This holdout problem may not be serious where the government seeks testimony because it is a repeat player, able to gain a reputation

²¹ One can barely imagine a system where plea bargains are used symmetrically. A defendant could coax a reluctant witness by offering a reduced prison term or even a promise that the witness will not face some charges, subject to approval, ex ante or ex post, by the presiding judge. In turn, the judge would be guided by instructions to provide incentives comparable to what the government had provided other witnesses in the case at hand or, with more complexity, in keeping with what the government offered in other criminal cases. The goal would be to elicit the truth and balance society's interests in the present case or in all cases. Such a system would also reduce the relative disadvantage of impoverished defendants. Indeed, if the rules permitted only nonmonetary inducements, but symmetrically so, they would be understood as aiming to correct for wealth differentials.

²² The strategy is familiar in other areas of law. A professional athlete having the season of his life may suddenly complain of ailments while trying to renegotiate his contract in midseason. In the case of rescue and emergency, law simply refuses to enforce bargains that are negotiated under "duress," but in other areas it is difficult to separate opportunistic and "normal" breaches.

for refusing to pay where the witness is seeking a windfall.²³ We might even say that the prosecutor can plea bargain for testimony because potential witnesses know that she will not do so in a manner that undermines *ex ante* contracts with persons normally expected to witness crimes. This explanation does not overcome the objection that the defendant is uncharacteristically disadvantaged by the asymmetric rule. There is, however, another way to deal with the holdout problem and it is most usefully developed in the context of physical rather than testimonial evidence.

C. Explaining the State's Asymmetrical Advantage

How should we best understand this asymmetry with respect to nonmonetary inducements? There is always the simple possibility that the government is asymmetrically favored in the law of evidence because voters, legislators, and even courts share the majority's preference for fighting crime as well as its disinclination to protect criminal defendants. Constitutional constraints battle this preference at many junctures—most especially with the beyond-a-reasonable-doubt standard—but where such law is less vigilant, it is the majority's preferences that are reflected in law, crafted in incremental fashion by judges and legislators not inclined to enhance the protection of the unpopular minority.

A second, more mundane version of this understanding builds on the majority's disinclination to tax itself. Plea bargaining generates benefits for the majority by "taxing" unidentifiable interests and persons who are unlikely to organize and, in any event, unlikely to argue against this method of inducing witnesses. At the same time it keeps taxes low. Put plainly, the majority might like asymmetry in favor of its government and stacked against criminal suspects, and it pushes this preference as far as constitutional law allows. It is arguable that while constitutional law (in the United States and comparable protections elsewhere) permits the majority to use plea bargains, it would probably not allow the more blatant asymmetry of permitting the government to pay directly for witnesses in criminal trials when the defendant could not do so.²⁴ In short, the majority's perceived self-interest brings about law's forbidding monetary payments to witnesses in order to leave on the table only those inducements that the government can asymmetrically exploit. Under this view, it is possible to imagine courts' restricting the government to the point where plea bargaining

²³Even if the prosecutor's payments were undisclosed, the prosecutor might decline to pay much in order to preserve the office budget for other cases.

²⁴It is hard to know whether the majority would prefer to use monetary payments if it could do so asymmetrically. From its perspective, a disadvantage of plea bargaining is that it might give its agent, the prosecutor, too much discretion.

with witnesses disappears, though there is no evidence of such a trend.²⁵ Courts can justify the asymmetry by promising transparency, and with the argument that it is more than offset by other asymmetries that favor the defendant.

A third explanation focuses on the disclosure of witness compensation to juries and adversaries. We have already mentioned that the ban on payments reflects the concern that payments will be made but not disclosed. Juries and adversaries will be unable to assess the strength of testimony without this information. As a repeat player, however, the government is perhaps more reliably held to its disclosure obligations. It is plausible that most of the benefits traded by the government in order to gain testimony, including improved terms of confinement and agreements not to prosecute, are more observable than cash.²⁶ On the other hand, a promise to prosecute on some charges and not others—and a failure to disclose such a bargain—will sometimes be more difficult to observe. More generally, a prosecutor who wants to secret his inducements can hide behind his discretionary power to prosecute or not; even witnesses already in confinement can be rewarded by parole boards for their good behavior in ways not fully transparent to defendants against whom these parolees testified.²⁷

A more interesting twist, and fourth understanding, is that the asymmetry in favor of the government might offset a subtle one that favors many defendants. There are cases where the problem is not that witnesses do not know they are needed, and cannot be compelled, but rather where self-interest or other loyalties keep them

²⁵ This asymmetry led to the controversial case, *United States v. Singleton*, 144 F.3d 1343 (10th Cir. 1998), in which the court held prosecutorial plea bargains impermissible under the federal anti-bribery statute, 18 USC §201(c)(2). On rehearing, the court reversed its decision *en banc*, see *United States v. Singleton*, 165 F3d 1297 (1999), on the basis that 18 USC §201(c)(2) does not apply to agents acting as alter egos of the United States government. Much of the subsequent literature has focused on the unreliability of testimony obtained through plea bargains and the resulting disadvantage to the defendant. See, for example, Timothy Hollis, *An Offer you Can't Refuse? United States v. Singleton and the Effects of Witness/Prosecutorial Agreements*, 9 B.U. PUB. INT. L.J. (2000). Proposed solutions range from increasing the transparency of plea bargains, so that juries can better evaluate the reliability of the testimony, to more aggressive calls to prohibit plea bargains due to the asymmetrical power it creates. See Michael Cassidy, "Soft Words of Hope:" *Giglio, Accomplice Witnesses, and the Problem of Implied Inducements*, 98 NW. U. L. REV. 1129 (2004); James W. Haldin, *Note, Toward a Level Playing Field: Challenges to Accomplice Testimony in the Wake of United States v. Singleton*, 57 WASH. & LEE L. REV. 515 (2000). In spite of this controversy, plea bargains remain common practice throughout the United States, not to mention the world.

²⁶ To be sure, prosecutors can offer benefits, including monetary ones, and attempt to hide these from the court. See *In re G. Paul Howes*, (D.C. C.A. 2012)(use of vouchers as substitute for illicit cash payments).

²⁷ Another asymmetrical problem with disclosure is noted *infra* note 48.

away. In cases ranging from everyday tax fraud to large-scale criminal enterprises, employees might decline to come forward because their salaries or other compensation depends on the continued viability of the very employers who are the targets of criminal prosecution. In some cases the payments will seem close to explicit, as when a defendant's associate is promoted or favored with a profitable contract on the heels of an acquittal or in circumstances where the government's prosecutorial effort was thwarted. In other cases, there is simply an ongoing arrangement of sorts and the parties are bound by mutual self-interest or, more romantically, by notions of loyalty to clan and a cultural norm against "ratting."²⁸ The government is of course free to argue in court that testimony is tainted or unavailable to it because of such strong ties, but the right ties of this kind can stand in the way of many criminal cases. For every trial where the government succeeds because juries are swayed and impressed by witnesses who are willing to turn on their employers (or families and neighbors), there must be many more where some combination of loyalty and self-interest disadvantages the government. Put differently, it is easy to imagine witnesses' lying or remaining silent in support of those whom they know, but it is much harder to think of cases where citizens will fabricate or remain silent in order to further a case made by their government.²⁹ Loyalty to one's government, or larger community, rarely involves false testimony or silence in domestic courts.

This fact, if it can be called that, would be the basis of a powerful if not more obvious positive theory if the government could bargain with nonmonetary inducements only when dealing with witnesses currently themselves in confinement or called to testify against their employers or family members. It would be especially easy to spin a story in which the carrots and sticks found inside prison walls required the government to be equipped with some means of payment that leveled the playing field and made it possible to gain truthful testimony from persons in prisons. As it is, the explanation is more intuitive than rigorous. The version of this fourth explanation that works best might begin with the idea that the apparent asymmetry offsets the widespread taboo against providing information that harms one's close associates or peers. It continues with the argument that the rule serves, albeit overinclusively, to compensate fact witnesses who can expect to lose money or position when they testify in a way likely to harm their employers or

²⁸ This norm might itself have an efficiency explanation, though it might be a blunt instrument that is refined by the rules discussed here. See Saul Levmore, *Informants, Barn Burning, and the Public Interest: Loyalty in Law, Literature, and Manly Endeavors* (2012 conference paper available from author).

²⁹ These cases might be limited to those where witnesses are eager to see an enemy convicted.

comparable parties. This explanation, like the others before it, requires an additional step in order to explain why the offset cannot be in the form of cash. The government could, after all, be allowed to pay for an employee's testimony against his employer, subject perhaps to a disclosure requirement and a court's approval of the payment. Again, the argument must be that once monetary payments were allowed to one side, they would be allowed to the other and justice would not be served—or the majority's interests not advanced.

II. PAYMENTS FOR EVIDENCE PRODUCTION

A. Ex Ante and Ex Post Payments

There is no asymmetry in the government's favor as one moves back in time and away from particular testimony. Either side can offer a reward for information leading to the arrest of a perpetrator or for the return of a lost object.³⁰ And, plainly, a storekeeper is free to pay a security guard, much as the government is expected to pay its police officers, even though the employee is likely to be called upon to testify at some later trial—albeit one that is unlikely to find the storekeeper in the role of defendant. No court would bar the later testimony against a shoplifter simply because the witness had been paid in advance by the victimized storekeeper. It is not simply that the employer had non-testimonial aims. For example, a criminal suspect can pay a lawyer or other person to be present when the police conduct a search, though that person might later be called as a witness. Similarly, a civil rights worker or a candidate for political office can pay someone to be an observer, though it is plain that if testimony is later required, it will almost surely be given “in a certain way.” Great latitude is afforded payments promised in advance of an unfolded story, so long as not conditioned on particular testimony, while ex post money payments are severely constrained.³¹ Witnesses

³⁰ There does not appear to be any law preventing testimony at trial where the testimony would not have been available had there not been a much earlier reward. Nor does there seem to be law about inducements offered closer to the time of testimony. If in the midst of trial one side posted a reward for an alibi witness or a missing weapon, it is unclear whether current rules would sanction the payment, the offer, or the resulting evidence.

³¹ It is clear that ex ante payments are more acceptable than ex post payments. The observer might be paid in advance but might not easily be solicited after the fact. On the other hand, it is doubtful that testimony would be accepted from a witness who had been told one year earlier “I promise to pay you \$1,000 if during this next year you testify for me in a trial in which I seek damages for a tort.” That offer is ex ante but overly conditioned and particular even though the alleged tort has not yet taken place. Note that the example pertains to a civil dispute, where the rule

of this kind might lose their jobs if their employers find them uncooperative when the times comes to testify, but it is likely that the pressure to give untrue testimony is reduced when the compensation is set in advance and not tied to particular testimony. For this reason, and simply because efficient employment contracts may be encouraged at the margin by the possibility that the employee will “work” as a witness, ex ante investments in future witnesses are welcome.

The government’s hiring of police officers is comfortably included in the preceding analysis, but the reasoning does not extend to informants. More generally, ex ante arrangements are not necessarily superior to ex post payments for testimony. The police might pay a well-placed source to call a contact on the police force when a person of interest arrives at a location, but that information triggers police action rather than forms the core of useful testimony. “Follow E around and we will pay you \$500 if and when you able to tell us and, if necessary, testify that you saw E sell drugs,” comes closer to prohibited inducement, and is certainly so if the payment is not for the surveillance information but for the actual testimony. Indeed, it seems more likely that such an offer would induce false testimony or encourage more crime than one structured as: “We suspect E of selling drugs last week; we will pay you \$500 if you are able to testify that you observed such a transaction.” The same is likely true for nonmonetary payments, if monetary inducements are to be ruled out because they cannot be permitted the defense, and because such blatant asymmetry would run afoul of court-generated constitutional protections. An offer made to an inmate, F, that: “If a guard is ever attacked in this prison, we will reduce your prison sentence if you tell us who did it, and you testify accordingly,” seems quite capable of generating false testimony and dangerously likely to increase the number of attacks on guards. It is probably worse than the more ex post: “We will reduce your sentence if you testify that last week’s attack on Guard X was undertaken by Y,” or: “We will reduce your sentence if you identify the person who attacked X last week.”

There are, to be sure, many variations on this theme, and it seems unlikely that we can reach many firm conclusions about the relative desirability of ex ante and ex post promises and payments

against payments also applies.

It is tempting to advance the idea that payment is more acceptable when it is part of a package in which the potential witness is assigned other tasks along with the possibility that he will one day offer testimony. A police officer, as well as the civil rights intern, does more than wait around to be a witness, and this somehow makes the payment less objectionable. There are situations where the bundling is more efficient, but there are also contexts where specialization is efficient, and we hesitate to place too much weight on this feature of some ex ante payments.

with respect to testimony. In any event, there are two good reasons not to bind the permissibility of payments for testimony to the timing of inducements. The first is that timing does not matter if we assume hyper-rationality. In the prison case, for example, the strategic inmate, F, might behave identically whether the government's offer is *ex ante* or *ex post*, because F will anticipate the *ex post* offer. If this putative witness knows that the government will likely offer a reduction in time served or other benefit to find the person who attacked a guard, it matters not whether the government waits to make the offer or posts it long in advance of any attack. Second, the benefit of an *ex ante* offer seems to be that it avoids making payment for specific testimony "given in a certain way." But it is plausible that there is a greater moral hazard when the payment is for uncertain testimony than when it is for testimony about a particular wrongdoer or specific victim. There is, after all, more opportunity for an opportunistic witness to bring about an attack on *some* guard or by *some* inmate than there is the chance of generating an attack on a named guard or by a named inmate. It is likely that specificity generates bias, inasmuch as the government can pay but the defendant cannot, but generality increases moral hazard. We ought not, therefore, make a broad claim about what the law prefers or ought to prefer with respect to the timing of inducements, at least with respect to testimony.

Where physical evidence is concerned, *ex ante* payments come with the advantage of limiting defendants' ability to sort and misrepresent evidence. Consider a case where a defendant proffers a photograph as evidence. The defense might have sorted through many images from one source and selected the one most favorable to it, even if it is most misleading. Arguably, the defense need not turn over the other images because it does not intend to use them at trial.³² If law wanted to limit misleading evidence, it is not obvious what remedy it could use to force full disclosure regarding the set from which defendant selected evidence, but we might understand a preference for advance payments as pushing in the right direction. Thus, if the photographs available to the defendant came from a camera installed at the government's behest in a public place, then

³² Fed. R. Crim. P. (16)(b)(1)(A) (requiring disclosure by defendant if defendant has used Rule 16 to gain information from the government and the defendant has an "item . . . within the defendant's possession, custody, or control; and . . . intends to use the item in the defendant's case-in-chief at trial).

Note that the government, asymmetrically, does not enjoy this ability to sort and select evidence. Fed. R. Crim. P. (16)(a)(1)(E) requires the government to turn over material under its control if it is material to preparing the defense—or if it intends to use the item in its case-in-chief at trial or the item was obtained from or belongs to the defendant. The government would clearly need to turn over all the photographs. The asymmetry is not on its own puzzling inasmuch as it is but one of many in favor of the accused.

the defendant's sort-and-select strategy could be undone by the prosecutor's ability to look at the other (now relevant) photographs produced by this camera and others near it.³³

B. Regulated Payments for Physical Evidence

1. The Need for Greater Rewards

As a doctrinal matter, physical evidence differs from testimonial evidence because there is no blanket prohibition on payment for particular evidence. Physical evidence—and here we refer both to objects (such as weapons, diaries, and automobiles) and to data (including DNA, recordings, and the contents of a computer's hard drive)—can surely be fabricated, but apparently the intuition is that critical evidence subject to a chain of control, or otherwise tested, is less corruptible than are fact witnesses.³⁴ Most physical evidence will be compelled by subpoena or will otherwise be in the possession of the police. The point of payment must be to bring forward evidence that will otherwise be secreted or in the hands of an owner who is unaware of its relevance, or that will not be produced in the first place if uncompensated.³⁵

We have seen that all payments need to be inspected for moral hazard. If there is no problem of this kind, then an advance offer for information that later turns out to be relevant evidence is usually unproblematic, while an ex post payment for information already known to be favorable to one side in a particular case is only attractive where it does not generate holdouts or renegotiations. The

³³ Put differently, the more the government has paid for, and has access to, all available data, the less the defendant can sort-and-select.

³⁴ The distinction between physical and testimonial evidence, and the nature of fabrication, collapses at the margin. For example, the value of a DNA sample or audio recording may completely depend on when and where it was taken, so that the physical evidence depends on testimony about its origin. There is also the case where we have only a recording of a potential witness's words. We try, therefore, not to put too much weight on the categorical distinction, but rather to paint with a broad brush. On the other hand, we do suggest a change in practice regarding physical evidence and not testimony, but the call is really for a change where the risk of fabrication is low. *See infra* note 45 and accompanying text. To make the categories yet murkier, when we advance the idea of investing in physical evidence, we include and even emphasize the personal efforts that go into the production of such evidence (*infra* note 39 and accompanying text), so that the distinction is not between things and people.

³⁵ The idea that some information, or evidence, happens along while other information requires inducement brings to mind the distinction between information that one party to a contract knows in the course of things and information that requires legal protection if it is to be developed. *See* Anthony T. Kronman, *Mistake, Disclosure, Information, and the Law of Contracts*, 7 J. LEGAL STUD. 1, 9-18 (1978).

government can be expected to take this into account when making payments, and a good way to understand subpoenas and other means of compulsion is as a way of protecting against the holdout and renegotiation problem. A person who knows that she controls critical evidence cannot easily hold out, because once she tries to profit from its existence the state is entitled (on behalf of either party) to compel its production with no reward. Of course, the missing element here is that this power may lead to the underproduction of evidence in the first place.

Our suggestion that evidence is likely underproduced, and in need of new inducements, is tied to the reality of technological change. For most of history, law may simply have reflected the view that witnesses and physical evidence happen along, and can be compelled when necessary. One way to think about professional police is that increased wealth or improved mobility, or both, made it worthwhile to make *ex ante* payments to civil servants whose job description would include protecting, investigating, and witnessing. With the development of a connected and wireless world, it is plausible that law is ready for another change because there are more opportunities for investment in evidence-gathering devices like cameras and smartphones. New technologies motivate our thinking about explicit payments for the production of evidence. At the same time, law may also be ready for enhanced protections of privacy. For every technology that might be encouraged to produce evidence, there is the objection or danger that citizens (or the spirit of the Constitution) would actually prefer to suppress the new intrusions rather than encourage them. We offer no opinion on this matter, but proceed as if there were agreement simply to fight crime efficiently, without regard to privacy and related issues. Put more optimistically, fixed cameras, smartphones, and motivated human witnesses have the potential to bring about dramatic reductions in police forces, and constitutional values might be furthered by this reduction and by the likelihood that machines are free of some of the biases that we associate with humans, and especially with those paid to fight crime.

The next step could be to deploy takings law more aggressively when it comes to compelled evidence.³⁶ We regard this approach as

³⁶ Courts have typically denied compensation for physical evidence under the takings clause since the Supreme Court's decision in *Hurtado v. United States*, 410 U.S. 578 (1973). In *Hurtado*, the Court held that the government's compulsion of a person's time and labor for the draft, jury duty, or witness appearances is not a constitutional taking because these are civic duties—as opposed to property taken by the government. Lower federal courts and state courts extrapolated *Hurtado*, holding that the takings clause does not apply to physical evidence acquired by the government through subpoenas. See Gary Lawson and Guy Seidman, *Taking Notes: Subpoenas and Just Compensation*, 66 U. CHI. L. REV. 1081, 1083-84 (1999) (explaining the expansion of the *Hurtado* holding to physical evidence in lower courts). Even if subpoenas for physical evidence were considered

inadequate, in large part because even the most liberal form of takings law fails to capture a great deal of information as well as objects that are not in the control of “owners.”³⁷ We begin with an example that does not implicate new technology and then move to one that does—with broad consequences. Imagine, first, that there has been a fatal shooting but that no gun has been located, and that the gun would likely lead to the conviction (or acquittal) of G. We know that the police will search for the weapon, but it might be that private citizens are better at searching or that some citizen, H, has seen a gun but is disinclined to come forward or does not realize that it is linked to a homicide. H requires motivation, but H has never owned this property and will not be compensated by takings law, except with some stretch of an argument that first labels H the finder of the property, and then regards the prior owner as relinquishing a claim, when often that fiction will be contradicted by facts. As positive theorists, it is easy to explain law’s disinclination to encourage H with money; compensation might lead to fabrication (though this is difficult in the case of guns),³⁸ to false testimony

government takings, some argue that just compensation is provided by “implicit in-kind compensation.” See RICHARD EPSTEIN, *TAKINGS: PRIVATE PROPERTY AND THE POWER OF EMINENT DOMAIN*, 195-215 (1985). Under this theory, the government’s use of evidence is compensated by the opportunity of the property owner to compel production of evidence if the need arises in the future.

Lawson and Seidman argue that the application of *Hurtado* to physical evidence and implicit in-kind compensation are insufficient justifications to deny compensation under the takings clause. In particular, they argue that unlike witness testimony, subpoenaed physical evidence falls within the takings clause under an originalist interpretation of the Constitution. They further argue that although implicit in-kind compensation is justifiable in “normal cases,” there are three exceptional situations in which further compensation may be required: (1) “where the target [of the subpoena] can realistically expect significant asymmetries in the application of the scheme,” (2) “where compliance costs are unusually high because the scope of the demand is unusually large or complex,” and (3) “where the act of production itself has costs beyond ordinary compliance costs.” Lawson & Seidman, *id.*, at 1107-11.

³⁷ In principle, takings law could do the job. When a court compels evidence, the owner ought to be compensated for the transfer, or rental, of the evidence at a level that is calculated to encourage rather than discourage production. This is more or less the compensation expected in takings law, where we do not want property owners to shy away from building and owning factories, for example, in the expectation that these properties might be taken for a war effort or highway. The government can bargain for a factory or its output, or take it and pay an amount equal to the pre-episode value to the property owner, but well below the value to the government. In the case of physical evidence this standard can be a bit complicated because the government or defendant might want the evidence for a short period of time (where, correspondingly, real property might well be regarded as not entirely taken), and thus not compensated, and some authority will need to be sensitive to the danger that low or zero compensation will have an unfortunate effect on the production of evidence in the first place.

³⁸ Note that when physical evidence is *easier* to fabricate, as might be the case for simple documents, we can rely on judges to find the evidence inadmissible. The

about the event itself or the location of the weapon, to unnecessary costs because evidence might be withheld when otherwise it would be compelled, and to a disconcerting advantage for rich defendants. Still, our normative intuition is that the current nearly-all-or-nothing rule, fashioned perhaps in the wake of takings law, goes too far and misses opportunities to extract critical evidence, with little risk of miscarrying justice.

Consider next a case where J records on his iPhone a video that one side will find extremely useful in a criminal trial. J need not be paid the \$100,000 that the evidence might be worth to the interested party (and there is the danger that such payments will bias things in favor of well-endowed defendants), but J needs be paid enough to make it likely that people will switch on their smartphones when they are likely to record useful evidence. We might have said that compensation needs to be sufficient so as not to discourage people from buying smartphones in the first place, inasmuch as they can be taken (for a considerable period of time) by the government in this hypothetical, but the expected value of that loss seems too low to change many purchase decisions. Whether or not this is so, the amount of compensation needed to ensure that smartphones are bought as before and then turned on (or at least not intentionally turned off) so as to record critical events seems fairly low. To be sure, smartphones might be discouraged by the danger that a criminal will injure the owner of an operating smartphone in order to destroy the means of his conviction. More substantial payment might be needed to overcome this fear, but that is easily done. Similarly, if private surveillance cameras are not as ubiquitous as the courts or other regulators would like, then more compensation might be awarded for useful footage in order to encourage the purchase and installation of these devices. Takings law can be understood as preventing “singling out” by the government, while the task here is to regulate—or generate—the market for evidence production.³⁹

2. *One Step Forward*

It is unlikely that the law of evidence or the rules of criminal procedure need to be changed, because little stops the parties from paying for physical evidence, whether *ex ante* or *ex post*, at present. The problem is that while the power to compel evidence combats the holdout problem, it likely discourages optimal investment in

distinction is thus not precisely between testimonial and physical evidence, but between properly admissible testimony and physical evidence.

³⁹ This is in contrast to the proposition advanced by Lawson & Seidman, *supra* note 36, which does not focus on generating and encouraging evidence production, but rather on the potential violation of the takings clause in situations where the evidence is of unusually high value or is excessively burdensome to produce.

evidence production. We have in mind a budget that allows judges to compensate the owners of physical evidence. An owner or finder who comes forward with the weapon needed to advance a murder trial, for example, should expect it to be tested for the danger of fabrication, but should also expect to be paid by the court if it proves true.

Other arms of the state might do more in the way of ex ante payments. Private parties can be paid to install cameras and to turn their smartphones into tools of evidence production, and thus crime-prevention. Our intuition is that the most successful schemes will pay the producers of physical evidence for results rather than mere efforts, perhaps adding in occasional large rewards. The first part of this intuition follows from some confidence about the system's ability to detect fabrication, and the second part is a reaction to the expectation that the payments for physical evidence are likely to be low. This is true whether one is guided by consideration of optimal evidence production or by the realities of budgets, and what we can expect of courts or other authorities. We imagine, for instance, a scheme in which smartphone users are rewarded with a 30-cent a day reduction in phone bill charges in return for loading and leaving alive (for at least some number of hours per day) an "app" that records local sound or video information and sends it to a storage location for some period of time. This is likely to work best if the information is in the hands of a third party, or even several such parties which compete to show consumers that they respect privacy and unlock the information only when it is sought by a court or relevant to a criminal case.⁴⁰ The prospect of a cost reduction of \$100 per year, for each participant, might motivate the production of evidence—without creating a moral hazard—and also be worthwhile from a crime-fighting point of view. But it is easy to imagine a news story about a criminal violently extracting smartphones prior to a planned crime or about a smartphone user arrested on the basis of evidence received from her own phone, causing a large fraction of participants to disable the app, at the cost of the 30-cent per-diem. The way to combat this volatility, or quirk in human reasoning, is apt to be with another teaser, such as lottery proceeds or a prize for a provider of evidence. Smartphone owners will then enable the evidence-gathering app in the hope of gaining a sizeable reward.

The case for these payments is strengthened or at least informed by admiralty law's strategy with respect to salvage. Salvors are compensated after the fact, and in proportion to the risk, equipment, and success associated with the episode. The legal rule tries to create the right incentive for investment in salvage equipment, and then for

⁴⁰ Note that this information can be retrieved in a way that limits the ability of a party to sort-and-select. *See* ___.

the effort suitable to a given emergency.⁴¹ The most important difference between salvors and producers of physical evidence is that shippers in need of rescue (and courts) have no power to compel salvors (for if they did, there would be underinvestment in salvage). But the similarities are significant, especially where we think that evidence does not happen along but is rather the product of effort.⁴²

C. Regulated Payments for Testimony—Rejected

Where witnesses come forward, it is more difficult to use scientific techniques to establish authenticity. Inducements might well be needed for witnesses who do not just happen along,⁴³ or who run risks by coming forward, but payments to them create the risk of bias, likely destabilize *ex ante* contracts, and even create moral hazards. If K is the sort of person who might go outside on a dark night to monitor a parking lot in the hope of compensation, it is perhaps too likely that K will allow a crime to occur, and be a witness to it, rather than prevent it or call police who might serve as uncompensated witnesses. In extreme cases, K might even encourage the commission of a crime in order to profit from witnessing it. The most plausible cases for compensation are probably those presently associated with witness protection programs, but there will also be cases where payment can overcome the inhibition and financial loss suffered by one who testifies against an employer or fellow worker. The government's ability to provide nonmonetary benefits is rarely of use in these contexts, but whistleblower rewards do occasionally rise to the occasion. We have seen that the Internal Revenue Code offers sizeable rewards for information leading to the collection of very large tax liabilities.⁴⁴ No doubt, law could expand on and refine that impulse where other testimony is concerned. Payments could be set after the fact and tied to the risk and investment undertaken by the witness, or set by formula, published in advance in the manner of tax law. If payments are made, they should be symmetrically available to witnesses for the defense, for they too might run risks.

⁴¹ On the law of salvage and its promotion of optimum rescue efforts, see William M. Landes and Richard A. Posner, *Salvors, Finders, Good Samaritans, and Other Rescuers: An Economic Study of Law and Altruism*, 7 J. LEGAL STUD. 83, 100-05 (1978).

⁴² Note that admiralty law can also be seen as sensitive to the holdout problem we have discussed. In the middle of an emergency, a local rescue vessel will enjoy holdout power, and overcompensation will lead to over-entry and over-investment in *ex ante* contracts with potential salvors. Admiralty law's solution has been with us for many hundreds of years; contracts made under stress are unenforced, and the *ex-post* compensation is generous.

⁴³ See *supra* note 35 and accompanying text (linking the discussion to Kronman's distinction in contract law between information acquired in the course of things and information acquired through costly investment).

⁴⁴ See *supra* note 12 and accompanying text.

But we do not favor radical changes in the rules barring payments to witnesses. There is, first of all, little technological change in this domain. More important, we have advanced a variety of new explanations for the various asymmetries and constraints in present law, and most of these warn against direct payments. The comparison with admiralty law is again instructive, and the difference between witness and salvor is much greater than that between salvor and a producer of physical evidence. Payments to fact witnesses generate a significant moral hazard, a risk of fabrication, and a danger of destabilizing earlier contracts with employees.⁴⁵ None of these problems is present in the case of salvage, and none is serious where payment for physical evidence is proposed.

Another difference between payments for witness testimony and for physical evidence (as well as salvage) is that the former presents a serious price-setting problem. It is difficult for an outsider to know much about the risk a witness runs, the value of a personal relationship that will be destroyed by perceived betrayal and, most of all, the effort invested. All these things are easier in the case of physical evidence. In addition, we can observe the effect of compensation on such things as the installation of surveillance cameras⁴⁶—and, once installed, their content can be compelled or simply streamed—but it is much harder to observe the impact of compensation on the willingness of people to observe rather than to turn away, and then to come forward rather than to slink away.

There are other problems with payments for testimony. Jurors probably need to be told about payments, and they might draw the wrong conclusions from this information.⁴⁷ Payments offered to a large group are likely to appeal to the biggest liars in the group, and it is difficult for juries to correct for this effect or for law always to target offers to small groups.⁴⁸ These problems are not so great as to

⁴⁵ Nevertheless, payments to employee-witnesses might be useful. It is easy to imagine an employee who will not betray a boss unless compensated for his (the employee's) testimony. At the same time, it is just as easy to imagine an unhappy worker who would manufacture evidence against his employer in order to be paid to leave the job he abhors.

⁴⁶ We do not claim that it will be easy to determine the optimal investment in crime reduction. Presumably, sophisticated comparisons of several jurisdictions will yield information about the returns from these investments, and then preferences about privacy will be added in to a jurisdiction's decision.

⁴⁷ If the jury learns that the government has paid handsomely for testimony from L, it might think that the police or prosecutor knows that the defendant is a danger to society, and that the state is therefore willing to pay a high price in order to put the defendant behind bars. In contrast, if the defendant pays a witness well, the jury might reason that the defendant believes he or she will otherwise be found guilty—because the defendant *is* guilty.

⁴⁸ If one side seeks an alibi witness and advertises that payment will be made to a witness who saw the defendant in Los Angeles on a certain date, it is effectively

“explain” the familiar ban on payments, but we do not explore them further inasmuch as we propose no dramatic change with respect to payments for testimony.

CONCLUSION

We have undertaken two separate, but related, tasks in this Article, with respect to the law surrounding incentives for providing testimonial and physical evidence. The first is to identify and make sense of the various asymmetries in the law, beginning with the remarkable ability of the prosecutor to plea bargain for testimony even as a defendant is barred from making any significant payments. This turns out to be part of a larger picture with other asymmetries, including one between *ex ante* and *ex post* payments.

Even as we have developed novel and arguably successful arguments explaining current law and its asymmetries, we turned to the possibility that new technologies have changed the balance a bit, and that it is time to experiment with incentives for the production of evidence. Our second task, then, has been to show how such incentives might be justified and structured. We have argued on the basis of theory and intuition that there is a good case to be made for payments for the production of physical evidence, including access to data, but that it is too risky to permit payments for testimony where such inducements are currently barred.

A great many things have been left incomplete or even untouched. We noted but put to the side the privacy issues that become more important when surveillance and other forms of evidence production are encouraged. With this important issue sidelined, there is no point in developing a more precise proposal for payments for the production of evidence. We have simply suggested what such a system might look like and why it might be sensible.

Another looming question is the relevance of the analysis to civil trials. In some ways the questions are less interesting where

making an offer to a large group of “sellers,” where there is likely to be at least one crafty opportunist. “We offer \$3,000 to the woman with red hair who can show that she was in Box 107 at a Los Angeles Dodgers baseball game on June 3rd,” might be a better way of producing an important witness and not just a good liar, but it would be difficult for courts to supervise this process or to explain the probabilities to juries.

Courts might also prefer evidence that is not entirely managed by its producer, but again this is difficult to legislate or supervise. “I did not personally see the murder, but pay me and I will tell you the name of the waiter who saw it,” seems better than: “Pay me and I will tell you who murdered Jack.” It is not much better, because the paid informer and the waiter can collude, and there remains a moral hazard. “We have reason to think that you saw the waiter run out of the restaurant on Monday, and we want the name of that waiter” is yet better, because it targets the informer and lessens the possibility that the payment will simply encourage the biggest liar in the group.

civil litigation is concerned, because there is no plea bargaining in the picture, often no repeat player on one side, and probably few cases where physical evidence rather than testimony is critical to the result. On the other hand, the law is more likely to allow experiments with payments where a defendant's liberty is not at stake or, perhaps, where the adversaries agree to permit payments. We leave these questions for another effort.

Readers with comments should address them to:

Professor Ariel Porat
University of Chicago Law School
1111 East 60th Street
Chicago, IL 60637
aporat@uchicago.edu

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