

LIVE HEARINGS AND PAPER TRIALS

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ABSTRACT

This Article explores a constantly recurring procedural question: When is fact-finding improved by a live hearing or trial, and when would it be better to rely on a written record? Unfortunately, when judges, lawyers, and rulemakers consider this issue, they are led astray by the widely shared—but false—assumption that a judge can best determine issues of credibility by viewing the demeanor of witnesses while they are testifying. In fact, a large body of scientific evidence indicates that judges are more likely to be deceived by lying or mistaken witnesses when observing live testimony than if the judges were to review a paper transcript. Witness presence, in other words, may often harm, rather than improve, the accuracy of credibility assessments. The fact that legal actors value hearings for mistaken reasons does not mean that hearings have no value, but it does raise the concern that live procedure will be employed when it is unneeded or even counterproductive, especially given the lack of available guidance on this question. In this Article, I attempt to remedy this problem by suggesting some guiding principles that lawyers, courts, and rulemakers could rely on when choosing between live and paper-based fact-finding.

Live hearings and trials will often, but not always, do more harm than good. In addition to the fact that demeanor cues generally impair credibility judgments, there are a number of cognitive biases that may arise from having one's first impressions of a witness be visual and auditory impressions. These include a persistent human tendency to trust or distrust witnesses based on their physical attractiveness, their social status, their race, or other features that may make them similar to, or different than, the fact-finder. On the flip side, live fact-finding may help a judge make sense of confusing evidence. In addition, in-court hearings may feel fairer to participants than paper-based decisions, due in large part to the desire to have expressive input in decisions that affect their well-being. And occasionally, a live hearing or trial may be preferable for reasons of cost or practicality.

A better understanding of the costs and benefits of live fact-finding could have profound implications for the design of our civil justice system. Our current approach relies on predominantly paper-based, pretrial fact-finding, followed in rare cases by a live trial process. Unfortunately, this system uses paper-based procedures at a point when live hearings may often be cheaper and more reliable, then shifts to live examination when its benefits will have evaporated and its costs are likely to be prohibitive. A preferable system would allow for more live hearings early in a case. Even when there is no direct credibility conflict, live proof at this stage may increase the legitimacy of rulings, may lower litigation costs, and will often be more reliable than the paper-based alternative of affidavit evidence. By contrast, rulemakers should be more willing to authorize—and judges should be more willing to use—paper trials at the final fact-finding stage of a dispute. At this late stage, live procedure is expensive and unreliable, and as a result litigants use it so rarely that it provides them with few opportunities for self-expression. In short, we should reverse our present approach to civil case fact-finding by holding more live pretrial hearings and more paper trials.

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I. INTRODUCTION

In American civil procedure, some of our metaphors draw heavily on a shared cultural image: the *viva voce* civil jury trial. If we wish to say that a litigant has a right to exercise some personal control over the presentation of arguments and evidence in a proceeding that might affect her rights, we say that she has the right to her “day in court”¹—even though the vast majority of cases are resolved by settlement or by pretrial motion, rather than by a trial.² Likewise, when we refer to a person’s due process rights to present evidence and make arguments to a court, we say that she has a right “to be heard,”³ even though the litigant (and even her counsel) may participate in those proceedings by many other means than speaking to the court.

The language of procedure is permeated with a presumption of *presence*—a default assumption that adjudication of a dispute requires the physical, visual, and aural immediacy furnished by a traditional trial environment. This assumption persists despite the fact that many case resolutions occur via motion practice or private settlement negotiations that deviate widely from the traditional model

1. See, e.g., *Ortiz v. Fibreboard Corp.*, 527 U.S. 815, 846 (1999); 18A CHARLES ALAN WRIGHT, ARTHUR R. MILLER & EDWARD H. COOPER, FEDERAL PRACTICE AND PROCEDURE § 4449 (2d ed. 2002).

2. See Marc Galanter, *The Vanishing Trial: An Examination of Trials and Related Matters in Federal and State Courts*, 1 J. EMPIRICAL LEGAL STUD. 459, 482-84 (2004); Gillian K. Hadfield, *Where Have All the Trials Gone? Settlements, Nontrial Adjudications, and Statistical Artifacts in the Changing Disposition of Federal Civil Cases*, 1 J. EMPIRICAL LEGAL STUD. 705, 730 tbl.7 (2004); see also Ronald J. Allen, *Laudan, Stein, and the Limits of Theorizing About Juridical Proof*, 29 L. & PHIL. 195, 207-08 (2010) (book review) (characterizing trials as an oddity reserved for those “perverse” cases in which the ordinary means of dispute resolution have failed).

3. See, e.g., *Phillips Petroleum Co. v. Shutts*, 472 U.S. 797, 812 (1985).

of a live trial.⁴ Once we have noticed this default assumption, a question presents itself: How well is the legal system served by a procedural mindset that automatically equates “in person” procedures with “fair” procedures?

I aim to explore that question in this Article, by assessing the costs and benefits of live hearings and trials in the resolution of civil disputes.⁵ It is a question that legal decisionmakers must answer *implicitly* on a nearly constant basis—to the extent that the question becomes a form of legal white noise. The litigating attorney must decide whether to ask for an evidentiary hearing or whether to seek a live trial; the judge must decide when to grant one or proceed on a paper record instead; the rulemaker must decide what (if any) rules are necessary to guide the judge’s discretion. Each time, someone is relying on a set of assumptions about whether the presence of the parties and the sights and sounds of live testimony are a help or a hindrance. And precisely because legal actors must so often decide what value to place on in-person procedures, any defects in their decisionmaking in this area are likely to be magnified when seen from a distance. Small introductions of error or dissatisfaction—aggregated across the entire system—may lead to large-scale inefficiencies or inequities.

Despite the frequent affirmation of the value of presence in the fact-finding process by legal thinkers, we shall see that live hearings and trials sometimes aid, but often hinder, the fair adjudication of disputes. In the sections that follow, I aim to establish the following propositions. First, legal decisionmakers are regularly forced to decide whether live procedure is useful in a particular circumstance or in a particular class of cases. But despite the ubiquity of this question, the utility of such presence is poorly understood by judges and under-theorized by academics. Most judges assume that live hearings increase accuracy by adding the demeanor of witnesses into the informational environment, thereby increasing their ability to tell whether a witness is being deceptive or inaccurate. But in fact, demeanor cues are more likely to mislead judges than to edify them; demeanor, in other words, is a tool that liars use to appear more credible. Moreover, live testimony introduces other sources of bias

4. See ROBERT P. BURNS, *THE DEATH OF THE AMERICAN TRIAL* 82-83 (2009). Burns describes the radical decline in the number of federal cases that are resolved by a trial, from approximately twenty-five percent of cases at the beginning of the twentieth century to less than two percent today. *Id.* A similar decline has occurred in state practice. *Id.* at 85-86.

5. Similar questions could profitably be asked in a variety of related legal contexts. Live procedures are the norm for the resolution of criminal disputes, and they are quite common in the administrative agency context. In both arenas such procedures may be subject to the same difficulties I discuss *infra* concerning civil case fact-finding, although unique cost considerations and expectations concerning fairness in such settings would require considerable additional analysis. The decision to limit the inquiry to the civil procedure context, therefore, flows primarily from a desire to keep this discussion to a manageable scope.

that may lead decisionmaking astray. Viewing a witness in person may encourage a judge to unconsciously credit or distrust testimony based on factors that have little to do with accuracy, including a desire to affiliate with high status or attractive witnesses or an innate tendency to trust witnesses who are members of one's own social in-group more than members of an out-group.

But this does not mean that live procedures are without value. Despite the concerns expressed above, live testimony can aid in accurate decisionmaking if it adds factual information that would be absent from a paper record—such as through a successful cross-examination of a poorly prepared witness. Furthermore, live fact-finding may sometimes be a lower-cost method of deciding a dispute, depending on the state of the evidentiary record when a decision must be made. Live procedures also have “softer” values that the legal system cannot afford to ignore: They are part of a process that signals to litigants that the legal system respects their dignity as persons even when it rejects their arguments. Such signals are an important way that the legal system projects an aura of legitimacy and thereby obtains public compliance with the law.

Ultimately, to decide whether a live or a paper-based procedure is preferable in a given situation, we should weigh these concerns of objective accuracy, subjective legitimacy, and cost against each other. By doing so, we shall see that many standard assumptions about when hearings are useful and when they are not are probably flawed, and that these flawed assumptions have resulted in a perverse set of practices in civil litigation. For instance, we regularly employ paper procedures early in a case but almost uniformly prefer live trials for the final fact-finding process. But attending to the costs and benefits of presence shows that this preference is very nearly the *opposite* of a sensible balance between accuracy, legitimacy, and cost considerations. Early in the life of a case, holding a live hearing may add reliability to fact-finding at little expense, particularly when the alternative is affidavit proof. After a lengthy pretrial process, however, the considerations are inverted: well-prepared witnesses can frustrate what few truth-seeking advantages a live trial may provide, while the high-costs and uncertainty of that procedure will induce many parties to settle and thereby lose the opportunity to argue the merits of their cases to a court. In other words, instead of our current habit of conducting paper motion practice followed (rarely) by a live trial, a more sensible approach would be to hold more live evidentiary hearings early in the life of a case, followed by a paper trial if the parties cannot settle.

This Article will proceed in five parts. First, I will attempt to show the relevance of the question under discussion by illustrating the ways that practitioners, judges, and rulemakers depend on their abil-

ity to accurately assess the value of live testimony. Second, I will discuss the costs and benefits that live procedures can impose on our ability to reach accurate determinations in the face of conflicting evidence. Third, I will examine the normative and practical factors that may counsel in favor of live testimony, even when it might add inaccuracy or expense. Fourth, I will discuss the effect of live hearings and trials on litigation costs. Fifth, I will attempt to demonstrate how these concerns play out in several real-world situations in which judges must evaluate the utility of in-person procedures. Using these examples, I will then suggest a proposed reform to the Federal Rules of Civil Procedure that would strike a better balance between live and paper-based fact-finding.

II. A TALE OF THREE DECISIONMAKERS

The question explored in this Article—whether a live hearing or trial will be an aid or a hindrance to decisionmaking in a given context—has relevance for participants at every level of the legal system. Lawyers must rely on a theory of live procedure (even if it is an implicit one) in order to make many decisions regarding litigation strategy. Likewise, judges are often called upon to decide whether live testimony is valuable in the context of a particular case, and procedural rulemakers must make more general decisions about the utility of *viva voce* procedures for particular types of judicial decisions. Often, the decisionmaker in question may not realize that a value-laden choice is being made, in part because the decision is one that is made so routinely. But the very ubiquity of the decision means that small errors in assessing the costs and benefits of live procedures can be magnified into substantial problems when viewed from a systemic perspective.

A lawyer must decide how much value she places on in-person procedure at the very outset of litigation. For one thing, she must decide whether she wishes to demand a jury trial.⁶ In making this decision, one important consideration is how much value she places on a live trial. In bench-trial cases, courts will sometimes agree to employ a paper trial procedure in which they reach a decision based only on a paper record, dispensing with a live trial.⁷ No parallel practice exists with respect to jury-trial cases, however. So, our hypothetical attorney makes an implicit decision regarding the value of *viva voce* presentation when she decides whether or not to seek a trial by jury

6. See U.S. CONST. amend. VII; FED. R. CIV. P. 38(b) (requiring that a demand be made within fourteen days of the last relevant pleading in federal court cases).

7. See, e.g., *Muller v. First Unum Life Ins. Co.*, 341 F.3d 119 (2d Cir. 2003); *Lac Courte Oreilles Band of Lake Superior Chippewa Indians v. Voigt*, 700 F.2d 341 (7th Cir. 1983).

and (if she has waived a jury trial) later in the case when she decides whether to seek a paper trial.⁸

Furthermore, our lawyer will reprise this decision many times during her lawsuit. The federal rules of procedure and evidence require judges to make many non-dispositive findings of fact in advance of trial. For instance, a judge in a civil case may need to decide whether to grant a preliminary injunction,⁹ whether to certify a class action,¹⁰ whether to compel arbitration,¹¹ or whether to admit scientific evidence.¹² However, because a court will often have discretion as to whether or not it needs to hold a hearing in order to make such decisions,¹³ an attorney has the option of asking the court to do its pretrial fact-finding on the basis of either an oral hearing or a written record.

Judges, of course, are forced to address these concerns as well. In some cases the choice between live procedures and paper procedures will have been made for them. For instance, a judge has no discretion to deny a jury trial once demanded by a party in a proper case.¹⁴ Similarly, local rules or circuit precedent may constrain the ability of judges to make pretrial findings of fact in the manner of their choosing.¹⁵ But often, a judge will have no authority to rely upon, and in

8. To dispel any confusion, I must make clear that the value of in-person procedure is only one of many factors that will or should bear on the jury-trial-waiver question. For example, in some cases, lawyers may believe that a jury will view their case more favorably than a judge would—or vice versa. Likewise, lawyers may prefer a live bench trial over a live jury trial for cost reasons, without regard to the possible availability of a paper trial procedure. And it is quite possible that litigators who specialize in subject matters in which paper trials are very rare may be unaware of the device's existence and thus fail to realize that a choice about the jury trial issue has this additional implication.

9. See FED. R. CIV. P. 65(a). See also *Univ. of Tex. v. Camenisch*, 451 U.S. 390, 392 (1981) (describing the findings of fact necessary to support a preliminary injunction).

10. See FED. R. CIV. P. 23.

11. See 9 U.S.C. § 4 (2006).

12. See FED. R. EVID. 702. Similar situations may arise in many other forums, of course. In a criminal case, for instance, fact-finding may be necessary to support a decision regarding pretrial detention or suppression of evidence, and judges may have discretion in such settings regarding the manner in which proof will be taken. See, e.g., 1A CHARLES ALAN WRIGHT & ANDREW D. LEIPOLD, *FEDERAL PRACTICE AND PROCEDURE* § 194 (4th ed. 2008) (suppression hearings). Likewise, arbitration and administrative law procedures may often grant non-judicial fact-finders the authority to decide whether or not a hearing will be useful.

13. See, e.g., 7AA CHARLES ALAN WRIGHT, ARTHUR R. MILLER & MARY KAY KANE, *FEDERAL PRACTICE & PROCEDURE* § 1785 (3d ed. 2005) (class action certification); 9 U.S.C. § 6 (2006) (motion to compel arbitration in non-jury-demand cases); CHRISTOPHER B. MUELLER & LAIRD C. KIRKPATRICK, 3 *FEDERAL EVIDENCE* § 7:17 (3d ed. 2007) (*Daubert* inquiry).

14. See U.S. CONST. amend. VII; FED. R. CIV. P. 38.

15. See, e.g., *Merrill v. S. Methodist Univ.*, 806 F.2d 600, 608 (5th Cir. 1986) (noting that Fifth Circuit precedent requires district courts to hold evidentiary hearings whenever a class certification is not “free from doubt”).

stead she will be forced to weigh the costs and benefits of a live proceeding without guidance.¹⁶

Judges may be relying on implicit assumptions about the value of *viva voce* procedure even when the issue is not explicitly presented. Quite often, a judge might find that a case falls within a zone of ambiguity when applying a rule that may either dispose of that case, or allow it to proceed to a bench or jury trial.¹⁷ For instance, consider a motion for summary judgment in which a judge is unsure whether the parties have created a material dispute of fact, perhaps because the submissions of the parties are somewhat vague as to key points of evidence.¹⁸ When legal questions become close, policy judgments may begin to play a larger role in the decisionmaking.¹⁹ In such a position, a judge might be influenced by her assumptions as to whether the additional proceedings are likely to improve the accuracy of the case's outcome or merely take up extra judicial time. Thus, a judge might end up granting summary judgment based on a view that live testimony will materially aid her subsequent decisionmaking or deny it based on a view that a live trial will be long on expense but short on new information.

Similarly, judges regularly review the work of other judges and decisionmakers, sometimes within a single court system (as in the case of a direct appeal) and sometimes across institutional lines (as in the case of administrative review). In this context, they often must apply rules of deference, which instruct them to give extra weight to decisions that follow a hearing.²⁰ Such rules are necessarily under-

16. Compare *Gingras v. Prudential Ins. Co. of Am.*, No. 06 C 2195, 2007 WL 1052500, at *7 (N.D. Ill. Apr. 4, 2007) (declining to try a case on a paper record despite the parties' stipulation to such a procedure), with *Migliorisi v. Walgreens Disability Benefits Plan*, No. 06 C 3290, 2008 WL 904883, at *1 (N.D. Ill. Mar. 31, 2008) (employing a paper-based decision procedure in a case involving credibility disputes).

17. For example, summary judgment decisions may often hinge on whether a particular dispute is characterized as a question of fact, which a court must view "in the light most favorable to the nonmoving party," *Ricci v. DeStefano*, 129 S. Ct. 2658, 2677 (2009) (quoting *Scott v. Harris*, 550 U.S. 372, 380 (2007)), or a question of law, to which no such rule of restraint applies. Deciding whether a particular dispute is one of fact, of law, or the application of law to fact will often involve a surprising amount of practical judicial discretion, given that "the journey from a pure question of fact to a pure question of law is one of subtle gradations rather than one marked by a rigid divide." *Burlington N. R.R. Co. v. Hyundai Merchant Marine Co., Ltd.* 63 F.3d 1227, 1235 (3d Cir. 1995) (quoting *United States v. Stauffer Chem. Co.*, 464 U.S. 165, 171 n.4 (1984)).

18. See FED. R. CIV. P. 56.

19. See Ward Farnsworth, Dustin F. Guzior & Anup Malani, *Ambiguity About Ambiguity: An Empirical Inquiry into Legal Interpretation*, 2 J. LEGAL ANALYSIS 257, 271-72 (2010) (noting that, when a legal text may be read as "ambiguous" in some senses but not in others, interpreters may be influenced by policy preferences when deciding whether to call it "ambiguous" or "clear").

20. See, e.g., 42 U.S.C. § 405(g) (2006) ("The findings of the Commissioner of Social Security as to any fact, if supported by substantial evidence, shall be conclusive" upon review in an action in federal court to set aside the Commissioner's decision); 8 U.S.C. § 1252(b)(4)(B) (providing that, when a court of appeals reviews an immigration decision,

determinative; they can tell judges to defer, but they cannot say exactly when deference must give way to the reviewing court's own judgment in a particular case. The gap must be filled by recourse to judicial judgment, and that judgment will be informed, either implicitly or explicitly,²¹ by the reviewing court's impression of the value of the differing vantage point of the first court.

Finally, rulemakers (whether acting as rule drafters²² or when voting to approve or reject proposed rules²³) must wrestle with these concerns as well. In some instances, they take explicit stances regarding the value of *viva voce* procedure. For example, Civil Rule 52(a)(6) admonishes appellate courts to defer to trial-court findings of fact and pay "due regard to the trial court's opportunity to judge the witnesses' credibility,"²⁴ which is, in effect, a codification of the assumption that in-person proceedings are likely to be more accurate than a review of the record. But it is not only such explicit statements that implicate the value of live procedure. Even *silence* regarding the method by which facts should be communicated to a court involves at least an implicit understanding that neither live nor paper procedure is so much more reliable that it should be mandated as a general means of proceeding.

In theory, rulemakers can require live hearings, forbid them, or leave the decision to the discretion of judges. Most often, the rules say nothing with respect to whether hearings are preferred to paper decisionmaking, which is effectively an election in favor of the third option. By saying nothing, a rulemaker signals one of two things: either the decision is not important enough to warrant a rule, or an *ex ante* rule is likely to be of lower quality than a contextualized exercise of judicial discretion. Either way, however, a committee making

"the administrative findings of fact are conclusive unless any reasonable adjudicator would be compelled to conclude to the contrary"); FED. R. CIV. P. 52(a)(6) (instructing "reviewing court[s] [to] . . . give due regard to the trial court's opportunity to judge the witnesses' credibility" and to affirm trial court findings unless they are "clearly erroneous"). *But cf.* FED. R. CIV. P. 72(b)(3) (requiring district judges to give fresh consideration to the pretrial fact-finding of a magistrate judge).

21. *Cf. Mitondo v. Mukasey*, 523 F.3d 784, 787-88 (7th Cir. 2008) (providing an unusually nuanced assessment of the differing perspectives and capabilities of an immigration judge and an appellate court with respect to determinations of an asylum applicant's credibility).

22. *See* Paul J. Stancil, *Close Enough for Government Work: The Committee Rulemaking Game*, 96 VA. L. REV. 69, 76-78 (2010) (describing the rulemaking process established by 28 U.S.C. § 2073 (2006), which delegates the drafting of rules to advisory committees made up of delegates from the federal bench of bar, and noting that in practice, the drafting of rules often involves a dialogue between these advisory committees and the Federal Judicial Conference's Standing Committee on Rules of Practice, Procedure, and Evidence).

23. *See id.* at 107-08 (noting that the proposed rules drafted by an advisory committee must pass through a number of veto gates, and that the Standing Committee, the Judicial Conference, the Supreme Court, and Congress all have the ability to stop a rule from going into effect).

24. FED. R. CIV. P. 52(a)(6).

rules that govern the litigation environment must constantly take some sort of stand as to either the value of presence specifically, or the superiority of judges in determining the best decisionmaking environment for each particular case context.

Because so many actors, at so many levels of the legal system, must regularly decide how useful live procedures are, even a small upgrade to their ability to accurately weigh the relevant costs and benefits can have large consequences when aggregated across the litigation system. Unfortunately, however, such decisions are often made unreflectively, from the gut and (in part because of the relative silence of rulemakers) without much guidance from authoritative sources. As a result, we have little reason to be confident that the average legal actor's concept of live procedure's advantages and disadvantages is well tuned. Indeed, as we shall see, close attention to this question shows that judges and rulemakers regularly rely on intuitions that are at best dubious, and at worst factually false, when thinking about these questions.

III. OBJECTIVE FAIRNESS: THE ACCURACY VALUE

Few values are as fundamental to our system of adjudication as accuracy—the interest in reaching outcomes that correctly describe past events.²⁵ For this reason, when a judge or rulemaker must decide whether to hear live evidence on a particular topic, the focus is often on whether doing so is likely to produce a more accurate decision. Unfortunately, some of the intuitions on which the legal system relies regarding the relationship between live testimony and accuracy are not sound. Although it is often presumed that a live hearing or trial generally makes a decision more accurate, the reality is that judges will often render less accurate decisions after watching live testimony than they would if they had relied on a paper record instead.

A. *Judicial Intuitions Concerning the Value of Demeanor Evidence*

One of the most frequently expressed intuitions regarding the utility of *viva voce* procedures is that they aid fact-finders in determining whether witnesses are testifying credibly. This assumption has a long history in the law. At one time, the superiority of visual examination seemed so obvious that many courts refused to seat blind people as jurors: “[S]urely,” reflected one court, “no one who cannot see

25. See, e.g., *Mathews v. Eldridge*, 424 U.S. 319, 335 (1976) (noting that preventing “the risk of an erroneous deprivation” of a legal interest is a key component of the constitutional right to due process); Lawrence B. Solum, *Procedural Justice*, 78 S. CAL. L. REV. 181, 183 (2004) (noting that procedural justice is “concerned with the benefits of accuracy”); cf. ALVIN I. GOLDMAN, *KNOWLEDGE IN A SOCIAL WORLD* 59-68 (1999) (defending the notion that a statement is true if it successfully describes events in the world).

the expression of faces, nor observe deportment and demeanor, can justly weigh testimony.”²⁶ Dean Wigmore, in his treatise on judicial proof, endorsed a similar principle: “[N]o intentional derogation from the truth can take place without a tendency to muscular contractions or expansions,— phenomena of inhibition or excitation.”²⁷

This belief has gained wide purchase in American law.²⁸ One author, discussing the Sixth Amendment’s Confrontation Clause, noted that “[t]here is . . . a secondary advantage to be obtained by the personal appearance of the witness: the judge and the jury are enabled to obtain the elusive and incommunicable evidence of a witness’ deportment while testifying”²⁹ Such views persist today: The Supreme Court has suggested that a witness, when facing a live defendant, may be “confound[ed]” and reveal his deceptive intent through visual cues, such as “studiously” avoiding the defendant’s gaze.³⁰ Guided by such considerations, the Second Circuit has suggested that the right of confrontation is impaired when jurors cannot see a witness’s eyes, but that such defects can be mitigated if they can at least observe a witness’s “body language.”³¹

This idea is also firmly ensconced in the relationship between an initial fact-finder and a subsequent reviewing court. In the direct appeal process, reviewing courts are advised to “give due regard to the trial court’s opportunity to judge the witnesses’ credibility.”³² Likewise, when reviewing the work of administrative fact-finders, courts often give special weight to the initial findings of a hearing officer, even if his conclusions were dismissed by his administrative superiors following an administrative appeal. The reasoning follows a familiar refrain: The Supreme Court noted that hearing officers, but not their superiors, had the “opportunity to observe the witnesses” at a hearing.³³ For this reason, when an agency disagrees with one of its hearing officers, its findings may be subject to extra scrutiny depending in part on the “importance of credibility in the particular case.”³⁴

Similarly, courts have focused on a witness’s appearance as a guide to accuracy as well as sincerity. Many courts refuse to allow

26. *Rhodes v. State*, 27 N.E. 866, 868 (Ind. 1891).

27. JOHN HENRY WIGMORE, *THE PRINCIPLES OF JUDICIAL PROOF* 493 (2d ed. 1931) (quoting G.L. DUPRAT, *LE MESONGE: ETUDE DE PSYCHOLOGIE* (2d ed. 1909)) (emphasis omitted).

28. *But cf.* *Mitondo v. Mukasey*, 523 F.3d 784, 788 (7th Cir. 2008) (providing what may be the only significant counterexample to the judicial trend approving of the probative value of demeanor evidence as a credibility signal).

29. 5 WIGMORE, *EVIDENCE* § 1395 (Chadbourn rev. 1974) (emphasis omitted).

30. *See Coy v. Iowa*, 487 U.S. 1012, 1019-20 (1988).

31. *Morales v. Artuz*, 281 F.3d 55, 60-62 (2d Cir. 2002) (concluding that a witness could testify while wearing dark sunglasses without violating the Confrontation Clause, so long as the jury could observe other aspects of her demeanor).

32. FED. R. CIV. P. 52(a)(6).

33. *Universal Camera Corp. v. NLRB*, 340 U.S. 474, 492-97 (1951).

34. *Id.* at 496.

experts to testify regarding the baseline reliability of eyewitness testimony,³⁵ and demeanor evidence provides a central part of the justification for excluding such evidence. For instance, in rejecting expert testimony that eyewitness confidence was rarely predictive of eyewitness accuracy, the Second Circuit opined that “assessing witness credibility” was a fundamental part of a jury’s role, that a jury could rely upon “a witness’s demeanor on the stand, including his or her confidence” in order to assess the reliability of an identification, and that the proffered expert testimony would intrude on this special role of the jury.³⁶

This view is articulated most directly when judges consider whether it is appropriate to hold a trial “on the papers” by the consent of the parties. In his article advocating an expanded use of this device, Magistrate Judge Denlow issued a word of caution: “In an instance when a credibility determination is at the heart of the case, a waiver of the right to bring in live witnesses does not make sense” because “a judge . . . can best decide credibility by seeing the witness.”³⁷ This view has been echoed by other judges: In a case where the parties “place great weight on the credibility of their own doctors in contrast to the alleged bias of the other party’s physicians,” one district court judge decided to hold a hearing despite the fact that both parties preferred a paper trial, stating that “[i]t simply is not possible for the Court to make the credibility determinations the parties argue are necessary by reviewing only the paper record.”³⁸

B. *The Reality: Demeanor Evidence Undercuts the Accuracy of Credibility Judgments*

Unfortunately, the widespread assumption that fact-finders can improve their credibility assessments by attending to demeanor is false. In fact, demeanor evidence is a poor tool for detecting either deliberate deception or mistaken recollection. A substantial body of social science evidence indicates that visually observing witnesses at best contributes nothing to a credibility determination and at worst increases the likelihood that a fact-finder will get it wrong.³⁹

35. See Richard A. Wise et al., *How to Analyze the Accuracy of Eyewitness Testimony in a Criminal Case*, 42 CONN. L. REV. 435, 452-54 (2009); 31A AM. JUR. 2D *Expert and Opinion Evidence* § 337 n.4 (2010) (collecting state cases excluding such evidence).

36. *United States v. Lumpkin*, 192 F.3d 280, 289 (2d Cir. 1999); see also *Arnstein v. Porter*, 154 F.2d 464, 471-72 (2d Cir. 1946).

37. Morton Denlow, *Trial on the Papers: An Alternative to Cross-Motions for Summary Judgment*, FED. LAW., August 1999, at 30, 32.

38. *Gingras v. Prudential Ins. Co. of Am.*, No. 06 C 2195, 2007 WL 1052500, at *7 (N.D. Ill. Apr. 4, 2007).

39. See generally Charles F. Bond, Jr. & Bella M. DePaulo, *Accuracy of Deception Judgments*, 10 PERSONALITY & SOC. PSYCHOL. REV. 214 (2006) (collecting and analyzing over 200 deception studies).

Studies consistently show that the average person's success rate in detecting a lie while watching the liar is little better than chance. Nor is this situation greatly changed by expertise. Most law enforcement officials, mental health professionals, and (most pertinent to the current investigation) judges can detect a lie based on visual cues at levels only slightly exceeding chance.⁴⁰

At first blush, this information may seem counterintuitive to many. It may seem natural to assume that we are good at detecting lies. Indeed, we depend upon this skill to a great extent in our everyday lives, in that we assume we would be able to tell if we were being deceived. The problem, however, is that liars can easily introspect on the cues that they would look for to determine sincerity, and fake them. Most people tell lies at least once each day,⁴¹ thereby getting the opportunity to practice the skills of duplicity in numerous, relatively low-risk acts of social deception. As a result, the average person is a better feigner of sincerity than detector of sincerity. One pair

40. *Id.* at 229-30 (concluding, in a meta-analysis of over 200 deception studies, that both experts and non-experts have an accuracy rate below fifty-five percent, with no significant gain being realized by expertise); Paul Ekman & Maureen O'Sullivan, *Who Can Catch a Liar?*, 46 AM. PSYCHOLOGIST 913, 916 (1991) (examining a number of occupations, including judges, polygraphists, robbery investigators, Secret Service agents, and psychiatrists, and finding an accuracy rate of approximately fifty-five percent for all groups except the Secret Service, who had a slightly higher accuracy rate of sixty-four percent). Ekman and O'Sullivan later conducted a study that purported to show that experts could achieve heightened levels of accuracy; this study selected groups of experts (including psychologists, judges, and law enforcement investigators), some of whom had "special interest or expertise" in detecting deception and who had attended special workshops on detecting deception. See Paul Ekman, Maureen O'Sullivan, & Mark G. Frank, *A Few Can Catch a Liar*, 10 PSYCHOL. SCI. 263, 263-64 (1999). This study found accuracy rates as high as seventy-three percent (among federal officers with special deception-detection experience who had attended a day-long workshop on the topic), and other deception-interested groups who had attended such workshops also showed detection rates above sixty percent (local sheriffs, federal judges, and clinical psychologists). *Id.* at 265. Subsequent investigators have cautioned, however, that the "results of these training studies are mixed," with some studies showing a training improvement, others showing no effects, and still others showing that training actually *impairs* lie detection. Aldert Vrij, *Criteria-Based Content Analysis: A Qualitative Review of the First 37 Studies*, 11 PSYCHOL. PUB. POL'Y & L. 3, 22-23 (2005); see also Maureen O'Sullivan et al., *Police Lie Detection Accuracy: The Effect of Lie Scenario*, 33 LAW & HUM. BEHAV. 530, 534 (2009) (reanalyzing twenty-three studies involving law enforcement officers' attempts to detect deception and finding that officers outperformed novice lie-detectors, showing sixty-four percent accuracy as compared with fifty-five percent among the novices, when the truth/lie sample involved "high stakes" for the deceiver in a manner similar to what an officer would encounter in a real-world interview scenario); Saul M. Kassin & Gisli H. Gudjonsson, *The Psychology of Confessions: A Review of the Literature and Issues*, 5 PSYCHOL. SCI. IN THE PUB. INT. 33, 38 (2004) (describing studies in which training lowered the quality of deception judgments while raising the confidence of the trained subjects that their judgments were correct). The overall picture appears to be consistent with the Bond, Jr. & DePaulo meta-analysis: Neither lie-detection training nor professional experience with lie-detection are reliably associated with accuracy improvements. See Bond, Jr. & DePaulo, *supra* note 39.

41. See Mark G. Frank, *Thoughts, Feelings, and Deception*, in DECEPTION: FROM ANCIENT EMPIRES TO INTERNET DATING 55, 56 (Brook Harrington ed., 2009) (noting that "when people keep diaries of their lies, they report telling one to two falsified accounts each day").

of researchers, summarizing their meta-analysis of existing studies, framed the problem as follows:

[While] lay people believe that certain nonverbal behaviors are strongly associated with deception . . . these beliefs are actually diametrically opposed to those observed to be indicators of deception in experimental studies. For example, although people generally believe that deception is accompanied by an increase in hand movements as well as in foot and leg movements and nodding, these behaviors actually decrease when people are lying. . . . [Although] people assume that blinks, illustrators, and postural shifts increase when people are lying, . . . there seems to be no association with these behaviors in this meta-analysis. Only for some behaviors do beliefs match the direction of the associations observed—perhaps a decrease in (genuine) smiles. Nonetheless, even with these behaviors, the magnitude of the association is assumed to be much stronger than it actually is⁴²

In short, most of us do not know what to look for to visually detect deception, and we have not yet developed reliable training methods that overcome this limitation.

The story is equally grim when we consider testimony that is not outright deceptive, but rather mistaken. “Numerous studies have [shown] . . . that subject jurors are unable to do better than chance in distinguishing between accurate and inaccurate eyewitness identifications, and that the jurors accord inappropriate weight to witness confidence.”⁴³ Simply stated, the problem is that people tend to over-rely on witness confidence as a proxy for witness accuracy. Unfortunately, confidence appears to be poorly correlated with accuracy in

42. Siegfried L. Sporer & Barbara Schwandt, *Moderators of Nonverbal Indicators of Deception: A Meta-Analytic Synthesis*, 13 PSYCHOL. PUB. POLY & L. 1, 26 (2007); see also Jeremy A. Blumenthal, *A Wipe of the Hands, a Lick of the Lips: The Validity of Demeanor Evidence in Assessing Witness Credibility*, 72 NEB. L. REV. 1157, 1165-66 (1993) (discussing physical signals that have been thought indicative of lying); Richard L. Marcus, *Completing Equity's Conquest? Reflections on the Future of Trial Under the Federal Rules of Civil Procedure*, 50 U. PITT. L. REV. 725, 758 (1989) (noting that judges and juries may misinterpret the nervousness of truth-telling witnesses as a symptom of deception “because of demeanor evidence that is misunderstood”).

43. Olin Guy Wellborn III, *Demeanor*, 76 CORNELL L. REV. 1075, 1089 (1991) (also listing studies); see VALERIE P. HANS & NEIL VIDMAR, *JUDGING THE JURY* 128 (1986). Nor does the situation improve when real attorneys are recruited to subject the mistaken witnesses to cross-examination. In one study, 178 participants viewed mock trials in which accurate and inaccurate witnesses were subjected to the full panoply of examination, cross-examination, and redirect examination, without time limit. R.C.L. Lindsay, Gary L. Wells, & Fergus O'Connor, *Mock-Juror Belief of Accurate and Inaccurate Eyewitnesses: A Replication and Extension*, 13 LAW & HUM. BEHAV. 333, 333, 335 (1989). The results were unsettling: Mock jurors who heard eyewitness testimony voted seventy-two percent of the time to convict the identified person of a “crime,” and even where eyewitnesses were discredited, sixty-eight percent of mock jurors voted to support conviction of the mis-identified person. See HANS & VIDMAR, *supra* note 43, at 128.

testimony, so this reliance leads us astray.⁴⁴ It seems reasonable to worry that fact-finders would make a similar error when assessing other examples of inaccurate, but confident, witness testimony.

C. Addressing the Demeanor-Evidence Problem

Scholars who have confronted this disparity between judicial assumptions and cognitive reality have mainly fallen into two camps. Some have attempted to find ways to minimize the degree of error induced by reliance on demeanor from the hearing process. Jeremy Blumenthal, for example, urges that the problem could be partially overcome by hiding witnesses behind screens, or else by instructing juries to base credibility judgments on what a witness says and the way in which they say it, but not on how they appear while speaking.⁴⁵ But this advice has limited utility for two reasons: First, Blumenthal relies significantly on the assumption that tone of voice is a “leaky” channel, which will betray deceptive intent despite the attempts of liars to conceal their emotional state.⁴⁶ But a meta-analysis of deception-detection studies indicates that judges who rely on audio recordings in trying to detect lies do not significantly out-perform those who rely only on transcripts.⁴⁷ There is little reason to think, therefore, that the vocal presence of witnesses will make a trial-behind-a-screen more accurate than a trial-on-the-papers. Second, by focusing almost entirely on the *jury* trial environment, Blumenthal looks at a context that is both limiting (because the Seventh Amendment and tradition constrain decisionmakers from dispensing with presence) and rare (because very few cases are disposed of by jury trial in the modern system).⁴⁸ So he does not ask the question explored here: Do the limits of demeanor evidence undercut the accuracy rationale for taking live testimony altogether?

Some scholars have addressed this question, although they have focused primarily on the trial environment, rather than the wider variety of situations in which a hearing might be employed to help a court reach a decision. Max Minzner responds to the demeanor deficit by noting that “[w]hile liars do not give off demeanor cues, they do tell stories that are less logical, less consistent, and contain fewer

44. See Robert K. Bothwell, *Social Cognition in the Courtroom: Juror Information Processing and Story Construction*, in A HANDBOOK OF JURY RESEARCH 17-1, 17-20 (Walter F. Abbott & John Batt eds., 1999); Kenneth R. Weingardt, R. Jacob Leonesio & Elizabeth F. Loftus, *Viewing Eyewitness Research from a Metacognitive Perspective*, in METACOGNITION: KNOWING ABOUT KNOWING 157, 164 (Janet Metcalfe & Arthur P. Shimamura eds., 1994) (reporting that “much research on eyewitness identification has consistently found very weak correlations” between witness accuracy and witness confidence).

45. See Blumenthal, *supra* note 42, at 1201-02.

46. *Id.* at 1189-91.

47. See Bond, Jr. & DePaulo, *supra* note 39, at 225.

48. See Galanter, *supra* note 2, at 482-84; Hadfield, *supra* note 2, at 730.

details than those of truth-tellers.”⁴⁹ This claim finds some support in the experimental literature.⁵⁰ Indeed, the field of Statement Validity Analysis has responded to the experimental evidence by shifting an investigator’s focus from demeanor cues to content-based cues, with judges relying on transcripts produced by an initial interview, and has produced higher (although far from stellar) rates of accurate lie detection.⁵¹ Minzner therefore concludes that juries may be fairly accurate when they rely on contextual cues or well-calibrated prior probabilities that a witness is lying, even if they will sometimes generate unreliable decisions by relying on demeanor.⁵² But although this reasoning undercuts the fear that the legal system will never be able to distinguish truths from lies due to the unreliability of demeanor evidence, it does not give a reason to prefer in-person to absent procedures.

Olin Wellborn is the only scholar who has directly argued that in-person procedures are superior to absent ones *despite* the problem of demeanor evidence. In his view, the fact that “live testimony does not enhance credibility judgments does not imply that a trial with live testimony is not the best kind of trial.”⁵³ He suggests several alternative values to live trials. For example, such proceedings may “deter dishonest witnesses . . . who would lie in a deposition [but who] may balk at lying in public, in a courtroom, in the physical presence of the opponent, the judge, and the jury.”⁵⁴ He also notes that live testimony may be necessary for the *perception* of accurate adjudication even if it does not further *actual* accuracy—a point we shall return to later.⁵⁵

Wellborn’s first point—that hearings may enhance accuracy even if they do not aid credibility determinations—deserves further development. His argument for witness deterrence is somewhat speculative because we have little data on the degree to which witnesses who are willing to lie on an affidavit or while being deposed would refuse to repeat the performance in front of a judge. Some witnesses may be so

49. Max Minzner, *Detecting Lies Using Demeanor, Bias, and Context*, 29 CARDOZO L. REV. 2557, 2569 (2008).

50. See, e.g., Bella M. DePaulo et al., *Cues to Deception*, 129 PSYCHOL. BULL. 74, 102 (2003) (finding that “liars were generally less forthcoming than truth tellers, . . . [that] their tales were less compelling” to listeners, and that they “provided fewer details than did truth tellers”).

51. See Vrij, *supra* note 40, at 23 (finding, in a meta-analysis of relevant studies, an average accuracy rate of seventy-three percent for detecting truths and seventy-two percent for detecting lies); cf. Bond, Jr. & DePaulo, *supra* note 39, at 229 (both experts and non-experts have below a fifty-five percent accuracy rate in discriminating between truths and lies when viewing a video sample that includes demeanor cues).

52. See Minzner, *supra* note 49, at 2578.

53. Wellborn, *supra* note 43, at 1092. He argues that recognition of the demeanor problem should lead instead to a modest reduction in the deference that appellate courts apply when they review trial-court fact-finding, as well as to a liberalized use of deposition evidence at trial, among other recommendations. *Id.* at 1094-99.

54. *Id.* at 1092.

55. *Id.*

confident in the deposition environment that they feel little pressure while lying; others may find it terrifying merely to face down an adversary lawyer in a conference room after having been warned that any deception is subject to the “penalty of perjury.”⁵⁶ Moreover, this argument has little purchase in the many cases where deception is less of an obstacle to fact finding than unintentional gaps or errors in witness memory. Indeed, we might question whether a witness with a faulty memory is likely to be *more* persuasive in a hearing setting than in a deposition, due to increased preparation and rehearsal of testimony before the more formal proceeding.⁵⁷ So if we do make gains in deterring deception in a live hearing or trial environment, we may suffer correlative losses in our ability to catch mistaken recollections.

But leaving deterrence of deception aside, there are other ways that live testimony may contribute to accuracy. Deception is most likely to be detected by reference to the content of a witness’s claims, and by comparison of that content to other evidence.⁵⁸ Several features of live examination can further this process. First, a relatively unprepared witness can be encouraged during cross-examination to commit himself to one version of a fabricated account, only to be subsequently confronted by contradictory information. Such tactics, when employed in investigative situations, have sometimes been able to produce a high rate of deception detection by inducing and probing inconsistencies in fabricated accounts.⁵⁹ There is an important caveat to this account, however: This “evidence confrontation” strategy relies on the witness being surprised by the direction taken in the ex-

56. Cf. FED. R. CIV. P. 30(c)(1) (requiring that deponents swear an oath or affirmation before giving testimony); 2 MICHAEL H. GRAHAM, HANDBOOK OF FED. EVID. § 603:1 n.1 (6th ed. 2006) (noting that “a typical oath is ‘Do you swear to tell the truth, the whole truth and nothing but the truth, so help you God?’ ” and that “[a] typical affirmation is ‘Do you affirm to tell the truth under penalty of perjury?’ ”).

57. See Weingardt et al., *supra* note 44, at 183 (noting that witnesses who are exposed to false information after an event “consistently demonstrate overconfidence” when recalling their perceptions). In the study reported, many witnesses exposed to contradictory information following an observed event expressed *certainty* regarding their recollections, even though their actual rates of accurate recollection were below chance. *Id.* at 177; *cf. id.* at 178 (noting that witnesses who were not exposed to inaccurate information had high rates of calibration between confidence and accuracy, with “certain” witnesses being correct approximately ninety percent of the time). As a result, those witnesses who have developed false recollections as a result of contamination by other sources or attorney suggestion during testimony preparation may exploit the “confidence equals accuracy” decisionmaking heuristic, and thereby seem more credible than they should. As confidence is likely to be a more salient characteristic in a live hearing, and as confidence is likely to increase as testimony is rehearsed before such a hearing, this concern becomes especially significant in that setting.

58. Compare Vrij, *supra* note 40, at 24, with Bond, Jr. & DePaulo, *supra* note 39, at 229.

59. See Minzner, *supra* note 49, at 2569. Marcus points out that there may be a counter-effect that mitigates the advantages of such a strategy: Pointing to a study examining the effects of hostile questioning on a fact-finder’s evaluation of witness trustworthiness, he noted the author’s view that witnesses subjected to confrontational questioning might “tr[y] harder to be believable,” and succeed. Marcus, *supra* note 42, at 759.

amination. If a witness is well-prepared for the encounter and can anticipate the questions that the investigator is likely to ask, it is doubtful that the confrontation strategy will be as useful.⁶⁰

We should therefore be wary of presuming that cross-examination adds significant value for deception detection when a witness has had an opportunity to prepare for the encounter and knows the questions that are likely to be asked.⁶¹ This means that the advantages of hearings for detecting deception will vary by situation; questions asked of an unprepared witness before the two sides have exchanged significant discovery may be very revealing. On the other hand, if a witness has previously been deposed and has been prepared for the encounter by an attorney who can easily anticipate the directions that questioning is likely to take, the encounter may reveal little.⁶² Indeed, the earlier deposition transcript may be more revealing than the subsequent examination; the witness may have since crafted explanations of earlier inconsistencies that make deceptive content harder, rather than easier, to detect.

Even when live testimony is unlikely to aid in the detection of deception or error, however, it may increase the accuracy of decisions if it can make the existing evidence *clearer*.⁶³ As Marcus has noted, “there is a difference between reading a treatise and being instructed by a live expert,”⁶⁴ and as cases grow more complex that difference may overwhelm other accuracy considerations. Available depositions or affidavits may dodge important questions, or presume an understanding of contextual information that a judge does not in fact possess. At a hearing, a judge can interpose her own questions, pinning down a witness on an important point or requiring a lawyer to explain a complex transaction.⁶⁵ Likewise, the additional preparation that may occur before a hearing may allow parties to find ways to

60. See Minzer, *supra* note 49, at 2569 (noting that this effect relies upon an “informational advantage” on the part of the interrogator); Chris William Sanchirico, “What Makes the Engine Go?: Cognitive Limitations and Cross-Examination,” 14 WIDENER L. REV. 507, 516 (2009) (noting that “[c]onstructing testimony on the fly is considerably more difficult” than preparing for questions in advance, and that unanticipated questions are the hardest for insincere witnesses to answer without giving away the deception); Marcus, *supra* note 42, at 759; see also DePaulo et al., *supra* note 50, at 103 (noting that planned presentations of deceptive testimony are generally harder to detect).

61. See Sanchirico, *supra* note 60, at 521 (urging that it is “crucial” that cross-examination questions be unanticipated if we desire to place insincere witnesses in a situation where they are likely to slip up).

62. See *id.*; ROBERT P. BURNS, A THEORY OF THE TRIAL 65 & n.83 (1999) (noting that a witness’s ability to resist the impulse to be led by a cross-examining attorney into what appear to be self-serving contradictory statements is a central means by which the witness can appear credible, and that witness preparation is a key means of ensuring that this consistency is produced).

63. See Marcus, *supra* note 42, at 763.

64. *Id.*

65. See FED. R. EVID. 614 (permitting a court to conduct its own examination of witnesses *sua sponte*, whether those witnesses were called by a party or by the court itself).

communicate complex information in more digestible ways.⁶⁶ Of course, paper has clarity benefits as well: It may be easier to remember technical information when it is read than when it is heard,⁶⁷ in part because a reader can interact with written information in ways that facilitate recall.⁶⁸ But such advantages are mitigated in the present analysis, which focuses on *judicial* decisionmaking, given that judges can order transcripts of hearings and even request supplemental briefing when necessary, allowing them to have the best of both worlds. So, at least for judges, live hearings and trials have accuracy benefits that are unrelated to deception or witness error: They allow the clarification of a confusing record through interaction between judges, witnesses, and advocates, and they allow advocates to present complicated information in ways that may be more intuitive and understandable for generalist judges.⁶⁹

D. *The Biasing Effects of Witness Appearance*

Finally, however, there is one more cost we must weigh in the accuracy balance: In addition to distorting fact-finding through the introduction of unreliable demeanor evidence, hearings may impede accurate fact-finding by introducing biases for or against particular witnesses. Two forms of bias are particularly worrisome in this context. The first is the innate human tendency to associate one type of positive trait with other positive traits that a person might possess, and to do likewise with negative traits. The second is the human impulse to view members of our social in-groups favorably while seeing members of out-groups in a darker light. Both of these forms of bias may distort fact-finding by making a fact-finder trust or distrust witnesses for irrelevant reasons, and both may be exacerbated by meeting the witness in a live hearing environment.

66. See FEDERAL PRACTICE MANUAL FOR LEGAL AID ATTORNEYS 148 (Jeffrey S. Gutman, ed., 2004) (suggesting that oral arguments may be particularly useful when a case “hinges on complicated concepts”).

67. See Marcus, *supra* note 42, at 764.

68. Oldfather explains the clarity virtues of text by focusing on the process he calls “backlooping”:

For an appellate judge viewing a transcript, the words on the page do not appear for only an instant, but instead remain to be reread and reconsidered. This ability to “backloop” allows the reader to devote less effort to keeping information in memory and thus to allocate more cognitive resources to understanding the material. The limitations of oral memory no longer constrain the intellectual operations that may be performed with the information conveyed.

Chad M. Oldfather, *Appellate Courts, Historical Facts, and the Civil-Criminal Distinction*, 57 VAND. L. REV. 437, 455 (2004).

69. See STEVEN LUBET, MODERN TRIAL ADVOCACY 279-80 (3d ed. 2010) (describing the ways that advocates can employ devices such as models, maps, diagrams, graphs, and charts to clarify spatial relationships, complicated timelines, or financial information).

The first form of bias—often referred to as the “halo effect[]”—invokes our “tendency to assume that like goes with like” so that “[s]alient information (such as height or attractiveness) activates positive or negative associations that color how people process everything else they learn about an individual.”⁷⁰ Early impressions of a person can induce us to like or dislike an individual, and those mental attitudes tend to impact our subsequent evaluations of that person. In one early study, a researcher provided study participants with a list of characteristics possessed by a hypothetical individual.⁷¹ Each participant read a list containing the same overall mix of traits, but some lists described the favorable characteristics before the negative ones, while other lists fronted the bad news.⁷² Simply varying the order in which people read these traits generated a “considerable difference” in the participants’ descriptions of the hypothetical person: starting with positive traits resulted in an impression of a “predominantly . . . able person who possesses certain shortcomings which do not, however, overshadow his merits,” while reversing the order led to the person being perceived “as a ‘problem,’ whose abilities are hampered by his serious difficulties.”⁷³ So the mere fact that certain information is learned before other information can radically affect the final picture we will arrive at even when the differently ordered information is identical.

One way to account for this tendency is as an example of confirmation bias, our tendency to “seek information that . . . support[s] [our] . . . existing beliefs and to interpret information in ways that are partial to those . . . beliefs.”⁷⁴ Especially when looking at ambiguous evidence, we are likely to draw inferences in favor of the view we currently think is most likely. This “primacy effect” leads us to “form an opinion early in the process and then evaluate subsequently acquired information in a way that is partial to that opinion.”⁷⁵ To the extent that our initial impressions rest on a shaky foundation—such as the mental tendency to relate positively valued surface characteristics, such as beauty or social status, with valuable underlying characteristics, like intelligence or honesty—we may skew our

70. Andrew J. Wistrich, Chris Guthrie & Jeffrey J. Rachlinski, *Can Judges Ignore Inadmissible Information? The Difficulty of Deliberately Disregarding*, 153 U. PA. L. REV. 1251, 1266-67 (2005).

71. *Id.* at 1266.

72. *Id.*

73. S. E. Asch, *Forming Impressions of Personality*, 41 J. ABNORMAL PSYCHOL. & SOC. PSYCHOL. 258, 270 (1948).

74. Raymond S. Nickerson, *Confirmation Bias: A Ubiquitous Phenomenon in Many Guises*, 2 REV. GEN. PSYCHOL. 175, 177 (1998); see also Shelly Chaiken & Durairaj Maheswaran, *Heuristic Processing Can Bias Systematic Processing: Effects of Source Credibility, Argument Ambiguity, and Task Importance on Attitude Judgment*, 66 J. PERSONALITY & SOC. PSYCHOL. 460, 469 (1994) (see discussion *infra* note 76).

75. Nickerson, *supra* note 74, at 187.

resulting judgments of witness credibility or party culpability based on irrelevancies.⁷⁶

A number of characteristics revealed during *viva voce* hearings and trials might activate the primacy effect in a way that would cast doubt on the accuracy of fact-finding. Perhaps the most studied form of the halo effect is the physical appearance bias. In study after study, people who form impressions of others based on photos presume that physically attractive people possess other desirable qualities as well. We unconsciously link traits such as kindness, intelligence, and honesty with beauty.⁷⁷ This leads to a skew in fact-finding, documented in many contexts. For instance, “[u]nattractive litigants receive higher sentences and lower damage awards in simulated legal proceedings, while attractive litigants have an advantage.”⁷⁸

Physical attractiveness is unlikely to be the only source of bias introduced by hearings, however. Other socially valued attributes may create a similar halo effect and induce a fact-finder to credit one

76. Another way to characterize the conflict between initial impressions and fair evaluations of witness credibility may be drawn from persuasion theory. In one model of social-informational processing, known as the “Heuristic-Systematic Model,” people have two overlapping cognitive systems that can be employed in order to evaluate the credibility of a message. “Systematic processing” involves a “comprehensive analytic” attempt to “evaluate the validity of the advocated position by scrutinizing the persuasive information and relating this information to their previous knowledge of the persuasion issue.” Alexander Todorov, Shelly Chaiken & Marlone D. Henderson, *The Heuristic-Systematic Model of Social Information Processing*, in *THE PERSUASION HANDBOOK: DEVELOPMENTS IN THEORY AND PRACTICE* 195, 197 (James Price Dillard & Michael Pfau eds., 2002). When people engage in “[h]euristic processing,” by contrast, they take a less analytic approach, focusing on easily accessible information that “enables them to use simple decision rules or heuristics” to decide whether to trust a message. *Id.* Either cognitive system may be invoked in a particular situation, depending on the context in which a person hears a message. Two such contextual factors are most relevant here: To the degree that a message is ambiguous (that is, it neither clearly supports nor clearly contradicts a conclusion) and to the degree that a source is initially perceived as credible, a person evaluating that message becomes more likely to rely on heuristic processing. *See* Chaiken & Maheswaran, *supra* note 74, at 469. As a result, the initial credibility judgment is more likely to control the final view of message validity (due to a “trustworthy source = trustworthy message” heuristic), in part due to a partial substitution of heuristic reasoning for a systematic evaluation of message content, and in part due to a biasing effect of the initial heuristic judgment on the systematic reasoning process itself. *Id.* Applied to the context of hearing-based decisionmaking, this suggests that a decisionmaker who receives a favorable initial impression of a witness’s credibility due to surface features may subsequently give lowered scrutiny to the coherence of the witness’s message and may be biased towards a pro-credibility finding to the extent that the content is actually analyzed.

77. SAUL M. KASSIN & LAWRENCE S. WRIGHTSMAN, *THE AMERICAN JURY ON TRIAL: PSYCHOLOGICAL PERSPECTIVES* 100 (1988); Marc-André Reinhard & Siegfried L. Sporer, *Content Versus Source Cue Information as a Basis for Credibility Judgments: The Impact of Task Involvement* 41 *SOC. PSYCHOL.* 93, 95-97 (2010) (demonstrating experimentally that test subjects find more attractive speakers to be more credible).

78. Deborah L. Rhode, *The Injustice of Appearance*, 61 *STAN. L. REV.* 1033, 1038 (2009). *Cf.* Marc W. Patry, *Attractive but Guilty: Deliberation and the Physical Attractiveness Bias*, 102 *PSYCHOL. REP.* 727, 728 (2008) (noting the general effect, but adding the caveat that defendants who “used their attractiveness in the execution of a crime” may be punished more harshly than otherwise-similar, less-attractive defendants).

witness more than another. Indicators of high social status, including a witness's race, gender, clothing, level of grooming, occupation, and style of speech, all increase the likelihood that a fact-finder will view a witness as credible.⁷⁹ Although it may be hard to totally conceal social status from a fact-finder—we can expect a judge to learn such information from the sound of a witness's voice or even from the information that can be gleaned from a written record⁸⁰—we still may be concerned that the primacy effect will amplify the power of such information in particular settings. Social status may be gleaned from a written record, but it is unlikely to be the first thing a judge will encounter. In a hearing, such information may be conveyed long before a witness takes the stand. So, while realizing that we can never avoid halo effects entirely, we should nevertheless number them as among the factors that could make hearing-based fact-finding less accurate than a paper-based process.

The other form of bias that might concern us is the tendency to favor in-groups over out-groups. “In intergroup contexts people generally behave so as to gain or maintain an advantage for their own group over other groups in terms of resources, status, prestige, and so forth.”⁸¹ Over time, we develop schema for particular groups, which color our subsequent interactions with those groups. The ways such schema may influence fact-finding is as varied as a list of the factors that constitute our personal identities.

Factors such as race provide noteworthy examples of problematic in-group bias. In testing designed to probe unconscious associations between a defendant's race and his innocence, participants “held implicit associations between Black and Guilty,” and those associations “predicted judgments of ambiguous evidence as more indicative of guilt.”⁸² Note that although this effect might be explained to some extent by the halo effect—whiteness may be a marker of high status that induces positive associations for white and black people alike—the use of implicit association tests shows a more mixed picture, in which Caucasians generally associate whiteness with positive char-

79. J. Alexander Tanford & Sarah Tanford, *Better Trials Through Science: A Defense of Psychologist-Lawyer Collaboration*, 66 N.C. L. REV. 741, 750 (1988); HANS & VIDMAR, *supra* note 43, at 140 (noting that “we evaluate a person's credibility by his or her speech style” and that styles of speaking are often associated with the sex, social class, or ethnic background of the speaker); WILLIAM M. O'BARR, LINGUISTIC EVIDENCE: LANGUAGE, POWER, AND STRATEGY IN THE COURTROOM 74 (1982) (finding that mock jurors found the same testimony more convincing if it was delivered using a “powerful” mode of speaking than if a “powerless” mode was employed).

80. Andrew E. Taslitz, *Confessing in the Human Voice: A Defense of the Privilege Against Self-Incrimination*, 7 CARDOZO PUB. L., POLY & ETHICS J. 121, 174, 177, 183-84 (2008).

81. Michael A. Hogg, *Intergroup Relations*, in HANDBOOK OF SOCIAL PSYCHOLOGY 479, 480 (John Delamater ed., 2006).

82. Justin D. Levinson et al., *Guilty by Implicit Racial Bias: The Guilty/Not Guilty Implicit Association Test*, 3 OHIO ST. J. CRIM. L. 187, 189-90, 206 (2010).

acteristics (because the halo effect and the in-group effect reinforce each other), while black people have more mixed results, with some individuals associating blackness with badness and others reversing the association.⁸³

Similar effects might be expected for other traits. Female judges, for instance, are more likely than male judges to rule in favor of (predominantly female) sex discrimination litigants.⁸⁴ Likewise, we might worry that fact-finders will favor those who hold similar social or political views,⁸⁵ and that a fact-finder might draw inferences about a witness's beliefs based on how that witness dresses and behaves.

It is important to qualify the significance of these sources of bias. Judges may be able to suppress innate impulses towards stereotyping in decisionmaking to varying degrees, at least some of the time.⁸⁶ We should be wary of placing complete trust in judicial self-control, however. Judges are as human as the rest of us, and there is evidence suggesting that they will rely unconsciously on inadmissible information when it is a salient element of a case.⁸⁷ This is not to say every decision will be the product of a halo effect or in-group bias; oftentimes the evidence may be one-sided enough that these effects cannot exert a significant influence,⁸⁸ and in other cases, varying forms of bias may cancel each other out. But to the extent that avoiding a hearing lowers the salience of various markers of a party's or a witness's identity, such avoidance might also lower the risk that a judge's evaluation of evidence will be skewed by these forms of bias.

One type of situation might require a different analysis than that offered above. When a judge is already strongly biased *against* a disputant, it is possible that being visually confronted by that person might act as a counterweight, inducing empathy that could serve to mitigate that bias. As an example, imagine that a judge was faced with deciding whether a man who had repeatedly committed violent sexual crimes was so dangerous that he should be placed in preventive incarceration even after he has served the entirety of the sen-

83. See Jeffrey J. Rachlinski et al., *Does Unconscious Racial Bias Affect Trial Judges?*, 84 NOTRE DAME L. REV. 1195, 1199-1200 (2009); see also HANS & VIDMAR, *supra* note 43, at 137-38 (noting that in close cases, race can be a factor in decisionmaking, but that the direction of the effect may vary depending on whether the jury members are of the same or of a different race than the defendant).

84. See Elizabeth M. Schneider, *The Dangers of Summary Judgment: Gender and Federal Civil Litigation*, 59 RUTGERS L. REV. 705, 768-69 (2007). In-group bias is only one possible explanation for this data, of course. It is also possible that differing life experiences influence men and women to form different estimates of base rates of sexual discrimination and harassment.

85. See Dan M. Kahan, *Culture, Cognition, and Consent: Who Perceives What, and Why, in Acquaintance-Rape Cases*, 158 U. PA. L. REV. 729, 793, 800-01, 804-05 (2010).

86. Rachlinski et al., *supra* note 83, at 1202-04, 1221-26.

87. See Wistrich et al., *supra* note 70, at 1330-31.

88. See BURNS, *supra* note 4, at 9 (arguing that "it is the evidence in the case, more than any other factor, that determines the outcome" of most jury trials).

tences due to his prior crimes.⁸⁹ Perhaps, a judge might reason, viewing the potential detainee can only help. After all, the presence of this person in the flesh *might* mitigate the bias produced merely by knowing his record.⁹⁰

There is an important kernel of truth in this suggestion. In some cases, a judge may be able to move past initially unjust impressions of a defendant in part due to the emotional impact of seeing and hearing the other person in a live encounter.⁹¹ But this approach should be viewed with appropriate caution, at least in cases where the judge already has a strongly negative view of a party or witness. First, because of the initially negative impression, a judge might well end up evaluating ambiguous demeanor cues as more “confirmation” that the witness should not be trusted; as in the Asch experiment, first impressions may dominate over subsequent information.⁹² What is more, in seeking to move from one strong emotion (antipathy) to a place of neutrality, by harnessing a countervailing emotion (empathy), we create a real risk. Experiencing empathy towards someone we have previously disliked is often an unpleasant feeling, and the cognitive dissonance involved in holding two such opposing states in the mind is unpleasant, so that people experiencing such states “are motivated to reduce [the conflict].”⁹³ The urge to return to a non-conflicted mental state may produce some benefits—such as greater attention to conflicting evidence—but it may also encourage rash or impulsive decisions.⁹⁴ As a result, the ambivalent attitudes may “become polarized, resulting in exaggerated positive attitudes if exposed to positive information about the person, and exaggerated negative

89. See, e.g., *Kansas v. Hendricks*, 521 U.S. 346, 354 (1997) (considering due process issues in connection with the indefinite detention, under the Kansas Sexually Violent Predator Act, of a person who had engaged in a “chilling history of repeated child sexual molestation and abuse”).

90. See Kenworthy Bilz, *We Don't Want to Hear It: Psychology, Literature and the Narrative Model of Judging*, 2010 ILL. L. REV. 429, 465-66 (noting that “inducing empathy . . . predictably inspires an emotional response of sympathy and compassion” and can lead to a “softening of attitudes toward the wrongdoer”); *id.* at 467-68 (noting that feelings of empathy can help reduce “‘correspondence bias,’ in which we assume that others’ behaviors are a product of immutable personality traits rather than of their circumstances”).

91. See *id.* at 465-66; Laurie L. Levenson, *Courtroom Demeanor: The Theater of the Courtroom*, 92 MINN. L. REV. 573, 592-94 (2008) (describing high-profile cases in which the mild or contrite appearance of the defendants may have garnered the sympathy of jurors); BURNS, *supra* note 62, at 134-35 (noting that the “aural medium” has a socializing influence, making it harder for a jury to treat the case “simply as a stereotype of a certain kind of controversy”).

92. See Asch, *supra* note 73, at 270-72; Levenson, *supra* note 91, at 594-96 (relating how, in the trial of Timothy McVeigh, the jury interpreted his “bland[]” clothing and stoic demeanor as evidence that McVeigh was a “cold, heartless, and calculating killer” who felt no remorse).

93. See Bilz, *supra* note 90 at 464 & n.165 (collecting psychological sources on the motivating effects of cognitive dissonance).

94. See *id.* at 464-65.

attitudes when exposed to negative information”—a process that can also lead to extreme actions toward the subject of the ambivalence.⁹⁵ Many might regard this possible “solution” to the problem of initial bias to be worse than the problem it addresses. Given the conflicting possible results that can arise from the use of demeanor as a debiasing tool, one thing seems clear: The visual and aural presence of disputants and witnesses creates a significant risk of bias based on appearance, social status, and in-group affiliation, and the danger of these factors is not obviously outweighed by any bias-correcting function when a fact-finder has an initially negative impression of a particular party to the dispute.⁹⁶

As we have seen, the conventional judicial wisdom fails to provide a fruitful foundation for a theory of live procedures because it is premised on a faulty intuition. Neither people in general, nor judges in particular, are good at catching deception or inaccuracies of memory from demeanor cues, and in fact such cues are more likely to lead a fact-finder astray than to aid her. Some scholarly critiques have pointed out this concern, but they have failed to supplement it with a holistic consideration of the accuracy costs and benefits of live procedures as opposed to a decision on a written record.

Now that we have surveyed some of the concerns at stake in such a decision, we have seen the following things:

First, live testimony will rarely add value in detecting deception. When it does help, it will not usually be through useful demeanor cues. Rather, a witness’s deception may be unearthed through surprises at cross-examination that reveal inconsistencies in the witness’s story. Such surprises are most likely to occur when a witness has not been well-prepared for the cross-examination. Successful cross-examination is therefore most likely to occur when a party’s opportunity to woodshed a witness is limited by either lack of information or financial resources. Once the witness is well-prepared to testify, however, the primary effect of a hearing on a credibility determination will be to add misleading demeanor evidence into consideration, which will tend to lower the quality of credibility findings.

Second, live testimony may nevertheless increase the accuracy of decisionmaking by clarifying vague or ambiguous evidence. A judge may find deposition transcripts and affidavits opaque on the points

95. *Id.*

96. To be clear, I do not wish to suggest that activating empathy in general provides no value in the fair resolution of cases. Rather, I am urging only that empathy is unlikely to help correct an initially negative bias against a party in a way that returns a decisionmaker to a more neutral state of mind. Cf. Jody Lyneé Madeira, *Lashing Reason to the Mast: Understanding Judicial Constraints on Emotion in Personal Injury Litigation*, 40 U.C. DAVIS L. REV. 137, 142 (2006) (describing the personal injury trial as a forum in which “[p]ainful sights and sounds” provide “a forum for negotiation between narratives” as parties vie for the empathy of jurors).

where she needs clarity in order to reach a decision, and the opportunity to ask follow-up questions of a witness at a hearing may be a useful way to resolve these questions. Likewise, in very complex cases, a live hearing may provide a party with an opportunity to explain complex scientific or economic evidence to a greater extent than a paper briefing would allow.

Third, the presence of a witness in court may induce or worsen certain forms of decisional bias. Specifically, live procedures may emphasize cues as to the attractiveness, race, and social status of a witness that will encourage a fact-finder to affiliate with some witnesses and distrust others on the basis of factors that bear little relation to accuracy. Thus, to the degree that a judge has not already had the opportunity to form a personal impression of the parties or witnesses, a decision on a written record may be shielded from certain forms of bias.

So, in short, the benefits of live testimony are most likely to accrue when the witnesses are not prepared for cross-examination or when the evidentiary record is either vague or technically complex. Live procedures will have significant accuracy costs, however, when the dispute centers on the credibility of well-prepared witnesses or when a live hearing or trial will allow a judge to form first impressions of witnesses based on their appearances.

IV. SUBJECTIVE FAIRNESS: MAKING PAPER-FOCUSED LITIGATION PALATABLE

Although the accuracy concerns described above are central to any consideration of the utility of live hearings and trials, they do not tell the whole story. A theory that attends heavily to how accurate legal decisions are, but pays no attention to how acceptable those procedures are to the litigants and the public, ignores the fact that the law requires public acceptance and cooperation if it is to meaningfully guide the conduct of the citizens it governs.⁹⁷ A useful label for these concerns is “subjective fairness.” Unlike the accuracy concerns described above, which relate to the ability of judicial decisions to accurately describe historical events⁹⁸ and can therefore be said to involve a fairness that is separate from the preferences of either party, subjective fairness focuses on “whether disputants and neutral observers *believe* that procedures and outcomes are fair, rather than whether the procedures or outcomes were fair in some objective sense.”⁹⁹

97. See Charles Nesson, *The Evidence or the Event? On Judicial Proof and the Acceptability of Verdicts*, 98 HARV. L. REV. 1357, 1359 (1985).

98. Cf. GOLDMAN, *supra* note 25, at 59-68 (defending the notion that a statement is true if it successfully describes events in the world).

99. E. ALLAN LIND & TOM R. TYLER, *THE SOCIAL PSYCHOLOGY OF PROCEDURAL JUSTICE* 26 (1988).

As we shall see, the decision to resolve legal disputes without a live hearing may come at a cost from the standpoint of subjective fairness, even if (as discussed above) dispensing with hearings would make the resulting outcomes more accurate. Subjective fairness, in other words, does not always correspond with objective fairness. Nevertheless, in those cases where there are significant accuracy gains available from using a paper trial decision procedure, the subjective fairness costs of such a procedure often can be minimized to the point where they will be outweighed by the procedure's objective accuracy advantages.

At the outset, there is a potential objection to this line of inquiry that is worth addressing. One type of reader, when informed that procedures may involve a trade-off between objective accuracy and subjective experiences of fairness, may feel that there is no trade-off at all. After all, such a reader would say, the goal of legal procedures is to "get it right," and we should not sacrifice that goal in the pursuit of making litigants "feel" better.¹⁰⁰ Indeed, it might even seem to represent a form of disrespect to give litigants a "dumbed down" form of justice that feels satisfying, but is in fact less reliable. In this framing, procedures that have high ratings of subjective fairness but lower levels of objective accuracy are like junk food: a satisfying experience, but nonetheless bad for the people who enjoy it.

There are several reasons why this objection is less weighty than it might seem. One response is to fall back on democratic assumptions; if people, by and large, prefer certain types of legal procedures, perhaps that provides enough of a reason to make such procedures accessible.¹⁰¹ Under such a theory, taking the preferences of the public into account when designing litigation procedures can be justified on the grounds that to do otherwise would be paternalistic. Just as we allow people to eat candy bars even if they may suffer bad consequences from doing so, we should not presume to choose in their stead that they should prefer one type of litigation procedure over another.¹⁰² Unfortunately, this response can only take us so far. Although it might seem relevant when people have the choice between a number of different procedures for dispute resolution—as in, for example, the arbitration context—the legal system acts both as a "default rule" for situations where no private choices have been made

100. See, e.g., Robert G. Bone, *Making Effective Rules: The Need for Procedure Theory*, 61 OKLA. L. REV. 319, 338 (2008) (expressing skepticism that the demands of participatory rights can ever rise above the needs of adjudicative accuracy).

101. Tom R. Tyler, *Citizen Discontent with Legal Procedures: A Social Science Perspective on Civil Procedure Reform*, 45 AM. J. COMP. L. 871, 871-72 (1997); Austin Sarat, *Studying American Legal Culture: An Assessment of Survey Evidence*, 11 L. & SOC'Y REV. 427, 430 (1977).

102. See Tyler, *supra* note 101, at 871-72.

and as a backstop when those other options have broken down.¹⁰³ To continue the analogy, it is one thing to say that people should be free to buy candy bars if they want them, but another to make candy bars the only option provided to poor children who depend on school lunch programs. The first option respects private choice, while the second imposes what may be an unhealthy choice on a population of people who are ill-suited to judge between different options for themselves and who may be unable to select another option in any event.¹⁰⁴

In the end, the value of respecting individual preferences for particular types of procedures might be overcome if we had reason to think that those preferences placed individuals in danger of significant harm. As one author has noted, the powerful effects of perceived procedural fairness can put “[s]cience . . . at the service of authority,” helping to “mobiliz[e] consent” to official action.¹⁰⁵ The danger then arises that authorities will abuse this information to “construct[] procedures that give people the opportunity to be heard while, at the same time, systematically denying them just outcomes.”¹⁰⁶ In the procedural justice literature, this concern is often described as the problem of “false consciousness”: “If people are satisfied with objectively poor outcomes because they believe they were generated by a fair process, this may reflect a false consciousness that is not desirable.”¹⁰⁷ In a condition of false consciousness, citizens may be satisfied

103. See Solum, *supra* note 25, at 261 (noting that litigants are often unable to freely choose the procedures that will apply to their cases and may indeed be forced to play according to a particular set of rules or suffer a default judgment).

104. The candy analogy can, of course, be taken too far. It might justly be said that to compare the preference of citizens for procedures that allow them to voice their grievances to a preference for junk food is to minimize very real expressive and moral values that are at stake in such a setting. This concern becomes especially compelling when we recall that the public generally places relatively little confidence in legal authorities, including courts, which suggests that legal institutions may be failing to provide the public with the type of justice it desires. See Tyler, *supra* note 101, at 872. Moreover, it may be inappropriate (depending on one’s ethical assumptions) to describe the desire to participate in legal proceedings and to be treated with dignity by public officials as a “mere” preference, like the desire for sugary foods. Some commentators insist vigorously that procedural preferences of this type have deep moral foundations. See, e.g., Tom R. Tyler & E. Allan Lind, *Procedural Justice*, in HANDBOOK OF JUSTICE RESEARCH IN LAW 65, 67 (Joseph Sanders & V. Lee Hamilton eds., 2001) (“People’s attitudes are . . . important in their own right, because a central tenet of democratic government is that . . . people should be able to accept the solutions reached by those in power.”); JERRY L. MASHAW, *DUE PROCESS IN THE ADMINISTRATIVE STATE* 45-49, 162-63 (1985) (tracing the source of our constitutional right to be heard by a decisionmaker to our moral right, as autonomous beings, to be treated as ends rather than as a means to someone else’s ends, and urging that connecting procedural rights to such dignitary values has an “intuitive plausibility”).

105. Austin Sarat, *Authority, Anxiety, and Procedural Justice: Moving from Scientific Detachment to Critical Engagement*, 27 L. & SOC’Y REV. 647, 656 (1993) (book review).

106. *Id.* at 658-59.

107. TOM R. TYLER, *WHY PEOPLE OBEY THE LAW* 111 (2006).

when they should not be, relying on a system's perceived neutrality but ignoring its tendency to produce unfair outcomes.¹⁰⁸

Despite this concern, the harm resulting from employing objectively accurate procedures that *feel* substantially unfair may sometimes be great enough to justify sacrificing small amounts of accuracy for large gains in public acceptance. To see why, we must look at the system from a large-scale perspective and consider the role of individual case outcomes in accounting for compliance with legal rules.¹⁰⁹ From this perspective, individual civil cases send a "behavioral message" through which society attempts to "influence individuals' conduct" by "forg[ing] a link between . . . wrong and liability."¹¹⁰

When we focus on deterrence, the role of subjective assessments of fairness takes on a great deal of importance. In a classic study, Tyler surveyed a large number of Chicago residents both before and after their encounters with law enforcement and the courts. In analyzing the responses to his surveys, he found that those citizens who viewed legal procedures as fair were more likely to have a positive view of legal authorities and the legitimacy of the legal system.¹¹¹ Having a favorable view of legal authorities and the legitimacy of the judicial system, in turn, made the individuals more likely to comply with the commands of the law.¹¹² One implication of this finding is that even if legal procedures are very accurate, the willingness of people to obey the law may decline if those people view those procedures as unfair.¹¹³ The significance of this effect is not overwhelming—many other factors bear on legal compliance, so a modest increase in subjective dissatisfaction will not immediately lead to a strong upswell in law-breaking¹¹⁴—but it is still a factor that should be considered before

108. Sarat, *supra* note 105, at 659, 662; TYLER, *supra* note 107, at 147; *see also* Robert J. MacCoun, *Voice, Control and Belonging: The Double-Edged Sword of Procedural Fairness*, 1 ANN. REV. L. SOC. SCI. 171, 193 (2005).

109. *See* Tyler & Lind, *supra* note 104, at 66 ("[F]or the law to be effective, people must obey it.").

110. Nesson, *supra* note 97, at 1359.

111. *See* TYLER, *supra* note 107, at 63; Tyler & Lind, *supra* note 104, at 80.

112. TYLER, *supra* note 107, at 62-64. The effect on legal compliance can take several different forms. First, dissatisfied litigants may be less likely to obey specific judicial orders, such as the obligation to follow probation conditions, satisfy a judgment debt, or pay child support. To the extent that litigants experience procedures as unfair, compliance with such orders is likely to decrease. *See* Tyler, *supra* note 101, at 872-74. This problem becomes particularly worrisome when we confront the reality that sanctions alone are often insufficient to compel compliance with judicial orders. *See id.* at 873. Second, a negative view of the legal system's legitimacy may lead as well to a lowered willingness to comply with the law when it clashes with individual preferences or moral beliefs; in other words, lowered views of systemic legitimacy may undermine the law's ability to produce general deterrence of illegal activity. *See id.* at 873-74.

113. *See* Tyler & Lind, *supra* note 104, at 80.

114. *See id.* at 80-81; TYLER, *supra* note 107, at 59-60 (finding, in a regression analysis of survey data from numerous Chicago residents, that compliance with the law correlated most strongly with views that the law's commands were morally just, that the legitimacy of

we decide to ignore public reactions to changes in judicial procedures solely on the ground that the new procedures are more accurate. In the end, it seems inappropriate to ignore either concept of fairness. Increasing subjective satisfaction through procedural changes that cause large decreases in accuracy would seem subject to the false consciousness objection, but modest increases in accuracy that come at the cost of large decreases in *perceptions* of fairness may harm the cause of deterrence more than they help it.

This brings us to the central question of this section: Will individuals respond more favorably to procedures that employ live testimony than those who rely only on briefing and record evidence? If so, decisionmakers who must decide between the two procedures might sometimes be faced with a hard choice, at least in cases where presence is a hindrance to good fact-finding rather than an aid. They might choose to dispense with live testimony, gaining more accuracy in fact-finding at the cost of making the litigants unhappy and possibly worsening their view of the legitimacy of law. Or alternatively, they might hold a hearing or live trial in order to keep the litigants happy and thereby lose some measure of confidence in the accuracy of the final result.

This is not an idle concern. Although this precise question has not been studied, people who respond to surveys regarding their views of what make procedures fair often express preferences that would ill-accord with a widespread adoption of hearing-less decision procedures.¹¹⁵ One such preference—a litigant’s desire to control the manner in which her case is made to a court—deserves sustained attention in this context.¹¹⁶

It is fairly clear that litigants value what has been called “process control”—meaning “control over the opportunity to state one’s case” to a decisionmaker.¹¹⁷ People value process control for a number of

legal authorities played a modest but measurable role in compliance, and that deterrence and peer opinion played a smaller but still significant role).

115. See generally TYLER, *supra* note 107, at 137-38.

116. Other factors that are often enumerated are the degree to which people perceive decisionmakers to be “unbiased, honest, and principled,” the degree to which decisionmakers seem “benevolent and caring,” and the degree to which decisionmakers treat disputants with “dignity and respect.” Michael M. O’Hear, *Plea Bargaining and Procedural Justice*, 42 GA. L. REV. 407, 421 (2008) (adding these three factors to the case-control and expressive concerns described above). It seems doubtful that the decision to employ a paper trial would significantly affect the neutrality interest in having an unbiased decisionmaker, given that it treats all parties in a similar manner. Likewise, to the extent that the *reasons* for employing a non-hearing procedure are explained to litigants and the court and then explains the reasons for its decision in a way that shows that it has considered the parties’ arguments, it is unlikely that the interests in having a decisionmaker seem to care about your rights or respect your dignity will be greatly affected. See *id.* at 429 (“Perceived trustworthiness is enhanced when the authorities demonstrate that they have actually considered the information offered during voice opportunities.”).

117. TYLER, *supra* note 107, at 115.

reasons. Some of its value is as a means to an end; parties want to control the evidence and arguments presented to a court so that they can make sure that a persuasive case is made and thereby maximize their chances of winning.¹¹⁸ The decision to hold live hearings or not should have little impact on this value in most cases because the attorney, regardless of the extent to which the client values process control, is ethically obliged to consult with his client regarding the means by which the client's litigation objectives are to be pursued.¹¹⁹ There may, no doubt, be situations in which the client's control over the strategic or tactical litigation choices will be impaired in the absence of live proceedings. If a client lacks the means to monitor his attorney's conduct by perusing the lawyer's written submissions—perhaps due to a lack of legal sophistication—the observation of the lawyer's performance at a live hearing might be the best available indicator of the quality of the lawyer's efforts on his behalf. There may, indeed, be cases where this value becomes paramount, due to the combination of a particularly unsophisticated client and a lawyer whose poor performance calls out for client monitoring. But unless the hearing in question would occur early in a case, it may be too late for the process to add much value in terms of the client's ability to control the content of the case presented by his lawyers. So overall, this *instrumental* value of process control will not be greatly affected by the decision to hear live testimony at the trial stage.

The instrumental value of process control does not tell the whole story, however; litigants derive significant value from expressing themselves to a decisionmaker even in the absence of a clear connection between such expression and a plausible change in the case's outcome.¹²⁰ Although this fact might seem surprising, it has been documented in a number of studies that giving litigants opportunities to control the presentation of their case matters even when the decisionmaker openly gives very little weight to the litigants' arguments.¹²¹ Indeed, this effect can persist even when the decisionmaker announces that the litigants' views will have no effect on the decision. In one experiment, conducted by Lind, a task-assigner "announced his decision" regarding the workload of participants, making it clear that the decision "was final and not subject to change," and

118. See John Thibaut & Laurens Walker, *A Theory of Procedure*, 66 CAL. L. REV. 541, 550-52, 556 (1978) (urging that, because procedural control gives parties the ability to introduce "possibly important contextual factors" that a neutral investigator would overlook, it will maximize the chances that the result will be an "attainment of distributive justice" between the parties).

119. See MODEL RULES OF PROF'L CONDUCT R. 1.2 (2003).

120. See TYLER, *supra* note 107, at 116.

121. See, e.g., *id.* at 133; MacCoun, *supra* note 108, at 192 (describing the study reported in E. Allan Lind et al., *Voice, Control, and Procedural Justice: Instrumental and Noninstrumental Concerns in Fairness Judgments*, 59 J. Pers. & Soc. Psych. 952 (1990)).

then invited some of them to offer comments anyway.¹²² The participants who were permitted to offer comments rated the procedures as significantly fairer than did those participants who were not provided with such an opportunity.¹²³

This non-instrumental process control value—what we might call the value of self-expression in procedure—seems more likely to be infringed by paper-based procedures. The risk is that judges who decide cases without holding evidentiary hearings may seem like bureaucratic black boxes because the process of considering and weighing evidence is hidden from the parties. Parties may therefore feel as if they have not been able to express their point of view to the judge, which in turn will lead to a decline in assessments of procedural fairness. What is worse, this problem may be magnified in the very cases in which hearings are most likely to be *objectively* unfair. As discussed above,¹²⁴ hearings pose a particular risk to the accuracy of judgments when the dispute centers around the credibility of the disputants, due to the misleading effects of demeanor evidence and the biasing effects of party appearance and behavior. But, at least on an intuitive level, it is in these cases—cases in which the decision must necessarily discredit the honesty or accuracy of one party's story—that the denial of an opportunity to address the decisionmaker is most likely to feel fundamentally unfair to the parties. And this problem may be exacerbated by the fact that the flaws that a non-hearing procedure is attempting to avoid—that is, our cognitive limits in assessing the likelihood of deception when demeanor is in play—cut against the grain of our everyday intuition that we can tell when someone is lying to us.¹²⁵

For several reasons, however, the disadvantages of paper procedures for litigants' perceptions of subjective fairness are less serious than they might initially seem. First, it is not the case that every choice between live and paper procedures involves a potential loss of expressive opportunity for a party. Some pretrial hearings, for instance, will turn on questions of fact that do not implicate the parties' own knowledge or involve questions of law to which testimony will not be relevant. A classic example of this would be a *Daubert* motion, in which the only question for a court is whether an expert witness should be allowed to testify at a trial on the merits.¹²⁶ Although the

122. MacCoun, *supra* note 108, at 192 (describing the study reported in E. ALLAN LIND, *ARBITRATING HIGH-STAKES CASES: AN EVALUATION OF COURT-ANNEXED ARBITRATION IN A UNITED STATES DISTRICT COURT* (RAND 1990)).

123. *Id.* at 192-93.

124. *See supra* Part II.

125. *See* Sporer & Schwandt, *supra* note 42, at 24-27 (noting that certain behaviors commonly associated with deception are not correlated to untruthfulness).

126. *See* FED. R. EVID. 702; *Daubert v. Merrell Dow Pharmaceutical, Inc.*, 509 U.S. 579, 585 (1993).

court will need to resolve issues of fact in such a setting, the parties' testimony will not be needed. And although the potential expert witness might wish to have some expressive input before a court makes its decision, a court might justly decide that the subjective preferences of a paid professional witness weigh less heavily than the need to accurately determine the admissibility question. So if the court thought that a paper-based procedure was superior in such a setting, subjective fairness concerns would be unlikely to suggest a different result.¹²⁷

Parties with an attenuated personal connection to their disputes may likewise experience little loss of satisfaction when courts employ paper-based fact-finding procedures. Perhaps the simplest way in which such a situation would arise would be when one party's connection to its claim is purely financial. Consider, for instance, an insurer bringing a subrogated claim on behalf of its insured. For one thing, the insurer is itself an artificial legal entity that cannot personally experience anything we would recognize as satisfaction or dissatisfaction with procedures. For another, its owners and agents—who are capable of feeling such feelings—can be expected to have a less intense connection with a disputed matter, given that such disputes are a routine part of their day-to-day work and that decisions about such disputes will not reflect on their past conduct or blamefulness. To be sure, the owners and agents of business associations will sometimes feel very strongly about the subjects of their companies' lawsuits,¹²⁸ but we can expect a significant volume of "mundane" litigation arising out of business transactions in which some of the parties may view the process as a chore rather than an opportunity for expression.

Finally, it is worth noting that in many cases, a paper trial procedure will in fact be satisfaction-*enhancing* because it will take the place of a settlement process rather than a more expressive live hearing or trial. As will be discussed in more detail below, paper-based procedures may save significant litigation costs for parties.¹²⁹ In some cases, this cost-reduction may encourage the parties to seek a judicial determination of the merits of their dispute rather than settle their case.¹³⁰ The arbitration context provides a useful example of such a process, in that the lowered costs of arbitration make it more likely

127. Note, however, that the clarity-enhancing virtues of live testimony might still counsel in favor of a live *Daubert* hearing, at least if the testimony in question is fairly complex.

128. *Cf. Citizens United v. Fed. Election Comm'n*, 130 S. Ct. 876, 907 (2010) (noting that most corporations are relatively small and not particularly wealthy). One can imagine, for instance, that the owner of a small business could take being sued by a regular customer quite personally.

129. *See infra* Part IV.

130. *See* E. ALLAN LIND, *ARBITRATING HIGH-STAKES CASES: AN EVALUATION OF COURT-ANNEXED ARBITRATION IN A UNITED STATES DISTRICT COURT* 63 (RAND 1990) (noting that the lowered costs of arbitration hearings have this effect).

that parties will press their claims in such a forum than they would if they could only obtain relief in court.¹³¹ Arbitrating parties, on average, experience greater process satisfaction than those whose cases are confined to the court system,¹³² and this may stem, in part, from the fact that arbitration “gives litigants something that they want . . . an opportunity to have their cases adjudicated.”¹³³ In other words, most parties probably prefer to get a chance to make their complaints in an authoritative forum, and they will lose such an opportunity if pushed to settle their cases due to the high cost of litigating. To the extent that non-hearing procedures can realize a similar cost reduction as arbitration, we might expect a similar gain in overall satisfaction, especially if the process is designed in a transparent way.

Having said this, there are no doubt many potential hearings or trials in which parties have a strong emotional tie with the dispute, in which a live hearing will be less expensive than a paper-based procedure, and in which the parties can be expected to offer evidence. In such cases, litigants might experience a significant loss of expressive opportunity and therefore view the overall process as less fair. The question, then, is whether paper-based fact-finding will feel so unfair in such cases that we should reject it even when it has strong accuracy advantages.

Happily, a well-designed paper procedure will probably allow enough litigant participation that any loss of satisfaction will be minimal. For one thing, the “bureaucratic black box” characterization of the paper trial process depends on the assumption that the non-hearing process, and the reasons for it, are not transparent to litigants. But if the court explains the reasons for using a paper-based procedure, casting the overall goal as one of fairness and the avoidance of bias, the likelihood that the parties will lose confidence in the fairness of the overall process should be reduced.¹³⁴ Indeed, so long as procedures involve a certain baseline level of party control and participation, smaller levels of participation variation seem to have little or no effect on satisfaction rates.¹³⁵ Moreover, the parties’ perceptions that

131. *Id.*

132. *Id.* at 44-45.

133. *Id.* at 63; *see also* O’Hear, *supra* note 116, at 425 (noting that parties value voice even when they are engaging in a process of negotiation in which they have strong decisional control).

134. *See* Bone, *supra* note 100, at 339 (noting that litigants already accept some loss of voice due to existing non-party preclusion rules and that giving “reasons” for such preclusion may affect their willingness to regard such rules as legitimate).

135. *See* E. ALLAN LIND ET AL., *THE PERCEPTION OF JUSTICE: TORT LITIGANTS’ VIEWS OF TRIAL, COURT-ANNEXED ARBITRATION, AND JUDICIAL SETTLEMENT CONFERENCES* 62 (1989). Lind specifically examined three types of dispute resolution procedures—judicial trials, arbitrations, and judicially mediated settlement conferences—and found that within this subset of procedures, variations in felt participation did not correlate significantly with satisfaction levels. *Id.* When compared with Tyler’s much broader survey of public experi-

the court will hear and consider their arguments may be increased by an explanation of *how* the court has reached its decision, with an emphasis on its consideration of all the evidence that the parties have submitted. Such an explanation might reassure parties that their arguments are still *attended to* even if they have not been *heard*.

Finally, if we are still concerned that litigants will find a paper procedure unfair, it may help to provide them with additional expressive opportunities that will give them a sense of having been heard without affecting the outcome. Taking inspiration from Lind's workload-assignment study, a court might allow the parties to personally summarize their cases in open court at the time it announces its decision.¹³⁶ Although this procedure will likely be viewed less favorably by the parties than one in which it is clear that their arguments can impact the outcome of the case,¹³⁷ it might still reduce their discomfort with an accuracy-enhancing procedure to an acceptable level.

In summary, although significant legitimacy issues are at stake when we choose between live and paper-based fact-finding procedures, it seems unlikely that there will be a significant loss in litigant satisfaction from employing paper-based methods. Indeed, when choosing between live and paper-based *trials*, the paper procedure may enhance litigant satisfaction if it can lower costs enough that parties who would otherwise have settled will instead obtain a judicial decision on the merits of their cases. But even in settings where the cost difference may not have this effect,¹³⁸ such as early pretrial fact-finding, any deficiencies of a paper procedure might be reduced to acceptable levels by providing litigants outlets for personal expression short of a full hearing, by explaining the reasons for the procedure in understandable terms, and by making it clear that the reasons for eschewing live presentation are grounded in the desire for accuracy rather than in judicial disinterest. In short, when paper-based procedures are more accurate than the live alternative, they can probably be made to feel fair enough to be acceptable to litigants.

V. OTHER PRAGMATIC CONSIDERATIONS: COST, DELAY, AND AGENCY CONCERNS

In assessing the value of hearings, cost is a variable that we cannot ignore.¹³⁹ Relying on values such as accuracy and subjective fair-

ences with police and courts, this suggests that variations in expressive input matter less within a relatively high-participation and high-formality subset of dispute resolution procedures than among the much broader range of dispute resolution possibilities.

136. See MacCoun, *supra* note 108, at 192-93; Lind et al., *supra* note 121, at 956.

137. See Lind et al., *supra* note 121, at 956.

138. See discussion *infra* Part IV.

139. See also MARILYN J. BERGER ET AL., PRETRIAL ADVOCACY 2 (1988) (warning lawyers that their advocacy will always be constrained by their client's cost concerns).

ness alone, we would develop a warped theory. This is easiest to see in the simple example of a case in which the “outcome . . . includes a damage award that reflects an accurate application of the substantive law to the facts,” but the “plaintiff who was entitled to prevail had to pay more in attorneys’ fees than the value of the judgment.”¹⁴⁰ Nor is cost only relevant in such extreme circumstances. High litigation costs for defendants (even if less than the amount in controversy) can incentivize strike suits even when those defendants are innocent of wrongdoing.¹⁴¹ And higher litigation costs generally encourage parties to settle claims rather than pursue them to trial; if we are concerned about the lack of authoritative adjudications of claims (perhaps due to the potential stagnation of the law or the secrecy of resulting settlement amounts), then this is an additional downside of high costs.¹⁴² Moreover, the effect of litigation costs on settlement decisions produces a secondary cost. As discussed above, parties who are pushed towards settlement are likely to feel deprived of an opportunity to present their case to a decisionmaker and to view the overall procedure as less legitimate.¹⁴³ Finally, absent any other effects, any *unnecessary* costs—that is, any costs not offset by an increase in accuracy or subjective satisfaction with the litigation process—are simply a deadweight loss.¹⁴⁴

The balance between fairness considerations and litigation costs cannot be formulated in simple mathematical terms, however. The problem is that most of the key variables are subject to significant uncertainty. As we have already seen, the use of hearings in a decisionmaking process is not likely to consistently improve accuracy or reduce it; rather, the impact will depend on a number of case-specific factors, including the degree to which the dispute hinges upon credibility, the degree to which the parties or witnesses on one side of the dispute may gain an advantage due to biasing appearance factors, the amount of preparation that has occurred before the hearing, and the amount of confusion inherent in the existing record.¹⁴⁵ The problem is exacerbated because we lack existing data on the degree of bias that hearings may induce, or the amount of clarity they may provide, either in general or in the relevant subsets of case-types. So although we can easily articulate a goal—that we would like to balance the benefits of hearing procedures against their costs—we can do so only in a general way, without being able to do any *explicit* balancing.

140. Solum, *supra* note 25, at 185.

141. Cf. Paul Stancil, *Balancing the Pleading Equation*, 61 BAYLOR L. REV. 90, 148 (2009).

142. See BURNS, *supra* note 4, at 112-35; Owen M. Fiss, *Against Settlement*, 93 YALE L.J. 1073, 1085-87 (1984).

143. See LIND, *supra* note 130, at 44-45, 63; see also discussion *supra* Part III.

144. See RICHARD A. POSNER, *ECONOMIC ANALYSIS OF LAW* 549 (4th ed. 1992).

145. See discussion *supra* Parts II, III.

The foregoing also assumes something that is far from clear: that holding a hearing necessarily makes litigation more expensive. To some extent, such an assumption is implicit in the many legal rules that allow judges to dispense with live procedures when deciding issues that are legally frivolous.¹⁴⁶ Hearings and trials, in this framing, should be dispensed with in easy cases but used in hard ones. Those who rely on this framing seem to assume two things. The first assumption is that live procedures will either improve, or have at worst have no effect on, the accuracy of a resulting decision; we therefore are obliged to use them whenever the outcome of a case is in doubt. The second assumption is that live procedures are more expensive than alternative decisionmaking methods; we therefore should dispense with them in cases whose outcome is clear. As we have seen, the first assumption is flawed because live testimony may reduce the accuracy of decisions where a case is close due to a difficult credibility contest. The second assumption is likewise flawed. Live procedures will sometimes add costs to decisionmaking, but will at other times be less expensive than paper-based fact-finding.

A. *The Court's Perspective*

First, we must consider the ways in which a decision between a live and a paper-based procedure impacts a court. A judge, as well as other court employees, must take time away from other business in order to sit and hear evidence. The relevant unit of expense, for our purposes, is time. Most court staff, including judges, are salaried personnel who must allocate a limited budget of time between a number of competing cases. Nor is the concern merely for the work-satisfaction of government employees; a backlog of court-time can result in a lengthy queue for case consideration. Such queues, in turn, give rise to social distress. Litigants who must wait many months or years for a decision may become embittered or be hindered in their ability to plan their future conduct due to lingering uncertainty, and members of the general public may lose respect for a judicial system that imposes lengthy delays between questions and answers.¹⁴⁷

In some circumstances, a judge can save court time by holding a live hearing or trial. One such situation would occur when the evi-

146. See, e.g., FED. R. CIV. P. 56; Rules Governing Section 2254 and 2255 Cases in the United States District Courts 4 (2010).

147. See Civil Justice Reform Act of 1990, Pub. L. No. 101-650, § 102, 104 Stat. 5089 (“The courts, the litigants, the litigants’ attorneys, and the Congress and the executive branch, share responsibility for cost and delay in civil litigation and its impact on access to the courts, adjudication of cases on the merits, and the ability of the civil justice system to provide proper and timely judicial relief for aggrieved parties.”). *But see* LIND ET AL., *supra* note 135, at 54-55, 77-78 (noting that, when litigants have access to relatively formal methods of dispute resolution subject to “moderate levels of delay,” their satisfaction was affected by their *perceptions* of delay, but did not vary based on the *actual duration* of their cases).

dence in the record is confusing or ambiguous. Imagine that a key witness has been vague on an important point in his affidavit or deposition testimony. Rather than slowly puzzle through the record, comparing this problematic testimony with other, possibly conflicting evidence, a judge might choose to hear live testimony instead. By doing so, she can ensure that the witness will be pinned down on the presently vague point, either through cross-examination or, if necessary, by the judge's own questions.¹⁴⁸ Similarly, a court may be able to economize by holding a live hearing when a record is complete but still very complex or hard to follow. Imagine, for instance, a case in which the key evidence is scattered through numerous documents and depositions, and in which the parties' briefing has failed to give a coherent guide through the maze.¹⁴⁹ By requesting a hearing, a judge may force advocates to winnow down a scattershot presentation into a smaller number of key arguments.¹⁵⁰ And even if the advocates themselves are unable or unwilling to offer a coherent presentation at a hearing, a judge can use focused questioning to pin down a recalcitrant attorney, forcing them to either make their claims clear or risk waiver.¹⁵¹

In practice, these cost savings will interact with the accuracy advantages of hearings discussed earlier. To the extent that a judge is dealing with a confusing record, a decision on a paper record may involve a choice between accuracy and cost: A careful parsing of the record may reveal all the information that would be sought in a hearing but only at the cost of a large expenditure of court time. Likewise, the cost-savings described above can be avoided by making a decision following a relatively brief review of the written submissions, forcing the parties to bear the accuracy costs of vague or confusing filings. The advantage of hearings in such a circumstance, strictly speaking, is not that they necessarily either save costs or reduce error rates, but rather that they avoid a trade-off between these two quantities. Likewise, this analysis is subject to the caveat that some judges may be able to economize when deciding a case on a paper record by rely-

148. See FED. R. EVID. 614.

149. See, e.g., *Zenith Radio Corp. v. Matsushita Elec. Indus. Co.*, 513 F. Supp. 1100, 1117-18 (E.D. Penn. 1981), *aff'd in part and rev'd in part*, 723 F.2d 238 (3d Cir. 1983), *rev'd*, 475 U.S. 574 (1986) (describing the "veritable odyssey," lasting twenty-three months, that the district court endured while reviewing an enormous summary judgment record in an antitrust case).

150. See LUBET, *supra* note 69, at 347 (advising attorneys to "do everything they can to shorten" their opening statements during a bench trial, eschewing repetition in favor of giving "a clear picture of the occurrences" in the case); FEDERAL PRACTICE MANUAL FOR LEGAL AID ATTORNEYS, *supra* note 66, at 148 (advising advocates that their oral presentations should be brief and should not assume that the judge has comprehended all the material in the briefings).

151. This strategy is not, however, without its own dangers. Past a certain point, simplification might leave out crucial details. A court, therefore, should be more reluctant to pursue this strategy if the case seems complex *despite*, and not *because of*, the written advocacy.

ing more on the work of law clerks; hearing live testimony, by contrast, cannot be effectively delegated. But to the extent that the judge will ultimately wish (or need) to carefully consider the relevant evidence personally, live testimony may be the more efficient solution in cases involving either highly complex information or underperforming advocates.

By contrast, in many cases these benefits will not be present. Many simple civil cases involve a relatively clear dispute that can easily be gleaned from a paper record. Imagine, for example, a car-crash case in which the dispute centers on conflicting testimony about whether a motorist signaled before entering a lane. If the parties and witnesses have been effectively deposed, a hearing may merely repeat information that can easily be gleaned from a few short deposition excerpts.

Add to this a factor not previously addressed: Not all live fact-finding procedures involve the same degree of requisite formality. For instance, although bench trials will generally be more streamlined than a full jury trial, they will often be more complex than a run-of-the-mill pretrial hearing, incorporating opening statements, case-presentations by each participating party, and possibly final argument.¹⁵² So the cost-variable depends, in part, on what law, tradition, and the participants will find to be an acceptable live procedure. In the car-crash example, this variable means that a judge offered the chance to choose between a paper trial and a bench-trial may find that the added formality of a “trial” counts against it when the expense of the two modes of proceeding are at issue.

So, from a court’s perspective, the cost equation boils down to answering the following questions: First, how long will a hearing take—can it be a short, simple affair, or will a lengthy process be necessary? Second, how hard will it be to decide a case on a paper record—is the briefing easy to follow and the evidence clear, or complex and hard-to-follow? Finally, will the hearing make it possible to cut through ambiguous factual disputes with focused questions, or pin down advocates on disputed facts?¹⁵³

152. LUBET, *supra* note 69 at 346-47 (Bench trials sometimes, but not always, include opening statements and final arguments, although judges tend to prefer that such presentations be shorter in the absence of a jury.).

153. The perspective of a rulemaker is not discussed in detail in this section, but a few points may usefully be added. First, rulemakers will often be concerned with minimizing costs to both courts and parties. *See, e.g.*, FED. R. CIV. P. 1 (instructing courts to interpret the federal rules of civil procedure to “secure the just, speedy, and inexpensive determination of every action and proceeding”). Beyond a direct concern about costs, rulemakers may also have preferences regarding the frequency with which cases should be resolved via settlement or via judicial decision. *Compare, e.g.*, FISS, *supra* note 142, at 1085-87, with FED. R. CIV. P. 16(a) (permitting courts to order pretrial conferences for several purposes, one of which is “facilitating settlement”). To the extent that one type of decision procedure has a higher cost to parties than another, parties may be given an extra incentive to settle

B. *The Litigant's and Witness's Perspective*

The court is not the only relevant actor, however. We must also assess the impact of live procedures on the parties and witnesses. The witness perspective is perhaps the easiest to inhabit. Courts rarely travel to hold hearings, but lawyers often travel to conduct depositions, so a live hearing or trial will often involve the time and expense of traveling to court in order to testify. Likewise, lawyers may often feel the need to prepare witnesses more intensely for cross-examination in court than for a deposition, so a witness may find the deposition-preparation more congenial.¹⁵⁴ And of course, if the question is whether to hold a live trial after a witness has already been thoroughly deposed, the cost equation for the witness is clear: Paper procedures are preferable to a second round of testimony.

To some extent, the witness's concerns might be partially mollified by a modification of hearing procedures, rather than by an elimination of hearings. If a hearing can be conducted telephonically, for instance, the travel burden for a witness might be reduced.¹⁵⁵ In the end, however, such adjustments cannot make hearings a favorable bargain for witnesses in most cases. Courts may often be reluctant to modify the formal presentation of a bench trial to allow for telephonic testimony, and even if they are not, the desire of attorneys to prepare witnesses to testify directly to a court may involve preparation burdens that make even telephonic testimony a bad bargain. So, from the perspective of a non-party witness, a paper procedure will normally be preferable to a hearing.¹⁵⁶

For parties, the answer is less obvious. If the parties are financing their own lawsuits (rather than via a contingent fee arrangement or an insurance agreement), one obvious interest is in limiting the extent of attorney's fees.¹⁵⁷ Paper procedures have some advantages in

their claims in order to avoid the higher-cost procedure. So if rulemakers generally wish to incentivize settlements, this may be viewed as a silver-lining to the higher-cost procedure.

154. It is possible that the amount of deposition preparation would increase if the lawyer knew beforehand that the deposition transcript was to be used in a paper trial; some of the preparation costs, in other words, might shift in response to a rise in the willingness of courts to use paper trials. Nevertheless, this increase might be modest; parties already develop depositions with an eye towards either making or defending against a summary judgment motion, which gives an already large incentive to extract as much evidence as possible in the time allotted.

155. See FED. R. CIV. P. 43(a) (permitting the court, "[f]or good cause in compelling circumstances and with appropriate safeguards," to "permit testimony in open court by contemporaneous transmission from a different location").

156. If the witness is testifying as an expert, however, the costs will be shifted to the party paying the expert witness fees. See THOMAS A. MAUET, PRETRIAL 357 (5th ed. 2002) (noting that these costs "can be substantial since medical and other technical experts usually command hourly rates comparable to that of lawyers" and that such expenses are further exacerbated if the expert witness needs to be flown in).

157. See *id.* (noting a five-day case, requiring five days of preparation time, can easily cost \$10,000 in attorney's fees alone, exclusive of other costs).

this regard. Lawyers working in firms may be willing to delegate the taking of depositions to younger associates, but they are likely to be reluctant to delegate in-court witness examinations. Likewise, even in complex cases, law partners regularly delegate motion-writing and exhibit-collection tasks to younger and cheaper attorneys but insist on practicing and then presenting their own in-court arguments.

This cost-savings may be counterbalanced, to some extent, by the court-perspective discussed above: Courts may save time in complex cases by having attorneys and witnesses present in court, where they (hopefully) present streamlined arguments and testimony and where the judge can ask follow-up questions. The court, in other words, can save time in complex cases, but at the cost of imposing more expense on the parties who are likely to end up paying higher fees to finance the simplified presentation.¹⁵⁸

However, live fact-finding procedures may introduce burdens for parties that are not so counterbalanced. One additional concern that a litigant may have when an issue will be decided following a hearing or trial is an increased chance of waiver of a legal or procedural right by his attorney during the encounter.¹⁵⁹ When appearing in court, lawyers are subject to a substantial cognitive load: They must advance the goals of their client, keep a great deal of information organized in their head, respond to changing circumstances, and remain alert for potential violations of evidentiary or procedural rules that may worsen their client's litigation position. Moreover, the ability of lawyers working together on a team to solve problems collaboratively is reduced by the necessity of nominating one advocate at a time to conduct the presentation of arguments and the examination of witnesses, as well as by the necessity of confining communications between team members to scribbled notes and whispers. Under such conditions, it is sensible for a client to worry that her lawyer may, through a lapse of attention or through not possessing the knowledge or insight of another team member, inadvertently waive the client's rights to object to evidentiary errors or procedural violations.

Live procedures, in other words, may reduce the ability of attorneys to be the best possible agents for their clients. This difficulty

158. As discussed *supra* at Part III, such higher costs may also have collateral consequences for the parties' subjective assessments of procedural fairness if they push parties into settling claims rather than pursuing them to a judicial decision. Because people generally value the opportunity to voice their grievances during a dispute resolution process, they may find the overall process less satisfying if they are pushed to settle their cases, to the extent that the negotiation process does not incorporate opportunities for voice. See LIND, *supra* note 130, at 63; O'Hear, *supra* note 116, at 420-21.

159. See L. RONALD JORGESON, MOTION PRACTICE AND PERSUASION 21-23 (2006) (noting that an important goal during trial-court proceedings is to preserve issues for appellate review and that useful appellate arguments are often "seemingly minor legal issues tucked away in the record," in contrast to the evidentiary arguments that seem important during a hearing or trial).

likely results in increased litigation costs, as clients hire higher quality, but more expensive, counsel in an attempt to prevent such lapses from occurring. It might also result in a loss of control by the client over the litigation, as lawyers fail to operate in the manner that the client would prefer. In either event, a litigant would view the hearing as having worsened her position.¹⁶⁰

So in the end, a number of financial factors will make parties and witnesses tend to favor paper procedures over live ones: the costs of travel, the costs of preparing for live testimony, the added cost of lawyer preparation time (due to the likely involvement of more senior counsel when a presentation will be made to a court), and the increased risk of inadvertent waiver due to the cognitive and emotional stress of the live environment.¹⁶¹ These concerns must be weighed against the cost savings that courts may achieve by holding a hearing or trial in cases where doing so will result in a simplified or clearer picture of the dispute. In some cases, the party and witness concerns might be minimized: The witnesses might be local or be able to be examined telephonically, the attorney might be a solo practitioner with a reputation as a skilled oral advocate and a preference for live presentation, and the client might have faith in the attorney's ability to faithfully protect his interests in that environment. But in many cases, the general intuition that live procedures add costs will be accurate: The evidence may be clear on the existing record, witness travel may be necessary, the live procedure may draw more senior (and hence more expensive) counsel to the case and result in more elaborate witness preparation, and the live environment may lead to an increased risk that attorneys will unwittingly waive their clients' rights.

160. It is possible, and indeed likely, that some advocates will not suffer such a "live procedure" performance deficit. Indeed, advocates whose time is spent *primarily* doing in-court work may be more effective in court than they are on paper. Cf. Robert P. Mosteller, *Why Defense Attorneys Cannot, But Do, Care About Innocence*, 50 SANTA CLARA L. REV. 1, 45 (2010) (noting that some court-appointed lawyers are better paid for in-court time than out-of-court time, and have a corresponding incentive to minimize pretrial work and to seek trial time instead). This is mostly likely to be true for lawyers who specialize in fields that involve a relatively large proportion of trial time; the majority of lawyers, by contrast, spend far more time out of court than in it, and so are unlikely to have developed such lopsided skill sets. See Luis Garicano & Thomas N. Hubbard, *Specialization, Firms, and Markets: The Division of Labor within and between Law Firms*, 25 J.L. ECON. & ORG. 339, 345 (2009) (showing that those lawyers who on average spend more than ten days a month in court—working in the fields of personal injury, divorce, and criminal law—make up less than a quarter of the total population of lawyers, based on census data).

161. Some evidence suggests that they do, in fact, have this preference: Written summary judgment practice has become much more common than oral trial practice in the federal courts. See BURNS, *supra* note 4, at 84. Parties who could choose either to file a written dispositive motion or proceed directly towards trial, in other words, seem to prefer the written procedure, and to settle their cases rather than face the live hearing.

VI. THEORY RESTATEMENT, APPLICATIONS, AND IMPLICATIONS FOR REFORM

Having examined three critical concerns that are implicated when a decisionmaker must choose between live and paper-based procedures—accuracy, subjective fairness, and costs—we can now place these concerns side by side and examine how they interact in actual case scenarios. Some traditional uses of hearings and paper-based decisions may be sensible, even if the traditional justifications for one or the other were founded on mistaken notions about the utility of demeanor evidence; in other settings, we may not be so lucky. In this section, we will examine four examples in which a judge might have the discretion¹⁶² to choose either to hold a hearing or trial, or to find facts on a paper record: A preliminary-injunction decision, an automobile negligence case in small-claims court, a toxic-tort bench trial, and a civil rape bench trial. These examples will help to illustrate that live procedure generally works better early in the life of a case than later on. I will then offer some proposals for rule reform to encourage judges to employ live procedure when it is useful and avoid it when it is harmful.

A. *Theory Restatement*

Before we consider these examples, it may be useful to restate briefly some of the considerations that may help us choose between live and paper-based procedures:

Detecting Deceptive and Erroneous Testimony: Demeanor evidence is unlikely to aid the court in making credibility determinations. In some cases, live cross-examination may assist the court in deciding credibility, but that utility will be limited to the extent that witnesses have had significant opportunities to rehearse their testimony with lawyers who are aware of the likely subjects of cross-examination. If a transcript of a well-conducted deposition is available, it will usually be a more reliable and a fairer basis for determining whether a witness is testifying truthfully than live testimony.

Avoiding Unnecessary Appearance-Induced Bias: If a hearing or trial will introduce the court to parties or witnesses for the first time, it is likely that a court's view of the evidence will be colored by irrelevant factors arising from visual and aural contact with witnesses. These concerns include the biasing effects of witness attractiveness, social status, and educational level, as well as in-group/out-group effects based on the similarities and differences between the judge and the witnesses.

162. For the purpose of simplification, we shall assume that these cases are arising either in a forum where there is no right to a jury trial or that the parties have elected to try their cases to the bench.

Clarifying Complex or Confusing Evidence: Live procedures may induce parties to offer a simplified portrait of the issues before the court. They may also give the court an opportunity to pin down vague or confusing witnesses through *sua sponte* witness-interrogation by the court. In cases where complexity is more of a problem than credibility, this counsels in favor of live proceedings.

Subjective Perceptions of Fairness: All other things being equal, hearings may be more satisfying to parties who have the opportunity to testify during the proceedings, given the value people place on voicing grievances in connection with dispute resolution procedures. Variations in satisfaction are likely to be modest, however, so long as the paper procedure is relatively formal and respects the dignity of litigants. Any deficits will be lowered further if the litigants view the case as a business matter rather than an opportunity for personal vindication. Furthermore, paper procedures may make the overall litigation feel fairer when live procedures will be the more expensive approach, largely because of the increased likelihood of a voice-less settlement negotiation if an expensive hearing is the only option. When litigants are likely to find a paper-based procedure unfair, this concern may be partially mitigated by a court's efforts to explain the accuracy and fairness benefits of paper-based procedures to parties and to justify its decisions by reference to the arguments actually offered by those parties. Finally, the parties' desire for voice may also be partially satisfied by opportunities to speak that occur after the court has reached its decision.

Court Costs: Employing a paper procedure will sometimes save valuable court time, helping a court to maintain an efficient pace in moving through its docket. When a case involves a large amount of technical evidence, the court may end up reviewing documents no matter what, and a hearing or trial may simply be a duplication of time. Paper-based decisions may also allow a court to delegate more of the effort to law clerks, which may sometimes provide efficiency advantages. On the other hand, when the evidence in a case is vague or hard to follow, hearings may save court time by allowing a court to ask its own questions.

Other Costs: Witnesses will generally prefer paper procedures, at least if they will need to travel to attend a hearing or trial. Parties who find it difficult to monitor their counsel's performance may appreciate having an opportunity to observe their efforts in court. But oftentimes, parties will find this advantage outweighed by the added attorney costs that arise from preparing for a live procedure—including the likelihood of being billed for the time of more senior attorneys and the increased agency costs that arise in the in-court litigation environment.

With these principles in mind, let us consider how they might apply in some real-world examples.

B. *The Preliminary Injunction Motion*

For our first example, let us consider a motion for a preliminary injunction under Rule 65 of the Federal Rules of Civil Procedure, a setting in which the district court often has nearly unfettered discretion to choose between live and paper-based fact-finding procedures. Parties usually seek preliminary injunctions “to preserve the status quo” until the case can be definitively resolved by settlement, pretrial dismissal, or a trial on the merits.¹⁶³ Following a long tradition of federal equity practice, district judges generally have broad discretion to grant or deny such injunctions,¹⁶⁴ and the rule is silent regarding the methods of proving the facts necessary to determine whether an injunction is appropriate.¹⁶⁵ District courts may therefore decide for themselves, in many cases, whether to rely on affidavit evidence¹⁶⁶ or employ an evidentiary hearing.¹⁶⁷ To the degree this discretion is constrained, it is by the traditional view of American courts that oral hearings are necessary when the credibility of conflicting testimony must be decided. In such cases, some courts of appeals (but not all) will find that the failure to hold a hearing constituted an abuse of discretion, unless both parties have consented to an affidavit-based decision.¹⁶⁸ For the purposes of this discussion, however, let us assume that the district court sits in a circuit, like the Ninth Circuit, where it can freely choose between hearings and paper-based procedures, so as to focus on the underlying question of policy.

163. *Penn v. San Juan Hospital, Inc.*, 528 F.2d 1181, 1185 (10th Cir. 1975); *see also* 11A CHARLES ALAN WRIGHT, ARTHUR R. MILLER & MARY KAY KANE, FEDERAL PRACTICE AND PROCEDURE § 2947 (2d ed. 1995).

164. *See* WRIGHT, MILLER & KANE, *supra* note 163. Courts will typically weigh a number of factors in concluding whether a preliminary injunction is in the interest of justice, including: “the significance of the threat of irreparable harm to plaintiff if the injunction is not granted,” the amount of harm the injunction would cause the defendant, the likelihood that the “plaintiff will succeed on the merits,” and “the public interest.” *Id.* at § 2948.

165. *See* FED. R. CIV. P. 65(a); *cf.* FED. R. CIV. P. 43(c). Unless the parties stipulate all relevant facts or unless the losing party’s arguments are insufficient as a matter of law, some fact-finding will be necessary, as district courts will not rely on the unproven allegations in a pleading to justify injunctive relief. *See* WRIGHT, MILLER & KANE, *supra* note 163, at § 2949 & n.12 (collecting cases).

166. *See, e.g.*, *S. F.-Oakland Newspaper Guild v. Kennedy*, 412 F.2d 541, 546 (9th Cir. 1969).

167. *See, e.g.*, *Wounded Knee Legal Def./Offense Comm. v. Fed. Bureau of Investigation*, 507 F.2d 1281, 1287 (8th Cir. 1974); *see also* *Aoude v. Mobil Oil Corp.*, 862 F.2d 890, 894 (1st Cir. 1988) (stating that, in some cases, the use of a paper trial to decide fact disputes relating to a preliminary injunction motion was within a district court’s discretion, but that an oral hearing is preferable whenever there is doubt that a party can fairly present its case via affidavits).

168. *See* WRIGHT, MILLER & KANE, *supra* note 163, at § 2949 & n.29 (collecting cases and discussing this rule). *But see, e.g.*, *S.F.-Oakland Newspaper Guild*, 412 F.2d at 546 (applying contrary Ninth Circuit rule).

In most cases, the theory of hearings outlined above would suggest that an evidentiary hearing is more useful at this stage of the case than a decision that relies only on affidavits, at least if the factual disputes are reasonably complex. Although some point to a need to consider demeanor evidence to resolve fact conflicts in this setting,¹⁶⁹ this argument is relatively weak given that such evidence is more likely to decrease the accuracy of credibility calls in this setting than it is to increase it.¹⁷⁰ But many other factors do weigh in favor of a hearing.

First, there are the other accuracy considerations. Although the demeanor problem exists as much here as in other cases, it is counteracted to an extent by the increased utility of cross-examination at this relatively early stage. Witnesses will likely receive less coaching, and have less access to the other side's evidence and arguments, in preparation for such a hearing,¹⁷¹ so cross-examination may be more likely to usefully ferret out fabrications and mistakes in their testimony. This advantage becomes more apparent when we consider that the alternative is usually to rely on affidavit evidence rather than depositions: Affidavits, which do not require a witness to answer questions put forth by opposing counsel, may paper over the gaps in an account rather than probe them. The availability of cross-examination therefore takes on special importance here. Furthermore, the judge may have little familiarity with the facts of the case at this early stage, so the ability to ask follow-up questions may be particularly helpful.

Second, there is the question of subjective fairness. As we have already seen, the desire of litigants for expressive opportunities can be furthered by giving them an opportunity to testify in court. The countervailing possibility—that the cost of the hearing will be high enough to force a settlement, thereby reducing opportunities for parties to voice their complaints—does exist in this context, but to a lesser degree than in other cases, given that preliminary injunction hearings will usually be shorter—and involve less preparation—than trials.¹⁷² So, on balance, a hearing procedure will seem fairer to the litigants involved.

Finally, there is the question of cost. Some of the above defects in the efficacy of a paper procedure could be cured, no doubt, if we allowed more extensive discovery (especially deposition practice) before

169. WRIGHT, MILLER & KANE, *supra* note 163, at § 2949.

170. *See supra* Part II.

171. *See* Lee T. Gesmer & Jay Shepard, *Employee Non-Competition Agreements*, in II MASSACHUSETTS EMPLOYMENT LAW § 20.7.2 (John F. Adkins & Nancy S. Shilepsky eds., 2009) (noting that lawyers often have only “a few days” to prepare for preliminary injunction hearings).

172. *See* discussion *infra* Part V.D-E; *see also* Gesmer & Shepard, *supra* note 171, at § 20.7.2; Morton Denlow, *The Motion for a Preliminary Injunction: Time for a Uniform Federal Standard*, 22 REV. LITIG. 495, 507 (2003) (noting that such hearings are less formal than trials on the merits and involve the presentation of a smaller quantity of available evidence).

a preliminary injunction hearing. But such discovery would be impractical, given that the necessary delay would clash with the “haste that is often necessary to preserve the relative positions of the parties and to protect the movant from irreparable injury.”¹⁷³ Given these time constraints, there is less reason to worry about the intense level of witness preparation that normally adds to the cost of live hearing procedures. Moreover, the less-formal nature of preliminary injunction hearings makes it more likely that the judge will allow cost-saving devices like the telephonic testimony of remote witnesses.¹⁷⁴ Finally, a hurried briefing schedule may make it more likely that written submissions will have gaps or ambiguities; thus, it might save the court time to have a live hearing at which these gaps can be filled in, rather than having to puzzle over cryptic submissions in chambers. All in all, the preliminary injunction hearing is a situation in which the judicial instinct favoring live presentation is sound, even if the demeanor-focused reasoning underlying that instinct has little to recommend it.

C. *The Case in Small Claims Court*

Next, let us consider a setting in which cost considerations become paramount: the small-claims court. Every state has a forum in which relatively minor disputes, involving low amounts-in-controversy, are handled using “expedited and simpli[fied]” procedures.¹⁷⁵ In this setting, “traditional rules of evidence and court processes do not apply,”¹⁷⁶ and the use of attorney representation is rarely cost-effective—and sometimes, it is not permitted.¹⁷⁷ One such simplified procedure is to use highly simplified pleadings,¹⁷⁸ followed by an oral evidentiary hearing at which the pro se parties may testify and introduce witness testimony or other evidence.¹⁷⁹

173. Denlow, *supra* note 172, at 507.

174. *See id.*

175. Bruce Zucker & Monica Her, *The People's Court Examined: A Legal and Empirical Analysis of the Small Claims Court System*, 37 U.S.F. L. REV. 315, 317 (2003). The lowest jurisdictional limits for small claims courts in the United States are set at \$1,000 (Virginia), while “the highest limits are in Georgia and Tennessee, with limits of \$15,000.” *Id.* at 318. The mean limit is \$4,504. *Id.* at 320 tbl.1.

176. *Id.* at 317.

177. *Id.* at 319, 327; *see* Scott Sabey & Tim Shea, *Small Claims Court: A Conversation with Scott Sabey and Tim Shea*, 19 UTAH B. J. (75th SPECIAL ANNIVERSARY ISSUE), no. 6, 2006 at 32, 34 (noting that even after Utah raised its jurisdictional limit to \$7,500, “relatively few” parties in small claims court were represented by counsel).

178. *See, e.g.*, CAL. CIV. PROC. CODE § 116.320 (Deering 1991 & Supp. 2009) (only requiring a plaintiff to plead the names and addresses of the defendants, the dollar amount of the claim, and a simple description of its basis); *see also* Zucker & Her, *supra* note 175, at 325-29 (describing the California process); *accord* Sabey & Shea, *supra* note 177 at 32-33 (describing similar Utah process).

179. *See, e.g.*, CAL. CIV. PROC. CODE § 116.520 (Deering 1991).

In such a setting, the live procedure is clearly the only sensible choice for dispute resolution, even if the dispute centers on a simple credibility conflict. First, the accuracy consequences of potentially misleading demeanor evidence are less severe; due to the amount-in-controversy limits, the fiscal loss resulting from a mistaken decision is contained to relatively tolerable levels.¹⁸⁰ What is more, the accuracy advantages of hearings may be more likely to show themselves in this context. Any briefing will be prepared by inexpert pro se parties who do not know the relevant law and will likely be confusing, so that a judge's own questions will take on a special utility. Furthermore, the likelihood that witnesses will have been carefully prepared for cross-examination is at its lowest in the small-claims setting, and even if the parties lack the skill to effectively cross-examine the witnesses, the judge can provide some credibility-probing questioning of his own.¹⁸¹ These clarity-producing factors might outweigh the accuracy losses we can expect due to the impact of demeanor evidence on credibility determinations and the appearance-bias problem.

When we place the remaining factors on the scale, the answer is even clearer. As we have seen, litigants gain satisfaction from expressing their views to a decisionmaker. Nor is there any concern here that the added cost of a hearing will force parties into low-voice settlement negotiations: If anything, the cost equation runs the other way. In proceedings in which discovery is almost non-existent and lawyers rarely assist litigants, the preparation of an adequate record for a paper-based decision presents very high cost obstacles for litigants; adding the necessary deposition practice and requiring the drafting of lengthy briefs might deter many parties from suing at all, due to the expense of hiring a lawyer or the information costs of learning how to handle such tasks personally. Oral hearings, therefore, turn out to be a clearly superior method of resolving very small claims.

D. The Toxic Tort Bench Trial

Now, let us turn our attention from preliminary or low-value matters to a category of cases in which the decision between live and paper procedures will be much more challenging: The resolution of tort claims premised on exposure to allegedly dangerous chemicals. Such cases involve many added wrinkles beyond the "ordinary" trial; most

180. Note that to say this is not to suggest that the financial consequences of a mistake in a small case do not matter to the parties. But from an economic perspective, an increased chance of losing a smaller amount of money is always preferable to a similar chance of losing a larger amount.

181. See, e.g., Steve Averett, *Small Claims Courts*, 16 B.Y.U. J. PUB. L. 179, 183 (2001) (noting that in Utah, a small claims judge will be responsible for questioning witnesses); Gerald Lebovits, *Small Claims Courts Offer Prompt Adjudication Based on Substantive Law*, 70 N.Y. ST. B. J. 6, 10 (1998) (noting that in New York, small claims judges "tak[e] active charge of the proceedings and examining witnesses").

significantly, from our perspective, plaintiffs will often have to establish, using scientific expert testimony, a causative link between exposure to a particular substance and infirmities suffered many years later.¹⁸² Let us presume, for the sake of simplicity, that the parties have consented to a bench trial, and that they are willing to consider the use of a paper procedure in order to conserve costs. So the question is presented squarely to the court: Is a paper trial the best way of resolving this case?¹⁸³

Here, it will be hard to clearly decide between the procedures on the basis of accuracy criteria. For the sake of analysis, we can break down our hypothetical case into two important things that a plaintiff must prove. First, was she exposed to a chemical produced by the defendant, and second, did that substance cause her subsequent maladies?¹⁸⁴ The first issue mainly involves historical proof—subject to significant uncertainty in the large subset of cases that involve a long latency period—with the same concerns we normally have regarding demeanor and appearance bias. The second issue, however, involves very little focus on the plaintiff's credibility and instead requires a lengthy excursion into the arcana of scientific evidence. In such a setting, the risk that paper briefing will be confusing or vague becomes more significant, and the value of dialogue between judges and expert witnesses rises. To a large extent, then, the accuracy inquiry will depend on which aspect of the case predominates: In some “mature” types of toxic torts, causation might be clearly established by precedent, so that the main question is whether the plaintiff was exposed to the substance as a result of the defendant's actions.¹⁸⁵ Other cases, however, might involve a single supplier of a substance and little dispute on exposure, with the inquiry turning entirely on the scientific causation question.¹⁸⁶

What then of the other factors? Given the complexity described above, it should neither be surprising that toxic tort cases often last longer than the typical trial nor that the use of testifying scientific

182. See Jamie A. Grodsky, *Genomics and Toxic Torts: Dismantling the Risk-Injury Divide*, 59 STAN. L. REV. 1671, 1677-78 (2007); J. Michael Veron, *The Trial of Toxic Torts: Scientific Evidence in the Wake of Daubert*, 57 LA. L. REV. 647, 648-49 (1997).

183. See *Gingras v. Prudential Ins. Co. of Am.*, No. 06 C 2195, 2007 WL 1052500, at *7 (N.D. Ill. Apr. 4, 2007) (considering whether a paper trial was the best way of resolving a dispute even though all parties had consented to the procedure).

184. Veron, *supra* note 182, at 648.

185. See Samuel Issacharoff, *Governance and Legitimacy in the Law of Class Actions*, 1999 SUP. CT. REV. 337, 343, 357 (providing modern asbestos claims as a paradigmatic example of such a “mature” toxic tort).

186. See Young K. Lee, Note, *Beyond Gatekeeping: Class Certification, Judicial Oversight, and the Promotion of Scientific Research in “Immature” Pharmaceutical Torts*, 105 COLUM. L. REV. 1905, 1908-09 (2005) (describing the “immature” tort category, in which claims of scientific causation are novel and undeveloped in previous cases).

experts makes these long trials even more expensive.¹⁸⁷ To the extent that a paper trial can reduce the need for lengthy witness-preparation sessions, decrease the need for expensive court days, and shift some of the lawyering labor to lower-cost associates, we might plausibly expect it to create significant cost economies as compared with a live trial.¹⁸⁸

By reducing the incentive to settle, the paper trial may increase voice opportunities as well.¹⁸⁹ In some cases, the issue of voice will be of reduced significance, in particular in cases where the plaintiff would not be testifying even in a live proceeding.¹⁹⁰ In others, a court will need to weigh the extent of possible cost reductions and their impact on likely voice opportunities, as well as any concerns about difficult credibility judgments being undermined by demeanor and appearance bias, against the clarity gains that a live hearing might provide to the scientific causation questions. To the extent that the parties are stipulating to a paper procedure, a court might decide reasonably that the cost factors are quite significant and that the voice opportunity favors a paper decision over no decision, which could indicate that a paper trial is preferable. But, in the end, it is the court that has to render a decision that will depend on a clear understanding of the scientific dispute in the case. So if the court finds itself significantly troubled by the difficulty of comprehending the scientific issues on briefs alone and by the inefficiencies of trying to do so without an opportunity to interact with the experts themselves, the call might reasonably go the other way.

187. See Judicial Conf. of the U.S., Rep. of the Judicial Conf. Ad Hoc Comm, on Asbestos Litigation 10-14 (1991) (describing the complexity and lengthiness of asbestos-exposure trials).

188. One cost in particular where a significant economy could be realized is in the area of expert witness fees. For one thing, merely paying such witnesses to travel can be a significant burden. See MAUET, *supra* note 156, at 357 (noting that the travel costs of expert witnesses can be substantial). Moreover, expert witnesses will already have prepared a written summary of their findings in most cases, see FED. R. CIV. P. 26(a)(2)(B), making the additional costs of testifying duplicative of an already-prepared written submission.

189. See discussion *supra* Part III.

190. Testimony will be unlikely, for example, if the defendant has stipulated the issue of exposure and damages, or if these issues have already been resolved in the first half of a bifurcated proceeding. Cf. FED. R. CIV. P. 42(b) (giving the District Courts discretion to try issues separately). On the flip side, however, we should not necessarily discount the importance of voice on the defendant's side, even if the defendant party is a corporation that cannot "speak" in a literal sense. Although the nominal defendant may not have feelings or expectations that can be violated in a low-voice condition, it is nevertheless made up of individuals whose experiences should be counted in the procedural justice calculus. Cf. *Citizens United v. Fed. Election Comm'n*, 130 S. Ct. 876, 928 (2010) (Scalia, J., concurring) (urging that "the individual person's right to speak includes the right to speak in association with other individual persons," even if the form of association is a business corporation (emphasis omitted)). Indeed, to the extent that the perceived legitimacy of the proceedings implicates decree-following and law-compliance concerns, society's interest in encouraging such compliance may be *heightened* when the party at issue is a powerful corporation.

E. The Civil Rape Bench Trial

Finally, let us consider an example in which the accuracy interest and the subjective fairness interest collide with unusual severity: a civil rape trial.¹⁹¹ Victims of sexual assault appear to be raising such claims with increasing frequency,¹⁹² often suing both the claimed assailant and third-party defendants who, they allege, failed to employ reasonable precautions to prevent sexual assaults on their property.¹⁹³ Although these claims might traditionally seem like obvious candidates for live, confrontational trials, paper procedures are arguably superior in most instances.

First, the accuracy factor will generally favor a paper trial in these cases. The factual dispute in civil rape cases will often boil down to a simple swearing contest between the alleged victim and the alleged perpetrator.¹⁹⁴ In many cases, the victim and the assailant will be acquaintances or intimates, and the defense will be that the sexual contact was consensual.¹⁹⁵ The trier of fact will therefore be making a decision that hinges on whether the alleged victim or the alleged assailant is a more credible witness.¹⁹⁶

This is exactly the sort of case in which the live procedure is most likely to bias fair inferences regarding witness credibility. Nervousness and discomfort at testifying might result in a hesitant delivery that appears deceptive,¹⁹⁷ while a well-rehearsed, confident witness may inspire an amount of trust that is ill-deserved. Likewise, the possibility that judgments of credibility may be skewed in favor of those parties who are attractive, high-status, or who happen to share salient

191. Once again, for the sake of avoiding doctrinal complexities and focusing on the underlying policy question, we will assume that the parties have consented to a bench trial and are willing to consider a paper trial procedure.

192. See Ellen M. Bublick, *Tort Suits Filed by Rape and Sexual Assault Victims in Civil Courts: Lessons for Courts, Classrooms and Constituencies*, 59 SMU L. REV. 55, 58-59 (2006) (reporting a ten-fold increase in reported state-court appellate opinions on this subject between the early 1970s and the early 2000s).

193. *Id.* at 61.

194. See JEANNE C. MARSH, ALISON GEIST & NATHAN CAPLAN, RAPE AND THE LIMITS OF LAW REFORM 20-21, 35 (1982) (reporting data showing that less than half of the criminal sexual conduct cases studied involved charges that the defendant either employed actual force or threatened force involving a deadly weapon). In the absence of injury, many rape cases will necessarily rely on competing testimony about conduct and apparent consent.

195. See JENNIFER TEMKIN & BARBARA KRAHÉ, SEXUAL ASSAULT AND THE JUSTICE GAP: A QUESTION OF ATTITUDE 11 (2008) (noting that, in a majority of the most severe sexual assaults reported in the British Crime Survey, the victim and perpetrator were intimates); Susan J. Lea, Ursula Lanvers & Steve Shaw, *Attrition in Rape Cases: Developing a Profile and Identifying Relevant Factors*, 43 BRIT. J. CRIMINOLOGY 583, 590 (2003) (noting that the victim and perpetrator are intimately related in twenty-four percent of reported cases and that they are acquaintances or relatives in fifty percent of the cases).

196. TEMKIN & KRAHÉ, *supra* note 195, at 167-68.

197. *Id.* at 129 (describing the ease with which defense barristers can undermine a nervous rape complainant's credibility).

characteristics with the fact-finder is deeply troubling, suggesting a danger that the system will subtly but systematically privilege powerful people with the right to sexually victimize the less-fortunate.¹⁹⁸

As to the subjective fairness considerations, the analysis is more nuanced. In such suits, the ability of a victim to voice her complaint in an authoritative forum takes on particular importance, especially in light of the underwhelming success of the criminal justice system in obtaining convictions in rape cases.¹⁹⁹ If police or prosecutors do not consider her case to be worth pursuing, a civil court may be the only forum in which the victim can express her grievance and seek an official declaration that she was wronged.²⁰⁰ And the accused defendants, being publicly charged with breaching some of society's bedrock norms, may have a profound desire to personally counter the accusations and confront the accuser.

Nevertheless, there are also strong subjective fairness reasons why we might wish to avoid a live rape trial. Many rape plaintiffs will have suffered substantial psychological trauma and may be very reluctant to be physically present in the same room with their attacker.²⁰¹ So although they might desire "voice" to the extent that they want to tell their story and have it recognized by legal officials, they may find the traditional trial environment more threatening and unpleasant than a deposition would be. So although there are still very real voice concerns in these cases, some of which (such as the defendant's preferences) might still counsel in favor of a live trial, there are also subjective fairness reasons to favor a paper procedure.

The best way to handle such a situation—where accuracy concerns counsel strongly in favor of a paper trial, but where at least one litigant may feel very dissatisfied with that mode of proceeding—is to go ahead with the paper trial while doing everything that is possible to make it palatable. As outlined above,²⁰² the negative voice effects of paper-based procedure can be minimized via a number of methods. First, the court can try and provide alternative avenues for party expression, even if those opportunities do not directly contribute to the evidentiary basis of the decision. If trying to maximize the parties'

198. Cf. Brandon L. Garrett, *Judging Innocence*, 108 COLUM. L. REV. 55, 66 (2008) (noting that members of ethnic minority groups are "overrepresented . . . among rape . . . convicts," and also that they are more likely to be exonerated for their crimes than is the norm among rape convicts).

199. See Joan McGregor, *Introduction to Symposium on Philosophical Issues in Rape Law*, 11 LAW & PHIL. 1, 2 (1992) ("The likelihood of a [rape] complaint actually ending in conviction is generally estimated at two to five percent."); see also David P. Bryden & Sonja Lengnick, *Rape in the Criminal Justice System*, 87 J. CRIM. L. & CRIMINOLOGY 1194, 1209 (1997) ("The relatively few cases that proceed to trial often end with an acquittal or a hung jury.").

200. See Bublick, *supra* note 192, at 68.

201. See Melanie Randall, *Domestic Violence and the Construction of "Ideal Victims": Assaulted Women's "Image Problems" in Law*, 23 ST. LOUIS U. PUB. L. REV. 107, 136-37 (2004).

202. See *supra* Part III.

trust in a paper-based procedure, a court could first encourage them to participate in a non-binding form of alternative dispute resolution—such as a summary jury trial²⁰³—in which they would be able to voice their disputes without biasing a decisionmaker who would issue a binding judgment in their case.²⁰⁴ If the parties do not settle after this initial exploration of their dispute,²⁰⁵ the court can explain the need for an absent procedure and seek the parties' explicit consent, thus explicitly tying the procedure to a desire for fair adjudication. This may reduce the likelihood that the parties will perceive the court's desire to dispense with a hearing as a signal of disrespect for the parties or as an indication that the court does not take their dispute seriously. Next, after it has reached a view of the merits of the case based on the written submissions, the court could permit the parties to briefly articulate their claims in open court, if they wished, before announcing that decision. This will allow those parties who desire further opportunities for voice to speak directly to the court while minimizing the likelihood that their expressive opportunity will decrease the accuracy of the decision. Finally, when announcing its decision, the court should summarize the parties' main arguments and testimony and then explain its reasons for accepting one account and rejecting the other, thus clearly indicating that it considered their written submissions with care. With such an approach, a court can assure that the decision is as accurate as possible while minimizing any loss of legitimacy that might arise from the use of a paper-based procedure in such a delicate setting.

With these examples, a few things have hopefully become clear. Although the demeanor-evidence rationale for preferring live adjudication as a means of resolving evidentiary disputes has little to recommend it, there are many situations in which a live hearing is nevertheless the best way to proceed. Indeed, at early stages of a lawsuit and in low-stakes cases, hearing-based procedures will usually be preferable to paper-based ones. But, in higher-stakes disputes with a

203. A summary jury trial is a "non-binding abbreviated trial[] by mock jurors who are chosen from the jury pool." Donna Shestowsky, *Improving Summary Jury Trials: Insights from Psychology*, 18 OHIO ST. J. ON DISP. RESOL. 469, 470 (2003) (quotation marks omitted). The goal is to have the summary jurors issue a verdict that can "provide the starting point for settlement negotiations." *Id.* at 471.

204. Ideally, such a procedure would incorporate protections for the privacy and trauma of the plaintiff, such as separating the two parties so that they do not come into contact when they speak before the summary jurors.

205. Note that the concern discussed above—that settlement would harm parties by excluding voice opportunities—could be mitigated here, if the summary jury procedure was modified to incorporate opportunities for the parties to testify briefly. *Cf. id.* at 472 & n.13 (noting that live witness testimony is normally not employed at a summary trial, but that it is an option that lawyers sometimes elect); Thomas R. Mulroy, Jr. & Andrea B. Friedlander, *Trial Techniques: A Discussion of Summary Jury Trials and the Use of Mock Jurors*, 24 TORT & INS. L.J. 563, 564 (1989) (noting that lawyers can choose to present live witness testimony "in abbreviated form").

well-developed record and an incentive to extensively prepare for a hearing, both accuracy and cost considerations start to favor paper procedures, and the overall decision becomes more nuanced. In some cases, if credibility is of less importance but the need of the court to comprehend complex evidence is a more pressing concern, a hearing may still be preferable. But in cases in which credibility is a central concern and a great deal rides on the accuracy of the outcome, it may be best for courts to employ paper-based procedures if they are available, in order to avoid the biasing effects of witness demeanor and appearance, while attending carefully to the consequences of such an approach on participant and observer assessments of procedural fairness.

F. Implications for Law Reform

The above analysis suggests that in some respects, such as our tendency to use oral hearings to resolve very small cases, or the preference of some courts for oral evidentiary hearings at the preliminary injunction stage, our legal systems are striking an appropriate balance between the accuracy, the perceived fairness, and the costs of fact-finding procedures. In other respects, however, our approach to fact-finding in civil cases seems upside-down. Most notably, paper-based fact-finding is rarest at the end of cases, which is precisely when it is likely to be most useful. Moreover, courts faced with choosing between live and paper-based procedures often fall back on the faulty premise that credibility conflicts favor live hearings, when in fact they favor a paper-based approach. So, there is clearly a large amount of room for improvement.

Luckily, actors at all levels of the legal system can make choices that will help remedy the defects of our present system. Lawyers can get better justice at lower cost by attending to the real costs and benefits of these differing approaches to fact-finding and by asking for procedures that will actually serve their interests. Judges, likewise, can exercise their discretion to hold more live evidentiary hearings early on in the evolution of cases, when they will be most useful. On the flip-side, judges should be more willing to employ paper-based procedures at the trial stage, especially if the parties have consented to them, even if the controversy involves credibility disputes. Their freedom to do so may be limited by the practical constraints of the jury trial process, but they should feel freer to experiment with paper-based fact-finding in lieu of bench trials.

Much of the blame for the present situation must lie with rule-makers, however. The complex policies in this arena no doubt make it hard to write categorical rules requiring live fact-finding in some settings and a paper-based process in others. But other approaches would improve on the current model. Let us consider, for example, the Federal Rules of Civil Procedure. These rules are mostly silent

regarding how pretrial fact-finding is to be conducted when it is necessary,²⁰⁶ and Rule 43(c) suggests that judges may choose freely between affidavits, depositions, and oral testimony when finding facts during motion practice.²⁰⁷ Moreover, they suggest (although they do not explicitly state) that paper trials are improper: Rule 43(a) requires that, “[a]t trial, the witnesses’ testimony must be taken in open court,”²⁰⁸ and Rule 52 instructs that “[i]n an action tried on the facts without a jury or with an advisory jury, the court must find the facts specially and state its conclusions of law separately.”²⁰⁹ Although some judges read the language of Rule 52 to permit paper trials,²¹⁰ the phrase “tried on the facts” seems to invoke Rule 43’s mandate of oral proof at trial, and (perhaps because of these doubts), courts generally proceed to try cases on paper only by consent of both parties, requiring in effect a waiver of the right to an oral trial.²¹¹

A better approach would give trial judges explicit discretion to choose between the two procedures in all fact-finding settings, thus allowing room for judges to decide between the procedures on a case by case basis. At the same time, such a rule should provide guidance as to which factors weigh in favor of each approach, given the poor state of judicial intuitions on this subject. Finally, given the significant accuracy and cost advantages that can often be attained by using a paper trial, the rules should allow courts to dispense with live procedures in some cases where both parties do not consent to the procedure. A good rule might provide as follows:

- (1). At all stages of cases tried to the bench, or when pretrial fact-finding is necessary in jury-trial cases, the court may find facts based either based on paper submissions (which may include affidavits, deposition testimony, and documentary evidence) or based

206. See, e.g., FED. R. CIV. P. 12 (setting forth a number of pretrial motions that can result in the dismissal of a case, some of which require factual proof, but giving no guidance as to how such facts should be demonstrated); FED. R. CIV. P. 19 (similarly silent as to the method of proving the facts necessary to support dismissals for failure to join necessary parties); FED. R. CIV. P. 23 (silent as to how parties should prove the factual basis for class action certification); FED. R. CIV. P. 37 (silent as to how parties should prove the existence of discovery violations when seeking sanctions); FED. R. CIV. P. 65 (referring to preliminary injunction “hearing[s]” but not specifying whether they should involve testimony or whether argument on affidavit evidence is sufficient). The primary exception to this silence is Rule 56, which provides that parties seeking summary judgment should show the absence of disputed facts using paper submissions of affidavits and depositions. But this is the exception that proves the rule, because motions for summary judgment do not require the court to engage in actual fact-finding, but rather require only the identification of factual disputes. See FED. R. CIV. P. 56(a).

207. FED. R. CIV. P. 43(c) (“When a motion relies on facts outside the record, the court may hear the matter on affidavits or may hear it wholly or partly on oral testimony or on depositions.”).

208. *Id.* 43(a).

209. *Id.* 52(a)(1).

210. See Denlow, *supra* note 37, at 31, 34 n.6. (collecting cases).

211. See, e.g., *id.*; *Acuff-Rose Music, Inc. v. Jostens, Inc.*, 155 F.3d 140, 142-3 (2d Cir. 1998); see also *Market Street Assocs. Ltd. P’ship v. Frey*, 941 F.2d 588, 590 (7th Cir. 1991).

on live witness testimony.

(2). In exercising its discretion to choose between these methods of proof, the court should be guided by the following principles:

(a) Early in a case, live testimony is usually preferable for reasons of cost and clarity.

(b) Later in a case, including at the trial stage, paper proof will often be more accurate and less expensive.

(c) To the extent that credibility disputes arise, a paper procedure is likely to be more accurate than an oral one. Therefore, a desire to observe the demeanor of witnesses when making credibility determinations is not a proper reason to order live presentation.

(d) The joint consent of the parties to either mode of evidence presentation counsels strongly in favor of that method, but is not dispositive.

(e) The court may allow a brief statement from each party before issuing its decision in a paper trial case, in order to give aggrieved litigants an opportunity to address the court directly without undue risk of biasing the resulting decision.

Although an admittedly radical change from present practice, such a rule would do a much better job balancing accuracy, satisfaction, and costs than the approach currently embodied in federal rules and practice.

VII. CONCLUSION

As we have seen, the conventional wisdom regarding live evidentiary hearings and trials—that they increase the accuracy of decisions by allowing fact-finders to use witness demeanor to make better credibility calls—is wrong. In fact, the live appearance of witnesses has a much larger downside than judges or commentators have previously appreciated; in addition to the fact that demeanor cues generally impair, rather than aid, credibility judgments, there are a number of cognitive biases that may arise from having one's first impressions of a witness be *visual* and *auditory* impressions. These include a persistent human tendency to trust or distrust witnesses based on their physical attractiveness, their social status, their race, or other features that may make them similar to, or different than, the decisionmaker.

But the fact that live testimony rarely aids credibility judgments does not make it useless. Sometimes live presentation allows for more effective witness examination—although this opportunity will grow less likely if a witness is well prepared to rebut cross-examination questions. More commonly, a hearing or trial provides a forum in which a judge can interact with witnesses, enabling her to cut through confusion or evasion with her own questioning. In addition, live proceedings often *feel* fairer to participants than paper-based decisions, due in large part to the desire to have expressive input in decisions that affect us. And sometimes a live hearing may be preferable for reasons of cost or practicality.

In the end, it would be naïve to suggest that one procedure is preferable to the other in all possible circumstances. Instead, when deciding which procedure to favor, a decisionmaker—whether it be a lawyer deciding what to ask for, a judge exercising a discretionary choice between alternatives, or a rulemaker trying to guide or constrain that discretion—should attend to the situational costs and benefits of each procedure. In general, live procedures will be more useful early in the life of a case, and in low-value, highly cost-constrained cases, whereas paper procedures will usually be preferable for late-stage fact-finding. This means that the dominant approach to fact-finding in American civil procedure—in which a largely paper-based pretrial process is followed by a live trial—has little to recommend it. Although the constitutional right to a jury trial may place limits on our ability to design a better system, one obvious reform implication is to give trial courts the discretion to choose freely between live hearings and paper trials in cases tried to the bench, and encourage them to use each procedure when it is most advantageous. To that end, I hope the enumeration of relevant policy factors in this Article, as well as a proposed rule to implement those factors into day-to-day court decisionmaking, may serve some use.