# Arbitration in Anarchy

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**Abstract:** The paper investigates the prospects for "neutral" arbitration in anarchy, in which the parties to a dispute have no recourse to legal dispute resolution. A neutral arbitrator settles disputes according to some standard or norm. In anarchy the imposition of such a norm may reduce the likelihood that both parties will either agree to arbitration ex ante or comply with it ex post. This implies that, in anarchic settings, an arbitrator must take into account facts about the relative powers of the parties to prevail in a fight if it is to promote peaceful conflict resolution. Neutral norm enforcement is possible when the arbitrator has some coercive power permitting her to force the disputing parties to appear and accept her proposed settlement. In other words, neutrality can be achieved insofar as the power of the arbitrator approaches that of a court backed by a state. We show that some degree of neutral norm enforcement is also possible under weaker conditions, without the need for the power to coerce. Key conditions for approximately neutral arbitration are that the gains from arbitration are large and power asymmetries are not too extreme.

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## Introduction

In this paper we study arbitration in anarchy. Normally an arbitrator cannot be appointed unless the disputing parties make a request and cannot succeed unless the parties participate and accept the settlement. Thus an arbitrator always needs some consent from the parties.[2] This requires her to take account of the strengths of the disputants should they decide to return to the fight. A successful arbitrator needs to have the cognitive capacity to figure out what settlements are feasible in the sense of satisfying the incentive constraints under which she operates – both in attracting new business and in getting parties to comply. Of course it would be valuable if the arbitrator was also powerful and able to impose solutions, but we argue that arbitration can be succeed without power, at least to settle some disputes. We expect moreover that successful arbitrators will tend to accrue power which can enable them to settle a wider range of disputes. This view is admittedly simplistic, but it seems to us that in anarchy smart and relatively powerful arbitrators would seem to have a competitive advantage.

One reason to study arbitration in anarchy is that it offers a way to understand the development of a state and its legal system. We think that a plausible model of state formation sees proto-states gradually accruing the capacity to settle a wider range fights between more and more contestants. This seems to trace more or less the way that some medieval princes gradually extended their writs, getting powerful lords to attend their courts and resolving their disputes without too much fighting. Not every prince was able to do this. This heterogeneity may have to

[2] By contrast, When there is a state "...the arbitration process involves a delegation of the power of the state... the exertion of this power will channel conduct within or between institutions ... and thus have consequences with which society must be concerned...." In this setting "...arbitration ... is the aftermath of contract. Contract is the law of the parties; it is special rather than general or universal law. The general legal norm is that contracts are binding." Kenneth Carlston, "Theory of the Arbitration Process," Law and Contemporary Problems, vol. 17 (1952), no. 4, p. 635. Things are very different in anarchy: there may be contracts but they are not binding in the way they are if there is a state run legal system. The only way for a contract to bind in anarchy is for it to be self enforcing or, as we say it, incentive compatible.

do with facts about how power was distributed at some early period; but we think it may, as well, depend on something else: on the comparative cognitive capacities of arbitrators. Some arbitrators might have been better able to assess the strengths of disputants and determine mutually acceptable settlements.[3]

E.E. Schattschneider started one of his little books by describing a fistfight between two men in front of a crowd of people who were cheering and booing the participants.[4] He argued that this (*triadic)* situation was unstable because once one of the parties started to get the worst of it, he had a strong motive to appeal to the third party, the crowd, for help. Such an appeal was not necessarily to an *impartial* party but to a *powerful* and somewhat unpredictable one. The crowd may well have been *independent* from the fighters in the sense that it was not under either's control, but there was no reason to think it would be impartial as between them. What was important about the crowd is that it had the brute power to determine the outcome.[5] Schattschneider argued that bilateral conflict is inherently unstable in this sense – always conferring on the weaker party an incentive to try to widen the conflict in order to try to reverse an unfavorable balance of power. Of course fights normally end, perhaps when there is no nearby powerful party to whom the loser can appeal. In effect, Schattschneider presents a model of anarchy in which some parties are simply powerful enough to settle fights. It resembles the

[3] The story depicted on Achilles shield in Book18 of the Illiad is the classic example: an aggrieved person testifies in front of a council of elders about what has been done to him and asks for redress. Then each member of the council suggests a solution (a potential remedy) and the one whose "dike" is most straight (ie. Whose proposed settlement is most just) is the settlement given to the disputant. See Eva Cantarella, "Private Justice and Public Justice," *Punishment and Society* 3, 4 (2001): 473-483.

[4] E.E. Schattschneider, The Semi-Sovereign People (1960).

[5] The loser may try appeal to some external norm – in our sense to neutrality. He may cry for help on the ground of the unfairness of the fight or the cruelty of the winner. That might actually be the best way to drag the crowd into the fight.

world that Hobbes invoked to argue that disputants ought rationally to consent to be ruled by a powerful entity who will impose the peace.

Writing about other fights, Martin Shapiro has argued that the "triad" – in which a third party is appealed to by disputants to settle an argument – is at the core of any system of dispute resolution.[6] The judge or arbitrator presents herself as independent of both parties (i.e. not under the control of either of them) and, at least initially, as impartial between them. While she may be powerful enough to shift the balance to one side or another as a result of her decision, the judge must ordinarily seek the consent of the parties to appear before her and to comply with her proposed settlement. In this sense dispute resolvers must make their courts attractive to the parties as a place to resolve their problems and must find ways to encourage compliance by the loser. Shapiro presents an alternative version of anarchy: a prudent judge without coercive power, who must settle disputes as she finds them, using only the resources of her own intelligence and guile.

Shapiro's genius was to set the study of courts in a comparative context – recognizing that judges operate in a wide variety of institutional settings, up to and including anarchy. This allowed him to see that the powers of, nominally distinct, judges and arbitrators shade into one another. In some circumstances judges are not more than arbitrators; in others arbitrators are judges in all but title. By focusing on judicial institutions in developed societies with highly articulated legal systems the traditional literature often fails to recognize the gradation between arbitrator and judge. And it fails to recognize the continuing role of negotiation and mediation in dispute settlement even in advanced systems. Many parts of the justice system in the US, for

[6] Martin Shapiro, Courts: A COMPARATIVE AND POLITICAL ANALYSIS (University of Chicago Press, 1981).

example, are predicated on negotiation and mediation (in pretrial bargaining and in the use of arbitration in commercial contracts, etc.). Smaller literatures, found in legal anthropology and international law, consider the operation of dispute resolution institutions other settings such as systems of customary norms, without an effective state to enforce them.[7] There might be an international tribunal or a council of elders but neither has the power to coerce the parties to follow international or customary laws. In either of these cases there are normative standards, separate from the material powers of the disputants, which may be applied to settle disputes.

We are interested, here, in the role dispute resolvers might play in a situation of anarchy -- where disputes are settled by fighting – but where there may be (underenforced) norms to guide how disputes should be settled. We suggest that in such situations, which we might think of as the original core of dispute resolution, an arbitrator can help the parties by providing information as to what their relative strengths are, allowing them to save the cost of fighting.

Dispute resolvers need to present their court as impartial between the parties, at least until the facts of the dispute are heard. Impartiality may not be sufficient to attain consent to judicial rulings even if they represent compromises of this kind: why would the party that expects to prevail in a fight – the stronger party in the particular dispute – ever agree to submit the dispute to an impartial court in the first place? And why would the losing party in court comply with an adverse ruling? Another method is to resist naming winners and losers, choosing instead to propose a compromise or intermediate solution. A third option is for the arbitrator to restrict her settlements to those that are incentive compatible – settlements that would be self-enforcing. We explore this option below. Such an arbitrator would have solved the compliance problem but at

[7] Peter Stein, Dispute Resolution (1982); Tom Ginsburg and Richard McAdams, *Adjudication in Anarchy*, Wm. and Mary L. Rev. (2004); Oona Hathaway and Scott Shapiro, *Outcasting*, Yale L. J. (2011).

the cost of reaching "good" or fair settlements, that accord with some external notion of justice. Still, we shall see that an arbitrator may sometimes be able to impose just outcomes.

We agree with Shapiro that the contrast between judge and arbitrator is an exaggeration and that the distinctive powers of the judge rise and fall with state power. Still, even in advanced legal systems in powerful states, mediation and arbitration are often preferred means of settling disputes, partly because they offer efficiency gains. We think, however, that Shapiro underemphasized two characteristic differences between judges and arbitrators: judges ordinarily have some power to get the disputants to court and to enforce the judgment against the loser. Her powers to decide cases are delegated legislatively and she can call on the executive to enforce her orders. In anarchy, however, the arbitrator is not exercising a delegated power of the state: she is acting, in effect, only on behalf the parties, but she is not free to make use of the powers of the parties in any way she pleases.[8]

All the arbitrator can count on is her own cognitive capacities (ie. intelligence) to hear and determine facts as well as norms and make the settlement of a dispute turn on such matters. Judges, by contrast, normally have the obligation to decide disputes according to a party-

[8] The distinction between anarchy and the state is an analytical exaggeration. For more than a century, arbitration has spread beyond state boundaries and often does not call upon any state to enforce arbitral terms. Rather, reliance is placed on the "moral" (or reputational) sanctions. Referring to practices of international arbitration, Owen Young (former president of the Commercial Arbitration Committee of the US Chamber of Commerce) said as early as 1921 "Before agreeing to conduct an arbitration outside the law, even when both parties should join in a request, the International Chamber should be convinced that the business men of both countries concerned are sufficiently well organized and that the business organizations are willing to exert moral pressure, if need be, in favor of carrying out the arbitration decision outside the law, and are sufficiently influential to make such pressure effective." See Jan Paulson, "International Arbitration in Three dimensions," LSE Law, Society and Economy working papers 2/2010. p. 22. Paulson argues that the refusal to rely on domestic legal systems is the 'reality' of most modern commercial arbitration. He recognizes that this circumstance is puzzling: "The fluid legal order in which arbitration operates undoubtedly works in practice, but, as the old joke asks: will it work in theory." (p. 23) Our guess is that many of the disputants in international commercial disputes are essentially repeat players for whom reputational motivations would be reliable. In any case, the subject of commercial arbitration mostly concerns ordinary contractual disputes where, but for jurisdictional diversity, the conflicting parties have legal rights to state enforcement. This is not, to our minds, a circumstance of pure anarchy but one similar to the famous Milgrom, North and Weingast analysis of the Law Merchant in the Hanseatic League.

independent (legal) norm – that is, according to law. An arbitrator may not generally have that duty but she may find it prudent to base her arbitration on law (or other norms). Indeed in many cases, she may be bound to decide disputes according to what the parties have agreed to contractually, prior to the actual dispute. In effect, then, we can think of a four cell table. Schattschneider's crowd is an example of an independent entity with power but no intelligence, Shapiro's arbitrator has intelligence but no power; and the judge has both intelligence and power. There is no apparent need to worry about the missing category.

In any case, an arbitrator must offer a forum sufficiently attractive to both disputing parties ex ante that they are willing to show up voluntarily. A judge, on the other hand, normally must only get one party to appear. The other may then be forced or induced to show up or else to forfeit something of value. And a judge may have access to the coercive power to force the losing party to pay, except in extreme cases. An arbitrator's rulings must also be incentive compatible ex post or they may be ignored by one party or the other. Or they will be appealed to some other forum – either to the legal system, if one exists; or to heaven (the battlefield). In effect, this means that the arbitrator works in the shadow of any forum to which the parties may resort. This implies that an arbitrator's substantive rulings must be sensitive to the powers of the disputing parties in the outside forum if they are to impose a settlement that is to take effect. If that forum is a legal system, her rulings must respond to the legal positions of the parties; if it is anarchy, a battlefield, rulings must reflect the fighting powers of the adversaries.

We begin by introducing the concepts of power, neutrality, and impartiality, as we use them. Part II introduces different types of disputing situation. Part III develops a formal model to demonstrate the multiple equilibria that are possible, and to show that dispute resolution is possible without neutral norms (no surprise), but that arbitrators can to some extent impose

neutral norms as well. Part IV provides illustrations from dispute resolution in pre-state situations, in which a crowd or a set of elders arbitrates, with neutral norms that are incomplete. Part V concludes with a discussion of implications.

## I. Power, Impartiality, and Neutrality

If the losing party had no incentive to comply with an adverse decision, why would both parties submit the dispute to arbitration in the first place? One possibility is that the parties have inconsistent beliefs: both sides expect to win. Perhaps the arbitrator is *physically* powerful enough to step in without getting the agreement of the parties, as in the case of Schattschneider's crowd (which could presumably step in forcefully to determine the outcome whether or not either party wants it to). Perhaps the power of a state stands behind her judgment so that the police or army will enforce whatever settlement she proposes. These are special cases in which the parties have irrational beliefs or where the arbitrator has the powers of a judge. Such situations cannot be the foundation for a pure theory of arbitration. The "general" feature of an arbitrator is that, though she lacks the power to force compliance, she has only some **cognitive capacity** to find a settlement that accurately and credibly reflects what the outcome of fighting would be so that the costs of actual battle can be avoided.[9] A general theory must be based on this capacity and not on appeals to irrationality or power.

We define an impartial arbitrator as one whose proposals represent a prediction, unbiased by irrelevant features of the disputants (such as their identities), as to what would happen in a fight. Note that the idea of impartiality as we define it applies both to anarchy and to the case of a legal system. In the special case of legal system to which the parties can appeal, an impartial

[9] Richard McAdams, *The Expressive Theory of Law,* 2005 Illinois Law Review (2005).

arbitrator will propose a settlement that accurately reflects the *legal* strengths of the disputants, permitting them to avoid the costs of litigation. Note that this prediction must be based substantially on normative or legal analysis: determining what the law requires if the case goes to court.[10]

If fighting (or litigating) is very costly it is easy to see the value of an impartial arbitrator to potential disputants. Nevertheless, it may be difficult for the parties to agree to arbitration once a dispute has arisen. The parties may disagree about what grounds are appropriate to settle their dispute. They may have different interpretations of the facts of the dispute or about their relative strengths. Disagreements of these kinds may make one or both hesitate before agreeing to arbitration once a conflict has broken out. Finally, after arbitration, there is the problem of compliance. An arbitrator, like Shapiro's judge, will ultimately make a decision that will in fact favor one party or another and the losing party may be unwilling to pay.

In principle, an impartial arbitrator could resolve these issues by informing the parties of their true relative strengths in battle and imposing a settlement that apportions shares proportionate to their strengths. But how can parties be convinced about the outcome of unfought battles? This is a hard question but we think there are two general ways of doing this: reputational and procedural. An arbitrator can, we suppose, gain a reputation for impartiality by successfully (and publicly) settling a lot of disputes and perhaps having failed settlements come out as they had predicted. Or, she could adopt procedures for gaining information that are likely to accurately reveal the parties strengths. The arbitrator might simply flip a fair coin (one which both parties can publicly verify is fair) to settle the question. Such a procedure would rarely

[10] Of course, the legal system may, to some extent, corrupt. If so a good arbitrator would have to engage in a "realist" analysis of what a judge or jury would do in a trial.

reflect the actual strengths of the parties so a party which saw itself as strong would not rationally agree to arbitration by means of (fair) coin flipping. Alternatively, the arbitrator could commit (somehow) to procedures giving each party an equal institutional role in the proceedings. For example, in many contexts arbitration panels are composed by having each party pick a member and then having the two appointees pick the third member. But why would the stronger party agree to this?

Impartial institutional solutions must therefore give more institutional weight to the stronger party. She could flip a strength-weighted coin. While this method may be attractive to the parties ex ante, it may not be enforceable ex post. Besides, if she actually could measure the strengths, why not allocate spoils based on those without the random element? Further procedural mechanisms can be imagined as well, such as a requirement that each party be permitted to present its case and rebut the arguments of the other side, where the arbitrator is to decide which has the better argument (where "better" means more likely to resolve the dispute without a fight). In anarchy this would amount simply to having each side try to convince the arbitrator of its strength in battle. In a legal setting, the better argument is the one more likely to prevail in a court under existing relevant doctrine. In any case, if arbitration is to succeed, the proposed settlement must be at least roughly proportionate to the strengths of the parties and therefore its institutions must work to induce the revelation of those strengths to the arbitrator and (through arbitration) to the parties.[11]

[11] Tom Tyler, Why People Obey the Law (2006).

Commentators who make their living doing arbitration often seem to run the concepts of neutrality and impartiality together.[12] In our conception, an impartial arbitrator bases her proposed settlement on her unbiased estimate of the comparison of the strength of the disputants.[13] A neutral arbitrator, by contrast, provides rulings that implement a party-independent norm.[14] If there is a legal system capable of enforcing its judgments, neutrality and impartiality are the same.[15] This is because a legal system, insofar as it is not a sham, has the capacity to enforce party independent (legal) norms on the parties.[16] In a legal system an arbitrator would rationally propose a settlement that accurately reflects the outcome had the dispute been fought in court. That is the best way to avoid costly litigation. If the dispute reaches a court the normative standard that would be applied by the judge is provided by law, and law is presumably independent of the material strengths of the parties.

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[12] One definition that we found defines neutrality this way: ""Arbitrator" and "neutral arbitrator" means any arbitrator who is to serve impartially…" Another website puts it similarly: "A Neutral Arbitrator is an impartial person assigned to hear and decide a case."

[13] The International Bar Association's set of non-binding guidelines for international arbitrators defines partiality as arising "where an arbitrator favors one of the parties, or where he is prejudiced in relation to the subject-matter of the dispute." International Bar Association, Ethics for International Arbitrators, *reprinted in* 26 I.L.M. 583, 585-86 (1987), Section 3(1). As a matter of federal law, the Federal Arbitration Act allows courts to vacate an award rendered in the United States for "evident partiality" of an arbitrator. 9 U.S.C. § 10(b) (1999). The leading case involving "evident partiality" is the United States Supreme Court case of *Commonwealth Coatings Corp. v. Continental Casualty Co.,* in which the Supreme Court vacated a unanimous award after it was revealed that the "neutral" arbitrator had failed to disclose that he had provided consulting services to one party over a five-year period. 393 U.S. 145, 151-52, 89 S.Ct. 337, 21 L. Ed. 2d 201 (1968). In a plurality opinion, Justice Black stated that arbitrators, like judges, must not only avoid bias but "even the appearance of bias." Id. at 150. Later opinions have defined "evident partiality" to exist when a reasonable person would believe that the arbitrator was partial to one party.

[14] The State of California's standard for arbitrator neutrality requires compliance with a legislated code: Code of Civil Procedure section 1281.85 provides that, beginning July 1, 2002, a person serving as a neutral arbitrator pursuant to an arbitration agreement shall comply with the ethics standards for arbitrators adopted by the Judicial Council pursuant to that section. On internal and external perspectives see H.L.A. Hart, The Concept of Law, 1961.

[15] This is not quite accurate as stated. An arbitrator and judge may have different legal theories which lead them to different views of which party ought to prevail in a particular dispute. A good arbitrator would, in principle, try to decide a case as the judge would if the arbitrator's decision is appealed. But generally, there are many judges to whom an arbitrator's decisions could be appealed and each of them may have a different legal theory. We set this issue aside as our focus in this paper is on anarchy. In anarchy, however, it is necessary to recognize that battlefield outcomes are subject to chance. In this paper we simply assume that the arbitrator can form beliefs about how battles will play out.

[16] This is not to say that actual legal systems can do this perfectly. We have no doubt that the strong or rich do better than the weak. But that is a defect of any such legal system.

When the dispute would be decided by fighting an efficient arbitrator would be to seek a settlement that prevents a fight. In both cases – legality or anarchy -- the guiding arbitral norm is efficiency – avoiding a more costly method of settling the dispute. The difference between the two cases – enforceable legal system versus anarchy – is that in anarchy the arbitrator faces constraints that do not arise for an arbitrator in legal system. She has to induce disputants to appear before her; and she has to be convinced that both parties will comply with her decision. Both parties must see a reason to ask for arbitration – presumably to avoid the costs of fighting. And each party must find it advantageous to comply with the settlement rather than returning to the fight.

Where neutrality and impartiality come apart is in circumstances in which there are norms that apply to a dispute but which are not enforceable in a court. In that case a neutral arbitrator has normative reason to decide the dispute in a manner that may not exactly reflect the expected outcome of the fight (as an impartial arbitrator would). She does not seek to decide impartially but makes proposals that reflect the substantive norm to the extent possible. She may be unable to achieve full neutrality. But, as long as the costs of arbitration are small compared to the cost of fighting (or litigating), there may be settlements that would be sufficiently attractive to both parties (ex ante) to avoid costly fighting (ex post). This gives the neutral arbitrator some slack: her proposal may reflect their battlefield strengths sufficiently to avoid a fight, while getting the parties to comply with the norm to some extent. [17]

There are many such "intermediate" cases where disputes are subject to evaluation by normative standards but where, in the last resort, they can only be decided by fighting. Such

[17] Of course, if she is powerful enough to intervene in a dispute and back her own rulings by force, the ex ante and ex post incentive constraints can be ignored. She can simply impose her justice on the parties without worrying that they will fail to comply. But this is no longer a situation of anarchy as such an arbitrator, in effect, constitutes a genuine legal system.

"semi-anarchic" cases include primitive legal systems, organized crime, and the international order, none of which have institutions for authoritatively enforcing norms. In those cases a neutral arbitrator may propose a settlement that reflects norms to some degree. She may seek to implement some notion of justice or equality, for example. But in anarchy her proposals must respect the incentive constraints or they will be ignored.

We think, therefore, that neutral arbitrators in the normative sense presented above would be used more sparingly in anarchy than impartial ones. Put another way, neutral arbitration seems possible if two further things are true: first, there is a norm that the community (or the parties themselves in a pre-dispute negotiation) wants to apply to the dispute; and, second, the neutral arbitrator has a reputation for having sufficient cognitive power to convince the parties to appear before her and to comply with her proposed settlement. She must have the reputation for finding solutions that will reflect community norms without violating incentive constraints arising from the conflicting interests of the disputants. Her judgments must, therefore, reflect to some extent, the power differentials between the disputants. Unless those conditions are met, we would not expect neutral arbitrators to be successful in attracting business.

**II. Three Kinds of Dispute**

We consider three kinds of disputes, each of which suggests a somewhat different analysis. In each of these examples we imagine that the cost of fighting is high enough that the parties have reason either to try to negotiate a settlement or to seek an arbitrator. The arbitrator must offer his services in light of two alternative settings in which the parties may seek to settle their dispute -- fighting and negotiation. And both parties must prefer arbitration -- so the expected arbitrated outcome needs to be at least as good as the expected outcome from fighting

or negotiating. Second, the outcome that would be reached in the alternative settings may reflect the strengths of the parties where strength may or may not rest on norms of some kind.

**1. legal disputes** (such as a divorce, property, or a contractual dispute inside a legal system): disputants could either come to a negotiated settlement, fight the matter out in a court, or resort to an arbitrator. We assume that the cost of fighting in court is very high, relative to negotiation or arbitration, but that the outcome will be determined by the "merits" of the case under law. In this case a neutral arbitrator is one who will decide the case either on the merits (as a court would) or would produce an unbiased (but perhaps noisy) estimate of the merited outcome. The "merits" may be derived from specific laws or from general norms of equity or fairness or from principles of interpretation of the kind that courts may employ to reach fair results.

A legal system, as we define it, has two features: it consists of a set of norms that are to be (neutrally) imposed to resolve conflicts, and it provides fora for disputes to be heard. Fora for resolving legal disputes may be provided by state-sponsored courts, as in most countries. But international courts of some kind may serve as well. In any "legal" situation of this kind we assume that there is a more or less accepted notion of merit that is independent of the real powers of the parties were they to decide the dispute by fighting. Such fora also include more archaic institutions in which, for example, traditional village elders enforce a customary code such as in the Pashtunwali that prevails in rural Afghanistan, or the dispute depicted on Achilles Shield, as will be described below. These situations may be only weakly legal, because the content of the "neutral" norms may not be well-specified in advance, or the outcome may depend on the identities of the parties and their social status in way that might be impermissible in a legal system. Still if such a system is in place, one would expect that some practices of informal

mediation or arbitration might arise that would permit parties to avoid having judgments imposed on them.

We suggested in the introduction that legal systems are often willing to intervene in a dispute on the petition of one party, or sometimes without any petition at all; but arbitration systems are typically voluntary. So while arbitration in the shadow of legal process requires that the strong party be willing to agree to have the settlement heard and to go along with the resolution, her decision is made in light of the fact that the weaker party can drag her into court if she refuses.

**2. Domestic Political Crisis**: Sometimes, because of some features of the institutions for resolving conflicts, political conflict may produce a stalemate where neither side gets what it wants. We may assume is a more or less bad outcome for both parties. Consider three US cases: the Social Security debate in 1983; the argument over the nuclear option with respect to Senate confirmation of judicial appointments; or the argument about how to reduce the long run deficit. In each case, there was a kind of stalemate under the institutional rules and a panel was set up to be impartial between the parties in the sense of being made up of equal numbers from the two parties and of the various ideological tendencies. In each case the impartial bipartisan panel offered to implement a something like a fifty-fifty compromise which was independent of the merits but reflected the more or less equal strengths, or veto powers, of the opposed parties. Thus enforcement of an equal compromise in these cases is rooted not in substantive community norms (embodied in the legal system) but in the fact that each party has a veto and that each has more or less an equal power to prevent the other from getting what she wants, and an impartial arbitrator recognized the need to base a settlement on these facts..

In a political crisis, however, stalemate is usually temporary. It may last only until the next election or until the king dies or falls under the sway of some other advisor. The parties will naturally form expectations as to which side is likely to prevail later on and, if there are public indications of likely shifts, such expectations will tend to be correlated. If this is the case, and it is commonly known, an arbitrator cannot credibly propose a fifty-fifty split but will have to suggest a split that is biased toward the likely downstream winner, if she wants her decision to be obeyed by the stronger party (and thus to be self enforcing). So we think that effective dispute resolution in this context reflects not equal veto powers, but prospects of political success, discounted back to the present. And, in the disputes described above, there may well have been departures from the fifty-fifty split that reflected this possibility.

**3. Constitutional Crisis or Civil War**. Here the outcome may be violent warfare (with lots of collateral damage); the parties have different probabilities of winning depending on their own strength in winning a violent fight, or their ability to attract powerful allies from inside the country (the military or the police or the workers, etc.) or outside (international actors). The list of such examples is endless but a topical example is Syria. In such cases, an impartial arbitrator must anticipate the likely outcome of the violent struggle (hopefully at lower costs than fighting) and offer a settlement that the parties are likely to accept; that is make a decision that reflects the actual strengths of the parties. We think that in cases of regime crisis a neutral (as opposed to merely impartial) arbitrator may propose settlements based, to some extent, on power-independent norms such as (for example) democracy, justice, protection of minority rights, etc. Here, as in a legal dispute, one may expect a neutral arbitrator to pay attention to normative values,, but these values are themselves objects of contestation between the incumbent regime and its opposition; there may be no (agreed) forum in which these conflicting conceptions can be

settled. For that reason, any claim of an arbitrator to be neutral (with respect to some norm) will be contested because there is no normative agreement among the parties.

Moreover, in many of these cases the potential arbitrators are powerful forces either inside or outside the country that might be able to enforce a settlement on the parties or at least might induce strong post-settlement incentives on the parties by providing or withholding assistance, occupying some territory, or engaging in various acts of retaliation. Powerful arbitrators may be attractive to disputants mostly on account of their power. But part of their attraction may have to do with their willingness to enforce certain norms.

**III. "Neutral" Arbitration: enforcing a fairness norm**

States can normally enforce neutral norms against the wishes of the disputants. They may forcibly maintain social peace, impose "just" settlements that redistribute wealth between the parties, etc. This is so partly because states have the capacity to use force to compel the parties to submit their dispute for resolution and to comply with a resolution once one is reached. But as HLA Hart and others remind us, force may not be necessary to enforce neutral norms as long as the legal officials have internalized these norms in ways that they are applied, and expected to be applied, in legal settings. Arbitrators operating in anarchy, however, who possess only cognitive powers, cannot generally compel disputants to appear or to comply with settlements which disadvantage them. Can they, nevertheless, hope to implement a neutral norm? Depending on the content of a neutral norm there may be cases where arbitration would be sufficiently unattractive to the stronger party that she would prefer to fight. We will show that

as long as there are sufficient efficiency gains to arbitration that some degree of neutral norm enforcement may be possible even without the use of the state coercive apparatus.

We start with the baseline model in which there is a dispute over some object, *b*, which we can think of as not yet possessed by either party. Perhaps an oil field is discovered off a coastline adjacent to two nations; perhaps two villages contest a forest between them. We assume, initially that the arbitrator is impartial but not neutral. If she is asked to arbitrate, she has the cognitive capacity to estimate the strengths of the two parties to a dispute and provide a settlement that reflects what would happen if the fighting were to continue (either in court or on a battlefield). The model is intended to capture the situation of two parties in a dispute, who are uncertain of the strength of the opponent, facing the prospect of a costly fight which neither side is sure of winning.

One might think that the parties could negotiate to an efficient settlement without incurring the costs of arbitration.[18] Why would they want to pay the cost of arbitration to a third party when they could simply divide up the prize themselves? Strategic issues may interfere with making and interpreting offers and acceptances. There are generally many equilibria in the two person bargaining game that would have to be played if no third party was available. If, however, arbitration is an option, then the parties may be able to negotiate in the shadow of a third party who can verify claims and perhaps assess penalties for lying during the negotiations. The point is that without an arbitrator who can verify reports and coordinate understandings it

[18] One might think that one could invoke the revelation principle to make the following argument. Let G describe the outcome of the negotiation game without arbitration: and let x(s) y(w) be equilibrium strategies for players one and two where s and w are their respective types. Then F(s,w)=G(x(s),y(w)) is a direct revelation mechanism and s and w are equilibrium strategies for F. Thus under F, each player would tell the truth about her type and would receive awards like those in the text, net of arbitration costs, k. The trouble is that it is not at all clear that the equilibrium in the original game is peaceful. See Fey and Ramsay, supra n 20. for a careful analysis of this issue.

may be hard to reach peaceful settlements in direct negotiations. But if an arbitrator is available, direct negotiations may succeed in getting a peaceful outcome.

While, in principle, arbitration would be attractive to both parties in this case as long as the cost of arbitration is small compared to the cost of fighting, there are considerations that may prevent arbitration. First, there may be multiple equilibria and, therefore problems of coordination. Second, the parties may disagree about how to split the gains from arbitration, making coordination more difficult. Moreover, requesting arbitration may reveal information to the other party in a way that disadvantages the requestor. Finally, there is a fourth possible problem: the arbitrator may be committed to impose a (neutral) fairness norm in dispute resolution and the imposition of that norm may not permit the arbitrator to obtain the consent of both parties.

We assume that an arbitrator is appointed if and only if both parties request one. Each party has the choice to request arbitration (A) or not (NA), and if there is no arbitration, each can decide to fight (F) or not (DF). If there is an arbitration the parties need to decide whether to comply with the proposed settlement. We do not model that here but assume that the impartial arbitrator would only propose incentive compatible settlements: those that are at least as good as fighting for each party. The game, as stated, has a proper subgame if an arbitrator is not appointed. We will restrict attention to Perfect Bayesian Equilibria (PBE)[19]: at that subgame, each party updates her beliefs and chooses a best policy.

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[19] In this setting the set of Perfect Bayesian Equilibria corresponds to the set of Sequential Equilibria ( Drew Fudenberg and Jean Tirole, ‘‘Perfect Bayesian and Sequential Equilibrium,’’ Journal of Economic Theory, 53 (1991), 236–260.

We model the strength of a party by its costs of fighting: the strong party incurs $c_L$ and the weak party, $c_H$. These costs are private information to the parties and types are drawn from a common distribution, where p is the probability of a strong type and the cost of arbitration is $k < c_L < c_H$. If there is a fight, the prize is awarded to the stronger party and is split evenly in the event of a fight between two parties with the same strength. In impartial arbitration, the arbitrator proposes a settlement that accurately reflects the strengths of the parties if they resort to fighting. We assume that the prize, b, is large enough that the strong party is willing to fight, $b/2 \geq c_H/(1-p)$ and therefore that the strong party is willing to fight as well). In this setup arbitration is plainly efficient in the sense that it economizes on the cost of dispute settlement. But the fact that costs are private information may prevent the parties from agreeing to arbitrate. Indeed, the model has several equilibria.

There is an equilibrium in which both parties refuse to request an arbitrator and fight (both play <NA,F>): as neither party can get an arbitrator by itself and both parties find it worthwhile to fight in the subgame in which there is no arbitrator. Another equilibrium, is where Strong plays <A,F> and Weak plays <A,DF>. Evidently Weak would not deviate to F if no arbitrator is appointed because, in this equilibrium, she would then face a strong type with certainty. So all that needs to be checked is that <A,F> is a best strategy for Strong, which implies that

$$p\left(\frac{b}{2}-k\right)+(1-p)(b-k) \geq p(\frac{b}{2}-c_L) + (1\text{-p})b, \text{ which reduces to}$$

$$pc_L \geq k.$$

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1991).

By assumption, Strong is willing to fight if there is no arbitrator. Thus, as long as there are many strong types (meaning that p is high) and k is small compared to $c_L$, Strong would be willing to play <A,F>. Note that this equilibrium Pareto dominates the pure strategy equilibrium where both parties play <NA,F>. There is another perfect equilibrium, payoff equivalent to the first, with Strong:<A,F> and Weak:<A,F>. Both Strong and Weak are willing to play A at the first stage so that the outcome is arbitrated as in the other equilibrium. Weak is willing to fight at the second stage in this equilibrium because $b/2 \geq c_H/(1-p)$ by assumption.

It can also be checked in this example that there is a mixed strategy equilibrium of the following form: Strong: <xA+(1-x)NA,F>; Weak:<A,DF>, as the strong types are indifferent in equilibrium between A and NA for $x = \frac{k(1-p)}{p(cL-k)}$ which is strictly less than 1 if $p < k/c_L$. Thus, if there are not too many strong types, a strong type can play NA with some probability. As there would be fighting with some probability, a mixed strategy equilibrium of this kind cannot be efficient. It is easy to check that weak types can never mix. Thus, while there is an equilibrium in which arbitration settles the dispute with certainty, if p is very large or $k/c_L$ very small ,there are also mixed strategy equilibria where fighting occurs with some probability.

Let us now turn the case where the arbitrator is committed or required to implement a neutral norm of some kind when reaching settlements.[20] In our example, suppose the arbitrator must decide "fairly" between the parties: if asked to arbitrate, she divides the prize evenly. We remind the reader that this is an example and we could have used any norm that required a

[20] The game we analyze here is a dynamic game of incomplete information and, not surprisingly, the set of equilibria can be large. We do not seek to offer a complete characterization of the set of equilibria, but content ourselves with highlighting some of the interesting different equilibria which exist. We also deliberately suppress discussion of issues in dynamic games of incomplete information such as out-of-equilibrium beliefs and refinements.

division that did not depend on fighting strengths. A neutral arbitrator, in this sense, imposes a party-independent norm. Otherwise the setup is the same as before.

As in the impartial model, there is an inefficient equilibrium where both players play <NA,F> and incur fighting costs. The question is whether there is an equilibrium where both parties request arbitration. Evidently if the strong type is willing to play <A,F>, the weak type is willing to play <A,DF> as in the impartial case. So we need to check

$$p\left(\frac{b}{2}-k\right)+(1-p)\left(\frac{b}{2}-k\right)=\frac{b}{2}-k\ \geq p\left(\frac{b}{2}-\mathrm{cL}\right)+(1-p)b,$$

Where the right hand expression is what the strong player would achieve if she rejects arbitration. Rearranging terms we get

$$p\geq(k+\tfrac{b}{2})/(\mathrm{cL}+\tfrac{\mathrm{b}}{2}).$$

Arbitration can occur only if it is cheap compared to fighting, the prize is not too big, and there is a high probability of meeting another strong type. This condition evidently implies a severe restriction on the range of disputes that can be settled by arbitration. If, for example, b=1, $c_L$=1/2 and k=1/4, then p must be at least ¾, whereas an impartial arbitrator could settle any dispute with p ≥0. Indeed, even if arbitration was free, p would have to be at least ½. The reason for this restriction is, of course, that (for other parameter values) the strong player can deviate to NA and guarantee herself a payoff of ½. Notice that if the strong type deviates to NA, there will only be fighting if she meets another strong type. That is, with probability $p^2$. Peaceful outcomes, which can occurs in other circumstances, can be extremely unequal however as the strong party takes the prize without a fight, or very inefficient (where the prize goes unclaimed).

These results imply that, without more options, the arbitrator has very limited abilities to impose a neutral norm. There are at least four additional options that could be considered that will permit the arbitrator to reach efficient outcomes. First, the arbitrator could have coercive powers to enforce a neutral settlement. In this case, the arbitrator is free to ignore the ex post incentive constraints and simply impose whichever settlement is best by her lights. Second, the disputing parties may have reputational incentives to uphold a fairness norm even if it is not incentive compatible in a single play of the game. These seem obvious enough not to detain us. Two other possibilities will attract our attention here: one involves redistribution of rewards ex post. The other considers the possibility that arbitrator herself may be able to make credible promises to the disputing parties sufficient to permit the satisfaction of the incentive constraints.

First consider ex post redistribution. We know that an impartial aribitrator can get efficient outcomes in the pure strategy equilibria and we can calculate the "surplus" at such an outcome (the expected difference between fighting and arbitrating the conflict). One way to do this is for the arbitrator to choose a settlement that satisfies the incentive compatibility constraint for the strong player and her arbitration gain ($c_L - k$) to the weak player. Thus the expected payoff to the weak player is $p(-k + c_L - k) + (1- p)(b/2 - k + c_L - k)$. It is easily checked that the neutral outcome can be attained for some parameter values: $b \leq 4(c_L - k)$. Thus if there are large gains from arbitration relative to the size of the prize an arbitrator can achieve a neutral settlement.

But a similar result can be obtained using only intrapersonal redistribution: insurance. Suppose the arbitrator proposes that before the parties know their types, each posts a bond sufficient to satisfy the ex post incentive constraint. For example, we can think of each agreeing to search for a treasure with the agreement that the prize will be split evenly once it is

discovered. But once the prize is found, the parties know that they have incentives to renege on the agreement and that they will have different abilities to succeed in winning the fight. It is easy to see that this constraint can be binding only for the strong player when facing a weak one, and so we need to determine an ex post payment to the strong player, $t = t_S$ that will make him indifferent between accepting the fair division and rejecting it:

$$\frac{b}{2} - k + tS = p(\frac{b}{2} - c_L) + (1- p)(b - c_L).$$

Thus, $t_S = k - cL + \frac{b}{2}(1 - p)$. Another way to put this is that each party will expect to receive the transfer, $t_S$ with probability p(1- p), in which case the parties' ex ante bond goes to transfer funds to her ex post. Otherwise the arbitrator promises to return the bond. Thus each party knows that her bond will be used only in case she is a strong type facing a weak type. Thus, for each player, her expectation from playing the game is unchanged by the introduction of the bond (ignoring discounting), but now the incentive constraint is satisfied. Note that the bond does not permit the move to full satisfaction of the equality norm. The strong party facing a weak party, ex post, expects to receive $\frac{b}{2} - k + tS$ whereas a weak party facing a strong party will expect $\frac{b}{2} - k$. Ex ante however, both parties will have the same expected value of play, and whatever transfers are necessary are only over time and not interpersonal.[21]

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[21] See Sandeep Baliga and Tomas Sjostrom, "Contracting with Third Parties," American Economic Journal: Microeconomics 1(1), 2009, pp.75-100 for a discussion of the role of third parties in mechanism design problems and Philippe Aghion and Richard Holden, "Incomplete Contracts and the Theory of the Firm: What Have We Learned over the Past 25 Years?" (with Philippe Aghion), Journal of Economic Perspectives, 25(2), Spring 2011, 181-197 for an instructive example.

Finally, we may now consider the possibility of a judge – or an arbitrator -- who can act on the request of only one party, requiring the other to appear and defend her claims or else possibly suffer some penalty. Must such an arbitrator command some source of power, independent of the parties? Suppose for example that she restricts her settlements to neutral norms that are acceptable to the Strong types as above. In this case the probability of actual fighting is simply the probability both sides play F, since if either type plays A, there will be either an arbitration or a concession. We can suppose that the weak type always requests arbitration and that the strong type will appear if and only if the anticipated settlement is at least as good as what she would win by fighting. It is easy to see that the conditions for arbitration are the same as where both parties need to consent to an arbitrator and therefore, the equilibria are the same as when both parties had to agree: both types generally play <A,F>, as long as each would fight if there is no arbitration. So the answer seems to be this: as long as a neutral arbitrator confines her settlements to those acceptable to Strong types, she will be able to settle disputes without any need to use (or even have) power resources of her own. Of course, if she actually did have powers of her own, the arbitrator could settle a wider range of disputes, including in settings in which there are many weak types, where the prize is large and where the costs of fighting are small. Moreover, one might expect that a successful arbitrator would tend to accumulate power resources enabling her to extend her "writ" over time.

## A More General Model

Suppose, now, that that there is a continuum of types indexed by the cost of fighting and that the fighting cost is private information. For example, assume that the cost of fighting is distributed according to a probability distribution with nonatomic cdf, F, on the [k,1] interval, where k is the cost of arbitration and that b >1. In this case, we can think of strong types as those

with low fighting costs and say that winner of a fight between c and c' is the one with the lower cost of fighting. So, if one has a fighting cost of c, the probability of losing is F(c) and 1- F(c) is the probability of winning. We can now examine equilibria with an impartial arbitrator.

Consider a strategy of the following form: S(c) = <NA,F> if $c \leq c^*$, and S(c) = <A,DF> for $c \geq c^*$, $c^*$ is the point at which the payoff to <NA,F> is equal to that of <A,DF>. Thus $c^*$ solves:

$$-cF(c) + b(1 - F(c)) = 0F(c) + (1 - F(c))(b - k), \text{ or}$$

$$k = cF(c)/(1 - F(c)).$$

Evidently the right hand side takes the value of 0 at c=k, is continuous and monotone increasing in c, and tends to infinity. Thus by the mean value theorem there is a unique solution. Numerical calculations show that if k = .1, $c^*$ =.25; if k = .2, $c^*$ = 31; if k = .4, $c^*$ = .43. As k increases, fewer disputes will be arbitrated. We can also see some additional comparative statics. If G first-order stochastically dominates F (ie. $G(x) \leq F(x)$: which means that there are more strong types under G) then $c_G^* \leq c_F^*$.

It is easy to check that $c > c^*$ would never deviate to F as she would be certain to lose because only $c \leq c^*$ play NA in equilibrium. Also she would not deviate to NA as A is weakly dominant at c. And, Strong c's (those playing <NA,F> would not deviate to A because, for her, NA is weakly dominant for $c \leq c^*$. Thus in this equilibrium there will be some fighting (if both parties have $c \leq c^*$) and forcible grabbing (if only one party has $c<c^*$), even though arbitration would economize on fighting costs for each type. Strategic considerations limit the gains from arbitration.

What about neutral arbitration where the arbitrator's settlement is b/2-k for all types? Evidently such an arbitrator is attractive to those with large fighting costs. The question is when such an arbitrator is acceptable to those with lower costs. The analysis proceeds in the same way as above. S(c) = <NA,F> if c ≤ c**; = <A,DF> if c > c**. Where c** solves the following expression:

$-cF(c) + b\big(1 - F(c)\big) = (1 - F(c))(\frac{b}{2} - k)$, rearranging terms we get

$$k + \frac{b}{2} = cF(c)/(1 - F(c).$$

Evidently, as the right hand side is monotone increasing, c** > c*. Fewer disputes will be settled by a neutral arbitrator compared to an impartial one. Moreover, the range of settled disputes shrinks as b increases.

The results of this section and the previous one can be read as negative or "impossibility" theorems, showing that the imposition of neutral norms will place severe limits on which disputes can be settled without the use of coercive force. They can also be seen as motivations for developing other, noncoercive, mechanisms for widening the range of disputes that can be settled. Principal among these are reputational mechanisms of the kind one would expect if the parties are interacting frequently and have ex ante or higher order preference that their disputes be settled according to some neutral norm. The paper by Milgrom, North and Weingast show how such higher order preferences for neutral norms (in their case the norm to keep to contractual agreements) might be enforced in equilibrium play.

**IV. Arbitration in Primitive Legal Systems**

We can appreciate the interaction of power and neutrality by looking at primitive legal systems. A primitive legal system, on our account, lacks certain kinds of "state" institutions – courts and police – and if it is to vindicate its authority it must rely on people to settle disputes in certain ways and voluntarily to comply with agreed settlements. Such systems include stateless societies described by anthropologists, but also other societies that rely on self help for law enforcement, such as commercial custom and some international legal. What is characteristic of such systems, from our perspective, is that the parties to disputes must be seen as having powers and capacities that need to taken account of and recruited in any dispute settlement practice. And third parties may be motivated to provide solutions.

One nearly universal finding from the anthropological literature is that persons who have high status for other reasons are useful third parties. There is a reciprocal relationship between high social status and dispute resolution in many simple societies. Shapiro notes the Papuans would turn to a man with many pigs; in other cases, a chief or elder may play the role. High status individuals have several advantages. First, they are likely to have many relationships in the community, which means they have a stake in mitigating the escalation of violence. They may also be able to call on material or social resources to help resolve the dispute or to enforce the settlement. Further their pronouncements may have a kind of focal quality that changes the perceptions of outsiders as to who *others* are likely to see as being in the right, changing incentives to fight for one or the other side, and aligning expectations of likely behavior. These are all, of course, facts about social power – high status groups are likely to have power and that makes them attractive dispute settlers, at least if "status" is not itself very contested. But it has nothing to do with neutrality.

There may be other means for motivating neutrality. One interesting example comes from the Shield of Achilles in the Iliad. Achilles shield features several scenes of urban life in peace time and war. One of the scenes of peace concerns dispute resolution:

> "And the people massed, streaming into the marketplace where a quarrel had broken out and two men struggled over the blood-price for a kinsman just murdered. One declaimed in public, vowing payment in full -- the other spurned him, he would not take a thing -- so both men pressed for a judge to cut the knot. The crowd cheered on both, they took both sides, but heralds held them back as the city elders sat on polished stone benches, forming the sacred circle, grasping in hand the staffs of clear-voiced heralds, and each leapt to his feet to plead his case in turn. Two bars of solid gold shone on the ground before them, a prize for the judge who'd speak the straightest verdict."[22]

The scene describes early dispute resolution and the shift toward judging. Here, the element of a contest among the judges suggests that a party-independent norm of some kind is in play. The judges engage in an epistemic competition to state or approximate a ground for a just resolution, as perceived by the gathered crowd. And if the sheer glory of conquest is not enough for these archaic Greeks, the two bars of gold represent an extra gratuity – putting the weight of the community behind the resolution of the dispute.[23]

[22] Translation R. Fagles (1996); note that Cantarella's version differs slightly.
[23] Cantarella has a different interpretation of the two gold bars, and sees the reference as referring to a prize going to the winner of the trial. Eva Cantarella, Private Revenge and Public Justice: The Settlement of Disputes in Homer's Iliad, *Punishment and Society* 3:473-83, 478 (2001). She believes the bars refer to an institution, found later in Roman law, in which each litigant would put down deposits related to the amount in dispute, perhaps to deter frivolous litigation. See also Eva Cantarella, *Dispute Settlement in Homer: Once Again on the Shield of Achilles,* 147-64 in Melanges en L'honneur de Panayiotis D. Dimakis, Droits Antiques Et Societies.

Herodotus reports the equally famous story of Deioces who became king of the Medes who, as we will see later, leveraged his epistemic capacities and sound judgment into the kingship.

> "As the Medes at that time dwelt in scattered villages without any central authority, and lawlessness in consequence prevailed throughout the land, Deioces, who was already a man of mark in his own village, applied himself with greater zeal and earnestness than ever before to the practice of justice among his fellows. It was his conviction that justice and injustice are engaged in perpetual war with one another. He therefore began his course of conduct, and presently the men of his village, observing his integrity, chose him to be the arbiter of all their disputes.... he showed himself an honest and an upright judge, and by these means gained such credit with his fellow-citizens as to attract the attention of those who lived in the surrounding villages. They had long been suffering from unjust and oppressive judgments; so that, when they heard of the singular uprightness of Deioces, and of the equity of his decisions, they joyfully had recourse to him in the various quarrels and suits that arose, until at last they came to put confidence in no one else." (Histories, Book I)

Early societies in which the state has not yet established a monopoly of violence typically resolve dispute by blood-feud, still a popular method in the Pashtun tribal region in Afghanistan and Pakistan, and other areas in which formal states have little reach.[24] Such societies are characterized by several features: (1) they strongly encourage retaliation, for only if retaliation is mandatory will there be a deterrent to violence; (2) they utilize strong honor norms to accomplish this—one who fails to retaliate will be seen as weak, and this may lead to "thin-

[24] Peter Stein, *Legal Institutions: The Development of Dispute Settlement* (1981)

skin"—erring on the side of perceiving injury; and (3) they utilize blood-price to mitigate the tendencies toward violence that flow from (1) and (2) above.

To illustrate: a young man in the Pashtun tribal areas committed adultery with a married woman and the husband wanted to exact revenge. He appealed to a tribal council which acted in this case to give a solution. A banquet was held that included both extended families and during the dinner the father of the young man pulled out a gun and killed him. And then he handed the gun to the father of the married woman, who killed her. The father gave one of his daughters to the cuckolded husband as a kind of blood price and the other family accepted it as compensation for the wrong. It seems likely that that there was not much choice as to what would happen. The two families implemented a "fair" settlement and did so in a way that established blood ties between the two families, reducing the likelihood of further conflicts between them. And it was also quite a dinner.

A blood-price is a set amount of compensation to be paid in case of injury. The injurer pays the compensation in exchange for the victim foregoing the right to take revenge. In Homeric society (and in some Pashtun areas), there was no third party that would compel the victim to accept the bloodprice.[25] But the if the victim does accept, it is done in public so that the victim may show that he is giving up his right of revenge because of the compensation, rather than out of fear of fighting with the other party.

The shield scene concerns such an instance but introduces an additional element: a third party, in the form of the city elders, who wield scepters to indicate their public roles. (It is not clear precisely whether the elders are resolving a primary dispute, a dispute over the amount of

[25] Eva Cantarella, Private Revenge and Public Justice: The Settlement of Disputes in Homer's Iliad, *Punishment and Society* 3:473-83, 477 (2001)

compensation, or as indicated in an alternative translation in Cantarella a dispute over whether compensation has already been paid or not.)[26] Note that the decision-making is collective. This may be useful on Condorcet jury grounds, ensuring that the ultimate decision is more accurate, though it may or may not affect neutrality per se.

The Pashtun story outlined above concerned a situation in which the two parties resolved the dispute among themselves using bloodfeud norms, without the intervention of third parties. But third parties are available to implement the loosely defined set of norms called the Pashtunwali. The norms are not mandatory, but require agreement of both parties *ex ante* through a choice-of-law decision, and so many disputes are left without resolution. . (Before deliberating, the parties are called on to decide whether the dispute should be resolved according to Sharia (Islamic law) or the Pashtunwali norms which differ in several important respects. We thus see some element of consent in the selection of the norms.) Typically disputes are resolved by *jirga*, councils of the members of the community, who can be called on to decide which party is in the wrong and stipulate the compensation or bloodprice In *jirga*, each adult member of the community will speak and deliberation will proceed until there is agreement as to the proper resolution of the case. There is an emphasis on voluntary acceptance by the parties, though in extreme cases, the community can impose collective punishments such as banishment. The Pashtun "legal" system is an intermediate one, in which there is no monopoly of dispute resolution (there are others who can provide the service such as Mullahs or chiefs), and some specified external norms but not many. In this situation, the job of the dispute resolvers is to contain conflict by working out a mediate solution, one that likely takes into account both the material strengths of the parties as well as their compliance with local norms.

[26] 2001:476

For several hundred years, Iceland had a stable legal system with judges but no public enforcement of their decisions.[27] When someone won a court case in Iceland, enforcement would be left to private parties. Typically, legal cases involved killing of an individual for which blood money had to be paid. If one failed to pay damages as determined by an adverse judgment, the original claimant could come back to the adjudicator, who would declare the defaulting defendant an outlaw, meaning the person could be killed without incurring legal liability. But consider the puzzle: the immunity granted to the killer of an outlaw is merely the right to be free from judgments issued by a court that had no power to enforce its judgments. Yet, despite the purely expressive power of the court, the Icelandic system provided sufficient incentives for many people to pay judgments.

The risk of this system was that it would seem to allow the stronger parties to avoid paying judgments rendered against them. Iceland had a market in claims, so that a successful but weak claimant could transfer his claim to a stronger party for enforcement of the judgment. This system worked so long as power asymmetries among the players were not too great. Apparently Iceland had some social surplus, but not a large one. There were enough resources to support a few public officials. But there were not enough resources so that a powerful individual could hire enough other powerful people as retainers to form a state. Presumably, whenever one faction would gather a number of powerful individuals so as to try to coerce others, it would lose judgments. As the number of judgments against the prospective ruler rose, so did the incentive for other powerful individuals to challenge the person so as to gain the payment due earlier but

[27] DAVID FRIEDMAN, LAW'S ORDER 263-67 (2000); Richard Posner, *Medieval Iceland and Modern Legal Scholarship*, 90 MICH. L. REV. 1495, 1496-97 (1992) (review of WILLIAM I. MILLER, BLOODTAKING AND PEACEMAKING: FEUD, LAW AND SOCIETY IN SAGA ICELAND (1990)).

weaker plaintiffs. This may have created a mechanism for internal stability and an equilibrium of power.

We can find similar examples in international legal systems. Milgrom, North and Weingast present an account of the old law merchant (which regulated trade among the Hanseatic merchants) in which arbitral courts simply announced judgments in triadic disputes and left it to the community of merchants to enforce their judgments.[28] Obviously this kind of system could only work where merchants are normally repeat players. While the authors don't really describe the substance of the trading norms in any detail, it seems likely that these norms would have embodied ordinary notions of fairness that merchants could be presumed to be familiar with. Probably modern commercial disputes are often decided within agreed contracts and if the transactions are among strangers, the contractual terms required to permit trade will be complex.

The point of bringing in these examples of adjudication in primitive legal systems is that they may be relevant to dispute settlement when established legal practices have broken down or become less legitimate. For example, in civil wars or insurrections some shared norms may, nevertheless, be available to permit "neutral" arbitration of disputes. There may well be conflicts among these norms – between fairness, efficiency and democratic rule for example – so that what counts as neutral will be contested. These situations therefore better approximate the anarchic situation with which our theory is concerned than does the more conventional conflict in an established legal system, though they are not perfect illustrations. Some aspects of neutrality are involved; when none are available, the only possibilities are coercive exercise of

[28] Paul R. Milgrom, Douglas C. North, and Barry R. Weingast. "The Role of Institutions in the Revival of Trade: The Law Merchant, Private Judges, and the Champagne Fairs" in *Economics and Politics*, vol. 2: No.1 (March 1990): 1-23.

power by the arbitrator, or simply telling the parties what the likely outcome is of their power struggle.

**V. Discussion and Extensions**

Our main focus in this paper has been to examine arbitration in an anarchic situation, where the arbitrator must exhibit to attract disputants to bring cases voluntarily. We imagined that where arbitration is by voluntary "agreement" between the parties, there would be competitive pressures on an arbitrator who wishes to offer an attractive venue for deciding disputes. If she wishes to attract cases, her practices must at minimum be sufficiently attractive to the party that would most likely prevail outside of arbitration (the stronger party) that she would be willing to consent to arbitration. If she wishes, in addition to implement a neutral norm in her settlements, she must still be constrained by what the disadvantaged party could achieve by fighting. At least she must obey this constraint as long as her only powers are cognitive.

If, however, there are gains to be had from impartial arbitration (as there are when both parties are risk averse and where the costs of arbitration are less than the cost of fighting) the arbitrator may not have to share all of these gains with the parties. Indeed, the existence of monopoly rents from arbitration is not necessarily a bad thing if the arbitrator wishes to enforce neutral norms. The existence of gains from arbitration offers the possibility that an arbitrator may accumulate coercive powers which she may use to enforce neutral norms, and still attract cases voluntarily. An arbitrator might try to produce substantively "fair" or "equitable" agreements, for example, whether or not the parties care about that at all.

There will of course be limits as to how far an arbitrator can go in implementing such exogenous norms. In voluntary arbitration, the arbitrator is constrained by the preferences of the

strongest party (who might be tempted to return to the fight) as well as by competition from other arbitrators who may care less about exogenous norms. One might think that sustaining fairness norms would therefore require the use of power to enforce entry restrictions in the arbitration market (creating monopoly power), or perhaps relatively equal levels of strength among disputants so that fairness can be sustained in equilibrium.

How such conditions might be brought about is an old question in political theory. In effect, the political theory of Leviathan provides one account of how both conditions might be met. Hobbes assumed, famously, a weak condition of strength equality: in the state of nature the weakest person is able with some positive probability to kill the strongest, so that the victory of the strongest cannot be guaranteed (though, as the saying goes, that's the way the smart money bets). If the parties greatly fear death, the costs of fighting so high compared to that of peaceful settlement enforced by a Hobbesian sovereign. And the sovereign, were one to be instituted, would have wide latitude to impose other values through his legal institutions and she could impose, if she wants, a norm of fairness. But, as Hobbes noted, her latitude is not unlimited since her courts would be rationally prohibited from enforcing certain punishments even if they are fully deserved.

Fairness as a dispute settlement norm could, alternatively, be explained in a contractarian setting in which the participants decide on norms governing dispute settlement prior to learning about their strengths in fighting. In such a setting one can imagine that risk averse parties might want to have disputes decided fairly and independently of the powers of the parties to win fights. And to this end they may agree to empower the state to intervene in disputes if, for example, either party demands it or even without the consent of the other party. Such procedures seem

typical in legal systems, which require that the stronger party must submit to judgment and to accept legal decisions as binding.

Now consider circumstances of political bargaining, where legal norms do not determine how disputes should be resolved. Imagine that the sovereign is faced with warring parties jockeying to control events. These factions may represent, roughly, the rich and poor: the parts of the city for Aristotle as well as for Machiavelli. Both may be necessary for the nation to flourish but they cannot agree how to share governmental powers or take turns controlling them. And fighting is very costly to both sides. The simple picture in part IV suggests that as long as both parties form realistic beliefs about their opponents there should be a path to a peaceful settlement either through negotiation or arbitration. The outcome in this case might require that the weak party is thoroughly subordinated to the stronger. This is an ordinary noncooperative bargaining problem where we expect the negotiated outcome to reflect the powers of the parties, and while there could be some delay to agreement, the outcome should reflect the strengths of the parties. Any such settlement would be acceptable the parties ex post and in that respect self-enforcing. If, however, the parties are too optimistic about their own powers or the weakness of the opponent, it may be impossible to prevent some fighting as a way to recalibrate beliefs. (We do not model this situation here).

In the case we considered in part IV, however, the arbitrator is somehow committed to a norm of fair division that is independent of the relative strengths of the parties. We could have considered any other party-independent norm such as democracy (such as requiring frequent and fair elections to choose the main officials) or some conception of liberty. In any such case the stronger party stands to lose some of her advantages in an arbitrated settlement and may resist arbitration and keep fighting. Neutrally imposed norms of this kind may be problematic from a

peace-seeking perspective, but they seem to have powerful attraction both in developed and many less developed legal systems, and such norms may be necessary for a functioning society for ethical or solidarity reasons. So, while they may be an impediment to peace in some cases, it may be impossible to reject neutral norms.

Insofar as such normative ideas are important to the community, there is reason for disputants to prefer powerful rather than neutral third parties to arbitrate disputes at least if the powerful party is committed to community norms. Power comes in many flavors of course, only some originating from the proverbial barrel of a gun. But the military often seems an attractive or unavoidable choice for settling disputes when ordinary legal processes have broken down. In other instances, other kinds of power may be sufficient: the power of the elders among the Pashtun or among the Homeric Greeks was adequate (apparently) to channel dangerous feuding into more socially acceptable channels. The elders probably had horses and weapons we imagine – but could they really have used them effectively? Is there any hint in these stories that the elders or the military were impartial or neutral as between the rich and poor or whoever is arguing over the reins of government? They may have been impartial or neutral in our sense – that is they may have been acting to enforce a party-independent norm (such as: adulterers should be punished sufficiently to make the practice very rare). But without a community capable of generating such norms it seems to us that successful arbitration must mostly be based on the powers of the parties to fight, or be imposed by a powerful third party.

There may be economies of scale in dispute resolution, so that arbitrators who develop a record of effective solutions gain *more* power, and eventually become monarchs. Indeed, there

are many examples of early states that seem to extend their rule through effective adjudication.[29] The weak party would always want to appeal to a relatively powerful arbitrator (who might be able to bring the strong to his forum and enforce the settlement). If there are gains from dispute resolution produced by avoiding the deadweight losses of fighting, the parties may share these with the arbitrator, and an arbitrator will have an incentive to gather more cases. In some circumstances, competition among arbitrators could be expected to lead to consolidation to a few (or one) powerful arbitrator who would become a Hobbesian sovereign. Thus, there is a nascent theory of the state embedded here, though we do not assert that the state is always or even usually the result of such a process. If knowledge is not inevitably power, it may be so eventually. We end by finishing Herodotus's story of Deioces, the Median king:

> "The number of complaints brought before him continually increasing,as people learnt more and more the fairness of his judgments, Deioces, feeling himself now all important, announced that he did not intend any longer to hear causes, and appeared no more in the seat in which he had been accustomed to sit and administer justice. ... Hereupon robbery and lawlessness broke out afresh, and prevailed through the country even more than heretofore; wherefore the Medes assembled from all quarters, and held a consultation on the state of affairs. ... "We cannot possibly," they said, "go on living in this country if things continue as they now are; let us therefore set a king over us.... It followed to determine who should be chosen to the office. When this debate began the claims of Deioces and his praises were at once in every mouth; so that presently all agreed that he should be king.... Deioces continued to administer justice with the same strictness as before. Causes were stated in writing, and sent in to the king, who passed his judgment

[29] See Shapiro.

upon the contents, and transmitted his decisions to the parties concerned: besides which he had spies and eavesdroppers in all parts of his dominions, and if he heard of any act of oppression, he sent for the guilty party, and awarded him the punishment meet for his offence. Thus Deioces collected the Medes into a nation, and ruled over them alone."[30]

[30] The details are even better: "he required a palace to be built for him suitable to his rank, and a guard to be given him for his person. The Medes complied, and built him a strong and large palace, on a spot which he himself pointed out, and likewise gave him liberty to choose himself a bodyguard from the whole nation. Thus settled upon the throne, he further required them to build a single great city.... All these fortifications Deioces caused to be raised for himself and his own palace. The people were required to build their dwellings outside the circuit of the walls. When the town was finished, he proceeded to arrange the ceremonial. He allowed no one to have direct access to the person of the king, but made all communication pass through the hands of messengers, and forbade the king to be seen by his subjects. He also made it an offence for any one whatsoever to laugh or spit in the royal presence."