

Do Alliances Deter Aggression? The Influence of Military Alliances on the Initiation of Militarized Interstate Disputes

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Scholars have long debated the effects of military alliances on the likelihood of war, and no clear support has emerged for the argument that alliances improve the prospects for peace through effective deterrence nor that they kindle the flames of war. In this study, I argue that alliance commitments affect the probability that a potential challenger will initiate a militarized interstate dispute because alliances provide information about the likelihood that others will intervene in a potential conflict. Yet, different agreements provide different information. Alliance commitments that would require allies to intervene on behalf of potential target states reduce the probability that a militarized dispute will emerge, but alliance commitments promising offensive support to a potential challenger and alliances that promise nonintervention by outside powers increase the likelihood that a challenger will initiate a crisis. As diplomats have long understood, the specific content of international agreements helps to determine their effects.

The Two Faces of Alliances: Deterrence and Assurance

Do alliances lead to peace or to war? Despite the fact that military alliances have long been considered a key factor in international politics, this basic question remains largely unanswered. Scholars disagree both on the extent of the independent influence of alliances on behavior and on the direction of that influence. While some claim that the careful use of military alliances to create countervailing coalitions will deter aggressors and prevent war (e.g., Gulick, 1955; Morgenthau 1967; Waltz 1979), others claim that alliance commitments can serve to provoke and to expand war (e.g., Christensen and Snyder 1990; Siverson and Starr 1991; Vasquez 1993). Large N empirical tests of the relationships between alliances and war have not clarified the debate, as they have failed to produce clear and consistent findings. Based partially on the lack of a clear and consistent empirical relationship, some scholars have

concluded that alliances have no discernible effect on the probability of international conflict.

In this article, I suggest that the simple question, “Do alliances lead to peace or to war?” is ill posed because the term *alliance* represents a heterogeneous category of cooperative security agreements that may have differing effects on the probability of conflict. I argue that military alliances do affect the probability of militarized conflict, but that this impact has been clouded in previous empirical research by the failure to account for differences in treaty content. Because some alliances serve to deter aggression while others encourage it, relationships between alliances and military conflict have been masked in aggregate analysis.

Building on theoretical models developed by Morrow (1994), Smith (1995, 1998), and Fearon (1997), I argue that formal military alliance agreements provide information to state leaders about the likelihood of intervention by other states in potential conflicts. Because alliances

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help state leaders to predict which conflicts will remain bilateral and which are likely to become multilateral, they affect the willingness of leaders to initiate particular militarized disputes. I extend the work of Morrow, Smith, and Fearon both theoretically and empirically. Theoretically, I extend the argument to include hypotheses about the type of information provided in alliance agreements and the subsequent effects that alliances including different promises are likely to have on the decisions of state leaders to initiate militarized conflict. This allows me to develop a more general theory of the influences of alliances on war. Empirically, I employ a new dataset on alliance commitments to conduct a statistical analysis that supports this theory and also fills a void in the literature on deterrence by addressing the extended general deterrent properties of formal alliance commitments. While scholars have attempted to determine the effects of alliances on extended immediate deterrence, the extended general deterrent effect of alliances remains largely unexamined (Huth 1999).

Alliance commitments affect decisions to initiate disputes, but because different alliances involve different promises to different actors, alliances can have different effects. Some alliances deter open hostilities whereas others provide the assurances necessary to facilitate attack. This study offers additional support for the efficacy of international agreements; alliances do affect behavior and they can play an effective role in general deterrence. The study also focuses attention on the varying effects of treaties with different provisions; the specific content of treaties matters in addition to their existence. Together these lessons should aid policymakers in anticipating the possible effects of military alliances and should encourage scholars to pursue research on military alliances, but to be wary of generalizing the effects of treaties with varying provisions.

Why Should Alliances Affect Dispute Initiation?

The puzzle facing theorists of alliance politics centers on the question of why leaders formalize cooperative relationships in contracts (e.g., Morrow 2000). It is possible to cooperate without a formal agreement, so why do state leaders commit to contracts, particularly if contracts in international politics are unenforceable? The answer posed by modern theoretical work is that the act of formalizing an alliance commitment reveals information about future incentives, and in some instances might create future incentives that did not previously exist. Alliances serve

as costly signals that allow state leaders to anticipate the behavior of other states. Either because of the sunk costs involved in forming alliances or because of the anticipated future costs of abrogation, only states that are fairly likely to fulfill their alliance commitments choose to form alliances. This suggests that the information conveyed by alliance formation about future behavior should be viewed as reasonably reliable (Morrow 1994; Smith 1995, 1998; Fearon 1997).

Recent empirical evidence on alliance reliability and conflict intervention is commensurate with this argument. Seventy-five percent of the time, when an alliance treaty is invoked by war, state leaders fulfill their commitments (Leeds, Long, and Mitchell 2000). Relatedly, when general deterrence fails, major powers are more likely to intervene in international crises when they have alliance ties to the target (Huth and Russett 1988; Huth 1998). Thus, both theory and evidence suggest that alliances should communicate credible information; most leaders fulfill their alliance commitments most of the time, and targets with allies are likely to receive assistance.

If alliances provide credible information about the willingness of state leaders to assist their allies, does it follow that this information should affect the decisions of leaders to initiate militarized disputes? Several scholars argue that it should. Gartner and Siverson (1996) point out that initiators are most likely to win the wars they start when those wars remain bilateral. Gartner and Siverson interpret this evidence to suggest that initiators only start wars that they think they can win, and that they are more likely to lose multilateral wars because they miscalculated the support that their targets would receive. Smith (1995, 1996, 1998) goes further and argues that when challengers attack targets with allies, it may be because the challengers expect the allies to be unreliable; reliable alliances will succeed at deterring attack. Alliances should often be an effective tool of general deterrence.

So why haven't political scientists been able to establish a robust empirical relationship between alliances and war?¹ If challengers are reluctant to start conflicts that they fear they can't win, if they know that in many cases they are less likely to win multilateral conflicts than bilateral conflicts, and if they believe that alliances are generally reliable, then it follows that alliances will deter the initiation of militarized disputes. Yet, extant empirical evidence has not revealed that relationship.

¹Singer and Small (1968) and Levy (1981) discover that alliances are associated with peace in the nineteenth century and with war in other centuries. Huth and Russett (1984) and Huth (1988) are unable to uncover a consistent relationship between alliances and the success of extended immediate deterrence. Vasquez (1993) provides a useful summary of this research.

Smith (1995) suggests one possible explanation for this non-finding. Alliances provide information to multiple audiences; both potential adversaries and allies gain information about future behavior. Alliances not only encourage timidity and restraint in adversaries, but embolden partners. Targets with allies may be less willing to concede to more powerful challengers, and challengers with allies are less easily deterred. Smith views each alliance as having two contradictory effects and thus serving both to discourage and to encourage war. Snyder (1984, 1997) refers to a similar phenomenon as an "alliance security dilemma" and warns policymakers that when they commit themselves to protect allies they may succeed in deterring adversaries, but they also may find themselves entrapped by their allies in unwanted conflicts.

Yet, both Smith and Snyder assume that allies can not control the nature of their promises and the information they convey through them to allies and adversaries about their willingness to join a conflict. Their claims suppose that all alliances are equivalent in their terms; that an alliance necessarily constitutes a "blank check" promising support in all circumstances, or at least that allies are unable to provide clear information about the conditions under which they will and will not intervene to help their partners. This is an inaccurate characterization of actual alliance agreements, which are rarely blanket commitments of support, but instead usually include detailed discussion of the conditions under which alliance obligations are invoked and the actions that are required of the signatories upon invocation (Leeds et al. 2002). Most of the time, information about the specific conditions under which support must be rendered and the character of that support is publicly known.²

Thus, there is more information available to potential initiators of conflicts than simply whether they or their targets have outside allies. Not only are outside allies to potential challengers and potential targets likely to have different influences on the calculations of a potential conflict initiator, but the differing terms of alliance agreements should matter as well. While alliances that promise support to a potential target if that state is attacked by an enemy should function to deter aggression, alliances that promise support in an offensive war may provoke it. This insight extends the signaling arguments proposed by Morrow (1994), Smith (1995, 1998), and Fearon (1997), and may prove capable of reconciling these theories with the empirical record. While Morrow (1994), Smith (1998), and Fearon (1997) model alliances only in

a deterrent role, I develop hypotheses about the influence of a wider range of alliance types on the probability of interstate conflict, thus providing a more complete account of the relationships between alliances and military conflict.

Disaggregating the Influence of Alliances on the Probability of Military Conflict

While military alliances have been the subject of considerable discussion in international relations scholarship, progress has been inhibited, in part, by the failure of researchers to define precisely the relationships that qualify as alliances and to ensure that their operational measures are valid indicators of their concepts. For the purpose of this study, I define alliances as "written agreements, signed by official representatives of at least two independent states, that include promises to aid a partner in the event of military conflict, to remain neutral in the event of conflict, to refrain from military conflict with one another, or to consult/cooperate in the event of international crises that create a potential for military conflict" (Leeds et al. 2002, 238). States that fight on the same side in a war or that take similar positions in international discussions are not necessarily allies by this definition; whether or not they are allied with one another depends solely on whether they have committed to a formal relationship that qualifies as an alliance. By this definition, not every form of security cooperation is an alliance, but the definition remains broad enough to include a variety of different types of agreements that will not necessarily have the same effect on the probability of war.

We can distinguish five different basic promises that are included in this definition of alliances: defensive cooperation, offensive cooperation, neutrality, nonaggression, and consultation. Certainly these are not mutually exclusive. Alliance treaties can include multiple promises and often do (Leeds et al. 2002). Yet, it is also the case that few treaties include all of these promises, and thus to use all alliances in a test of an argument specific to one type of promise can be misleading.

Beyond this, alliance treaties often include precise language identifying specific conditions under which different promises come into effect. For instance, alliances may be limited to conflicts in particular locations or with particular adversaries. Treating all alliances as blanket promises applicable to any conflict that emerges is often inappropriate (Leeds, Long, and Mitchell 2000). Treaties that are written with conditional commitments convey

²Some alliance treaties do include provisions requiring the signatories to keep portions of the treaty content or the existence of the alliance secret (Ritter n.d.).

information to allies and adversaries and should affect their behavior differently in circumstances that fall under the auspices of the treaty than in circumstances that do not.

The typical alliance that most imagine is a mutual defense pact. In such a treaty, the parties promise one another active military support in the event one or more is attacked. Based upon the informational theories discussed above, these alliances should have a deterrent effect. Potential aggressors know that if the alliance is reliable, they will find themselves in conflict with not only their intended target, but also the state or states allied with the target. If we assume that aggressors are more likely to initiate conflicts that they think they can win, and if we assume that usually aggressors are more optimistic about their ability to win a bilateral conflict than a multilateral conflict, it follows that potential aggressors should be more reluctant to challenge potential targets with allies committed to intervene on their behalf. This leads to a first hypothesis:

H1: Potential challengers are less likely to initiate a militarized dispute against a potential target if the target has one or more allies committed to intervene on behalf of the target if attacked by this challenger.

The formal models of Morrow (1994) and Smith (1998) are concerned exclusively with this defensive scenario, and in the past, some researchers have made the leap from this hypothesis to the claim that alliances must reduce the probability of military conflict. Yet, only 48% of the alliances in the Alliance Treaty Obligations and Provisions (ATOP) dataset include any promises of defensive support, and other types of promises may have alternative effects on the decisions of potential challengers. A straightforward example is the offense pact. Offense pacts promise active military support in circumstances not precipitated by military attack on an alliance member. The assurance of allied support in the challenge should not deter an aggressor, but rather embolden the potential challenger. Smith (1995) considers the influence of outside allies on the probability that a potential challenger will elect to attack and deduces that leaders who wish to advance their interests through aggression are more likely to do so when they have received commitments from others to help them.³ Thus, a second hypothesis is:

³State leaders probably form offensive alliances when they anticipate that future conflict is likely. The argument here is not that the alliance creates the desire for aggression, but rather that state leaders contemplating the initiation of military hostilities are more likely to choose aggression if they have been able to obtain outside commitments of support than if they have not.

H2: A potential challenger is more likely to initiate a militarized dispute against a potential target if the challenger has one or more allies who have promised offensive support in the conflict.

A more nuanced example, however, is the neutrality pact. Neutrality pacts include a promise that under specified conditions, a state will not participate in a conflict on the side of a partner's adversaries. These treaties offer assurances of nonintervention.⁴ Werner (2000) argues that challengers moderate their demands to deter outside intervention in conflicts. Sometimes, potential challengers go so far as to negotiate treaties with states they fear might choose to intervene. While defense pacts provide a potential aggressor with information that a conflict is less likely to remain bilateral, some neutrality pacts provide potential aggressors with information that they need not fear outside intervention on behalf of the target. Such promises might serve to encourage aggression, as leaders feel more certain that they can attack without fear of the development of a superior opposing coalition (Moul 1988).⁵ Thus, hypothesis three is:

H3: A potential challenger is more likely to initiate a militarized dispute against a potential target if the challenger has one or more allies committed to remain neutral in a conflict in which the challenger attacks this target.

The Alliance Treaty Obligations and Provisions (ATOP) dataset (Leeds et al. 2002) includes enough information about the specific content of alliance treaties to test these hypotheses appropriately. The dataset includes both information about the kinds of promises contained

⁴Neutrality pacts share some similarities with nonaggression pacts. Nonaggression pacts commit states to settle their disputes with one another without resorting to military force; their focus is on the relationship between the allies, not on the allies' relationships with outsiders. Neutrality pacts, on the other hand, commit signatories to refrain from assisting adversaries in the event a member becomes involved in a military conflict with an outside state. Neutrality and nonaggression commitments are not mutually exclusive, and the same treaty may include both types of promises. Because neutrality commitments are much more directly relevant to relations with outside states, I focus on these.

⁵For instance, before the Seven Weeks War, Austria signed an agreement with France promising French neutrality in return for territorial concessions upon the conclusion of the war (Weill 1972, 181–2). In the Franco-Prussian war, Britain signed treaties with both France and Prussia promising neutrality in their ensuing conflict as long as both sides respected the neutrality of Belgium (Hurst 1972, 455–8). Prior to the Russo-Turkish war of 1878, Russia made an agreement with Austria-Hungary in which Austria-Hungary promised neutrality in return for Russia's promise to limit demands on Turkey (Hurst 1972, 511–5).

in specific alliance treaties and the conditions under which these promises come into effect. Including information about specific types of outside alliance commitments to potential challengers and potential targets in a statistical model of dispute initiation will demonstrate whether alliance commitments have the hypothesized effects on the probability of militarized conflict.

Research Design and Empirical Results

In order to test these arguments about the influence of outside allies on the probability that a potential challenger will initiate a militarized dispute against a particular target, I employ a dataset that includes all states in interactions with the states in their politically relevant international environments for each year from 1816 to 1944. The unit of analysis is the directed dyad year.⁶ Rather than offering predictions regarding the overall level of war in a system or the war proneness of a particular state, the dyadic research design allows scholars to make predictions about who is likely to fight with whom under what conditions. A directed-dyad research design distinguishes cases in which (for example) Britain initiates a dispute against Russia from cases in which Russia initiates a dispute against Britain. Because I am interested in the conditions conducive to the decision by one state to initiate a dispute against another state rather than simply the conditions associated with the emergence of a dispute between two states, this is the appropriate unit of analysis. The temporal domain is dictated by data availability.⁷ The spatial domain follows a number of similar studies that have relied on simple decision rules to determine the types of relationships relevant for studies of militarized con-

flict. Because the sample of cases is unduly expanded by including states that we suspect have little ability or reason to engage one another in military conflict (for example, the Mauritania-Bolivia dyad or the Albania-Cambodia dyad), scholars have often limited analysis to the interactions of each state with its neighbors and with major powers (Maoz 1996). Lemke and Reed (2001) reassure us that this is unlikely to threaten proper inference.

The dependent variable is coded 1 if the challenger initiates a militarized interstate dispute against the target in the year in question, and 0 otherwise. A Militarized Interstate Dispute is defined as an instance "in which the threat, display, or use of military force . . . by one member state is directed towards . . . another state" (Jones, Bremer, and Singer 1996, 168). Some MIDs escalate to full scale war, while others end short of war.⁸ I employ the dyadic version of the MID data (version 1.1) provided by Zeev Maoz, so only pairs of states that engage one another directly are included as disputing dyads.⁹ I consider only original initiators and original targets; decisions to join ongoing disputes are not included.¹⁰ Original initiators are those states that are involved in a dispute when it begins on the side that first takes action, and original targets are those states that are involved in a dispute at its inception on the side that does not take the first action to qualify as a MID.¹¹

The independent variables of primary interest are three variables capturing types of alliance commitments to the potential target and the potential initiator. These are all drawn from the Alliance Treaty Obligations and Provisions (ATOP) dataset.¹² The first variable is a dummy variable representing whether the potential target had any allies who were committed to defend the target in the event the target was attacked by this potential challenger. Only alliances that include specific commitments for active military support in the event of attack qualify, and

⁶Prior studies have been posed at the system or state level of analysis. Singer and Small (1968), Ostrom and Hoole (1978), and Levy (1981) examine the correlation between the proportion of nations with allies and the proportion of nations in war and find no relationship that is consistent over time, but their studies do not attempt to determine whether there is any specific connection between particular alliances and particular wars. Siverson and King (1979) and Wayman (1990) examine the relationship between alliance membership and war participation at the state level of analysis and conclude that nations with alliances are more war-prone than nations without alliances, but it is unclear if they have revealed a causal relationship between alliance membership and war proneness or whether similar factors lead states to be both war prone and likely to form alliances.

⁷The indicators for my dependent variable and most of my independent variables are not available for cases occurring before 1816, and the data for my independent variables of primary interest (specific alliance commitments) are not yet available for years beyond 1944.

⁸This study analyzes the effects of alliances on the probability of dispute initiation, which is one necessary step to the outbreak of war. To understand the full effects of alliances on the probability of war, however, will require combining a study of the impact of alliances on dispute initiation with a study of the impact of alliances on the likelihood that disputes escalate to war.

⁹The data were obtained at <http://spirit.tau.ac.il/~zeevmaoz>.

¹⁰Alliances should have a different impact on joining decisions than initiation decisions, and thus the two phenomena can be studied productively separately. See Bennett and Stam (2000b) for a useful discussion of operationalization decisions using the MID data.

¹¹For those familiar with the MID data, original initiators are those that are coded as original participants on side A, and original targets are those that are coded as original participants on side B.

¹²The ATOP data can be obtained at <http://www.ruf.rice.edu/~leeds/atop.html>.

alliances are coded only for the dyadic relations to which they may apply. When, for instance, defensive commitments are limited to conflicts with particular adversaries, the same state in the same year might be coded as having an ally with a defensive commitment in some of its dyadic relations and not in others. For instance, if an alliance treaty specifies that the partners promise one another mutual defense if either is attacked by Germany, the alliance members would be coded as having commitments of defensive support in their dyadic relations with Germany, but not with Britain, or Italy, or any other dyadic partners. Alliance commitments may also be asymmetric. If one party promises to defend another without requiring a reciprocal guarantee, one member of an alliance may be coded as having a defensive ally while another is not.

The second variable is a dummy variable representing whether the potential aggressor had any allies who were committed to join in an offensive attack against this target. Again, I took great care to code offensive alliances to the potential aggressor only in cases in which the treaty specifies promises of active military support that are not contingent upon one of the partners being attacked, and for dyads to which the specific *casus foederis* would apply. Thus, if offensive promises apply only to particular targets or to particular locations, then the potential aggressor is coded as having offensive allies only in those dyadic relationships.

The third variable is a dummy variable representing whether any states had alliance commitments to the potential challenger that would preclude their intervention on the side of the target if the challenger attacked. These alliances are neutrality pacts; they specify that a partner will not fight with adversaries against an ally. Not only was the coding of these commitments limited only to conflicts with the targets that meet the specifications of the treaty, however, but neutrality pacts were also only coded as applicable to potential challengers if they were not conditional upon a partner being attacked. Many neutrality pacts are specifically limited to instances in which a member of the alliance is not the aggressor. The variable for neutrality commitments to a potential challenger includes only those alliances that are applicable to the dyad in question with the alliance member in the role of conflict initiator.

Because the goal of this analysis is to explore the relationships of different types of alliance commitments to the probability of military conflict, it is important to note that the coding of obligations in alliance treaties in the ATOP dataset is based solely on the texts of the agreements, and not on their use in practice, the alleged “true” intentions of the policymakers, or their ultimate effects. I argue that alliances provide information to potential challengers about

the intentions of others, and that this information comes from what is written in treaties. Testing my hypotheses appropriately, therefore, requires distinguishing different types of alliances based on information contained in the treaties.

Particularly important to this study is the distinction between defensive and offensive alliance obligations. An alliance is considered a defense pact if it is explicitly limited to circumstances in which the sovereignty or territorial integrity of an alliance member is attacked. An alliance is considered a defense/offense pact if the agreement contains additional language requiring active military cooperation in circumstances not precipitated by direct attack or language obligating the members to military action beyond repelling attackers from the alliance member’s territory. The alliance is considered an offense pact if it commits members to fight together in circumstances that do not involve protecting their own sovereignty and territorial integrity.¹³

Some examples may serve to illustrate the differences. The Balkan Entente, signed by Greece, Romania, Turkey, and Yugoslavia in 1934, is a defense pact. The obligations of the parties are defined (in part) as follows: “The Pact of Balkan Entente is not directed against any Power. Its object is to guarantee the security of the several Balkan frontiers against any aggression. . . . The Pact of Balkan Entente is a defensive instrument; accordingly, the obligations on the High Contracting Parties which arise out of the said Pact shall cease to exist in relation to a High Contracting Party becoming an aggressor against any other country within the meaning of Article 2 of the London Conventions” (League of Nations, V 153, 155–9). While the Balkan Entente commits the signatories to active military support of one another in case of attack on their home territory, it explicitly limits obligations to this defensive scenario.

In contrast, the 1912 Treaty of Friendship between Bulgaria and Serbia contains both defensive and offensive obligations. It states in part: “The kingdom of Bulgaria and the kingdom of Serbia guarantee to each other their national independence and the integrity of their national territories, binding themselves absolutely and without reservation to succour each other with their entire forces, in the event of one of them being attacked by one or more States. . . . The two contracting parties also undertake to come to one another’s assistance with all their forces in the event of any Great Power attempting to annex, occupy,

¹³While Singer and Small (1966) do not include a category for offense pacts in the coding scheme that produced the alliance data used in virtually all of the large n empirical tests of the relationship between alliances and war, many of the alliances that are included in the ATOP dataset and coded as including offensive commitments are included in the COW dataset and labeled defense pacts.

or even temporarily to invade with its armies any part of the Balkan territories which are today under Turkish rule, if one of the parties should consider this as contrary to its vital interests and a *casus belli*" (Hurst 1972, 819). The Bulgarian and Serbian leaders do not promise solely to defend one another's sovereignty and territorial integrity against direct attack. They also accept obligations to fight in the event that conflict emerges in an outside state, Turkey. Thus, this alliance imposes obligations that are not limited to direct defense. Even though the stated goals of Bulgaria and Serbia are to protect the status quo in Turkey, they plan to do so through the joint projection of military force abroad, which constitutes a promise of joint offensive action according to the ATOP coding rules.

A clear case of an offensive alliance is the treaty signed by Prussia and Italy in 1866, just before the Seven Weeks War with Austria. It states in part, "If the negotiations His Majesty the King of Prussia has opened with the other German Governments concerning certain reforms of the Confederate Constitution, which are demanded by the needs of the German Nation, shall fail, and in consequence thereof his Majesty be forced to take up arms in order to give effect to his proposals, then His Majesty the King of Italy, after Prussia has taken the initiative, and so soon as he is made aware of that fact, shall in virtue of this Treaty, immediately declare war against Austria. From that moment the war shall be carried on by both their Majesties with all the powers that Providence has placed at their disposal" (Sybel 1891, 355). The Prussian and Italian governments agree to cooperate in military attack on Austria in order to achieve their revisionist aims. They make no reference to joint defense.

Another offense pact according to the ATOP coding rules, however, is the 1832 agreement of Great Britain and France regarding the Netherlands. In this agreement, leaders of Britain and France commit to use joint military force to compel the withdrawal of Dutch troops from Belgium should the King of the Netherlands fail to respond to their ultimatum (Hurst 1972, 221–5). The French and British commit to assist one another with active military effort in an endeavor that does not relate directly to the defense of their own sovereignty and territorial integrity. Regardless of the fact that they do not seek spoils for themselves, this meets the requirements of offensive action. Were Belgium a party to the agreement, this alliance would involve promises by Britain and France to defend Belgium. Since the alliance is an agreement between only Britain and France, however, it includes no defensive promises. The military obligations come into effect without threats to British or French territory or sovereignty, and thus the alliance is coded as an offense pact.

Because my argument is based on the role of alliances in providing information about future intentions, some alliances that include provisions requiring the signatories to keep the agreement secret pose a difficult challenge. For offensive and neutrality commitments, secrecy should not affect expected behavior because the potential challenger is an alliance member. Secret defensive promises, on the other hand, may not convey any information to potential challengers, and thus might not be expected to perform a deterrent function. Fortunately, the ATOP dataset includes information about whether there were provisions in an alliance agreement requiring the signatories to keep all or part of the agreement secret. Not many defense pacts have secrecy provisions, and those that do are often signed by leaders of states who have other alliance commitments. In the few instances in which the only defensive commitment to a potential target was intended to be secret, I do not code a defensive alliance to the target.¹⁴ Because the potential challenger was not intended to know of the agreement, the challenger's behavior should not be affected by its existence.

In coding all of the variables representing outside allies to the potential challenger and target, I was careful to ensure that I only evaluated the impact of commitments that were in effect when a dispute began. Given that the data are aggregated on a yearly basis, I examined the temporal relationship between alliance commitments and disputes carefully to be certain that the alliances precede the disputes. Alliances that begin after a dispute begins or that end before a dispute begins but within the same year are not in effect when decisions about dispute initiation are made, and thus should not affect those decisions. If alliance treaties were signed after a dispute began or were terminated before a dispute began, they were not coded as applicable to the case.

My hypotheses relate to the influence of outside alliance commitments on the probability of a militarized interstate dispute. In order to evaluate the independent substantive effect of alliance commitments, however, I must embed these variables in an empirical model that predicts a base probability of dispute initiation. I include five variables in the model that have often been included in models designed to explain conflict initiation and are available for the temporal and spatial domain of this study.

¹⁴While the ATOP dataset includes information about whether the signatories promised to keep the agreement secret, it does not include information about whether the pact remained secret in practice. See Ritter (n.d.) for discussion of the role of secret alliances in the nineteenth century and an accounting of the extent to which they remained unknown to outside parties. I only exclude treaties that provide for the signatories to conceal the entire treaty, including its existence.

First, I include a measure of whether both states in the dyad had democratic forms of government. Many studies have demonstrated that democracies are unlikely to fight wars against one another or to engage in military disputes of any kind (e.g., Russett and Oneal 2001). As a result, I expect that all else equal, democratic states will demonstrate a lower propensity for militarized disputes with one another. The data on domestic regime type is drawn from the Polity III dataset (Jagers and Gurr 1996). I code as jointly democratic any dyad in which both states score a six or higher on the POLITY III democracy scale.

Second, I include a dummy variable to represent whether the two states in the dyad are contiguous. Because contiguous states tend to have greater opportunity to engage one another militarily, and because proximity can create conflict over issues like territorial boundaries, immigration, and resource allocation, contiguous states should be more likely to engage in militarized disputes than those that are not contiguous (e.g., Bremer 1992; Vasquez 1993). The data on contiguity were obtained from the EUGene computer program (Bennett and Stam 2000a).¹⁵

The third variable in my base model of conflict initiation compares the power of the potential challenger to the power of the potential target. Because stronger states are more likely to expect military success, stronger states should be more likely to challenge weaker states (e.g., Bennett and Stam 2000c). Using the Correlates of War project capabilities data obtained from the EUGene program, I create a variable that is the ratio of the capabilities of the potential challenger to the sum of the capabilities of the potential challenger and the potential target (Singer 1988). The values of the variable are thus bounded between zero and one, with smaller values representing weaker challengers and larger values representing stronger challengers.

Next I include a variable designed to represent the common international interests of the two states in the dyad. Presumably, military conflict is less likely among states that agree on the major contours of foreign policy (e.g., Bueno de Mesquita 1981; Gartzke 1998). Following a long tradition, I measure common interests through the similarity of alliance portfolios (Bueno de Mesquita 1981). I employ the weighted measure of similarity de-

veloped by Signorino and Ritter (1999) to establish the similarity of alliance portfolios. The values range from -1 to 1 , with larger numbers representing greater similarity, and thus, we assume, more similar international interests.¹⁶

Finally, I include a dummy variable that is coded one if the potential challenger and potential target are partners to the same military alliance. Some scholars have hypothesized that shared alliance commitments make conflict between partners less likely, although theoretical agreement does not exist on this point (e.g., Ray 1990; Bueno de Mesquita 1981). Many recent studies include a variable representing shared alliance commitments in models of conflict initiation, but this variable is not consistently statistically significant (e.g., Bremer 1992; Maoz and Russett 1993). I use the ATOP data to code shared alliance commitments, but I replicate the model using the more familiar Correlates of War alliance data and find no difference in the results.¹⁷

The most common techniques for analyzing statistical models with dichotomous dependent variables are logit and probit. Yet, traditional logit and probit techniques require assumptions of independence among cases that are inappropriate in a time-series cross-section context. Because my sample includes repeated observations of the same dyads over time and observations of many dyads in the same year, I have reason to expect correlation in the error terms both cross-sectionally and inter-temporally. Thus, I rely on a generalized estimating equation (GEE) to analyze my data. A direct extension of the Generalized Linear Model (GLM), GEE is a quasi-likelihood method that provides information about the relationship between the expected value of the dependent variable and the covariates in the context of time-series cross-section data, and is particularly well suited to examining differences among groups identified by particular characteristics (Zorn 2001). Given that my primary interest is in

¹⁶This measure was obtained from the EUGene computer program and is based on the Correlates of War project alliance data.

¹⁷There is no overlap between this control variable and the primary independent variables representing the commitments of outside allies, and the correlation between the variable measuring shared alliance membership and the variable measuring similarity of alliance portfolios is less than 0.2. The shared alliance variable captures whether the potential challenger and potential target are members of a common alliance, which some scholars claim indicates that they have an affinity for one another's policies, and are unlikely to fight one another. The variables representing outside alliance commitments capture whether either the challenger or the target has other states committed to cooperate with them should they become involved in a conflict. I did not code states as outside allies to their partners in the dyads in which the two allies in question interact. In other words, Britain can not serve as an outside ally to France in France's interactions with Britain.

¹⁵Given that the sample has already been limited to dyads that are contiguous and/or contain a major power member, the reference category is not all noncontiguous dyads, but those noncontiguous dyads that are deemed politically relevant because they include at least one major power member. The relative increase in probability of conflict associated with contiguity should be weaker in this sample than in a sample of all dyads, but there remains reason to believe (and prior evidence to suggest) that contiguous states are more conflict prone even in this more limited sample.

TABLE 1 The Effects of Outside Allies on the Probability of the Initiation of Militarized Interstate Disputes, 1816–1944

Probability of Dispute Initiation in Sample = 1.17%

	Effects of Outside		Substantive Effect on Probability of Dispute Initiation ^{##}
	Base Model Coefficient (s.e.) [#]	Allies Coefficient (s.e.) [#]	
Joint Democracy	–0.353 (0.228)	–0.323 (0.215)	–0.25%
Contiguity	1.112** (0.151)	1.232** (0.144)	1.62%
Power of Potential Challenger in Relation to Potential Target	0.728** (0.148)	0.539** (0.146)	0.40%
Shared Alliance Commitment	–.297 (0.227)	–0.292 (0.233)	–0.25%
Similarity in Alliance Portfolios	–.940** (0.121)	–0.916** (0.122)	– 0.53%
Potential Target Has Defensive Ally	–	–0.331* (0.139)	– 0.27%
Potential Challenger Has Offensive Ally	–	0.390** (0.127)	0.40%
Potential Challenger Has Relevant Neutrality Pact	–	0.461** (0.116)	0.49%
Constant	–4.666	–4.666	
N	69,730	69,730	
Chi ²	142.23**	197.69**	

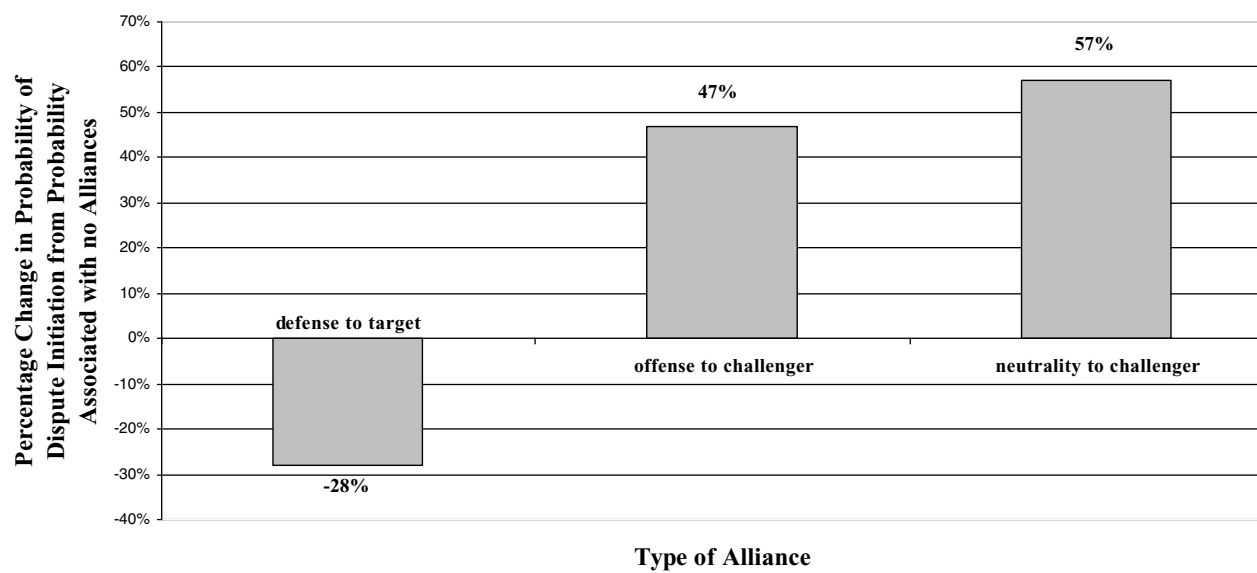
* $p < 0.05$; ** $p < 0.001$.[#]Standard errors are calculated assuming potential nonindependence among cases associated with the same dyad.^{##}Absolute change in probability of dispute initiation associated with a change from one standard deviation below the mean to one standard deviation above the mean in this independent variable (or from 0 to 1 for dichotomous variables) when all other variables are held constant at their mean values.

understanding how variance in alliance commitments affects the average probability of dispute initiation across a population, I elect to use this method. I correct the standard errors for heteroskedasticity among dyads, and correct for autocorrelation using a common rho estimated from the data.

The results of the statistical analysis appear in Table 1. Column 1 reports results for a model that includes only the control variables and not the variables representing outside alliance commitments. The findings are consistent with past research. Stronger challengers and contiguous states are more likely to initiate disputes, and states are less likely to initiate disputes against those that have similar alliance portfolios. The variable representing membership to a common alliance is statistically insignificant, regardless of whether the Correlates of War alliance data or the ATOP alliance data is used. The one surprise is that jointly democratic dyads do not show a lower propensity for dispute initiation in this sample. This may initially appear to

contradict a substantial amount of previous analysis, but once we consider the time period of the study, this is less apparent. In fact, the statistical results on the impact of joint democracy on conflict initiation in the nineteenth century are much more mixed than those covering the twentieth century, perhaps because the sample of democratic states prior to World War I is very small (e.g., Farber and Gowa 1995; Mitchell, Gates, and Hegre 1999). I divided the sample and found that in the period from 1914 to 1944, there is a statistically significant negative relationship between joint democracy and dispute initiation, but that the relationship is statistically insignificant for the 1816–1913 period. Thus, the base model is consistent with past research.

The second column in Table 1 reports the results of an analysis of the same specification with the addition of variables representing alliance commitments to the potential challenger and the potential target. The data are commensurate with all three of my hypotheses. Potential

FIGURE 1 Change in Probability of Dispute Initiation Due to Outside Allies

challengers are less likely to initiate disputes against targets whom they know have allies committed to intervene in their defense if they are attacked.¹⁸ Challengers who have commitments from allies to cooperate offensively or to remain neutral in the event of conflict with the potential target, however, are more likely to initiate disputes than those without such allies. Alliances do have consistent effects in the hypothesized directions. In addition, a comparison of the χ^2 statistics for the base model and the model including variables representing outside alliance commitments demonstrates that the new variables add substantial explanatory power. Not only are the three variables independently statistically significant, but they are jointly significant beyond the .0001 level.

In the third column of Table 1, I list the absolute change in the predicted probability of dispute initiation associated with a change in each independent variable while all other independent variables are held constant at their means.¹⁹ In the case of the continuous variables, I

report the difference in the predicted probability of dispute initiation with a value that is one standard deviation above the mean versus a value that is one standard deviation below the mean. In the case of the dichotomous variables, I report the difference in the predicted probability of dispute initiation with a value of one on this independent variable versus a value of zero. Thus, when a potential conflict initiator has an offensive ally, the probability of dispute initiation increases by 0.40%. This sounds like a low percentage, until one recognizes that the probability of dispute initiation in the sample as a whole is only 1.17%. For such a rare event, even the small percentage changes that we find in this analysis make a difference.

This is easiest to see by examining the bar graph pictured in Figure 1. This figure shows the percentage change in the probability of dispute initiation that can be attributed to outside allies when all other variables are held at their mean values. The first bar shows that when a target state has an ally committed to its defense, the probability of dispute initiation is 28% lower than the probability of dispute initiation in a dyad with the mean characteristics in the dataset but no outside allies. The second bar represents the case in which the challenger has an offensive ally; in this instance, the probability of dispute initiation is 47% higher than it is in the case in which neither the challenger nor the target has any allies committed to intervene.

¹⁸The reported results exclude secret defensive alliances. I conducted the same analysis including secret defensive alliances, and I found that the signs and levels of statistical significance of the coefficient for the variable representing an outside defensive alliance commitment to the potential target were the same whether or not the secret alliances were included. The magnitude of the coefficient is slightly larger and the standard error slightly smaller, however, when the secret alliances are removed, as an informational theory would predict.

¹⁹I hold all variables constant at their means, including the dichotomous variables. While no individual state could actually hold the average characteristics of this sample, the population averaged GEE

model is designed to predict average effects across a population, and thus this characterization of a baseline value is appropriate.

Finally, the bar on the right shows that when challengers have obtained promises of neutrality from outside states, the probability of dispute initiation is 57% higher than it is when neither state has any allies. Notably, these substantive effects are similar to those associated with variables like power relations and similarity in alliance portfolios, which scholars of international politics have long considered crucial to predicting and preventing dispute initiation. Given the rare occurrence and severe implications of military conflict, the substantive effects of outside alliance commitments to potential conflict initiators and targets are important enough that they should influence scholarship and policy.

Without exception, the data are supportive of the hypotheses proposed in this study. This suggests that alliances do influence the probability of militarized conflict, but the direction of that influence depends on the content of the treaty. Relevant defense pacts can deter aggressors from attacking alliance members, but relevant offense pacts and neutrality commitments can provide the assurances that aggressors need to facilitate attack.

Conclusions and Directions for Future Research

This article began with a simple question—do alliances lead to peace or to war? The answer is not quite as simple. Because alliances affect the decisions of both adversaries and allies, and because alliances may contain a variety of commitments, different agreements can have different effects. Defensive alliances to potential targets have a deterrent effect, but offensive alliances and promises of non-intervention to potential challengers have an incendiary impact, serving to increase the confidence of a challenger in his ability to succeed through aggression. Aggregating these effects can mask any relationship in large empirical studies.

The value added in this study is two-fold. First, I extend the basic informational theory of alliances to include aspects other than deterrence. Most of the prior research on the signaling properties of alliances has focused only on the case of a state using an alliance to deter a challenger from attacking a protégé. Alliances to the challenger have rarely been analyzed in this context, and researchers have not recognized explicitly the variety of obligations included in alliance treaties and the information provided by the specific content of treaties to allies and adversaries alike. This has limited our ability to provide a general explanation of the relationship between alliances and war. Recognizing these distinctions allows

me to provide a more general theory of the influence of alliances on military conflict.

Second, I provide empirical support for the influence of alliances on general deterrence. In his 1999 review of the scholarly literature on deterrence, Huth writes, “There are, then, no existing studies that directly and carefully test for the extended-general deterrent value of alliances. Given the limited empirical evidence available on alliances, it is not possible to reach clear conclusions about their utility as extended deterrents” (Huth 1999, 39). This study fills that void. By employing a new dataset that provides extensive information about the content of alliance agreements and matching the obligations to the situations where they are known to be relevant, I provide an analysis that is well matched to the theory being tested. The empirical results are consistent with the claim that defensive alliances to a potential target enhance the probability of successful general deterrence. In fact, the evidence is fully commensurate with all the hypotheses. It is reassuring to find that after many decades of seemingly unsuccessful quantitative research on the relationship between alliances and war, a clear influence of alliances on military conflict is discernible.

While this is a good first step, in order to complete our understanding of the relationships between alliances and war, we must also examine the impact of alliances on the probability that a dispute escalates to war. Defensive alliances may deter dispute initiation, but they may also encourage intransigence on the part of targets if disputes begin, raising the risk of war (Smith 1995). Future research should examine the path from dispute initiation to war and the effect of allies on decision making once disputes have begun. The relationships revealed in this study should be viewed as a necessary but insufficient part of a complete understanding of the impact of military alliances on war, and future studies of the influence of alliances on extended immediate deterrence must not ignore the important selection effect generated at the stage of general deterrence and dispute initiation. As Fearon (1994) and Huth (1999) suspect, the inability of past researchers to uncover a deterrent effect of alliances in studies of extended immediate deterrence may be a result of the impact of alliances on general deterrence and the selection effect that results.

We should also incorporate a study of the conditions under which outsiders join ongoing disputes. Are disputes among states with allies particularly likely to expand and diffuse? Under what conditions does the involvement of additional states exacerbate the crisis, and under what conditions does outside involvement encourage peaceful settlement? It is possible, for instance, that defensive alliances deter many potential challengers from initiating

disputes, but that when they fail to deter, they may be associated with particularly serious conflicts. Prior evidence regarding the reliability of alliances and the willingness of major powers to intervene in ongoing crises suggests that this may be the case (Leeds, Long, and Mitchell 2000; Huth and Russett 1988; Huth 1998).

While much work remains to be done to clarify the full effects of outside allies on the probability of war, there are clear lessons to be drawn from this first step. Alliances do appear to affect decision making about international conflict, but the content of the treaties and their impact on both allies and adversaries determine the nature of that influence. Alliances are written contracts, and the varying terms of agreements matter; treaties are not mere “scraps of paper.” We can feel more secure that there is efficacy in the formation of international agreements, but we should also be more aware that the effects are not always in the direction of peace. Policymakers must pay close attention to the information they convey to both their adversaries and their allies through the commitments they make, and scholars should focus increasing attention not only on the existence of international agreements, but on their content as well.

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