

Proxy Wars

The Effects of External Support on Multiparty Conflicts



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Abstract

How does external support affect the number of rebel groups active in a conflict? The aim of this thesis is to investigate whether there is a systematic relationship between external support and civil wars with more than one rebel group active, referred to as multiparty conflicts. Drawing on previous literature on the causes of such conflicts, I argue that external support increases the probability of multiparty conflicts by providing resources to nascent rebel groups while also causing polarization and inhibiting rebel alliances. Additionally, I argue governments involved in interstate rivalries are more likely to be involved in multipart conflicts, as the government's rivals are more likely than other states to support the rebels. I test these theories using global data on the number of actors in intrastate armed conflicts 1975-2009 using logistic regression and Random Forest machine learning. I find that conflicts with external supporters have an increased probability of being multiparty conflicts. This holds true for both support from states to the government and the rebels, as well as support from non-state groups to the rebels. I also find that governments involved in interstate rivalries are more likely to be involved in multiparty conflicts.

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1. Introduction

Multipart conflicts, where the government faces more than one rebel group at the same time, are associated with several factors that make civil wars more severe. They have been found to be longer and more difficult to resolve, cause more deaths and have an increased risk of conflict recurrence compared to conflicts with just one rebel group (Akcinaroglu 2012; Cunningham 2006; Cunningham, Bakke, and Seymour 2012; Christia 2012; Fjelde and Nilsson 2018; Rudloff and Findley 2015). Multipart conflict is a recurring phenomenon with several well-known examples such as Ethiopia, Afghanistan and the Democratic Republic of Congo (Pettersson et al. 2021). A recent extreme case is the Syrian civil war, which has at time of writing led to the death of nearly 400 000 people (ibid.). The escalatory dynamics of the Syrian civil war, and the difficulties associated with ending it, demonstrates the importance of understanding why multipart conflicts occur, and how countries at risk can be identified before such conflicts emerge. Yet, the reasons why some opposition movements become fragmented remain relatively unexplored.

From previous literature, we know that countries with a larger aggrieved population, with more politically salient groups, and a militarily weak government are more at risk of seeing a multipart conflict (Walter 2019). Whether more than one rebel group can establish itself is also a result of barriers to entry that nascent groups need to overcome to establish themselves (Fjelde and Nilsson 2018; Mosinger 2018; Walter 2019). Becoming a party in a conflict requires resources which are often in short supply. Failing to acquire those resources can prevent nascent groups from becoming established.

One underexplored factor that could affect the number of actors active in a conflict is external support. Several case studies indicate that the provision of support from abroad can help actors gaining the resources necessary to overcome barriers to entry. Yet, no quantitative study has investigated the relationship between external support and multipart conflicts. Accordingly, it is not known whether these cases studies are examples of a systematic relationship. Given the many negative consequences of multipart conflicts, this gap is problematic. How does external support affect the number of rebel groups active in a conflict?

In this study, I aim to investigate if there is a systematic relationship between external support and multipart conflicts. I also aim to examine whether external support is able to predict the occurrence of multipart conflicts. I draw on existing literature on the causes of multipart

conflicts. In addition, I also employ theories from literature covering external support and international interstate rivalries, which demonstrate how external backers, often motivated by interstate rivalries, can have profound effects on the dynamics of civil wars.

I argue that conflicts where parties receive external support will have a higher likelihood of developing into multiparty conflicts. External support will increase polarization and create more widespread grievances, which will increase the demand for more rebel groups. External support to the opposition will also help nascent rebel groups overcoming resource related barriers to entry, while also inhibit rebel alliances. I also argue that conflicts where the government is involved in interstate rivalries will have higher probability of being multiparty conflicts. Rebels facing a government involved in rivalries will have a higher chance of receiving external support, as the rivals see the rebels as an opportunity to weaken the government.

I test these relationships using statistical methods with input data on the number of actors in conflicts, external support, and interstate rivalries globally between 1975 and 2009. To analyse this relationship, I use logistic regression and Random Forest prediction (Breiman 2001). I find that conflicts with external sponsors have an increased probability of being multiparty conflicts. This holds true for both support from states to the government and the rebels, as well as support from non-state groups to the rebels. I also find that governments involved in interstate rivalries are more likely to be involved in multiparty conflicts. This relationship decreases when controlling for external support, suggesting that interstate rivalries lead to multiparty conflicts in part because they cause other states to get involved as external supporters. I also find that both external support and interstate rivalries hold predictive power over multiparty conflicts.

This thesis proceeds as follows. In the following section, I discuss previous literature that have explored the causes of multiparty conflicts. Next, I outline my theoretical argument and hypotheses, and define key concepts. This is followed by a presentation of the research design and the statistical methods. In the proceeding section, I present the empirical results for the first hypothesis and discuss the results. This is then repeated for the second hypothesis. Following that, I do a number of robustness tests. Then, I turn to the predictive modeling and discuss the results. In the penultimate section, I discuss the limitations of the study. Finally, I provide concluding thoughts, policy implications and avenues for further research.

2. The Causes of Multiparty Conflicts

Within an opposition, there may exist several groups that have an aspiration of challenging the government through violent means (Fjelde and Nilsson 2018, 552). This may be true even if an intra-state armed conflict has already started, as there may exist groups alongside established rebel groups who seek to become powerful enough to engage the government militarily. These are referred to as nascent rebel groups, who have an aspiration to further their political goals through violent strategies but have not been able to do so yet. The majority of these nascent groups never become actors in an armed conflict, as they never manage to assemble enough resources to engage in organized violence (Lewis 2017). Some do however, and when several groups manage to establish themselves as conflict actors at the same time, the opposition against the government becomes fragmented (Fjelde and Nilsson 2018, 553). This phenomenon, referred to here as multipart conflicts, have been found to complicate and worsen the dynamics of civil wars. Cunningham found that armed conflicts with more veto players last longer and are more difficult to resolve due to the complexities involved when attempting to satisfy the interests of more actors (Cunningham 2006). Cunningham, Bakke and Seymour argue that more non-state actors in civil wars leads to higher levels of violence between the rebels and the government, between different rebel groups, and against civilians (Cunningham, Bakke, and Seymour 2012). The increased competition that follows opposition fragmentation escalates the conflict and thus leads to more deaths. Rudloff and Findley claim that fragmentation of the opposition in civil wars is associated with higher risk of conflict recurrence, as the fragmentation often means more spoilers who are dissatisfied with how the conflict was settled (Rudloff and Findley 2015). The profound consequences of opposition fragmentation demonstrate the importance of understanding why multipart conflicts occur, and to identify which countries are most at risk.

Rebel groups can emerge in two different ways (Fjelde and Nilsson 2018, 552–553). They can either emerge independently from other armed actors, or they can be the result of a splinter of an already established rebel group. In recent years, there have been several studies that have explored factors associated with the splintering of rebel groups. Some factors that have been highlighted include gains or setbacks on the battlefield, low cohesion leading to disagreements and internal factions, as well as repression, concessions and changing demand for political change (Christia 2012; Staniland 2014; Tamm 2016a; Seymour, Bakke, and Gallagher Cunningham

2016). Although the splintering of rebel groups is an important phenomenon to consider when explaining the emergence of multipart conflicts, Fjelde and Nilsson and Walter highlight that only a small minority of all rebel groups in multipart conflicts were created as the result of splintering (Fjelde and Nilsson 2018; Walter 2019). Accordingly, most groups in multipart civil wars emerged independently from each other, with no organizational ties to existing groups. In explaining the formation of multi-party civil wars, theories need to account for both why groups splinter and why new groups emerge. Studies investigating both independently formed groups and splinter groups have been somewhat rarer. The articles that have been published have on the other hand yielded important insights into factors that cause or inhibit the formation of multiple rebel groups.

Mosinger and Walter argue an important factor that determines if rebel movements are unified or fragmented is how the demand for political change is manifested in the country (Mosinger 2018; Walter 2019). The higher the number of sub-national groups present in the country, and the higher level of the population with grievances, the higher the likelihood that the rebel movement will be divided. In this context, several groups have grievances against the current rule, but their grievances differ from each other. This means the groups do not agree on what needs to be done. These grievances can be based on political exclusion, economic inequality, deficiencies in vertical legitimacy to the national political elite. The differing grievances can form cleavages within society that can inhibit cooperation or widespread mobilization. But cleavages can also be used by political entrepreneurs, who can tap into these differences to mobilize different parts of the population along their group (Walter 2019).

If grievances are divided, then there is a demand for several rebel groups to represent these differing grievances. This divided demand can then be used by political entrepreneurs as a basis to form several contending armed groups upon. If grievances are limited, or if the country in question has few sub-national groups who have grievances, then the demand to form several rebel groups is much lower. According to Mosinger, widespread grievances not only open up the possibility of a fragmented opposition, it can also prevent successful formations of alliances, even if there is a will among the opposition to coordinate (Mosinger 2018). If grievances are indeed widespread but divided, the different interests will place a heavy burden on opposition actors to achieve collective action, which is often difficult to achieve when interests and cost bearing differ across the opposition. However, if grievances are exceptionally widespread and acute, they can also act as a bridge across communities, and thus facilitate collective action.

These works tie into the debate of whether the cause of civil wars are resource related aspects, or grievances. On the group level, the finding that higher levels of widespread grievances are associated with multipart conflicts strongly suggest that ideological reasons do play a role. This finding is corroborated by Cederman Gleditsch and Buhaug who find that politically excluded and economically disenfranchised groups were more likely to be engaged in conflict with the government (Cederman, Gleditsch and Buhaug 2014). If more groups are disenfranchised, but these groups do not share grievances with each other, then it is easy to see how that situation could escalate into a civil war with multiple parties. From the view of the political entrepreneur however, the lack of support from the civilian population can be viewed as a resource-based factor, irrespective of if those entrepreneurs are motivated by grievances or their own narrow interest. Support structures of non-combatants are equally if not more crucial than soldiers, which means nascent groups without civilian support will struggle to establish themselves (Parkinson 2013, 418). Without civilian support, political entrepreneurs will thus struggle to gain the support necessary to sustain a rebellion, even if they have an aspiration to form an armed group.

The lack of civilian support is not the only potential obstacle that nascent rebel groups need to overcome in order to become an established actor in an armed conflict. Forming a rebel group is often a difficult and risky enterprise. Governments are often fierce opponents with standing armies, and regularly treat rebellious groups as an existential threat. Moreover, already established rebel groups often do not welcome new challengers (Fjelde and Nilsson 2018). The resources required to maintain a rebellion are limited and will thus become scarce if several rebel groups are vying for them. Accordingly, several studies have highlighted barriers to entry that nascent rebel groups must overcome if they are going to be established actors. If nascent groups face great barriers to entry, then the differing demand for political change will likely not be enough for several groups to form.

Apart from securing civil support, Walter argues the military capacity of the government can form a barrier to entry not just for the outbreak of an armed conflict but also for more than one rebel group to become established (Walter 2019). Accordingly, militarily weak governments have a greater risk in facing several rebel groups, as the government's military strength does not pose the same threat to new groups. The resources and weapons required to withstand the government are therefore not as difficult to come by, thereby lowering the barrier to entry enough for more than one group to challenge the government militarily. Fjelde and Nilsson claim that when

incumbent rebel groups have strong social networks, they form a structural barrier which nascent groups struggle to overcome (Fjelde and Nilsson 2018). These networks make it harder for emerging groups to acquire and maintain the resource base necessary to establish themselves as credible contenders against the government. Similarly, Mosinger claims that unified rebellions tend to occur when one group manages to monopolize civilian support (Mosinger 2018). Such rebel groups tend to prioritize “public goods provision, social ties, and ideological persuasion to foster consensual rather than coercive relationships” (ibid. 63). Groups that use coercive methods to extract support from civilians generally struggle to monopolize their support networks, thereby enabling other groups to establish their own civilian support networks.

Accordingly, the emergence of multipart conflicts has both ideological and material explanations. Without a divided demand for political change, contending rebel groups will struggle to secure civilian support networks necessary to launch and sustain a rebellion, and the opposition is more likely to remain unified. However, if the government is powerful enough to overwhelm most challengers, or if an existing rebel group has managed to monopolize civilian support, then these factors can prevent nascent rebel groups to establish themselves even if grievances are both widespread and divided.

One additional, yet relatively unexplored factor that could lower the barriers to entry for new rebel contenders is external support. The inflow of resources from abroad to nascent rebel groups should be able to remove some resource-based barriers and make it easier for rebel contenders to both face off the government and incumbent rebel groups (Maoz and San-Akca 2012). Previous studies show that external support to actors in intra-state armed conflicts can have profound effects on individual actors and the course of the conflict as a whole. Yet few comparative studies have investigated the relationship between multiparty conflicts and external interventions.

Using qualitative methods, Tamm investigates how the allocation of resources by external sponsors affect the likelihood of group cohesion or within group splits (Tamm 2016a). Rebel groups are marked by differing degrees of within-group factions. Most groups have internal rivals that aspire to lead a group on their own. If the external sponsor channels resources to the incumbent leader, the likelihood of a group splitting decreases, as the leader’s comparative advantage towards the internal rivals increases. Conversely, if the external sponsor for some reason is unhappy with the current leadership, they can choose to channel resources to rivals. If this happens, the likelihood

of a split increases as the internal rivals are more likely to have the resources needed to start their own group. Although not accounting for independently formed groups, Tamm thus demonstrates how provisions of resources from abroad can empower a nascent rebel group to establish themselves as a conflict actor.

Some articles have conducted case studies in individual multi-party civil wars covering the effect of external support. Walther and Pedersen attempt to identify some of the causes behind the fragmentation of the Syrian civil war (Walther and Pedersen 2020). Amongst other findings, they argue the lack of coordination among foreign sponsors made a unified front against the Assad regime difficult to achieve. This effect was amplified due to the many inter-state rivalries that played out within the civil war through the proxies of countries such as Russia, Iran, Qatar and Saudi Arabia. These rivalries open rifts within alliances and prevented new alliances from forming. Walter uses Ethiopia as a case illustration for her theory, which experienced several episodes of intra-state armed conflict between 1976 and 1991 with multiple rebel groups active (Walter 2019). She notes that the formation and sustention of several of these groups were more or less dependent on support from external states. She states that “Without this interference, fewer groups would have formed” (ibid. p.23). In some instances, external support even enabled political entrepreneurs to start a rebel group even if they had virtually no civilian support.

Conclusively, there seems to be a relationship between multi-party civil wars, at least with the splintering of existing groups. In Syria and Ethiopia, external support appears to have exacerbated factors that enabled many groups to establish themselves. These case studies suggest that external support can amplify factors that cause fragmentation of the opposition, but in some cases the provision of support from abroad could be the sole cause that a rebel group is able to establish itself, as several groups in Ethiopia shows. If external support is present, factors such as widespread grievances, a divided demand for political change and civilian support networks appear to be less crucial for nascent rebel groups, compared to if there was no inflow of resources from abroad. Although widespread but divided grievances within the civilian population certainly increase the likelihood that the opposition will be fragmented, external support could reduce the necessity of this factor and in some cases substitute it entirely. However, no comparative study as of yet has investigated the relationship between the presence of foreign sponsors and multi-party civil wars, accounting for *both* splinter groups and independently formed groups. Moreover, no article has done a large-n quantitative study regarding that relationship.

2.1 Theory

In a country at risk of civil war, there can be several political entrepreneurs that have an aspiration to form a rebel group (Walter 2019). These entrepreneurs can be motivated by ideological grievances or personal narrow interests, but for this theory, their motivation has little importance. If the rebels win, they will have a unique opportunity to shape the politics of the country. If the war ends with a negotiated settlement, warring parties in the conflict are likely to be much more rewarded compared to groups that did not fight the government. Accordingly, political entrepreneurs should have an incentive to start a group of which they control, as that will allow them to have much more influence than they would have if they were part of a larger group. But these entrepreneurs face several barriers to entry that must be overcome if they are going to be an established actor in the conflict (Walter 2019; Fjelde and Nilsson 2018; Tamm 2016a). I argue that external actors can help political entrepreneurs acquire the resources necessary to become a warring party in an intra-state armed conflict by supporting them with weapons, finances, troops, intelligence and safe havens. This will reduce nascent rebels' reliance on civilian support, and thus reduce the importance of widespread and divided grievances.

Cunningham claims that when external governments intervene in civil wars, they bring their own agenda to the conflict, that may differ from those of the conflict parties they support (Cunningham (2010)). I argue there are reasons to believe that states and non-state actors looking to support a rebel group would prefer to not get behind a group that already have a sponsor. If a state chooses to bandwagon behind a rebel group, they must share influence over the rebels with another state. If interveners do not share interests, then they would likely prefer to sponsor their own group. Even when allies intervene in the same war, they can choose to support different actors. For example, Saudi Arabia and the United Arab Emirates are on the same side in the Yemeni civil war but have still different interests in the conflict and have chosen to support different parts of the opposition against the Houthis (The Economist 2022). Naturally, there are instances where several countries support the same rebel group, such as the many states that supports the Haftar camp in Libya (Crisis Group 2020). But I argue that when several states want to support the rebel side in a civil war, they will often choose to support separate groups. External states will thus create a non-domestic demand for more than one rebel group in the conflict. With this demand translated into resources to rebel groups, external actors can help rebel groups overcoming

resource-related barriers to entry. By doing so, their support will increase the probability of multiparty conflict. Rebel groups that would struggle to acquire the necessary resources from civilian support networks can thus become parties in the conflict.

That is not the only mechanism in which external sponsors could influence the number of rebel groups. As argued above, external actors can reduce nascent rebel's reliance on civilian support through their provision of support, thus reducing the need for widespread and divided grievances. But I also argue external support can *increase* polarization and grievances. As external states hope to change the course of the conflict through their involvement, previous studies have shown that external support can indeed have significant impact on conflict dynamics and actor behavior. Sambanis, Skaperdas and Wohlforth examine the impact of foreign interventions on the polarization within the target society and subsequently the likelihood of conflict onset (Sambanis, Skaperdas, and Wohlforth 2020). They argue that the involvement of external actors can cause polarization in society between the groups controlling the state and the groups forming the opposition. Similarly, Toukan argues foreign support increases the risk of armed conflict because it makes violent strategies feasible through the provision of weapons and resources, while also increasing domestic polarization when civil war actors try to secure support from abroad (Toukan 2019).

I argue that this effect should impact the probability of multiparty conflict. External support should increase polarization in a way that causes a larger part of the population to rise up. This would mean grievances would become more widespread. This connects back to the arguments made by Walter and Mosinger that widespread grievances should increase the demand for more groups to represent diverging interests across the opposition (Mosinger 2018; Walter 2019). I also argue that this mechanism should not only apply between the government and the opposition, but also within the opposition. If external support can create polarization between the government and the opposition, it should have a similar effect within the opposition. This again ties back to Walter's and Mosinger's arguments that divided grievances within the opposition increases the probability of multiparty conflict (Mosinger 2018; Walter 2019). Polarization within the opposition would increase the demand for more groups to represent diverging interests within the opposition. This translates into a demand for more rebel groups to form and thus enable more groups to establish civilian support networks.

An additional way in which external support can increase the probability of multiparty conflict is by inducing more groups to pick up arms. Toukan argues external actors can also induce groups to try to pursue their agenda through violent means (Toukan 2019). By building on Toukan's argument, I argue that external support to rebels can induce more groups which otherwise would have remained peaceful to pursue their agendas using violence. By doing so, external supporters to the rebels can cause multiparty conflicts by inducing more groups to pick up arms.

One final way in which external support can increase the probability of multiparty conflict, is by inhibiting the formation of alliances within a divided opposition. Walther and Pedersen described the divisive effect of the numerous external rebel supporters in Syria (Walther and Pedersen 2020). This made cooperation difficult, as the interveners did not coordinate their activities. This exemplifies how external rebel supporters can inhibit cooperation and rebel alliances. When there are several rebel supporters, I argue that individual rebel groups have less incentive to compromise due to inflow of resources from abroad. Simultaneously, the difference in interests within the opposition can increase as a result. The different interests of the rebel sponsors can also influence rebel leaders, and thus have polarizing effect within the opposition. Through this mechanism, an already divided opposition will remain divided because of the difficulties of building bridges and long-lasting alliances.

To summarize, I argue that external support should lead to multipart conflicts via three mechanisms. Firstly, external rebel supporters should enable more groups to establish themselves by providing resources to nascent rebel groups. Nascent groups face resource related barriers to entry that need to be overcome if the rebel group is to be established as a conflict actor. When external states intervene on behalf of the opposition, these states should often have an incentive to support their own group. They will therefore help nascent rebel groups who without support would struggle to overcome resource related barriers to entry. Secondly, external support to the government and the rebels exacerbates polarization between the government and the opposition as well as within the opposition, making grievances more widespread and identities more salient. Furthermore, external rebel supporters can induce groups to pursue violent strategies, that otherwise would have remained peaceful. Thirdly, external rebel supporters prevent alliances by exacerbating internal differences within the opposition and make it more feasible for weaker rebel groups to not join stronger ones.

In other words, I argue that external support should increase the risk of multipart conflicts both if the support is directed to the government side and the rebel side. This effect should apply to both warring support, i.e., weapons and soldiers, as well as and non-warring support. The effect should also apply both if the support is provided by other states, and by non-state groups. Accordingly, the first hypothesis will be:

H1: The introduction of warring and non-warring support to an actor in a civil war will increase the likelihood that more than one rebel group will be active in the conflict.

External sponsorship could in theory lead to multi-party civil wars in two main ways; firstly, by causing nascent groups to establish themselves, and secondly; through inducing within-group splits. For the sake of parsimony, the hypotheses will not differentiate between these mechanisms and thus treat them as the same phenomenon; rebel groups created as a result of sponsorship from an external state. Fjelde and Nilsson argue that the challenges faced by nascent groups in civil wars applies to both splinters and independently formed groups (Fjelde and Nilsson 2018).

In *H1*, all civil wars are regarded as equally likely to see external support to the rebel side. However, there are several factors that would likely increase the probability that other states will get involved. One potential factor is interstate rivalries. Maoz and San-Akca argue that the presence of interstate rivalries increases the likelihood that rebels will receive support (Maoz and San-Akca 2012). Toukan and Salehyan, Gleditsch, and Cunningham both assert that external support to one side increases the likelihood that the other side will also be sponsored (Toukan 2019; Salehyan, Gleditsch, and Cunningham 2011). One important reason behind this relationship is international rivalries. States who intervene in civil wars are often motivated by broader geopolitical goals, such as destabilizing the host government or other rivals (Salehyan, Gleditsch, and Cunningham 2011). As sponsoring rebel groups is both a hostile and risky enterprise, governments are unlikely to get involved if they are not engaged in a dispute with another actor. Specific goals may include gaining leverage over territorial issues, disputes over policies, and attempts to unseat or weaken unfriendly regimes.

Consequently, interstate rivalries can often influence which conflicts see the involvement of external states. Among other findings, Salehyan, Gleditsch, and Cunningham found strong evidence that rebel groups active against a government with foreign rivals are more likely to

receive support from another government, and that if the government in a civil war receives support from another government, the rebels are also more likely to receive support (Salehyan, Gleditsch, and Cunningham 2011).

Following that, I argue that a government involved in interstate rivalries will have a higher risk of facing several rebel groups if a civil war breaks out. When the government side is involved in rivalries, those rivals are more likely than other states to support rebels opposing the government. It will thus be easier for nascent rebel groups to find support (Maoz and San-Akca 2012). Additionally, Toukan and Sambanis, Skaperdas and Wohlforth claim the process of attracting sponsors increases the risk that the opposition against the government will become polarized (Toukan 2019; Sambanis, Skaperdas, and Wohlforth 2020). This polarization will make fragmentation of the rebel movement more likely, and inhibit the prospects of alliances between rebels.

H2: If the government in a civil war is involved in interstate rivalries, the conflict is more likely to have several rebel groups active.

2.2 Definitions

Adopting the definition used by Fjelde and Nilsson and Walter, I define a *multiparty conflict* as an intrastate armed conflict where one side is the government of a country, which faces more than one non-state group at the same time in the same conflict (Fjelde and Nilsson 2018; Walter 2019). The group needs to be actively using violence, meaning I exclude non-state group who have used violence in the past but for the moment does not pursue violent strategies.

The terms *nascent rebel group* and *established rebel group* also needs clarification. I define a nascent rebel group as a formally organized group with the aspiration to challenge the government of a state using organized violence but for whatever reason has not done so yet. The reason for this can be both that it is currently unable or unwilling to do so at that moment in time. I define an established rebel group as a formally organized rebel group which is currently challenging the government of a state using organized violence. By doing so, the rebel group has become an established actor in an armed conflict and will remain so until they for whatever reason

cease using organized violence. This definition thus allows an external state to support a nascent rebel group before it becomes a conflict actor.

3. Research Design

3.1 Unit of analysis and dependent variable

In this study, I will evaluate if external support to conflict parties is correlated with multipart conflicts. This will be tested by using statistical analysis based on logistic regression and prediction modelling. The statistical analysis of this study will include all countries that between 1975 and 2009 experienced an intra-state armed conflict, according to the operational definition used by the Uppsala Conflict Data Program (Pettersson et al. 2021). That includes all countries that experienced a conflict between the government and a rebel group, resulting in more than 25 battle-related deaths during a calendar year. The time period used in the analysis is the result of constraints in data availability, but nonetheless includes the final decades of the Cold War, a time period of intense rivalries. It also includes the 1990s and early 2000s, which in Africa was a period of intense inter-state rivalries (Tamm 2016b). To assess the effect of external support and interstate rivalries on multipart conflict, I will firstly run statistical tests using conflict – year unit of analysis. Using conflict – year as the unit of analysis will compare rebel groups who all share incompatibility against the government. This unit of analysis is appropriate as previous findings of the consequences of multipart conflicts, such as intense competition between conflict actors and difficulties related to ending the use of violence, applies to rebel groups who are intricately connected. Rebel groups who share incompatibility will likely be in close competition with each other and resolving the conflict will often require all rebel groups in that conflict to be either defeated or included in a peace agreement. Using conflict – year will thus exclude cases where two rebel groups are active in the same country simultaneously but are not connected in any meaningful way.

The downside of this unit of analysis is that in some countries, conflicts with separate incompatibilities can still be related to each other, where dynamics in one conflict still affect another. There is also a reason to use country – year when external support is used as the explaining variable. If a government is involved in a civil war over the political control over the entire country, another state can choose to undermine that government by sponsoring a secessionist rebel group, as happened in Ethiopia (Walter 2019). It is therefore important to test the hypotheses on a country level as well. Because of these reasons arguing for using country – year as the unit of analysis, I will run a robustness test using country level data.

The dependent variable *Multipart Conflicts* will be a dichotomous variable indicating if the number of rebel groups active is either one or more than one. A conflict will thus be regarded as a multipart conflict if a government is facing at least two rebel groups during the same calendar year. As indicated by the descriptive statistics found below, the majority of all multipart conflicts have only two rebel groups active, while only a very small number have three or more. It is therefore appropriate to use a dichotomous variable, as that means the data will not be skewed, while most of the information is still kept. To code the dependent variable, I will use the UCDP dyadic dataset, which includes all dyads in intra-state conflicts between a government and a rebel group which have at least 25 battle-related deaths recorded per year (Harbom, Melander, and Wallensteen 2008). Country-years that only include non-state conflicts will not be included, as the focus of this study nonetheless is countries where the government is involved in armed conflict.

Coding rebel alliances requires special consideration regarding its operationalization. This study will use the coding rules employed by the UCDP (Pettersson et al. 2021; Pettersson 2021). When two or more rebel groups form an alliance, the new formation will be regarded as one group if its forces conduct joint military operations under an integrated military and political organization. If two groups form an alliance but do not integrate their organization and do not conduct joint military operations, they will be regarded as separate parties. It is possible to argue that two rebel organizations that decide to form an alliance and fight for the same goal, but keep their organizations separate, should also be coded as one group. As demonstrated by Christia, rebel alliances can be very fleeting, as alliances can break up as quickly as they were formed, and different group can switch allegiances during the course of the conflict (Christia 2012). Unless two groups properly integrate their organizations with each other, a rebel alliance between two parties should not be considered as one single party as these two groups likely will retain different interests.

The problem of endogeneity needs to be addressed as there is otherwise a risk that the independent variable, external support, will happen *after* the rebel group has established itself. In that case, multipart conflicts would enable external parties to get involved, rather than be *caused* by external support. In order to address this problem, the independent variable will be time-lead by one year, meaning the dependent variable will be measured on the year after.

3.2 Independent Variable

I will use four different independent variables to attempt to measure external support. For *H1*, I will measure if the government receives support from another state. This variable, *Government support*, will be an ordinal variable ranging from 0 to 3. This variable represents the number of state supporters backing the government. The variable *State Rebel support* will measure support to the rebels provided by external states. This will also be an ordinal variable ranging from 0 to 3. When measuring military support to rebels provided by non-state groups, I will use a dichotomous variable called *Non-state Rebel support, military*. Support will be operationalized as one or several types of military support. Finally, I will use another dichotomous variable to indicate if the rebels receive non-military support from non-state groups, called *Non-state Rebel support, non-military*. This variable will be operationalized as support in any form other than military support. To code these variables, I will use the UCDP External Support Dataset, which cover external support to all parties in the UCDP data from 1975 and 2009 (Högbladh, Pettersson, and Themnér 2011). The dataset provides information on the provision of support, the type of support provided and the identity of the sponsor. Only support from states is included. In addition, I will also use the Non-state Actor data (NSA), which provides additional information on non-state actors, including data on when the external support comes from non-state actors (Cunningham, Skrede Gleditsch, and Salehyan 2009).

For *H2*, I will measure if the government is involved in an interstate rivalry. This will be a dichotomous variable, indicating if the government is involved in one or more interstate rivalries with another state. Interstate rivalry is defined as two states that see each other as strategic threats. It will be operationalized as when the leaders of two states have long-running hostile and competitive relationship, where they also pose a latent or direct military threat to each other (Thompson 2001). For data I use the list of strategic rivals composed by Thompson (Thompson and Dreyer 2011). As this operationalization focuses on threat perception, it captures all interstate rivalries, even those that do not express themselves in militarized interstate disputes (Toukan 2019, 817). As Toukan (ibid.) argues, rivalries can still change the “strategic calculus” of states even if they do not express themselves in militarized interstate disputes.

3.3 Control Variables

In order to isolate the effects of the variables of interests, I will control for several confounding variables. Walter found that the number of identifiable groups in a country increases the likelihood that several rebel groups will form (Walter 2019). It is also possible that it would be easier for an external state to intervene in a country with more identifiable groups. For example, the external state can have cultural, religious and ethnic linkages to such groups and therefore would have an interest in supporting them. Another reason could be more practical, as it would be easier for external states to identify potential rebels to support in countries with more numerous identifiable groups. Accordingly, the number of identifiable groups is a possible confounding variable and needs to be controlled for. In order to do this, I will use data from the Ethnic Power Relations (EPR) dataset, specifically data on the number of politically relevant cultural, linguistic and ethnic groups that are present in each country (Vogt et al. 2015).

Walter also found that the strength of the government's military also has an effect on the number of rebel groups active, as militarily weaker states have a higher risk of being involved in multiparty conflicts (Walter 2019). Again, there is a possibility that the strength of the government's armed forces will also influence the likelihood that external states consider intervening. As supporting a rebel group is almost always regarded as a hostile move, external states might be less willing to support rebels facing a strong government. Stronger governments might have a greater ability to punish the sponsors. Hence it is important to control for the strength of the government's armed forces. To do this, I will use data from the Correlates of War's National Military Capabilities dataset (Version 6), which includes the variable Composite Index of National Capability (CINC) score, here referred to as the variable *State Strength* (Singer, Bremer, and Stuckey, 1972). This variable is a single value per state and year based on an aggregate of six variables: iron and steel production, military expenditures, military personnel, primary energy consumption, total population and urban population.

Finally, I will control for conflict intensity. It is possible to argue that more intense conflicts could attract more external actors, as more violence and insecurity can persuade otherwise cautious states to intervene to protect their interests in the region and perhaps to limit conflict contagion. Simultaneously, widespread violence within the focal country can force more non-state actors to get involved, thus increasing the number of rebel groups active. For this variable, I will use the

UCDP Battle-Related Deaths Dataset (2020) (Harbom, Melander, and Wallensteen 2008; Therése Pettersson et al. 2021).

Interestingly, Walter (2019) found that many factors associated with conflict onset were not correlated with multiparty conflicts. These factors with little explanatory power included poverty, large population, authoritarianism, mountainous terrain, and natural resources. Accordingly, I will not control for these factors.

3.4 Statistical Methods

A large-n statistical study was chosen to evaluate if there is a systematic relationship between external support and multipart conflicts, as well as between interstate rivals and multipart conflicts. Previous literature which has investigated these relationships have been case studies. By doing a large-n study, I will be able to see if there is evidence for these relationships on a systemic level. In addition, a large-n study will also enable me to test the predictive power of external support and interstate rivals on the existence of multipart conflicts. As multiparty conflicts are deadlier and more difficult to resolve, it is arguably important to be able to identify countries at risk before armed conflicts break out. The predicative power of the theory is therefore relevant to test.

Firstly, I will test the correlation between external support to conflict parties and multiparty conflicts using logistic regression, as the independent variable is dichotomous (Kellstedt and Whitten 2013, 220–226). I will then simulate the quantities of interests (QI) in order to interpret the results from the logistic regressions in a more substantial manner (Carsey and Harden 2014). To subsequently evaluate the predictive power of these variables, I will use Random Forest (RF). Random Forest is a type of supervised machine learning, utilizing ensemble learning (Breiman 2001). Random Forests uses several randomly generated decision trees. This method was chosen for its ability to produce robust results and reduce the risk of overfitting, as well as its utilization of bootstrapping, so a lesser amount of valuable data needs to be set aside for testing the model. Additionally, Random Forests allow for plotting variable importance, indicating which variables were most important to train the model, thus indicating which variables have the most predictive power. I present QI simulation and Random Forests in more depth in their corresponding sections.

4. Results

The goal of this chapter is to examine if external support and interstate rivalries are correlated with multipart conflicts. I find support for all hypotheses, that external support increases the probability of multipart conflicts, and that interstate rivalries also increase the probability of multipart conflicts. I begin with descriptive statistics. I then proceed with investigating *H1* by doing logistic regression and QI simulation and discuss the results. Next, I do the same for *H2*. Following this, I run a number of robustness tests. In the next chapter, I turn to the predictive modelling using Random Forest.

4.1 Descriptive Statistics

The number of rebel groups active per conflict between 1975 and 2009 is displayed in the bar chart in *Figure 1*. As the chart shows, multipart conflicts are relatively common, as just over 20 % of all conflicts in the time period have more than one rebel group active at the same time. Most of these multipart conflicts have two rebel groups active, some have three, and only a small minority has more than three groups active at the same time. A full table of descriptive statistics for conflict level data is available in Appendix 1.

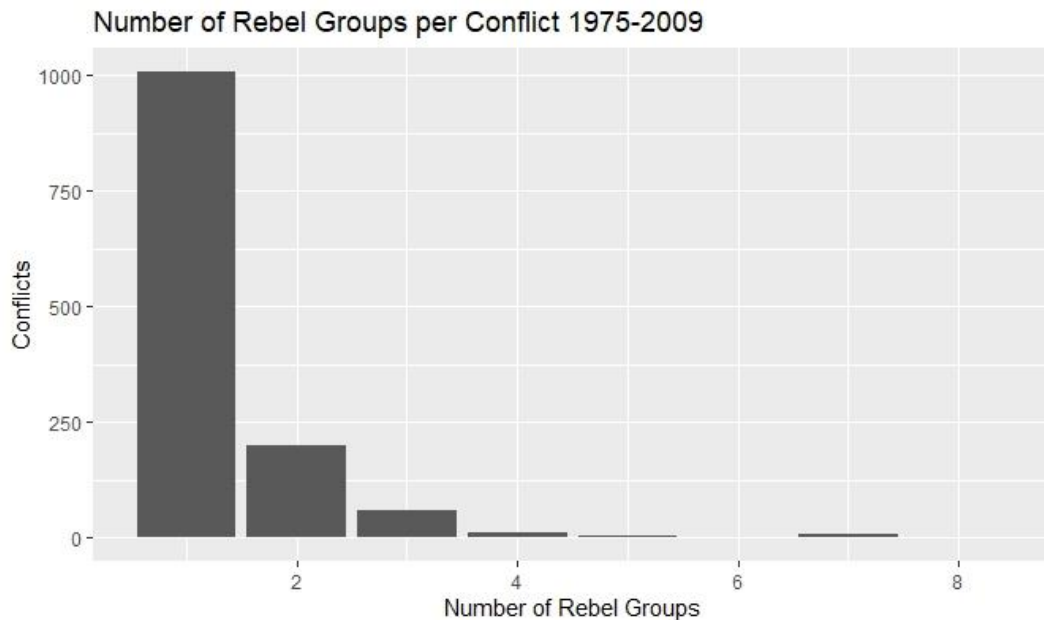


Figure 1. The Number of Rebel Groups per Conflict 1975-2009

4.2 Hypothesis 1

H1: The introduction of warring and non-warring support to an actor in a civil war will increase the likelihood that more than one rebel group will be active in the conflict.

In this section, I aim to test the first hypothesis. First, I do logistic regressions to test *H1* in order to see whether support to either party in a civil war is correlated with multiparty conflicts. The test results give support to the hypothesis. External support to either side in the conflict is statistically correlated with multiparty conflict. Support to the government, and both state support and non-state military support to the rebels were all found to be highly statistically significant. The only variable which was not found to be statistically significant was non-military support to the rebels from non-state groups. Subsequently, I simulate the Quantities of Interests to provide a more substantive interpretation of the coefficients in the logistic regression. I find that the probability of multiparty conflicts increases with more state external supporters involved. This applies for both state support to the government and the rebels. The added effect of a single rebel supporter was markedly stronger than the added effect of a single government supporter.

I begin with doing a logistic regression. The results of the logistic regressions testing *H1* are presented in *Table 1*. First, I run four tests with the four indicators separately, all using control variables in *Model 1* through *Model 4*. In *Model 5*, I run a test with all indicators for *H1*.

In *Model 1*, I test if support to the government is correlated with multiparty conflicts. The coefficient is positive and statistically significant at the 99 % confidence level, indicating high statistical certainty. In *model 2*, I run the same test for state support to the rebels. Again, the coefficient is positive and statistically significant at the 99 % confidence level. In *Model 3*, I run test for non-state military support to the rebels and find comparable results as in the previous models. In *Model 4*, I test for non-state non-military support to the rebels, but this coefficient is not statistically significant. Conclusively, these models indicate that state support to both the government and the rebels, as well as non-state military support to the rebels, are indeed positively correlated with multiparty conflicts. The only indicator which was not positively correlated was non-military support to rebels from non-state actors. I hypothesized that more external sponsors would both enable more rebel groups to gain enough resources and result in more polarization, thus dividing the opposition against the government and prevent long-lasting alliances. These

initial models thus offer support to that theory. In *Model 5* where all variables concerning external support are included, there are some differences between the coefficients compared to the previous *Model 1* through *Model 4*. In this model, all variables remain statistically significant at the 99 % confidence interval. Yet, the coefficient for the variable *Government support* is reduced somewhat, while the variables *Rebel support*, *Non-state Rebel support, military* and *Non-state Rebel support, non-military* all increase. When keeping the effect of support to the government constant, the effect of support to the rebels thus increases somewhat. This suggest that the effect of support to the rebels is more decisive than support to the government, even if the differences between the coefficients in *Model 5* and the other models are not substantial (Carsey and Harden 2014, 250–53). In *Model 5* the effect of non-military support from non-state groups is now distinctively negative and statistically significant at the 99 % confidence interval. I discuss possible explanations for this finding below.

Table 1. Logit estimations, Conflict Level: External Support and Multiparty Conflicts

| | <i>Dependent variable:</i> | | | | |
|---------------------------------------|----------------------------|------------------------------------|---------------------|----------------------|----------------------|
| | Model 1 | Multiparty Conflicts (dichotomous) | | | Model 5 |
| | Model 1 | Model 2 | Model 3 | Model 4 | Model 5 |
| Government support | 0.078*** (0.018) | | | | 0.060*** (0.017) |
| State Rebel support | | 0.084*** (0.014) | | | 0.096*** (0.014) |
| Non-state Rebel support, military | | | 0.179*** (0.024) | | 0.244*** (0.026) |
| Non-state Rebel support, non-military | | | | -0.015 (0.023) | -0.154*** (0.025) |
| Politically relevant groups | -0.005** (0.002) | -0.005** (0.002) | -0.003 (0.002) | -0.007*** (0.002) | -0.001 (0.002) |
| State strength | -0.489 (0.659) | -0.672 (0.655) | -1.529** (0.664) | -0.448 (0.668) | -1.543** (0.645) |
| Conflict Intensity | 0.036 (0.026) | 0.006 (0.027) | 0.039 (0.026) | 0.056** (0.027) | -0.002 (0.026) |
| Constant | 0.193*** (0.023) | 0.192*** (0.021) | 0.188*** (0.020) | 0.259*** (0.021) | 0.113*** (0.025) |
| Observations | 1,290 | 1,290 | 1,290 | 1,290 | 1,290 |
| Log Likelihood | -635.808 | -627.673 | -618.527 | -645.139 | -576.654 |
| Akaike Inf. Crit. | 1,281.616 | 1,265.345 | 1,247.054 | 1,300.278 | 1,169.308 |

Note:

* p<0.1; ** p<0.05; *** p<0.01

To rule out that the statistically significant relationships found in *Model 5* is the result of multicollinearity, I calculate the variance inflation factor (VIF) in Appendix 2 (Kellstedt and Whitten 2013, 238–244). As none of the independent variables has a VIF higher than 2, there is no strong correlation between those variables. The result in *Model 5* is thus very unlikely to be the cause of multicollinearity.

To provide a more substantive interpretation of the findings in the logit estimations, I simulate the Quantities of Interests (QI) using observed case solution (OCS) (Carsey and Harden 2014, 250–253). QI simulation enables substantive interpretation of logit estimates by creating “many sets of coefficients by simulation from the sampling distribution of the model estimates, and then compute the QI with each of those sets of coefficients” (ibid. :232). The result is a distribution of the quantities of interests that can be summarized in different ways along different values of the variables. In Observed Case Solution, the independent variables are set to each observed value for each observation in the data (ibid.: 250). The QI is then computed based on each of those values and the mean of those computations is then reported. Observed Case Solution is argued to be more accurate and better reflects the aim of making inferences of the data based on the sample.

The results of the QI simulation are presented in *Figure 2*. In the upper left corner, the effect of *Government supporters* on the likelihood of having a multiparty conflict is simulated. The x-axis represents the number of government supporters. The y-axis represents the probability of multiparty conflicts. The dots represent the mean of the simulations, and the bars represent the range in which 95 % of all simulations lie. The black symbols represent simulations using the *Government support*-variable and control variables, while the red symbols represent simulations using all external support-variables. Without governments support, there is a 0.15 probability of a multiparty conflict. With 1 - 10 supporters, the probability increases to just under 0.25. With 11 - 30 supporters, the probability increases further to around 0.3. With more than 30 supporters, the probability increases even further. There is however more variation in this group, as the simulations are spread across a larger range. This suggests that the more states supporting the government, the higher the probability that the government will face more than one rebel group in that conflict. As suggested in logit estimations in *Table 1*, the effect of government support decreases somewhat when controlling for other types of support.

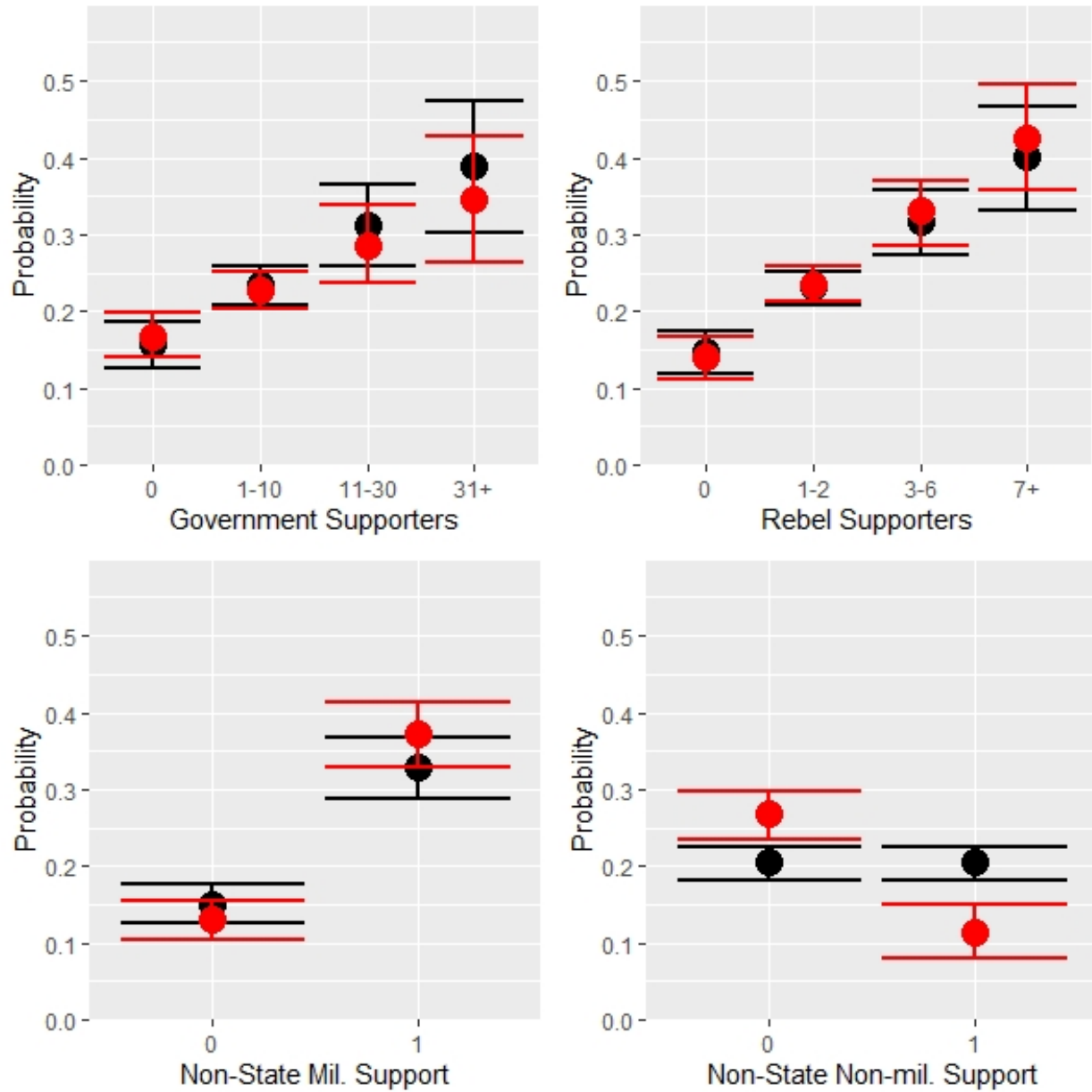


Figure 2. QI simulation of hypothesis 1, conflict level. The y-axis represents the probability of multiparty conflicts. The dots represent the mean of the simulations, and the bars represent the range in which 95 % of all simulations lie. The black symbols represent simulations using only the IV of interest and control variables, while the red symbols represent simulations including all external support-variables.

In the upper right corner of Figure 2, the results of the same simulation are presented but using state support to the rebels as the QI. The x-axis represents the total number of state supporters to all rebel groups active in the conflict. The chart shows that the introduction of one state rebel

sponsor is stronger than one government sponsor. Just 1 or 2 rebel sponsors increase the probability of multiparty conflict around the same as 1-10 government sponsors. More than 6 rebel sponsors increase the probability to around 0.4. The simulations are also more clustered than in the simulations for government support. As suggested in logit estimations in *Table 1*, the effect of rebel support increases when controlling for other types of support.

In the lower left corner, the results of the simulation for non-state military support to the rebels are presented. This variable is a dichotomous variable where 1 indicates if any of the rebel groups in the conflict receives military support from a non-state group. The QI simulation indicates that the introduction of such support significantly increases the probability of multiparty conflict. When controlling for other types of support, the probability of multiparty support is around 0.35, compared to under 0.15 without non-state support to the rebels. Just like state support to the rebels, the effect of non-state military support increases somewhat when controlling for other types of support.

In the lower right corner, the results of the simulation for non-state non-military support to the rebels are presented. As indicated in the logit estimates in *Table 1*, non-state non-military support has no effect when not including other types of support. But when controlling for those other types, the introduction of non-state non-military support reduces the likelihood of multiparty conflicts.

Conclusively, the logistic regressions and QI simulations offer evidence to the hypothesis that the initiation of warring and non-warring support to an actor in a civil war will increase the likelihood that more than one rebel group will be active in the conflict. The more state supporters that sponsor either the government or the rebels, the higher the probability that more than one rebel group will be active.

4.3 Discussion H1

In conclusion, the hypothesis that the introduction of external supporters increases the likelihood that more than one rebel group will be active holds up. The variables *Government support*, *Rebel support* and *Non-state Rebel support, military* were all statistically significant at the 99 % confidence level in both tests. Additionally, the QI simulations show that the more state supporters are involved, the higher the probability that more than one rebel group will be active.

Three important conclusions can be made based on these results. Firstly, the effect per individual state sponsor on the probability of multiparty conflict was stronger for rebel supporters compared to government supporters. The probability of multiparty conflicts increased dramatically as more rebel sponsored were introduced. If the opposition was supported by 7 or more states, there was a probability of just under 0.5 that more than one rebel group was active in the country. Moreover, the effect of rebel sponsors increased while including other types of support, while the effect of government support decreased, even if the differences were not large. Together, these findings suggest that individual rebel sponsors have a greater statistical effect on the number of actors in a conflict or country, if the correlation found here is the result of a causal relationship. This finding fits well into the proposed theory. In the theory section, I argued that external supporters to the rebels would enable more actors to overcome resources-related barriers to entry, induce opposition leaders to pick up arms, create polarization within the opposition and inhibit alliances. As rebel sponsors are much more directly connected to the rebel side in civil wars, the finding that the introduction of individual rebel sponsors seems to have a stronger effect on the probability of multiparty conflicts compared to government sponsors supports this theory, even if it is not a proof of that causal relationship. The results presented in this section is however well in line with the findings made by previous case studies regarding how external supporters affect conflict dynamics and the number of conflict actors (Walter 2019; Walther and Pedersen 2020).

The second finding is that state support to the government was still a statistically significant variable, even if the effect per sponsor was not as strong as support to the rebels. Naturally, support to the government is likely not as closely connected to the number of rebel groups active as support to the rebels. Yet, there seems to be at least a correlational relationship between support to the government and the number of rebel groups in a conflict. There are three main causal pathways that could explain this relationship. In the theory section, I argued that the involvement of external states supporting the government polarizes the opposition, just as state support to rebels. External involvement can be controversial and enable political entrepreneurs to mobilize along politically marginalized group identities. The involvement of foreigners who support a cause that goes against a group's interest could spur more support to protentional rebels and their cause against the government. There is ample anecdotal evidence of enragement against foreigners who get involved in one's own country. A second possible pathway is that government

support can incentivize other countries that are opposed to either the government or its supporters to sponsor the rebels. It is then the rebel sponsors who then cause the opposition to fractionalize. In a large-n study, it is again difficult to identify the existence of such mechanism. If that is the case, state support to the government should correlate with state support to the rebels. Yet, the variance covariance matrix in Appendix 2 suggests that support to the government is not strongly correlated with state support to the rebels. This finding speaks against that support to the government causes multiparty conflict by inducing states to support the rebels.

Another possible pathway is that external support to the government makes the government less dependent on support from their citizens and will thus be less willing to offer political concessions to already marginalized groups. An important caveat to this pathway is that Hanne and Fjelde found that government concessions during negotiations with the rebels increased the likelihood that more groups would form, as it indicates that violent resistance against the government is rewarded (Fjelde and Nilsson 2018). If there is a mechanism in which government support makes the government less accountable and then create widespread grievances, this mechanism would likely play out before the civil war takes place. In that case, extensive support to the government makes the ruling elite less willing to accommodate opposition groups, as they expect to be supported should any group try to challenge them. As outlined in the theory section, Mosinger and Walter argue that more widespread grievances increase the probability that more groups are formed (Mosinger 2018; Walter 2019). As the government has become increasingly unaccountable, widespread grievances have emerged that forms the basis of several rebel groups. When the war then breaks out, the government as expected receives extensive support from other states, while the widespread grievances cause more groups to establish themselves.

The third finding was that military support from non-state group also was both a strong and statistically significant variable across all statistical tests. This suggests that non-state support can also wield considerable influence on conflict dynamics, despite the fact that non-state groups generally have much less resources than states. Like state support to the rebels, non-state military support could both aid in overcoming resource-related obstacles, but also create polarization within the opposition. There are many examples of non-state groups getting involved in foreign civil wars because of ideological reasons. For example, the Sahel has for a long time been subject to increasing involvement from different foreign Islamist groups such as the Islamic State, Boko Haram and Al Qaida (*Uppsala Conflict Data Program 2022*). These groups have often different

ideologies and can split the rebel side by trying to control different parts of the opposition, by convincing groups to follow their political convictions.

A fourth finding was that non-military support to the rebels led to quite different results depending on the unit of analysis. In the different models, this variable was found to be both negative and positive, sometimes having a very high p-value while in other models being statistically significant at the 99 % confidence level. Naturally, one should be cautious against drawing conclusions with such diverging results. However, there are still a few things to say regarding this variable. Using conflict – year data and including other types of support, non-military support from non-state groups was found to be statistically significant at the 99 % confidence level and negative. This suggests that this type of support is correlated with conflicts with just one active rebel group. There is a possible explanation for this finding. Non-military support from non-state groups is likely to be political and ideological and is likely to originate from external interest groups and political parties. Hanne and Fjelde found that leftist groups posed higher barriers to entry, because of their ability to monopolize civilian support networks (Fjelde and Nilsson 2018). If non-military support from non-state groups is provided by ideological reasons, then it is likely more often rewarded to ideological rebel groups, which might be more effective at monopolizing civilian support networks. Nevertheless, one should avoid drawing conclusions on results that differs widely when using different research design choices.

As there is generally no way to measure causal relationships in large-n studies, there is a possibility that the relationship between external supporters to the government and the number of conflict actors is merely correlational. There is also a possibility that the findings are not representative of the real population. In this section, I already addressed the possibility of multicollinearity. I will discuss the limitations of the chosen research design in the dedicated limitation section below.

In conclusion, in this section I find support for the hypothesis that external support increases the likelihood that more than one rebel group will be active in the conflict, though nothing definitive can be said regarding causality. Both support to the rebels and to the government was strongly correlated with multiparty conflicts. More state supporters to both sides also increased the probability further. In the following section, I will take a step back in the chain of events to investigate if governments are more likely to face more rebel groups if they are involved in interstate rivalries with other states.

4.4 Hypothesis 2

H2: If the government in a civil war is involved in international rivalries, the conflict is more likely to have several rebel groups active.

In this section, I will test whether the government's involvement in interstate rivalries will increase the likelihood of multiparty conflicts. I find support for the hypothesis, as the probability of government being involved in a multiparty conflict increases if it is involved in an interstate rivalry. This effect decreases when controlling for external support, suggesting that interstate rivalry in part increases the risk of multiparty conflict through their ability to attract external supporters to the conflict.

I begin with doing a logistic regression. The results are presented in *Table 2*. In *Model 6*, I test the correlation of interstate rivalry with multiparty conflicts while including the control variables. The coefficient of the variable *Interstate rivalry* is positive and statistically significant at the 99 % confidence level. In *Model 7*, I run the same regression while adding the external support-variables from the previous hypothesis. Since the proposed theory argues that interstate rivalries cause multiparty conflicts by making external interventions more likely, it is arguably important to include external support variables in the regression. Here, the coefficient of *Interstate rivalry* is still positive but reduced, and now statistically significant at the 95 % confidence level. In this test, I thus find support for the hypothesis that the government's involvement in interstate rivalry will increase the likelihood of multiparty conflicts.

To rule out that the coefficient for *Interstate rivalry* is the result of multicollinearity, I calculate the VIF for *Model 7* in Appendix 2. This table shows that *Interstate rivalry* is not strongly correlated with any of the variables for external support.

Table 2. Logit estimations, Conflict Level: Interstate rivalry and Multiparty Conflicts

| | <i>Dependent variable:</i> | |
|--|----------------------------|----------------------|
| | Multiparty Conflicts | |
| | Model 6 | Model 7 |
| Interstate rivalry | 0.108*** (0.024) | 0.055** (0.024) |
| Government support | | 0.059*** (0.017) |
| State Rebel support | | 0.089*** (0.014) |
| Non-state Rebel support, military | | 0.237*** (0.027) |
| Non-state Rebel support, non-military | | -0.154*** (0.025) |
| Politically relevant groups | -0.004* (0.002) | 0.0002 (0.002) |
| State strength | -1.502** (0.696) | -1.998*** (0.674) |
| Conflict Intensity | 0.035 (0.026) | -0.007 (0.026) |
| Constant | 0.184*** (0.024) | 0.086*** (0.028) |
| Observations | 1,290 | 1,290 |
| Log Likelihood | -635.532 | -574.034 |
| Akaike Inf. Crit. | 1,281.065 | 1,166.069 |

Note:

*p<0.1; **p<0.05; ***p<0.01

To interpret the effect of interstate rivalry substantively, I again do a QI simulation. The results from the simulation using conflict level data are presented in *Figure 3*. The black symbols represent the simulated probability using the *Interstate rivalry* and the control variables, while the red symbols represent the same simulation when adding the external support variables. The probability of multiparty conflict increases from below 0.15 if the government is not involved in an interstate rivalry, to around 0.25 if it has interstate rivals. When introducing the external support variables, the increased probability is reduced, from around 0.175 without rivalries to around 0.225 with rivalries.

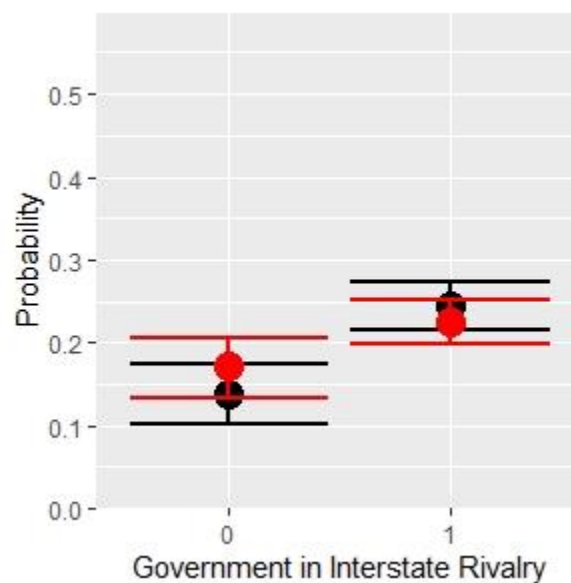


Figure 3. QI simulation of the effect of government in interstate rivalry on multiparty conflicts, conflict level. The y-axis represents the probability of multiparty conflicts. The dots represent the mean of the simulations, and the bars represent the range in which 95 % of all simulations lie. The black symbols represent simulations using only Interstate Rivalry and control variables, while the red symbols represent simulations including all external support-variables

4.5 Discussion H2

In conclusion, the logistic regression models in this section finds support for the hypothesis that if the government is involved in interstate rivalries there is a greater risk that the same government will be involved in a multiparty conflict. When only including the variable *Interstate rivalry*, the regression shows that the relationship is statistically significant at the 99 % confidence level when

using both conflict level and country level data. The explanatory power of *Interstate rivalry* decreased when introducing the external support variables. On the conflict level, the effect of rivalries remained statistically significant at the 95 % confidence level even when introducing external support variables. This change suggests that interstate rivalries are correlated with multipart conflicts, but that relationship decreases when controlling for external support. In the theory section, I hypothesized that interstate rivalries would cause multipart conflicts by making external support more likely. In that mechanism, external support would act as a mediating variable. One way to interpret these findings is that rivalries do increase the risk of multipart conflicts, but mostly to the extent that they cause the introduction of external support. If the government is involved in a rivalry, but that rivalry does not lead to external support, then the conflict is less likely to have more than one rebel group active. This finding fits well into the proposed theory that rivalries increase the probability of external support, which in turn increase the risk of multipart conflict. To do a simple test of this casual mechanism, I run a logistic regression with *Interstate rivalry* as the independent variable and external support to the rebels as the dependent variable. The results are presented in Appendix 3. The coefficient is positive and statistically significant at the 99 % confidence level. This regression lacks control variables, so the results should be treated accordingly. But the results are in line with the theory in this thesis and previous findings that rivalries are influential when states choose to provide support to conflict actors in civil wars (Salehyan, Gleditsch, and Cunningham 2011). With more data one which state support which rebel group, or by doing a case study, it would be possible to further test that causal mechanism. That is however beyond the scope of this thesis.

Another finding that should be discussed is that the coefficient for *Interstate rivalry* remained positive and statistically significant at the 95 % confidence level even when introducing external support variables. At the conflict level, rivalries seem to increase the risk further even when controlling for external support. A possible explanation is that interstate rivalries can change the context in which external support is provided. If the government is involved in a rivalry, the higher tension could increase the polarizing effect of external support and thus increase the probability of more than one rebel group forming. Another possibility is that the intervening actors will act more aggressively and provide more support for a longer time, thus helping more groups to overcome resource-related barriers to entry. If the stakes for the intervening states are higher,

they might also put a higher value in supporting their own rebel group, as it would likely allow that state to exert more direct influence on the conflict dynamics.

Again, there are limitations that have to be considered. There is little that can be said regarding the causal mechanism when doing large-n analysis. There is also the possibility that the results found here are not representative to the true population. I have already addressed the possibility of multicollinearity and further limitations will be discussed in the dedicated section below.

In conclusion, I found support for the second hypothesis that if the government is involved in an interstate rivalry there is a higher probability of multiparty conflict. Although the casual mechanism cannot be measured directly in this kind of study, I found some support for the theorized mechanism that rivalries increase the probability of external support which in turn increase the risk of multiparty conflicts.

5. Robustness test

To test the robustness of the results found above, I run a number of robustness tests. These tests should indicate if the findings made above are robust, or if they are the result of my chosen research design. The risk of multicollinearity has already been found to be minimal in the preceding sections. Here, I test both hypotheses on country level data. This will indicate if the independent variables of external support and intrastate rivalries are correlated with countries where more than one rebel group is active, even if those groups do not share incompatibility. I find that both hypotheses hold up in these tests. I also test the second hypothesis using Militarized Interstate Disputes (MID) as an alternative measure of rivalries. I find that the relationships remain statistically significant when using MID as independent variable. Another potential problem that needs to be controlled for is overfitting. This problem will be addressed in the proceeding section dealing with the Random Forest models.

5.1 Hypothesis 1 and Country Level Data

In the preceding section, I found support for the first hypothesis that external support increases the probability of multiparty conflict. To test how *H1* holds when using country-year unit of analysis, I run the same regression as in *Table 1* using country level data. The results are reported in *Table 3*. The variables *Government support Rebel support* and *Non-state Rebel support, military* are all positive and statistically significant at the 99 % confidence level. The variable *Non-state Rebel support, non-military* is positive and statistically significant when only including control variables, but not statistically significant when including all types of support. Apart from nonmilitary support from non-state groups to the rebel side, the hypothesis holds up when using country – year as the unit of analysis.

Table 3. Logit estimations, Country Level: External Support and Multiparty Conflicts

| | <i>Dependent variable:</i> | | | | |
|--|----------------------------|---------------------|---------------------|---------------------|---------------------|
| | Multiparty Conflicts | | | | |
| | Model 8 | Model 9 | Model 10 | Model 11 | Model 12 |
| Government support | 0.112*** (0.026) | | | | 0.080*** (0.026) |
| State Rebel support | | 0.147*** (0.018) | | | 0.135*** (0.018) |
| Non-state Rebel support, military | | | 0.147*** (0.033) | | 0.109*** (0.035) |
| Non-state Rebel support, non-military | | | | 0.121*** (0.033) | 0.006 (0.036) |
| Politically relevant groups | 0.011*** (0.003) | 0.011*** (0.003) | 0.010*** (0.003) | 0.009*** (0.003) | 0.014*** (0.003) |
| State strength | -1.169 (0.970) | -1.515 (0.947) | -2.086** (0.997) | -1.798* (0.995) | -2.408** (0.969) |
| Conflict Intensity | 0.116*** (0.034) | 0.035 (0.035) | 0.132*** (0.034) | 0.107*** (0.035) | 0.022 (0.035) |
| Constant | 0.216*** (0.030) | 0.189*** (0.027) | 0.237*** (0.027) | 0.246*** (0.028) | 0.098*** (0.033) |
| Observations | 949 | 949 | 949 | 949 | 949 |
| Log Likelihood | -641.556 | -617.247 | -640.586 | -643.939 | -604.755 |
| Akaike Inf. Crit. | 1,293.111 | 1,244.494 | 1,291.172 | 1,297.878 | 1,225.510 |

Note:

* p<0.1; ** p<0.05; *** p<0.01

To examine the substantive effects of the independent variables on country level data, I again run QI simulations using OCS on each of the variables. The results are presented in *Figure 4*. In the upper left corner, the result of the QI simulation for support to the government is shown. The chart shows comparable results to the same simulation using conflict – year as the unit of analysis. To recap, the dots represent the mean of the simulation, and the bars represent the range in which 95 % of all simulations lie. The black symbols represent simulations using the *Government support*-variable and control variables, while the red symbols represent simulations using all external support-variables. The probability that a government is facing more than one rebel group regardless of incompatibility is higher, however. Without government supporters, there is a probability of around 0.3 that more than one rebel group will be active in a country. With up to 10 supporters, the probability increases to around 0.4. With more than 10 supporters present, the probability is higher than 0.5 in many simulations. Just as when using conflict level data, the effect of government supporters decreases when including all types of support.

In the upper right corner, the result of the QI simulation for state support to the rebels is shown. The results are again similar when using country level data, with the exception that the effect of rebel supporters is stronger. Without state support to the rebels, there is a 0.25 probability of more than one rebel group active in that country. With the introduction of 1 or 2 supporters, the probability increases to around 0.4. With between 3 and 6 state supporters, the probability increases to over 0.5 and with more than 7 supporters, the probability is around 0.7.

In the lower left corner, the result of the QI simulation for the effect of non-state military support to the rebels is shown. The introduction of such support increases the probability of more than one rebel group being active to just above 0.45, compared to above 0.3 without such support. The increase in probability is thus not as strong as when using conflict level data.

In the lower right corner, the result of the QI simulation for the effect of non-state non-military support to the rebels is shown. When only including control variables, the introduction of such support increases the probability of more than one rebel group being active. But when including all types of support, the effect of non-state non-military support disappears.

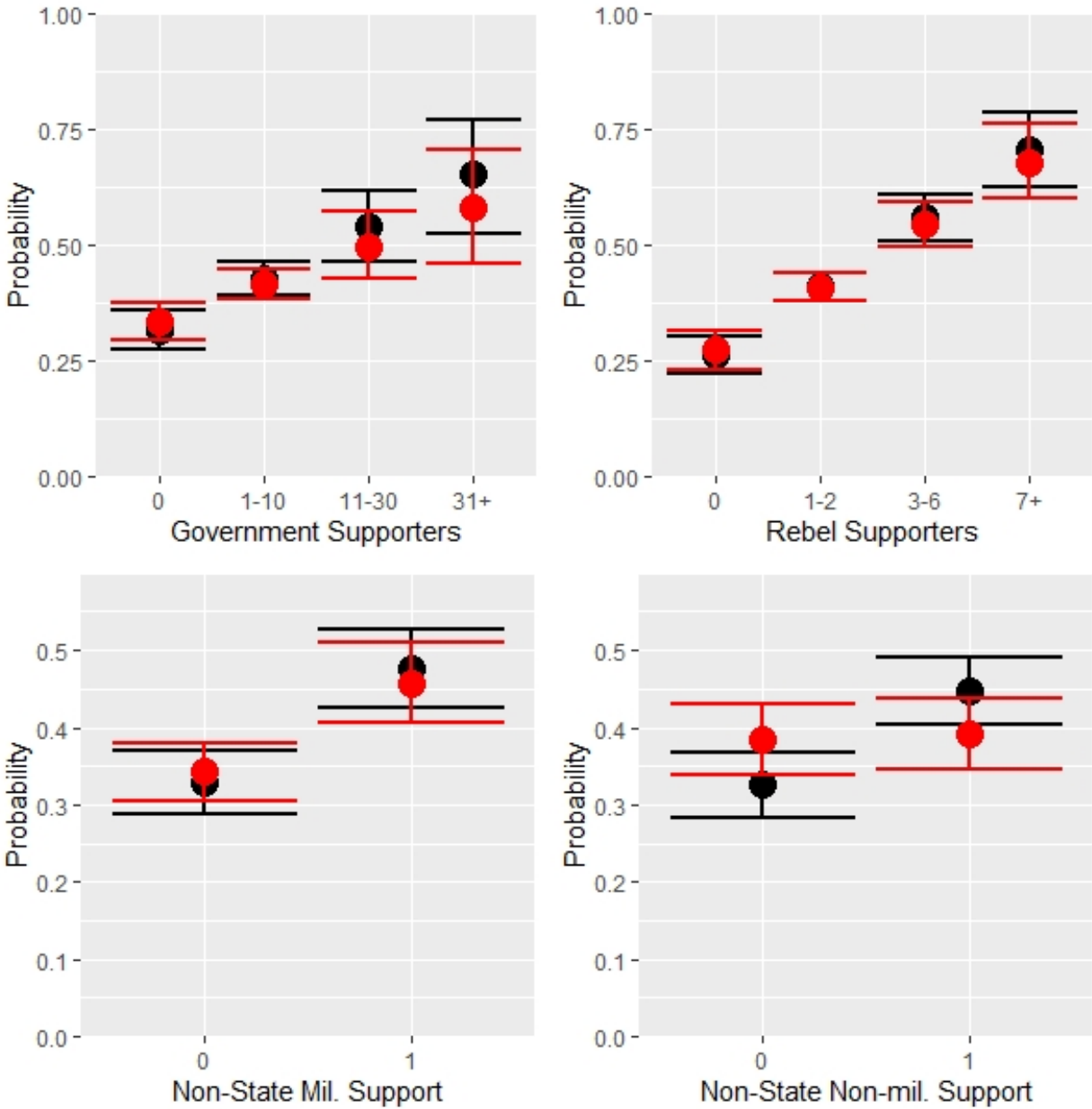


Figure 4. QI simulation of hypothesis 1, country level.

In conclusion, the first hypothesis holds up when using country – year unit of analysis. All variables measuring external support were statistically significant here as well with the exception of non-state non-military support to the rebels. This is not surprising, as non-state non-military support to the rebels returned mixed results when using conflict – year data as well. Moreover, QI simulation shows that more state supporters increase the likelihood further, just as when using conflict level data.

The change in probability is even stronger when using country level data. With more than 3 rebel supporters, the probability that more than one rebel group is active exceeds 0.5. It is not surprising that the base level probability is higher when using country level data, as this design includes rebel groups with different incompatibilities in the same country. However, the sharp increase in probability is still noteworthy.

5.2 Hypothesis 2 and Country Level Data

In the preceding section, I found support for the second hypothesis that governments involved in intrastate rivalry have a higher probability of being involved in multiparty conflicts. To test how *H2* holds up using country-year unit of analysis, I run the same regression as in *Table II* using country level data. The results are reported in *Table 4*. Here, the variable *Interstate rivalry* is still positive and statistically significant at the 99 % confidence level while only including the control variables. However, when the other external support-variables are included, *Interstate rivalry* is no longer statistically significant. Accordingly, correlation between *Interstate rivalry* and Multiparty Conflict largely disappears when introducing the external support variables in both the conflict level data and the country level data.

Table 4. Logit estimations, Country Level: Interstate rivalry and Multiparty Conflicts

| | <i>Dependent variable:</i> | |
|--|----------------------------|---------------------|
| | Multiparty Conflicts | |
| | Model 13 | Model 14 |
| Interstate rivalry | 0.090*** (0.033) | 0.021 (0.033) |
| Government support | | 0.079*** (0.026) |
| Non-state Rebel support, military | | 0.133*** (0.018) |
| Non-state Rebel support, non-military | | 0.106*** (0.036) |
| Politically relevant groups | | 0.007 (0.036) |
| State strength | 0.010*** (0.003) | 0.014*** (0.003) |
| State strength | -1.570 (0.997) | -2.512** (0.982) |
| Conflict Intensity | 0.125*** (0.034) | 0.020 (0.036) |
| Constant | 0.236*** (0.033) | 0.087** (0.037) |
| Observations | 949 | 949 |
| Log Likelihood | -647.070 | -604.539 |
| Akaike Inf. Crit. | 1,304.140 | 1,227.079 |

Note:

* p<0.1; ** p<0.05; *** p<0.01

I again use QI simulation to interpret the coefficients. The results are reported in *Figure 5*. As suggested in the logistic regression, *Interstate rivalry* increases the probability of multiparty conflict when only including control variables. That relationship disappears when including the variables for external support.

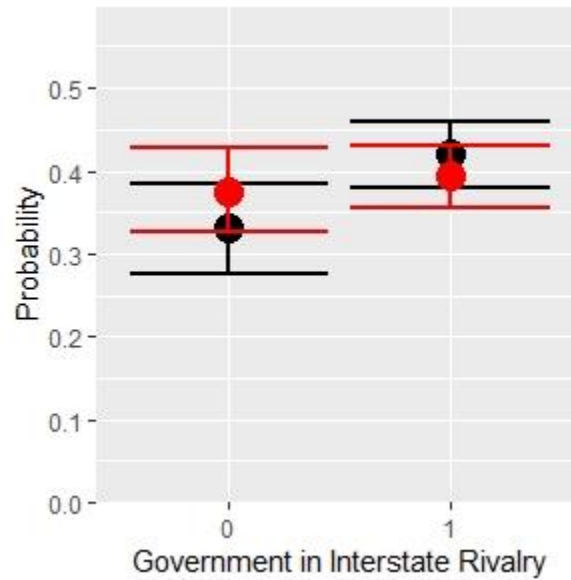


Figure 5. Qi Simulation of the effect of Government in Interstate Rivalry on Multiparty Conflict, country level.

In conclusion, the second hypothesis largely holds up when using country level data. Just as when using conflict level data, the variable *Interstate rivalry* is highly statistically significant when only including control variables. Unlike the regression using conflict level data, here the relationship largely disappears when including the variables for external support. This does not disprove the hypothesis, as I argued interstate rivalries would increase the probability of multiparty conflicts by attracting rivals to support the rebels.

5.3 Hypothesis 2 Using Militarized Interstate Disputes

In all the preceding sections, interstate rivalry was operationalized as two states which see each other as strategic threats. As there are different ways of measuring interstate rivalries, I run a robustness test where rivalries are instead operationalized as when the government has a militarized interstate dispute (MID) with another state. Jones, Bremer, and Singer define MID as

“united historical cases of conflict in which the threat, display or use of military force short of war by one member state is explicitly directed towards the government, official representatives, official forces, property, or territory of another state” (Jones, Bremer, and Singer 1996, 163). For information on MIDs, I will use Militarized Interstate Disputes dataset from the Correlates of War project (Palmer et al. 2021). That dataset includes instances when states have threatened, displayed force, or used force against another state (short of war) covering the period 1816-1814. The MIDs are ranked in intensity from 1 to 5, where 1 is the lowest. As MIDs are fairly common, the MIDs lowest in intensity are removed from the data in order to capture the more relevant cases. The variable used in the regression, MID, is a dichotomous variable indicating if the government has at least one MID with another state rank 2 or higher in intensity.

The results of the logistic regression are reported in the table in Appendix 4, using both conflict – year data, and country – year data. The results are similar to the model using interstate rivalries. The coefficient for the conflict level data is statistically significant at the 95 % confidence level, and the coefficient for country level data is statistically significant at the 99 % confidence level. The lower statistical significance when using conflict level data is not too problematic, as the measure used here is a proxy for interstate rivalries. In the previous sections, interstate rivalries were measured more directly. MIDs are therefore a less precise way of measuring the concept of interest. Yet, this robustness test still suggests that the results found in previous sections should be robust. In conclusion, the hypothesis holds up when using MIDs as the independent variable.

6. Predictive Modelling

In the preceding sections, I found strong support for the first two hypotheses, that external interventions and governments involved in interstate rivalries are correlated with multiparty conflicts. However, correlation is not a guarantee that the relationship can be used to predict if a conflict will have a multitude of actors active in it. As argued by Ward, Greenhill and Bakke, statistically significant relationships can in fact have poor predicative performance (Ward, Greenhill, and Bakke 2010). In other words, basing policy recommendations on correlation is hazardous, as the results of purely correlational studies can give “a distorted view of what matters most” (ibid.:364). Ultimately, the study of conflicts should end up in knowledge that can inform policy makers of what is going to happen, allowing them to adjust policy thereafter.

In order to assess the predictive power of the variables discussed in the preceding sections, I utilize Random Forest machine learning in order to train an algorithm that is able to predict whether a conflict will develop into a multiparty conflict. Random Forest is a type of supervised machine learning method that utilizes ensemble learning (Breiman 2001). Random Forests uses several randomly generated decision trees to produce robust results. Each tree is generated by choosing a random variable at each node and then grouping similar cases from the data on to leaves (for example “yes” or “no”). This process is then repeated several times in each tree. By producing many such trees and then averaging the results, the method creates robust classifications (Toukan 2019). To train and evaluate the variables, RF bootstraps the data, meaning it will randomly generate a new dataset with replacements from the original data (bagging) and then evaluate the error rate of the model on cases not used to train the model (out of bag cases, or OOB) (Hastie, Tibshirani, and Friedman 2009, 592–597). Random Forests are effective at predicting rarer events, making it a suitable method for evaluating multipart conflicts. Additionally, RF enables evaluation of the importance of variables in an intuitive way, while also functioning as a robustness test for the logistic regression to rule out positive results based on overfitting.

Just as in the logistic regression, the dependent variable will be a lead variable, meaning the algorithm will train and test itself on data on one year, and then predict if the conflict will have more than one rebel group active the year after. I again use both conflict level data and country level data to evaluate the model’s predictive performance on both levels of analysis. I begin with

tuning the model, so it uses the most effective number of trees and nodes and produces the lowest out of bag (OOB) error rate. The results of these tests are presented in the graphs found in Appendix 5. The tests indicate that 3 nodes work best for both models. It also shows that 500 trees are enough for both models

The Random Forest model produces votes for each row in the data, a value from 0 to 1 which indicates the probability of that conflict or country having more than one rebel group active the year after. Because the variable of interest is dichotomous, this probability needs to be converted into a two party/multiparty outcome (Ward, Greenhill, and Bakke 2010, 366). This necessitates setting a threshold that decides which probability should be counted as vote for a multiparty outcome. A high threshold will capture most of the true positive cases of multiparty conflicts, but also falsely flag many negative cases as positive, meaning it incorrectly predicts a two-party conflict as a multiparty conflict. In other words, there is a tradeoff between true positive rate (the number of correctly predicted cases divided by actual number of positive cases) and false positive rate (the number of negative cases predicted as positive divided by the number of actual negative cases). There is also a tradeoff between precision (true positives divided by true positives plus true false positives) and recall (true positives divided by true positives plus false negatives) (Sofaer et al. 2019). This means the threshold will be set depending on what is most interesting, like correctly capturing as many positive cases as possible or have a low error rate in both negative and positive cases. Since the choice of threshold therefore is arbitrary, the predicate performance of machine learning algorithms will be presented as diagrams showing the relationship between true positive rate and false positive rate (called Receiver Operator Characteristic curve, or ROC curve), as well as precision and recall (called PR curve).

6.1 Prediction Using Conflict Level Data

The predictive performance on the model using conflict level data is evaluated in the ROC curve to the left in *Figure 6*. The graph indicates that the model has a relatively high predictive performance on the conflict level of analysis. More powerful models will have a small tradeoff between true positive rate and false positive rate. This model can correctly predict 80 % of all OOB positive cases when incorrectly labeling around 30 % of the negative cases. This means the models correctly predict 80 % of all multiparty conflict years, while incorrectly labeling 30 % of

all two-party conflicts as multiparty. Lowering the threshold slightly means the model predicts 70 % of positive cases correctly while incorrectly predicting 20 % of all negative cases. Together, this suggests the model can identify a large part of the positive cases without incorrectly identifying negative cases as positive. If a majority of the observations are negative, as is the case here, the tradeoff between true positives and false positives can be helped by the large number of negative cases which are very unlikely of being labeled as positive. To further evaluate the model's predictive performance, the tradeoff between precision and recall will be examined. Precision indicates the ratio between true positives and false positives. With high precision, the model will identify positive cases without incorrectly predicting negative observations as positive. Higher precision will however decrease recall, which is the ratio between true positives and false negatives. Low recall will indicate many positive cases are incorrectly labeled as negative. The tradeoff between precision and recall for this model is presented in the precision-recall curve in the graph to the right in *Figure 6*. The graph indicates that precision remains considerably high even as recall increases. When correctly identifying 90 % of the positive cases, around 90 % of positive predictions are correct. Again, the model performs considerably well. The model can correctly identify a large number of multiparty conflicts without missing many cases by incorrectly predicting them as two-party.

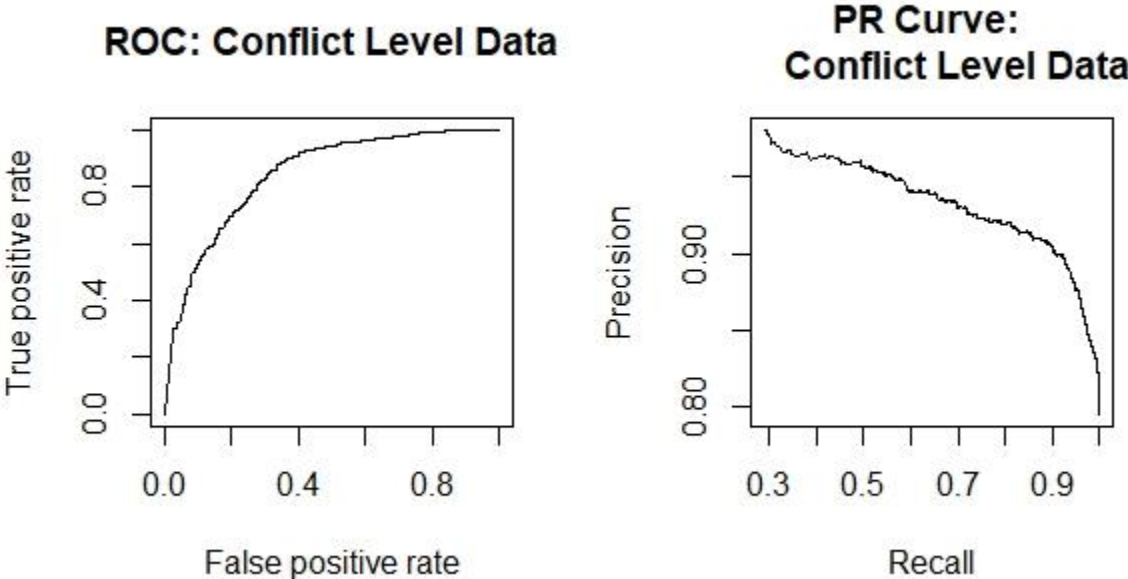


Figure 6. ROC and PR Curve: Conflict Level

Conclusively, the model performs well in predicting cases of multiparty conflicts, given the complexities involved in predicting conflict dynamics. The model shows a relatively small tradeoff between both true positives and false positives, as well as between precision and recall. It is thus able to correctly identify many multiparty conflicts without creating too many false alarms. To see which of the variables had the most predictive power, the importance for each variable is shown in *Figure 7*. The most important variable was state strength, followed by the number of politically relevant groups. Surprisingly, the third most important variable was non-state military support to the rebels. The next variables are state support to the rebels, followed by the variable for government in interstate rivalry. Next came state support to the government, conflict intensity and finally, government supporters in interstate rivalry.

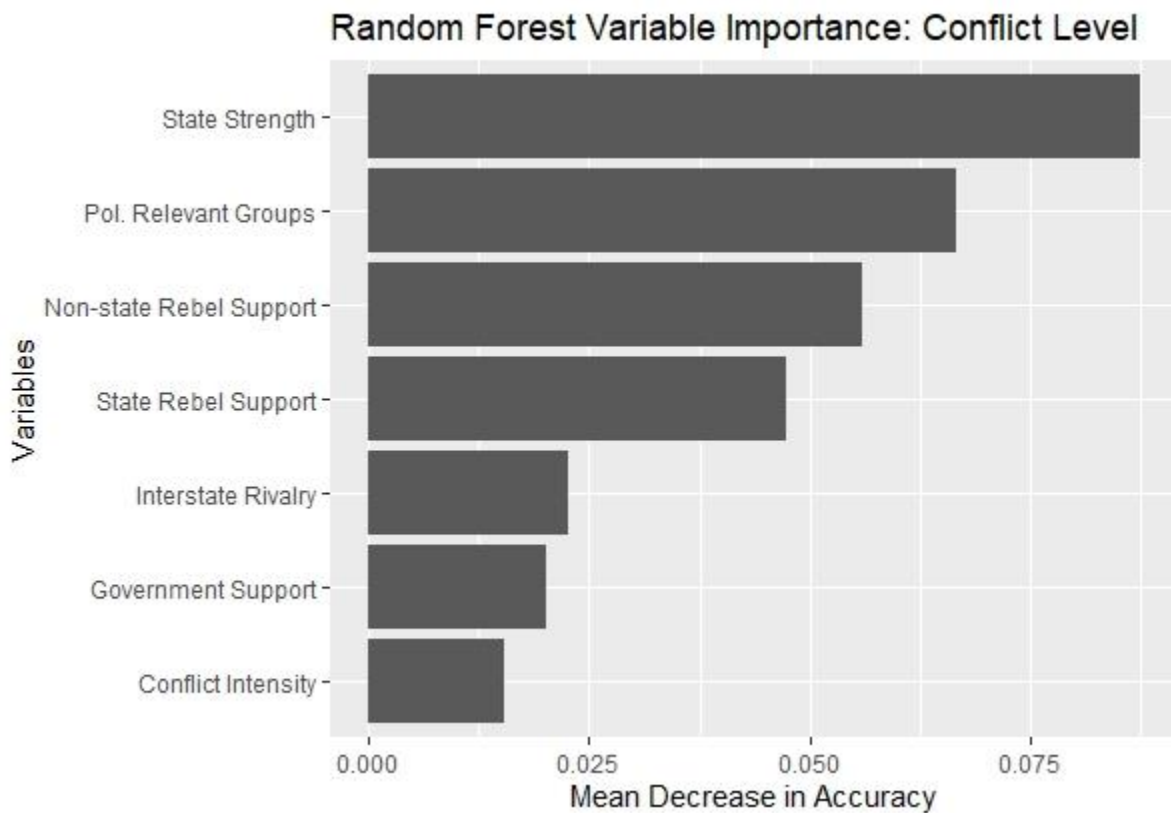


Figure 7. Variable Importance: Conflict Level

6.2 Prediction Using Country Level Data

I now turn to evaluate the model's predictive performance on country level data. The ROC curve for the model is presented in Appendix 6. This shows a similar tradeoff between true positivity rate and false positivity rate when using country level data. The PR curve shows the model perform somewhat less well when using country level data, although the change is not dramatic. When correctly identifying 80 % of the positive cases, around 85 % of positive predictions are correct. Conclusively, the model performs even better when using country level data. The variable importance when using country level data is reported in Appendix 6. This shows all the external support variables and *Interstate rivalry* to be of high relative importance, but the variables for support to the rebels are comparably more important.

6.3 Discussion on the Predictive Models

In this section I investigate if external support and governments in interstate rivalries can predict multiparty conflicts. The models performed well when using both conflict level data and country level data. The model can thus predict both if a conflict has more than one rebel group active, and if there are more than one rebel group active in one country.

Apart from showing a model's predictive performance, prediction models offer the advantage of evaluating different variables in terms of their importance. The statistical significance found in previous section could be the result of overfitting. In that case these variables would likely not have a causal relationship with multiparty conflicts, and it would not be possible to use these factors as predictors. As demonstrated by the graph showing variable importance in *Figure 5* and Appendix 6, all independent variables had predictive power over multiparty conflicts. Overfitting is therefore unlikely. In the preceding sections, external support to the rebels was found to have a greater effect on the probability of multiparty conflict.

One surprising finding was the high importance of non-state military support to the rebels, because of the difference in resources between non-state groups and states. This calls into question if there is one or a few influential cases that drives this result. A robustness test is therefore necessary. The data on non-state military support used here did not have any information on which group or groups that were providing the support. It is therefore not possible to exclude certain non-

state groups to see if that changes the results. Instead, I divide the data in half based on years, so the new sets contain the years 1975-1990 and the second 1991-2009, and then run the model again. If there is an influential case that drives the result, one of these two tests should produce different results regarding the importance of non-state military support. The results are reported in Appendix 7. In both these graphs, the relative importance of non-state rebel support decreases and is now the 4th least important variable. This indicates that the importance of variables shifts over time. Yet, all three external support variables showed high relative importance, suggesting they have predictive power regardless of time period.

An important finding was that support to the rebels, both from states and non-state groups, had greater importance across all models compared to support to the government or interstate rivalries. This is in line with the findings made in the logistic regressions that support to the rebels has a greater effect on the number of rebel groups active.

Another important finding was that *State strength* and the *Politically relevant groups* were consistently among the most important variables. *State strength* has a particularly high importance. As this study is not designed to measure the effect of state strength and politically relevant groups on multiparty conflicts, the conclusions that can be made regarding these findings are limited.

In these predictions, the models have been evaluated using out of bag samples. In other words, the models have had access to all time periods in the data set. This design was chosen as separating the dataset into training and test data was deemed to be too expensive, so out of bag samples was used as test data instead. This means that the models would not perform as well if they were to be tested on more recent data. This is a much harder test and would require more variables as there are additional known causes of multiparty conflicts than those included here. The aim of this section was not to create a strong model to predict multiparty conflicts across several time periods, but to evaluate the predictive power of the variables and variable importance, as well as to reduce the risk of overfitting.

7. Limitations of the Research Design

In this section, I will discuss the limitations of the research design and what they mean for the conclusions. Multicollinearity and overfitting have been addressed in previous sections.

One possible problem concerns correlation and causation. As already discussed, there is little that can be said regarding the casual mechanism when doing large-n statistical studies. The aim of this thesis was to explore if external interventions and interstate rivalries seem to be connected to multiparty conflicts on a systemic level, not to investigate if there is a causal relationship. The difficulties related to measuring causal mechanisms still means there remains a possibility that the findings were merely the result of correlation, not causation. One possible way to address the causal mechanism would be to pick one or a few of the cases in the sample and do a case study to investigate if there seems to be a causal mechanism at play. However, this was outside the scope of this thesis. The numerous robustness tests that were made still reduces the risk of the findings being the result of only correlation but not causation.

A related possible problem is the risk that an important control variable was overseen when conducting the logistic regressions. In that case, some other factor could cause both multiparty conflict and external support. The statistical relationship found in previous section would then be spurious. The three control variables chosen in this study were meant to mitigate that possibility. As it is impossible to control for every possible confounding variable, there is always the possibility that the correlation is caused by an unknown factor. Nevertheless, the three control variables were carefully chosen based on both findings regarding which conflicts see external support, and factors causing multiparty conflicts. Additionally, the robustness tests and the predictive modelling done in the previous section further reduces the likelihood that the relationship found is spurious.

A more serious problem relates to the difficulties in measuring complex phenomena in a quantitative study. Several variables used in this thesis are complex and have many layers, but a statistical study necessitates turning those phenomena into numbers. This primarily applies to interstate rivalries, but the control variables *State strength* and *Politically relevant groups* are also susceptible. The ways I chose to measure these variables were considered carefully in order to ensure they were measured as accurately as possible. Despite these efforts, the problem of imperfect measurements and operationalization can never be ruled out. It would be possible to

supplement the chosen variables with more alternative operationalizations. However, data availability prevented additional alternative ways of measuring interstate rivalries.

A related problem applies to measuring external support, as that is not always conducted transparently. However, the UCDP External Support Dataset differentiate between external support that has been clearly established, and cases where external support is credible alleged. In this thesis, I have only used cases of clearly established support. Accordingly, the information used to code external support should be reliable.

A second more serious problem concerns reverse causality, specifically that multiparty conflicts attract external supporters. To reduce this possibility, the independent variable was time lead by one year. Although this design decreases the risk of reverse causality, it does not eliminate it. The risk of reverse causality could be reduced with data on when external support was introduced at a more precise point in time than year, coupled with information on nascent rebel groups that has not been established yet, i.e., groups that have not started to use violence. Such information is however not available at the time of writing. Another possibility was to include information regarding if external assistance was crucial for the launch of a rebel group. However, such information is not available either.

Although reverse causality cannot be ruled out, there are several reasons that suggest the risk of reverse causality is still low. If reverse causality were indeed the case, it would mean external actors would passively wait for multiparty conflicts to emerge and then use them as an opportunity to get involved. It would also mean the departure of the external backers would do little to change the dynamics of the conflicts. Such scenario does not fit well into what is previously known from case studies on external support and the number of actors (Walter 2019; Walther and Pedersen 2020). These studies do suggest the inflow of resources can substantially change a group's possibilities of violent challenges. Neither does it fit well into what is previously known about the effects of external support on conflict dynamics. The high statistical significance found in the logistic regression also speaks against reverse causality. If external actors would passively wait for multiparty conflicts to emerge, there should arguably be more variation in that relationship.

8. Conclusion

How does external support affect the number of rebel groups active in a conflict? In this thesis, my aim was to investigate whether there is a systematic relationship between external support and multiparty conflicts. I argue that external support helps rebel groups overcoming resource-related barriers to entry while also increasing polarization and inhibit alliances. I found that external support increased the probability that more than one rebel group was active. This was true for state support to both the government and the opposition. I also found that non-state military support to the opposition increased the probability that more than one rebel group was active. Conflicts with more supporters had a higher probability of being multiparty conflict compared to conflicts with fewer supporters. The added effect per individual supporter was stronger when states supported the rebels. I also found that governments involved in interstate rivalries had a higher probability of facing more than one rebel group at the same time. I attribute this finding to the ability of interstate rivalries to attract external supporters to the conflict.

A second aim with this thesis was to investigate whether external support and interstate rivalries were able to predict the occurrence of multiparty conflicts. I found that both external support and interstate rivalries were able to predict multiparty conflicts, but that external support to the rebels appeared to be the most important factor.

This thesis adds to the literature explaining the causes of multiparty conflicts. The findings made here indicate that external support and interstate rivalries are important factors explaining why some conflicts have more than one rebel group active. By doing so, the thesis suggests that the formation of several rebel groups is not just the consequence of various internal factors, but also influenced by actors and dynamics active outside the borders of the country in question. It also adds to the literature on external support, by highlighting yet another negative consequence that follows external interventions into intrastate conflicts.

The findings made here do point towards some policy implications. Intrastate conflicts which attract the attention of outside actors should have an increased risk of becoming multiparty conflicts. The same applies for conflicts starting in countries where the government is involved in interstate rivalries. If there are signs that outside actors are likely to intervene, efforts should be made to prevent outside actors of intervening in ways that increase the risk of polarization and organized violence. Preferably, outside interventions should instead be coordinated, and conducted

in a way that promotes non-violent ways of managing disagreements. If done successfully, such efforts could prevent the conflict from becoming a multiparty conflict, with all the negative consequences that usually follows such development.

There are several avenues for further research. As this thesis did not investigate the causal mechanism behind the relationship, one avenue would be to investigate why external interventions seem to cause multiparty conflicts. I argued for three different causal mechanisms: inflow of resources, polarization and difficulties in forming alliances. A small-n study should be able to identify if one of these mechanisms are more important than the others, if there is another mechanism not mentioned here, or if the three mechanisms work together to amplify each other. Another possible avenue for further research is to look into which types of support seems to be the most important. External support can come in many different formats, and they might not have the same effect on conflict dynamics.

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Appendix 1

Summary Statistics

| | N | Mean | Sd | Min | Max | Range | Se |
|---------------------|------|------|------|-----|-------|-------|------|
| Dyads dummy | 1290 | 0.20 | 0.40 | 0 | 1.00 | 1.00 | 0.01 |
| Gov. support | 1290 | 0.62 | 0.65 | 0 | 3.00 | 3.00 | 0.02 |
| Reb. support | 1290 | 0.69 | 0.83 | 0 | 3.00 | 3.00 | 0.02 |
| Non-state reb. sup. | 1290 | 0.31 | 0.46 | 0 | 1.00 | 1.00 | 0.01 |
| Non-state non.mil | 1290 | 0.40 | 0.49 | 0 | 1.00 | 1.00 | 0.01 |
| Interstate rivalry | 1290 | 0.63 | 0.48 | 0 | 1.00 | 1.00 | 0.01 |
| Number of groups | 1290 | 8.34 | 7.15 | 1 | 53.00 | 52.00 | 0.20 |
| State strength | 1290 | 0.01 | 0.02 | 0 | 0.19 | 0.19 | 0.00 |
| Conflict intensity | 1290 | 0.24 | 0.43 | 0 | 1.00 | 1.00 | 0.01 |

Appendix 2

VIF Model 5

| | |
|---------------------------------------|----------|
| Government support | 1.108410 |
| State Rebel support | 1.187743 |
| Non-state Rebel support, military | 1.335385 |
| Non-state Rebel support, non-military | 1.374616 |
| Politically relevant groups | 2.159463 |
| State strength | 2.114921 |
| Conflict Intensity | 1.133939 |

VIF Model 7

| | |
|---------------------------------------|----------|
| Interstate rivalry | 1.131457 |
| Government support | 1.086041 |
| State Rebel support | 1.253145 |
| Non-state Rebel support, military | 1.360216 |
| Non-state Rebel support, non-military | 1.453641 |
| Politically relevant groups | 1.594747 |
| State strength | 1.633778 |
| Conflict Intensity | 1.205240 |

Appendix 3

Logit estimations, Conflict Level: Test of Causal Mechanism in H2

| <i>Dependent variable:</i> | |
|-----------------------------------|---------------------|
| State Rebel Support (dichotomous) | |
| Interstate Rivalry | 0.295*** (0.028) |
| Constant | 0.349*** (0.022) |
| Observations | 1,291 |
| Log Likelihood | -879.786 |
| Akaike Inf. Crit. | 1,763.571 |

Note: *p<0.1; **p<0.05; ***p<0.01

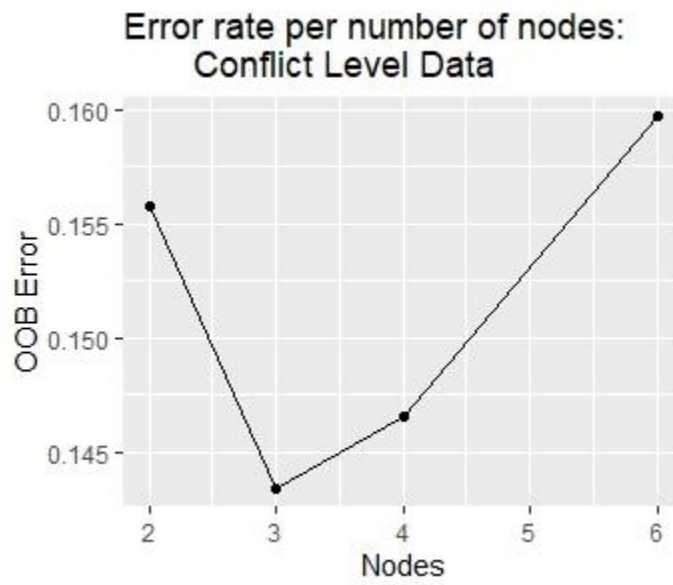
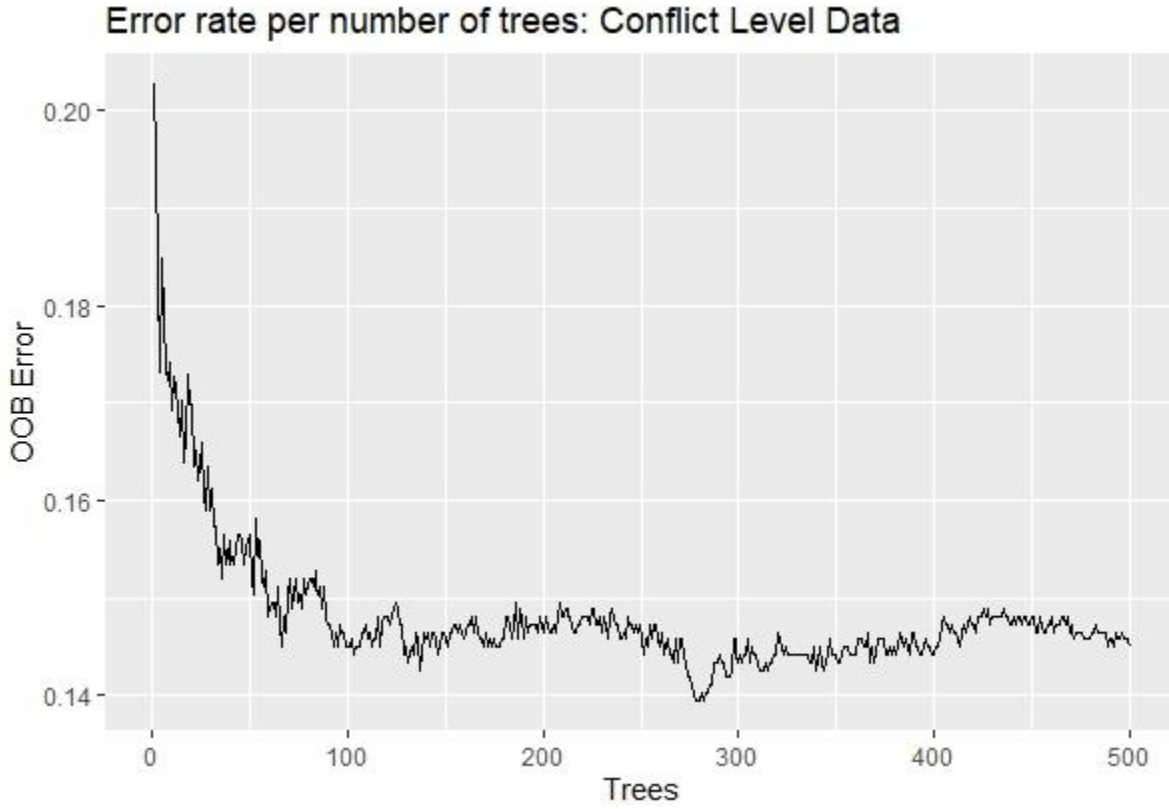
Appendix 4

Logit estimations, Conflict Level: Militarized Interstate Disputes and Multiparty Conflicts

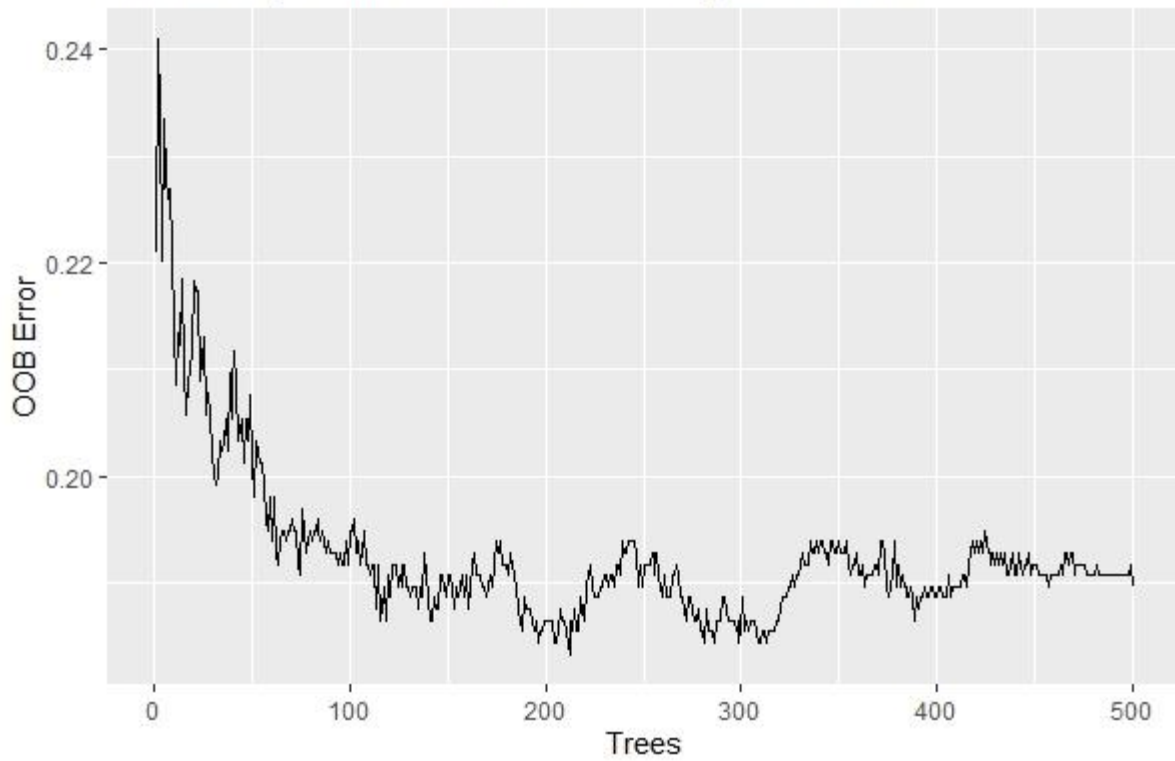
| | <i>Dependent variable:</i> | |
|--------------------|-------------------------------|---------------------|
| | Multiparty Conflicts | |
| | Conflict level data | Country Level data |
| States with MIDs | 0.044** (0.024) | 0.107*** (0.032) |
| Number of Groups | -0.007*** (0.002) | 0.008*** (0.003) |
| State Strength | -0.599 (0.665) | -1.203 (0.975) |
| Conflict Intensity | 0.051* (0.026) | 0.131*** (0.034) |
| Constant | 0.228*** (0.023) | 0.239*** (0.029) |
| Observations | 1,290 | 949 |
| Log Likelihood | -643.671 | -645.237 |
| Akaike Inf. Crit. | 1,297.342 | 1,300.474 |
| <i>Note:</i> | *p<0.1; ** p<0.05; *** p<0.01 | |

Appendix 5

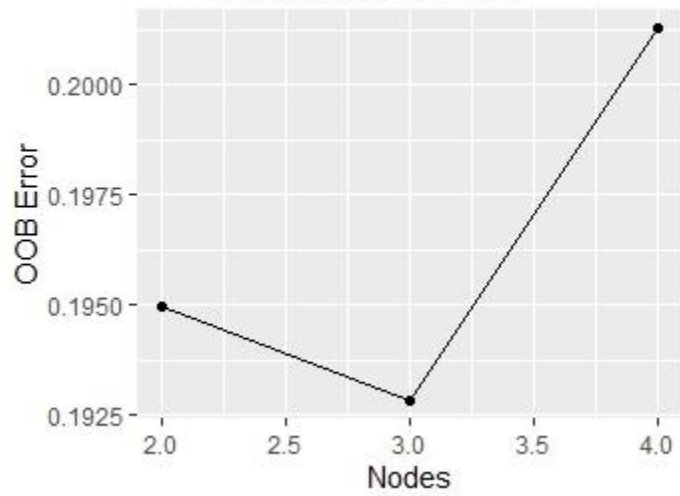
Random Forest Tuning Graphs



Error rate per number of trees: Country Level Data

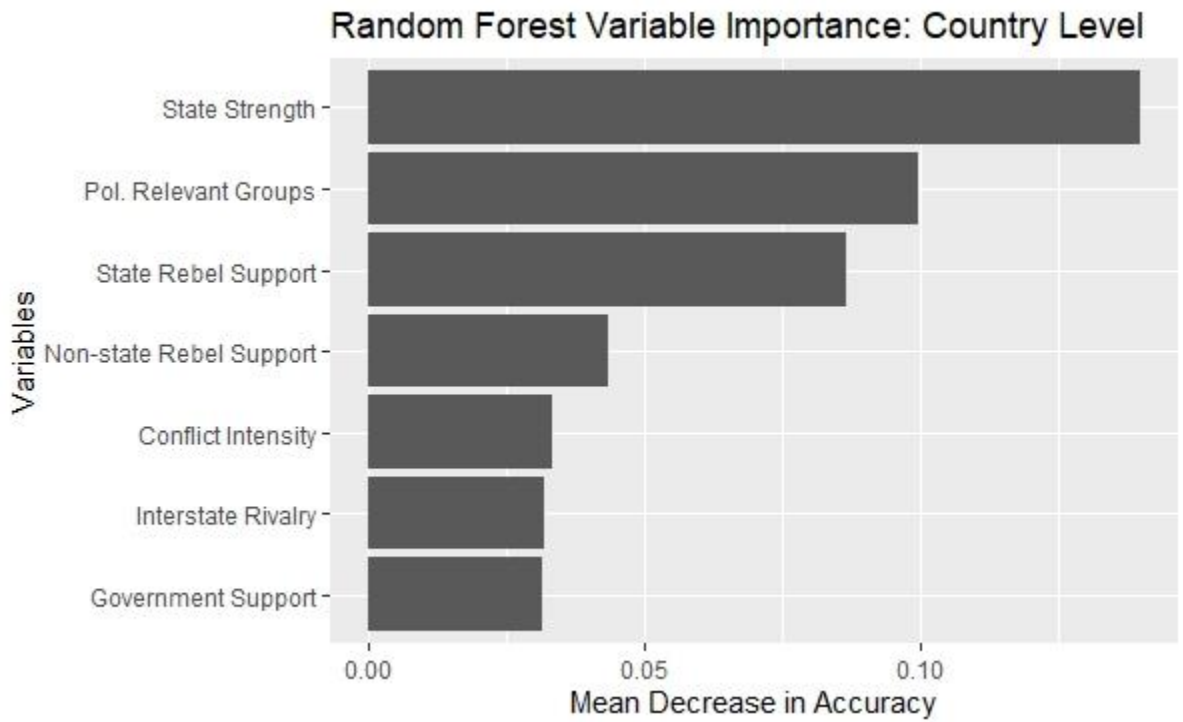
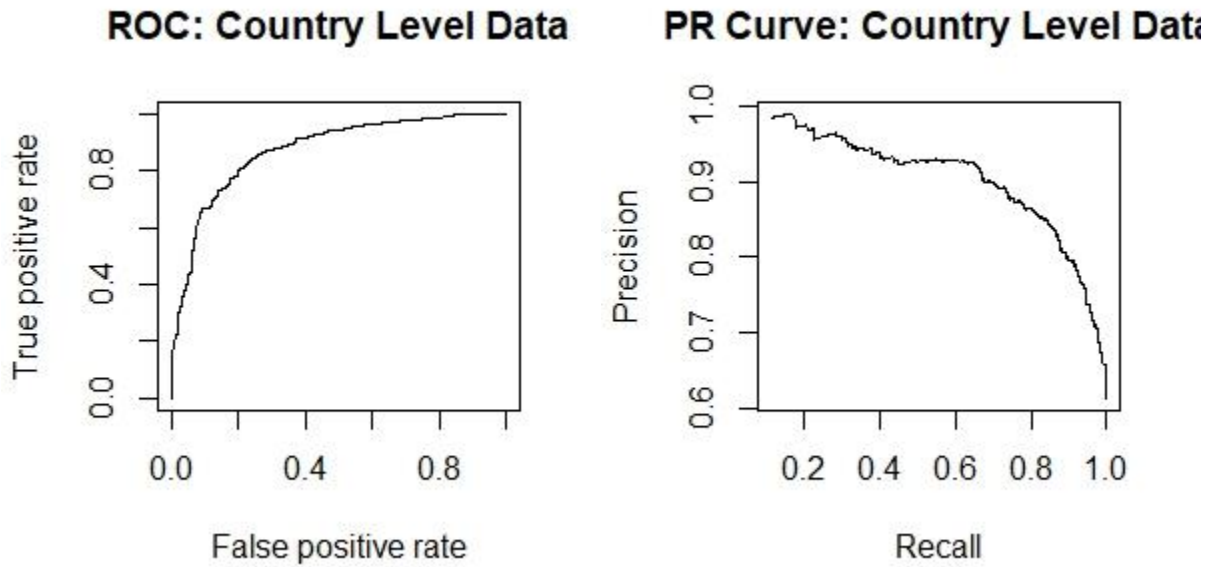


Error rate per number of nodes: Country Level Data



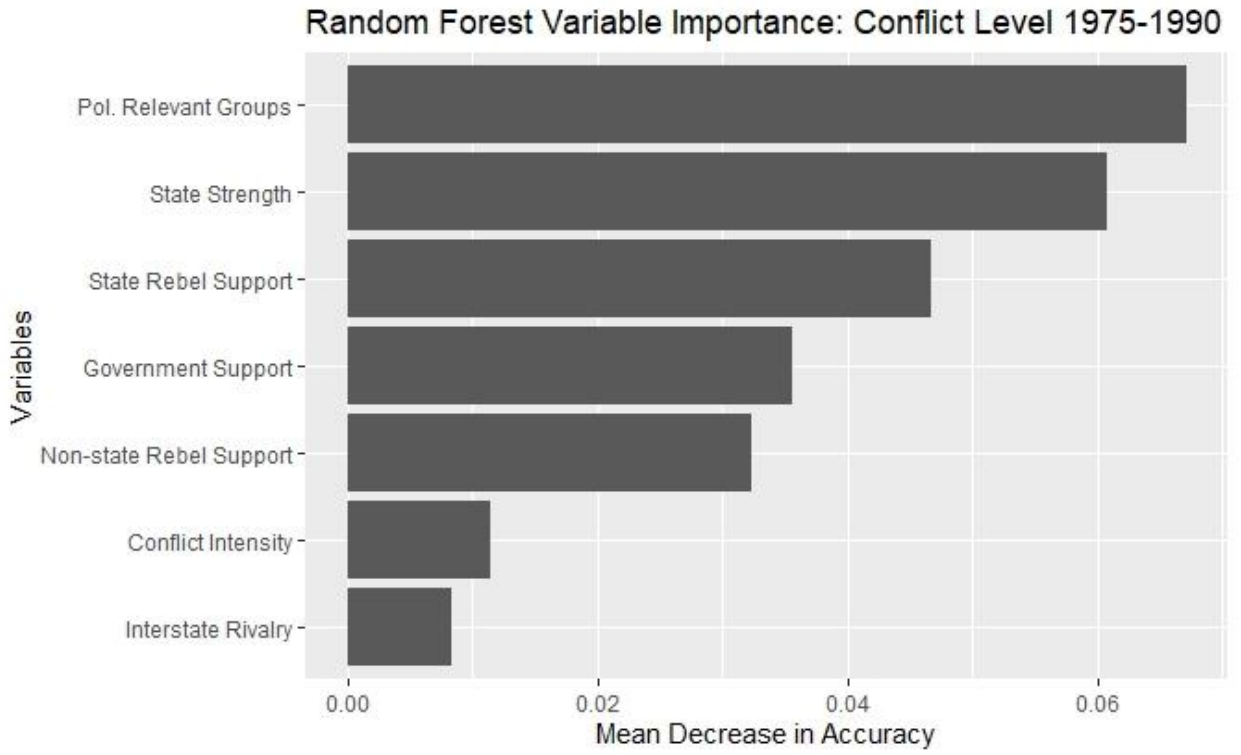
Appendix 6

Predictions using country level data. ROC, PR Curve and Variable Importance Plot.



Appendix 7

Test of Variable Importance for Non-State Rebel Support, Military



Random Forest Variable Importance: Conflict Level 1991-2009

