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"Cross-Strait Relations: An Application of Liberal Peace Theory"

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An abstract of
a thesis submitted to the Faculty of Emory College of Arts and Sciences
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Abstract: While previous applications of liberal peace theory examine the effect of economic ties on the onset of militarized dispute, this paper studies the ways in which trade dependence between China and Taiwan effects the nature of all cross-Strait interactions–both conflictual and cooperative. The results of this study contradict liberalism's null hypothesis that trade cannot directly affect political relations. This study concludes that for cross-Strait relations, economic ties and Taiwan's presidential elections affect cross-Strait relations, albeit in the opposite direction of that suggested by liberal peace theory.

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Tables and Figures

For China and Taiwan, economics, domestic politics, and cross-Strait relations are unavoidably inter-connected. For mainland China (the People's Republic of China or PRC), Taiwan (the Republic of China or ROC) is a political pressure point because of the potential that this island neighbor will one day declare formal independence. On this point, China's Communist Party (CCP) projects strong rhetoric and prioritizes saving-face whenever the issue of Taiwan's independence arises, which has certainly led to heightened tensions, especially through the 1990s (Lin, 2008; Shirk 2007). For Taiwan, maintaining political independence is made especially challenging by the mainland's economic liberalization and upper hand in international affairs (Goldstein and Chang 2008): Taiwan is a self-governing, democratic nation with a globalized, capitalist economy. Functionally, Taiwan is a state, yet formally it is a province of China. These semantics make it nearly impossible for Taiwan to act as a state in the international arena, as most of the world's powers would rather honor China's wish that Taiwan not be treated as a separate entity, than upset this commercial giant (Fell ed. 2008; Goldstein and Chang 2008). Since democratizing, Taiwan's elected leaders have had to grapple with a growing sense of nationalism among the Taiwanese and public demand that Taiwan be recognized internationally, all the while struggling to maintain stable relations, or a "status quo," with the mainland (Fell ed. 2008; Tucker ed. 2005). This status quo has allowed China and Taiwan to coexist relatively peacefully since the end of the Civil War, when the *Kuomintang* (KMT) fled to Taiwan. The status quo has also allowed Taipei to gradually liberalized restrictions on economic ties with China, which is the sort of policy the majority of Taiwanese have tended to favor (Tucker ed. 2005).

Taiwanese leaders walk an especially tight rope in terms of simple rhetoric. One issue of contention is the island's official name: some in Taiwan want to change the official name from *Republic of China* (ROC) to *Taiwan,* or *Republic of Taiwan* (Lin 2008; Tucker ed. 2005). Similarly, the way in which cross-Strait relations or connections are referred is another hotly debated rhetorical issue. Are China and Taiwan "one China," as Beijing prefers? Or are relations "state-to-state" or between "one China; two sides?" Both debates are so deeply contended because they reflect the way in which Taiwan defines itself to the citizens of Taiwan, China, and rest of the world (Fell ed. 2008; Lin 2008; Tucker ed. 2005).

Throughout a tumultuous history, China and Taiwan have experienced only a few periods of extremely high tension in the Strait: in 1995, for instance, President Lee Teng-hui's visit to the United States and upcoming popular election[1] incited China to perform military maneuvers and eventually fire missiles into the Taiwan Strait (Alagappa ed. 2001). Lee Teng-hui's predecessor also provoked China over the issue of Taiwanese sovereignty and international recognition (Goldstein and Chang 2008). Each time a Taiwanese leader has pushed the issue of Taiwan's sovereignty Beijing has felt compelled to respond decisively, usually by reiterating its prerogative to declare war should Taiwan formally declare independence (Goldstein and Chang 2008; Fell ed. 2008). Despite some "close calls," political relations between China and Taiwan have mostly been just that–political (as opposed to military). After the Civil War that led the *Kuomintang* faction from the mainland to the island, the two sides have never reverted to actual warfare. The history of exchanges is characterized by direct and indirect

[1] 1996 marked Taiwan's first popular election.

communication reflecting varying levels of cooperation or conciliation, and certainly at times, instigation and conflict.

Despite periods of high tension, since the late-1980s, cross-Strait economic ties have flourished with Taiwan's gradual liberalization in trade restrictions with the mainland (Tucker ed. 2005). The existence of extensive cross-Strait economic ties is puzzling considering China and Taiwan's historically tense relationship. China-Taiwan relations scholar, Scott Kastner, refers to this contradiction in the China-Taiwan economic relationship as "resemble[ing] a "least likely" case study because of the intensity of political conflict across the Taiwan Strait" (2009). There are a number of reasons why both China and Taiwan have been propelled to maintain an overall status quo despite a few periods of high tension. On the one hand, if China were to provoke Taiwan, the U.S. is bound by treaty to protect Taiwan (Fell ed. 2008). China, it seems, has also found value in rising to greater world power status as a globalized economy and peaceful superpower (Shirk 2007; Lin 2008). Engaging Taiwan would certainly upset such an image. For Taiwan, incentive for maintaining the status quo with China revolves around both fear and economic ties (Tucker ed. 2005). Though the U.S. is set to protect Taiwan should China declare war, there is no guarantee the U.S. would actually engage in war with China over Taiwan (Shirk 2007; Tucker ed. 2005). War in the Strait is simply not in any state's interest. Furthermore, as the Taiwanese government has gradually loosened trade restrictions, Taiwan has built incredible ties in trade and capital with the mainland (Goldstein and Chang 2008; Kastner 2006; 2009). For instance, "cross-Strait trade was less than US$1billion in 1986, but by 2006 it exceeded US$88 billion" (Kastner 2009). Direct investment has also grown over time, specifically by

industry-type, beginning with light, labor-intensive industries early on, and later progressing to higher technical industries such as electronics and semiconductors (Goldstein and Chang 2008; Kastner 2009).

While China certainly benefits from trade ties with Taiwan, particularly through Taiwan's direct investment in the Chinese economy, Taiwan's economy is far more dependent on economic ties with China (Kastner 2009). With such substantial trade and capital ties, it is perhaps natural to pursue the theory that economic ties have played a considerable or even crucial role in the maintenance of the status quo, or relative peace, between China and Taiwan (Kastner 2009).

In this paper, I seek to understand if, or to what extent, the above statement is true*: have economic ties allowed China and Taiwan to remain at relative peace?* To further explore this question it is necessary to delve into liberal peace or liberalism theory–the ways in which economic ties may lead to peace between states–and the related literature. Based on the principles of the liberal peace, and previous empirical studies testing the theory, I will run regressions on measures of economic ties with an indicator for the words and deeds exchanged between China and Taiwan, to test whether economic ties actually coincide with more positive cross-Strait interaction. I will supplement this quantitative research with a qualitative study, examining to what extent Taiwan's presidential elections impact cross-Strait relations. The qualitative study will serve to clarify some of the more inconclusive results of the empirical research. While the existence of a liberal peace between China and Taiwan proves difficult to support empirically, there is certainly evidence that economic ties with China have affected Taiwan's domestic politics (during election periods in particular) and subsequently

perhaps, Taiwanese foreign policy. Together, this study will give incite unto the ways in which both economic ties and elections in Taiwan impact the maintenance of the status quo in cross-Strait relations.

In attempting to understand the broader question—why economically linked states, like China and Taiwan, maintain peaceful relations—I first look to the liberal peace literature. I begin with the foundations for the work in this area—trade ties that promote interstate peace—and continue with the more contemporary, causal-related theories on liberal peace (Gartzke 2007; Gartzke and Li 2003; Kastner 2006, 2008, 2009). This paper will examine a number of these causal mechanisms, and specifically, the mechanisms that seem most relatable to the relationship between Taiwan and mainland China.

Secondly, I consider the effect of regime type and domestic politics on the liberal peace. As Taiwan is a democratic regime, while China is an authoritarian regime, consideration of regime type is especially important for relating broader theory to China-Taiwan relations. Some of the democratic peace literature questions whether democratic states are more prone to peace because they are democratic in nature or because democratic states are most often capitalistic, and thereby more inclined to value trade relationships (Gartzke 2007). Though China is an authoritarian state, it is also a global trader that has undergone considerable economic liberalization over the last three decades. Additionally, I briefly examine the literature addressing mechanisms under which both democratic and authoritarian regime leaders submit to pressures from public opinion and economy-related constraints (Gelpi and Grieco 2008; Mansfield and Pollins 2001). It is also important to consider the ways in which economic ties between states

might affect domestic politics. It is thought that over time, such an effect may catalyze change or transformation in foreign policy (Kastner 2006; 2009). Taiwan's recent regime shift, from President Chen to President Ma, in March of 2008 is one potential example of such a transformation (Kastner 2009).

Finally, I consider the effects of reciprocity on China-Taiwan relations (Goldstein and Freeman 1990; Goldstein and Pevehouse 1997). To what extent, for example, does a conflictual (or cooperative) word or action from Beijing to Taipei affect Taipei's words or actions directed back at Beijing? Does the extent of Taiwan's economic dependence on China during that interaction affect the nature of Taipei's response? Do presidential elections? These questions will be examined later in this paper, through empirical tests using linear regressions as well as through case study.

This paper will explore broader theories of liberal peace and apply one of those theories in particular, to a study of China-Taiwan relations. While the results of this study are not as easy to generalize as previous liberal peace (mostly large-n) research, the results will at least provide proof upon which to question one of the causal mechanisms of liberal peace theory. Additionally, this paper will serve as a study in the extent to which economic ties have shaped the nature of cross-Strait relations.

Literature Review

The literature on economic interdependence and peace is both extensive and varied. Immanuel Kant perhaps first fully explored this concept of "liberal peace," which is the notion that liberal or democratic states are less likely to engage in conflict (Kant [1795] 1957; Gartzke et.al. 2001; Gartzke 2007). The Kantian triangle refers to three

factors thought to make states more peaceful: democracy, involvement in international institutions, and economic interdependence (Mansfield and Pollins 2001; Russet and Oneal 1999). Kant also saw that checks on the leader, for example, such as that of the constitution, could constrain that leader's tendency to engage in conflict (Kant [1795] 1957; Gartzke 2007). Later scholars extended our understanding of the democratic-peace relationship by examining the influence of other factors like free trade between states or domestic constraints on leaders (Gartzke 2007; Gartzke et.al. 2001; McDonald 2004; Kastner 2006; 2009). Scholars continue to examine exactly why we observe the connection between democracies and peace.

It is important to note that most empirical studies of liberal peace that examine whether economic interdependence better promotes peace, test interstate economic ties against the onset of *militarized* interstate dispute (MID) through large-n study (Mansfield and Pollins 2001; Oneal and Russet 1999). This body of research examines the links between economic ties and conflict, whereas this study examines all interstate interaction or "words and deeds" exchanged within a single dyad, or pair of states. While this paper uses previous liberal peace literature as a model, it differs significantly in application. Furthermore, as liberal peace theory has progressed, scholars have looked beyond attempts to directly link trade to greater incidence of peace; the more recent literature calls for specific causal mechanisms for the ways in which greater trade ties better contain conflict, arguing that the trade-peace model alone provides a spurious, inconclusive argument (Bearce 2003; Kastner 2006).

Recent literature tends to support three main causal mechanisms between economic interdependence and a state's tendency to uphold peaceful foreign policy: 1.

Economic ties constrain state leaders; 2. Economic ties allow for increased communication or "signaling" between leaders; 3. Economic factors transform internal politics, thereby affecting leaders and their foreign policy preferences (Bearce 2003; Gartzke et. al 2001; Kastner 2006, 2008, 2009). These causal mechanisms further the liberal peace theory in that while current literature holds the relationship between economic ties and peace spurious in its failure to explain how economic interdependence yields peace, mechanisms such as these present compelling causal arguments for the economic ties-peace relationship (Bearce 2003; Gartzke et. al 2001; Kastner 2006).

Economic ties constrain

The constraint argument is perhaps the most obvious and the most documented of the three causal mechanisms that relate economic ties to peaceful relations. The constraint argument begins with the concept that economic interdependence increases the opportunity costs of war, and by making war more costly, actors will more readily seek to avoid war (Bearce 2003; Gartzke et al. 2001; Kant 1957; Kastner 2006; 2009). While many scholars note that this relationship has yet to be empirically proven, it remains an explanation worth examining in the interdependence-peace relationship between two states (Kastner 2006). Some scholars compare the extent to which economic considerations can constrain leaders in a democratic versus authoritarian regime: "since trade can help promote growth…democratic leaders should be more averse than autocratic leaders to initiating military conflicts with trading partners, for such conflicts might damage commercial times and hamper politically important growth" (Gelpi and Grieco 2008). And as Bearce succinctly states, "war could be costly for state leaders due to lost commerce" (2003). Though this kind of "state-society" relationship has, in the

past, proven difficult to gauge, it provides one of the most straight-forward mechanisms in the liberal peace literature (Bearce 2003).

But just why are democratic leaders more vulnerable to damages to economic growth? Because they are elected, they have a turnover that is directly dependent upon the public's views and opinions regarding the progress officials have made on their public's behalf (Bearce 2003; Gartzke et.al. 2001; Kastner 2006). Quite often, this approval is measured by the state of the economy, or by how the voter has fared financially (Hibbs 1987; Mackuen et.al. 1992; Oneal and Tir 2006). As Oneal and Tir contend, "…the state of the economy is the most important predictor of leaders' popularity" (Oneal and Tir 2006). Within a democratic system, the official must, to some extent, answer to the voter; this in turn leaves the democratic official more constrained than a non-elected official. Should a decision to engage in conflict result in a loss of trade ties or economic benefits, in certain situations, a democratic leader who favored conflict over peace would potentially not fare as well as a leader who allowed economic considerations to constrain his or her decision toward peaceful relations and continued trade (Bearce 2003). Losing an election is certainly a potential cost, and as David Bearce notes, "…commercial institutions increase opportunity costs for state leaders, creating a motive to bargain for dispute resolution" (2003). "Politically important economic growth," is the result of economic policies that can help leaders win elections and gain favor with constituencies and public institutions, hence the incentive to promote it (Gelpi and Grieco 2008).

However, there are certain caveats to the constraint argument. While some scholars look to economic institutions and opportunity costs as a general constraint to

conflict, others see economic ties as a constraint to only minor conflicts, when the opportunity cost of backing down is lower (Gartzke et.al. 2001). Others still take the completely opposite position, finding that economic ties can actually lead to conflict: Barbieri is among the few who argue that economic ties can actually generate more conflict by creating more fault lines through which conflict can rise (2002). Others, while discussing the potential value of the constraint argument, note that it seems plausible for economic ties with other states to constrain leaders to act more peacefully toward those trading partners, but still find the empirical support for such an argument lacking (Bearce 2003; Kastner 2006). However, I find that factors of political constraint are important considerations for this paper. Later, when I test the relationship between Taiwan's presidential elections and cross-Strait relations, the idea that democratic institutions constrain will certainly seem to be a more relevant a consideration for China-Taiwan relations.

Capital Market Integration Enables Signaling

The rise and spread of global capital markets creates new venues through which states can mutually benefit, compete with each other in nonviolent ways, and perhaps most optimistically, find ways to deter conflict (Gartzke and Li 2003). Capital markets are not only disrupted by full out conflict or sanctions, as with trade, but by even the hint of conflict, which suggests increased risk to investors and the potential need to pull out of a high risk or unstable market (Gartzke 2007; Gartzke and Li 2003). While the significance of capital flows will vary depending on the states considered, the high

vulnerability of capital markets to disruption, and the losses caused therein, gives them great potential as a deterrent to conflict (Gartzke and Li 2003).

Gartzke refers to capital ties as a primary factor that makes "costly contests more costly" (2007). Economic ties, like those formed through capital markets, also allow states the opportunity to more clearly communicate with one another, or signal, making dispute resolution or cooperation more manageable (Gartzke 2007; Gartzke and Li 2003). Gartzke, Li, and Boehmer describe capital markets as "sensitive"; it is this sensitivity that allows capital markets to function as a means for productive signaling in diplomacy (2001). Regardless of whether capital integration may constrain actors or allow actors to better signal to one another, capital markets are an important consideration in examining economic ties and their potential contribution to the maintenance of peace between states.

Economic Ties Transform

Of the three causal mechanisms of commercial peace often identified – constraining, signaling, and transformational effects –Kastner identifies transformational effects as the mechanism that is perhaps most evident, or in process, with Taiwan-China relations (2009). Economic factors have the ability to transform domestic politics in two main ways: by influencing leadership or regime change or by influencing a change in government policy (Bearce 2003; Gartzke et.al. 2001; Kastner 2006; 2009). In fact, Kastner predicts that "…economic ties may come, over time, to have a transformative impact on Taiwanese politics—and hence on Taiwan's foreign policy." (Kastner 2006) Specifically, Kastner notes that though he cannot prove that this causal mechanism might well be underway, he is optimistic with regard to evidence of the effect of both economic

ties with China, and relations with China more generally, on Taiwan's internal politics (2009). Before further delving into the impact of ties with China on Taiwan's domestic politics, I look to the broader concepts connecting economic ties and transformations in domestic politics.

How might economic ties lead to transformations in foreign policy? The transformational effects argument actually begins with *constraint* on political leaders. In review, "constraint effects rise indirectly in democracies through voters who might punish leaders who endanger the economy by adopting risky foreign policies" (Kastner 2009). If economic ties continue or perhaps deepen, then it holds that such "risky foreign policies" will also continue to threaten a state's economic stability (Kastner 2009). If leaders must constantly consider their state's economic progress because it is tied to economic relations with another state, then there should be greater incentive to promote stability with that economic partner over time (Kastner 2006; Mansfield and Pollins 2001). In sum, if economic outlook depends on economic ties to a certain extent with State A, then elected leaders in State B will need to consider the importance of economic ties with State A for State B's economy when making foreign policy decisions (Kastner 2006; 2009). Over time, the sum of such considerations and resultant policies, should lead to more peaceful foreign relations between economically-linked states (2006; 2009).

Trade ties and integration into global capital markets both contribute to the economic ties between states that have the potential to deter economically-tied states from conflict. Furthermore, all three mechanisms lend to an overarching theme: the influence of domestic institutions. Both aspects of economic interdependence–trade ties and global integration of capital markets–create domestic institutions with vested

interests in interstate economic ties. Trade cannot make leaders more inclined to choose peace based on opportunity costs alone; other components or interests may incentivize cooperation for state leaders (Gartzke 2007, Gartzke et.al. 2001; Bearce 2003). Institutions can fill this role, and different institutions have different areas of influence, bringing with them the backing of different sectors of society (Bearce 2003). For Taiwan, this might mean the institution of national elections or the ever-expanding community with business interests in the mainland; for China, as I will later note, it can also refer to the influence of the Taiwanese business community.

Does Regime Type Matter?

In addition to the types of economic ties that can yield mechanisms for promoting or constraining states to peace, within the liberal peace literature, are also implications or effects of regime type on liberal peace arguments (Gelpi and Grieco 2008). Differing regimes mean differing laws, institutions, and forms of governance. For non-democratic governments especially, the goal of maintaining stability and power creates regime policies, including mechanisms under which a regime will practice more peaceful foreign policy (Gelpi and Grieco 2008). It seems that with the literature questioning the prescriptions for peace of authoritarian regimes, there are no systematic mechanisms under which peace becomes more likely or sustainable.

This lack of plausible straightforward mechanisms for preventing conflict does not mean authoritarian regimes should be more prone to war, necessarily, but that for different types of regimes, the concept of commercial peace should be considered differently. For example, in the liberal peace model, domestic institutions greatly

influence the foreign policy pursued (Bearce 2003). But because authoritarian regimes answer to non-governmental and commercial institutions to a much lesser extent, this relationship is not as valuable a consideration for authoritarian regimes (Gelpi and Grieco 2008). However, when an authoritarian regime values economic growth as a mechanism for retaining their own political power internally, the need to promote trade relations and therefore oftentimes peaceful foreign relations is certainly present (Gelpi and Grieco 2008). But whereas unfavorable policies within a democratic state could potentially lead to an official's ejection from power, authoritarian leaders are certainly not as constrained by such institutional considerations (Gelpi and Grieco 2008). In fact, as Christopher Gelpi and Joseph Grieco note, if an authoritarian regime were to favor conflict over peace and lose an economically favorable relationship, there are other ways for the regime to retain its power—mostly through means of force, repression, and side payments, for example (2008). This is to say the political pressure felt by leaders in Taiwan might be vastly different than the political pressure felt by leaders in China, especially due to difference in regime type and the institutions that operate in those two very different regimes.

Further Considerations for China

For China, the long-term goal in relations with Taiwan is not economic benefit or political influence. The overall goal is, and will likely always be for Taiwan to reunify with mainland China. To China, Taiwan's existence as a separate entity serves as a long-standing reminder of Civil War and lost territory (Shirk 2007). China is unwilling, or more accurately perhaps, *unable*, to let Taiwan move toward independence, as doing so,

it is believed, would irreparably anger the majority of the Chinese public (Lin 2008; Shirk 2007).

An unusual concept in an interstate relationship as tumultuous as that between China and Taiwan is the lack in usage of traditional economic sanctions as a deterrent to unwanted action by one actor – in this case, Taiwan. Even when Taiwanese leadership tested Beijing's resolve, as did President Chen Shui-bian when he called to question the "one China" rhetoric, a harsh verbal warning was issued, yet economic sanctions were not (Lin 2008). Just as economic ties may constrain Taiwan's democratically elected leaders toward increasing cooperation with China in certain ways, economic ties of a different nature should constrain China's leaders to peaceful relations with Taiwan. Chong-Pin Lin notes, for example, that "Beijing has promoted a comprehensive campaign to woo the Taiwanese population through economic reward…" with an overriding, long-term goal of reunification (2008). Furthermore, China is unlikely to sanction Taiwan because it most values the Taiwanese business community (or *Taishang*) as a group of pro-China supporters (Kastner 2009; Tucker ed. 2005). Because Taiwanese business is the community on the island that most benefits from economic ties with the mainland, this is the community that tends to most strongly favor positive relations with China and most oppose uncooperative actions toward China by the Taiwanese government (Kastner 2009; Tucker ed. 2005).

Taiwanese investors in China also impact China's policy toward Taiwan. Under the climate of Taiwanese business directly investing in mainland China, applying economic sanctions is a method in coercion that is largely unavailable to China, as it would only harm the community most sympathetic to China's policy goals (Tucker ed.

2005). Such circumstances make the maintenance of peace in the dyad all the more complicated as China's only means for restraining or coercing Taiwan becomes verbal warning, as is seen in the aforementioned example, or militarized threat, as was seen with China's firing missiles into the Strait in 1996 (Lin 2008). While China's valuing the Taiwanese business community cannot necessarily act as a promoter of long term peace, it still seems a decisive factor in the maintenance of the status quo and in the overall liberal peace equation between China and Taiwan (Tucker ed. 2005).

Of the three mechanisms under which economic ties are thought to promote peace, the one most useful for this paper—the one that will be more closely examined through empirical tests –is the constraint mechanism, or the first discussed in the review of the literature. The constraint mechanism says that for democratic states, economic ties with other states will create constraint on elected leaders, as breaking or harming those ties would affect leaders' popularity and therefore their ability to be reelected. Under this mechanism, leaders may similarly feel constraint from the sectors of the business community with vested interests in productive economic relations with mainland China; business interests are also among the groups that will often act as the financiers of election candidates (Tucker ed. 2005). Democratic leaders should be most strongly affected or constrained by economic ties with other states due to the influence of domestic institutions or interests.

To Be Tested

In this paper I will test empirically the mechanism that theorizes economic ties constrain leaders to more peaceful foreign policy, through regressions of economic ties

and presidential election periods on China-Taiwan diplomatic interaction. This will provide a better picture of the influence of election periods on trade-peace considerations. I chose the constraint mechanism for testing over the signaling mechanism because the history of China-Taiwan relations does not have enough militarized dispute observations on which to run empirical regressions. Similarly, had I chosen to test the *transformational* effects mechanism instead of the constraint mechanism, then the long-term trends in foreign policy for Taiwan would have needed assessed. However, the history of cross-Strait trade relations only dates back to the late-1980s, when trade between these them first opened. Furthermore, because Taiwan is a democratic regime and China is not, if constraint effects are found to exist, it should be clear as to which state the independent economic ties variables most affect. For a study on China-Taiwan relations and the effect of economic ties on those relations, the constraint mechanism is one potential mechanism of the commercial-peace relationship at work. Furthermore, the constraint mechanism is one that also allows for empirical testing.

Trade Dependence

One measure for economic ties is level of trade dependence, which, in this study, is measured by the sum of one state's imports and exports over, or divided by, Gross Domestic Product (GDP) (Barbieri 2002; Oneal and Russet 1999; Gartzke 2007). I will measure both Taiwan's trade dependence on China as well as China's trade dependence on Taiwan, though I only really expect trade dependence to be significant for Taiwan to PRC events, as Taiwan is both the more economically dependent state in the dyad, as well as the only democratic regime (Barbieri 2002; Bearce 2003; Gelpi and Grieco 2008).

H1: An increase in economic ties between China and Taiwan will have a positive effect on the nature of words and deeds Taiwan directs toward the PRC.

Trade ties Constrain Leaders

Because the causal mechanism of this argument involves constraint on democratically elected leaders,[2] I expect to find that in election periods, economic fluctuations will coincide more with cooperative events in the dyad. With increasing trade ties, Taiwanese leaders should be more constrained during periods in which a presidential election is approaching, to promote a strong, stable economic outlook by maintaining cooperative relations with the PRC (Kastner 2009).

H2: As trade dependence increases, leaders will be especially constrained during impending elections, which will have a positive effect on the nature of words and deeds each state directs toward the other.

Capital Market Integration

China and Taiwan are both economically integrated into the world economy, which in turn links their capital markets, albeit more indirectly than with trade ties. Gartzke and Li argue that capital market integration has a powerful effect on the signaling that allows dyads to better pursue peace over conflict (2003; Gartzke 2007; Kastner 2006; 2009). Conflict or even the suggestion of conflict, signals instability to capital investors, who are then be propelled to withdraw capital from that state's market (Gartzke 2007). It is the signaling to investors, however, and the incentive for leaders to

[2] (Bearce 2003; Kastner 2006, 2009)

hold on to capital investments, that deter leaders from sending conflictual words or deeds (Gartzke 2007).

H3: As capital market integration increases for either state, it will have a positive effect on the nature of words and deeds each state directs toward the other.

Two primary measures for economic ties—trade dependence and capital market integration—are analyzed in order to present a more complete measure of the economic ties that affect the nature of events between China and Taiwan. Furthermore, for all parts of the study on economic ties, a notable time lag should exist between economic data and potential deeds or events response. I will look at the results of one quarter, two quarter, as well as one year, time lags on the economic variables as well as the events variables across all regression models (Gartzke and Li 2003).

The literature on liberal peace also presents causal mechanisms not linking economic ties and peace directly, but rather, linking economic ties and constraint on democratically elected leaders, or constraint on the foreign policy preferences of those leaders (Bearce 2003; Kastner 2009). Constraint is what should, in turn, lead to more cooperative relations. Economic ties create incentives among domestic institutions for further or continued interstate cooperation. Constraint and therefore more peaceful relations should be observed when it is in those actors' best interests to promote continued ties (Bearce 2003; Kastner 2006). Because both of these notions would be difficult to quantify, I plan to examine the existence of these two causal mechanisms by supplementing the empirical evidence of the relationship between economic ties and events between dyads above, with qualitative analysis on Taiwan elections within those periods.

Research Design

To test the relationship between economic ties and political interaction, I use statistical, linear regressions on these interactions for the period during which formal trade exists between China and Taiwan and for which the events data are available: 1991-2004. While trade between the two states legally opened in the mid-1980s, trade was not very significant until the early 1990s (and even then subject to considerable restrictions) so any sort of valuable dyadic economic ties data begin no earlier than 1990. Therefore, the test will evaluate the period from 1991 through 2004. Considerate of data constraints, there will be one main unit of analysis: the quarter period. Using the quarter as the unit of analysis provides enough observations upon which to test. Therefore, through linear regression tests, I will analyze independent economic ties variables in quarterly measures on events data also arranged by quarter.

To assemble the datasets, I used two different methods: direct dyad and non-direct dyad data assembly. The direct dyad regression results are reported first and examine the relationships between economic ties and interactions between States A and B, as well as the relationship between economic ties, election periods, and interactions between States A and B.[3] The second type of data assembly is non-direct dyad. The non-direct dyad dataset is used to add control tests of reciprocity to the economic ties-interaction and economic ties-election periods-interaction regressions. Non-direct dyad tests show from what state the action is originating, as well as on which state economic ties and elections have an effect (if not on both). For example, "p2tnet," represents the variable, PRC to

[3] In the direct dyad construction, "AB" represents both Taiwan-to-PRC interaction and PRC to Taiwan interaction, for a measure of overall interactions between China and Taiwan in the given period.

Taiwan *net interaction*, while "t2pnet" represents *Taiwan to PRC net interaction*. In terms of the overall results, the direct dyad measures were the best way to generally test the liberal peace theory, while the non-direct dyad served to clarify the direction of interactions and the variables affecting those interactions for each specific state.

Dependent Variable

Many previous studies of liberal peace or of the economic ties-to-peace relationship draw from the Oneal and Russet study and research design, using the Militarized Interstate Dispute (MID) dataset, which is an indicator all types of conflict between dyads, from threats to actual warfare (Mansfield and Pollins 2001; Oneal and Russet 1999). While this is a valuable method in that it attempts to offer a better explanation for the onset of militarized conflict, my study instead examines all events of "words and deeds" between the two states, China and Taiwan. This type of dependent variable can be thought of as a measure of the nature of diplomatic relations and conflict within the dyad. The events data, or Integrated Data for Events Analysis (IDEA), used in this study, measure and weigh the nature of all interaction between states as based on key words indicating the nature of interactions from Reuters Business Briefs headlines (Bond et.al. 2003). For example, words like "attack" and "accuse" indicate more negative-weighted interaction, while words like "agree," and "assure" would indicate instances of more positive relations or cooperation between states. Every type of interaction in the dataset is weighted based on severity, with -10 ranking most negative (war, for example), and +10 ranking most positive. The middle ground, around 0, indicates a more

ambiguous interaction, such as one state asking for aid or assistance (Bond et.al. 2003; Taylor et. al. 1999).

Under the direct dyad construction, the dependent variable is labeled "netAB," which is a measure of the average net cooperation, or the nature of overall interaction, from State A to State B. It involves this weighted interaction mechanism as outlined above, and was assembled by subtracting the average conflict-weighted interactions from the average cooperation-weighted interactions. "Net" is scaled so that negative values represent conflict, while positive values represent cooperation. The direct dyad dataset reveals all events that Taiwan initiated with China and conversely, all events that China initiated with Taiwan, which is combined and labeled as "netAB." It can be translated as the net average cooperation directed from State A to State B. Subsequently, it provides a holistic look at the overall nature of interactions between the two states over the one quarter, or three month time period.[4] In the non-direct dyad construction, the dependent variables for net interaction, also derived from the IDEA events data, are labeled as either "p2tnet" or "t2pnet." They too represent the net interaction between the PRC ("p") and Taiwan ("t").

Aside from the "net" interactions, some regressions were run based on solely positive or solely negative-weighted interactions. The count of positive interactions are indicated by "pct," and displayed as "pctAB" in the direct dyad results. Average positive or cooperative interactions – "ap" –are indicated by "t2pap" or "p2tap," in the non-direct dyad results. Direct dyad regressions use the "count" of cooperation, while the non-direct dyad results use the average weighted cooperation. There is no significant method

[4]Freeman and Goldstein (1991) offer a similar construction of the dependent events variables.

behind this distinction, other than it allows us to see both the effects on the amount of overall cooperative events (as with "pct"), as well as the effects on the nature of cooperative events (as with "ap"). I believe the use of both measures makes for a more thorough look at regression results.

The final table of results (Table 7) also includes a measure of average conflictual events, or "an," labeled in the same "p2tan," or "t2pan" format. For example, "p2tan," can be translated as the average weighted conflict that the PRC directed at Taiwan over one quarter, just as "p2tap" means the average weighted cooperation the PRC directs at Taiwan over one quarter.

Using measures of net interactions through the IDEAS events data is a way to study the effects of economic ties, elections (and to control for reciprocity), on overall interactions between China and Taiwan. In this way, a reported significance for election periods, for example, does not mean that elections have an effect on war or preventing war, but that elections may have affected either a more positive or more negative effect on the overall nature of interactions. This study is, again, one of the natures of diplomatic words and actions exchanged, rather than one of militarized dispute onset.

Independent Variables

- *Presidential Elections*: Presidential elections in Taiwan are measured with the dichotomous coding of "1" for the quarter in which the actual election was held and "0," for any other quarter. For example, in the quarterly dataset, quarter 1 of 2008 is coded with a "1" for elections as the first quarter represents months January, February, March, and the presidential election occurred near the end of

March of that year (as do the other three presidential elections). Within both the direct and non-direct dyad datasets, Taiwan is clearly the only state in the dyad with "1" values. All quarters for China within the direct dyad dataset simply receive a "0."[5]

- *Bilateral Trade:* Regressions were also run using measures of bilateral trade, or imports and exports between China and Taiwan. These variables are labeled as *Imports to State A from State B* and *Exports from State A to State B* in the direct dyad regression results, and *Taiwan Exports to China,* and *Taiwan Imports from China* in the non-direct dyad regression results. I also measure trade at one to four quarter time lags, as it may naturally take some time for policy to reflect economic constraints or considerations (Gartzke 2007). For both states, trade measures, like all economic data used, derive from DataStream and are reported in U.S. Dollars.

- *Trade Dependence:* For trade dependence measures I draw upon the data used for bilateral trade. Following Oneal and Russet's method for deriving trade dependence, I add the import and export measures for each quarter and divide by the GDP for that same quarter (Oneal and Russet 1999). I use the same sum of bilateral trade for both Taiwan's and China's trade dependence, but distinguish between GDP measures accordingly when constructing the indicators (Barbieri 2002; Bliss and Russet 1998; Oneal and Russet 1999; Gartzke 2007).

[5] China only needs to be given a value in the direct dyad dataset. In the non-direct dyad dataset, the variable for Taiwan presidential elections is "twpresele" or "lagtwpres6" for the lagged period. China does not receive an indicator for election periods in the non-direct dyad results table.

- *Capital Flows:* Gartzke's study of capitalist peace examines "capital liberalization," by combining different gauges of government restrictions to capital flows in the global economy (gauges such as "foreign exchange, current and capital accounts) (Gartzke 2003, 174). However, measures of government proclivity to capital liberalization is derived primarily from the International Monetary Fund (IMF), a source through which Taiwan is not considered a state and is therefore not included in the data. My alternative to this type of liberalization measure is to combine a number of indicators for China's and Taiwan's global capital flows or ties. It is important to note that these capital flows indicators are not measuring capital flows within the dyad (between China and Taiwan). The indicators I have compiled from DataStream measur*e global* capital flows and include total foreign direct investment (FDI) into both China and Taiwan, as well as each country's FDI abroad (all indicators are in net measures). The capital flows data also include an indicator labeled "other investments," for which both assets and liabilities are included, and portfolio investment or securities, which also includes both net assets and liabilities as separate indicators.

While all data were compiled from DataStream, the Taiwan capital flows data derive from the Central Bank of China (ROC), while the China capital flows data derive from China's State Administration of Foreign Exchange. Capital flows data for Taiwan were available in quarterly increments. For China, the data

in capital flows were considerably less thorough, but available in biannual measures from the years 2001 to 2008.[6]

- *Control Variables*: Studies of the liberal peace often use a number of different control variables such as geographic contiguity, major power status, military alliances, region, et cetera (Gartzke 2003; Oneal and Russet 1999). However, because this study is solely examining the economic ties within a single dyad, as opposed to economic ties across many dyads, I find the use of such control variables mostly unnecessary. I do include controls for previous interaction within the dyad, in the non-direct dyad regressions (the final set of regressions analyzed), to test whether previous actions or interstate reciprocity is affecting the nature of the interaction being tested. For example, when running regressions for PRC to Taiwan net interaction against trade dependence and election periods, I also include a one quarter lag on PRC to Taiwan net interaction (Goldstein and Pevehouse 1997).

Results

For the first several sets of regressions (Tables 1-5), each regression is run both against the dependent variable of "average net cooperation," meaning the weighted average of cooperative words or deeds from State A directed toward State B, minus the weighted average conflict-driven words or deeds from State A directed toward B; as well as against the weighted average of positive interactions –"pctAB."[7] Additionally, each independent variable is also tested as a lagged variable ranging from a lagged by one

[6] The IMF also reported global capital flows data for China, but only in yearly measures.
[7] This was done mostly to rule out the possibility that a few strongly negative interactions (i.e. missiles fired into the Strait) were skewing the "average-net" data.

quarter to a lagged by four quarters variable. The use of lagged variables accounts for the fact that changes in economic circumstances or trade relations might have a more delayed affect on interstate interactions (Gartzke 2007). The variation in regressions using this data is to rule out any inconsistencies or to attempt to discover any missed relationships between the three types of economic ties tested and nature of the words or deeds exchanged between Taiwan and China.

For the second sets of regressions (Tables 6-7) I use the non-direct dyad datasets rather than the direct dyad datasets. This allows me to present the results in terms of how economic ties (trade dependence in these columns) and election periods might be affecting either China's or Taiwan's action separately.

These results support neither the hypotheses that trade leads to peace, nor the null hypothesis that trade cannot directly lead to peace. However, two significant finding are A. that trade dependence of the target state (State B) has a negative effect on interstate interaction; and B. that presidential election periods correlate with less cooperative or more conflictual words and deeds exchanged. The regression results are further examined below.

Considering that China and Taiwan are two political adversaries with trade ties that have only liberalized and expanded over time, it is also necessary to consider why the results of direct regressions between economic ties and events/interactions prove on average, insignificant, and in some cases, contrary to liberal peace theory. First however, I review some of the most salient representations of the regressions run for this study. Additional analysis is provided in the case studies that follow, and in the Appendix of this paper.

Basic Analysis

Table 1 displays six columns of regular, linear regressions for testing Hypothesis 1, that trade ties will have a positive effect on the nature of interaction between China and Taiwan. The dependent variable in Table 1 is "netAB," or net interaction between State A and B, keeping in mind that net is scaled so that positive values indicate cooperative actions and negative values indicate negative or conflictual actions. Only a few variables prove statistically significant across these columns. Additionally, those that did show significance were actually significant in the opposite direction of the relationship predicted between interaction and trade in this hypothesis. Note the first column in Table 1: *Imports to State A from State B* is statistically significant, however, whereas the hypothesis suggests import ties will increase net cooperation, in this column, imports actually have a negative effect on net interaction between States A and B. Therefore, as imports to State A increase, State A's actions toward State B become less cooperative in general. Conversely, in the same column, *Exports from State A to State B* show a positive coefficient, albeit one that is not statistically significant. In the second column we see the same pattern of a negative coefficient for the imports indicator, and positive coefficient for the exports indicator. However, in column two both variables are insignificant at a one quarter time lag.

Column 3 also reports two insignificant, negative variables for imports and exports at four quarter lags. Next, note Column 4 of the same table, Table 1: *State B's Trade Dependence on State A* in Column 4, has a statistically significant, negative effect on net cooperation from State A to State B. The result can be thought of in this way: as

Table 1 Regressions of Trade Ties Variables on Net Interactions from State A to State B[8] (in the years 1991-2004)

Dependent Variable netAB (Avg Net Interactions)	1-Does trade (imports & exports) affect net interactions?	2-Does recent trade affect net interactions?	3-Does past trade affect net interactions?	4-Does a state's trade dependence on the other state affect net interactions ?	5- Does a state's past trade dependence on the other state affect net interactions ?
Imports to State A from State B	-.000228*≠ (.000109)				
Exports from State A to State B	.0000402 (.000109)				
1 Qtr Lag on Imports to State A from State B		-.000215 (.000118)			
1 Qtr Lag on Exports from State A to State B		.0000292 (.000118)			
4 Qtr Lag on Imports to State A from State B			-.0000422 (.000164)		
4 Qtr Lag on Exports from State A to State B			-.000267 (.000164)		
State A's Trade Dependence on State B[1]				-9.82 (18.3)	
State B's Trade Dependence on State A[1]				-49.1*≠ (18.3)	
1 Qtr Lag in State A's Trade Dep on State B[1]					-10.8 (20.0)
1 Qtr Lag in State B's Trade Dep on State A[1]					-52.9*≠ (20.0)
Number of Obs	**96.0**	**94.0**	**88.0**	**108.0**	**106.0**
R-squared	**.061**	**.049**	**.061**	**.069**	**.069**

(Standard errors in parentheses)
Tests are two-tailed.
*** p<0.01, ** p<0.05, * p<0.1
≠Indicates significance in the opposite direction of the one predicted.
[1] *Trade dependence* was derived from a state's imports+exports/GDP for each quarter.

the target's (State B) trade dependence increases, the sender's (State A's) overall interactions will become less positive (less cooperative/more conflictual).

[8] The descriptions for the variables found in this, and every table, are reported in the Appendix, beginning on page 53.

Table 2 below, also reports the results of tests on Hypothesis 1, and is similar to Table 1 in that the independent variables are exactly the same. However, Table 2 introduces the count of positive/cooperative interaction from State A to State B as the dependent variable (as opposed to net cooperation). For "pct" all values are positive, but cooperative events with a higher weight have a higher numerical value. As is reported in the previous table, the first column *Imports to State A from State B* have a statistical significance in the wrong direction. In this column, imports have a negative effect on the amount of cooperative words or deeds State A directs at State B. This may mean that for the previous table, Table 1, the negative effect on net interaction was a result of the decline in cooperation (as opposed to a rise in conflict)[9]. In this same column, State A's exports are statistically insignificant. Column 2 reflects the same pattern, demonstrating that even with a one quarter lag on imports and exports, the level of significance and the effect is similar: with a one quarter lag, imports are significant, but significant in the wrong direction. A rise in imports corresponds with less cooperation. A one quarter lag on exports also has a negative, albeit insignificant effect on the amount of positive events exchanged. Column 3 reports the regressions of a four quarter lag on import and export measures. For both import and export variables, trade from four quarters previous has a statistically insignificant effect on the amount of cooperative events from State A directed to State B.

Columns 4 and 5 show that the regressions were run with trade dependence variables, as opposed to trade ties variables. Column 4 shows that while *State A's Trade Dependence on State B* is negative but insignificant. *State B's Trade Dependence*

[9] Such patterns are examined further in Tables 6 and 7.

Table 2 Regressions of Trade Ties Variables on Count of Cooperative/Positive Events from State A to State B (1991-2004)

Dependent Variable pctAB (Count of positive events between States A & B)	1-Does trade affect the amount of positive events?	2-Does recent trade affect the count of positive events?	3-Does past trade affect the count of positive events?	4-Does a state's trade dependence on the other state affect the count of positive events?	5-Does a state's past trade dependence on the other state affect the count of positive events?
Imports to State A from State B	-.000811*≠ (.000380)				
Exports from State A to State B	-.000316 (.000380)				
1 Qtr Lag on Imports to State A from State B		-.000877*≠ (.000417)			
1 Qtr Lag on Exports from State A to State B		-.000330 (.000417)			
4 Qtr Lag on Imports to State A from State B			-.00112 (.000643)		
4 Qtr Lag on Exports from State A to State B			-.000512 (.000643)		
State A's Trade Dependence on State B[1]				-42.5 (62.4)	
State B's Trade Dependence on State A[1]				-226**≠ (62.4)	
1 Qtr Lag in State A's Trade Dep on State B[1]					-42.4 (68.8)
1 Qtr Lag in State B's Trade Dep on State A[1]					-247**≠ (68.8)
Number of Obs	**96.0**	**94.0**	**88.0**	**108**	**106**
R-squared	**.122**	**.116**	**.0982**	**.119**	**.119**

(Standard errors in parentheses)
Tests are two-tailed.
*** p<0.01, ** p<0.05, * p<0.1
≠Indicates significance in the opposite direction of the one predicted.
[1] *Trade dependence* was derived from a state's imports+exports/GDP for each quarter.

on State A is significant and also negative, meaning it is significant in the wrong direction, indicating that State B's trade dependence has a negative effect on the count of State A's cooperative words and deeds toward State B. Similarly, Column 5, with one quarter lags on trade dependence variables reports essentially the same effect on the

count of positive events: the *1 Quarter Lag on State A's Trade Dependence on State B* is negative and statistically insignificant, while *1 Quarter Lag on State B's Trade Dependence on State A* is negative and statistically significant. The findings for Columns 4 and 5 suggest that past and current trade dependence for State B correspond with decreases in the amount of positive interactions State B receives from State A. The results for these columns contradict the first hypothesis: imports had a negative, rather than a positive, effect on net interaction and count of cooperative events. And while *Exports from State A to State B* reported a positive relationship with net cooperation (but not positive count), the exports variables were not significant in any columns.

The second hypothesis, that trade dependence should constrain leaders during presidential election periods and therefore correspond with cooperative interaction during leader's, who can in turn, influence Taiwan's interaction with China. The regressions with this hypothesis also produce perhaps the most interesting of the quantitative results (particularly those reported in Table 4).

In the first table for Hypothesis 2, Table 3, State B's *Trade Dependence on State A* is consistently significant, as are the one and four quarter lagged indicators for State B's previous trade dependence. In fact, all trade dependence variables are statistically significant in their respective columns (1-5). However, like the conclusions drawn from Hypothesis 1, the nature of the significance (negative as opposed to positive) shown by trade dependence in Columns 1-5 in Table 3 also contradicts the second hypothesis. In Column 1, *State A's Trade Dependence on State B* is negative and insignificant while *State B's Trade Dependence on State A* is significant, but significant in the wrong direction. This shows that as State B's trade dependence increases, State A's behavior

toward State B becomes less cooperative or more conflictual. In this same column, variables for presidential election periods report negative but insignificant effects on the net interactions from State A to State B. For Column 1, only State B's trade dependence during election periods has a negative, significant effect on net interactions.

Column 2 reports a similar pattern in results as Column 1, while measuring the one quarter lag on trade dependence for both states. Election periods are insignificant, while *State B's Trade Dependence on State A* (from one quarter previous) remains significant, but again, in the wrong direction. Again State B's trade dependence is the only significant variable reported in the column. During election periods, the target state's trade dependence consistently has a negative effect on the nature of words or deeds from the sender state. Column 3 once again reports the same pattern in results as Columns 1 and 2: election periods report negative coefficients that are insignificant, while both state's trade dependence measures are also negative. Here, State B's past trade dependence (at a four quarter lag) on State A is significant and negative, or contradictory. Therefore, the results show that as trade dependence from State B (whether it be present, 1 quarter lagged, or 4 quarters lagged) increases the positive nature of interactions from State A to State B declines.

In Column 4, lagged presidential election periods also coincide with negative results for trade dependence variables: *significant* for State B's one quarter lag in trade dependence, but insignificant for State A's one quarter lag in trade dependence.

Table 3 Regressions of Presidential Election Periods and Trade Dependence Variables on Net Interaction from State A to State B (1991-2004)

Dependent Variable netAB (Avg Net Interactions)	1-Do presidential elections and trade dependence affect net interactions?	2-Do presidential elections and recent trade dependence affect net interactions?	3- Do presidential elections and past trade dependence affect net interactions?	4- Does presidential campaigning and recent trade dependence affect net interaction?	5- Does presidential campaigning (4 qtrs previous) and past trade dependence affect net interactions?
Qtr in which State A holds a Pres Election	-1.14 (1.00)	-1.09 (1.01)	-1.12 (.996)		
Qtr in which State B holds a Pres Election	-1.50 (1.00)	-1.40 (1.01)	-1.49 (.996)		
1 Qtr before State A holds a Pres Election				-.910 (1.01)	-.888 (1.01)
1 Qtr before State B holds a Pres Election				1.07 (1.01)	1.17 (1.01)
State A's Trade Dependence on State B[1]	-8.02 (18.5)				
State B's Trade Dependence on State A[1]	-45.7*≠ (18.5)				
1 Qtr Lag in State A's Trade Dep on State B[1]		-7.84 (20.5)		-5.54 (20.5)	
1 Qtr Lag in State B's Trade Dep on State A[1]		-48.2*≠ (20.5)		-58.5**≠ (20.5)	
4 Qtr Lag in State A's Trade Dep on State B[1]			-2.82 (28.3)		3.56 (28.8)
4 Qtr Lag in State B's Trade Dep on State A[1]			-62.9*≠ (28.3)		-75.4*≠ (28.8)
Number of Obs	**108**	**106**	**100**	**106**	**100**
R-squared	**.1006**	**.0962**	**.0893**	**.0865**	**.0765**

(Standard errors in parentheses)
Tests are two-tailed.
*** p<0.01, ** p<0.05, * p<0.1
≠Indicates significance in the opposite direction of the one predicted.
[1] *Trade dependence* was derived from a state's imports+exports/GDP for each quarter.

Column 5 finds the same pattern in results, with the substitution of a four-quarter lag on trade dependence instead of the one quarter lag reported in Column 4. In the quarter before elections, State B's past trade dependence on State A again has a statistically significant effect in the wrong direction: as trade dependence increases for State B, State A's behavior toward State B becomes less positive.

The variables for presidential election periods in each column of Table 3 (which includes current election periods in Columns 1-3; one quarter before an election quarter in Columns 4 and 5) show mostly negative coefficients (except for the *1 Quarter before State B holds a Presidential Election*, which is positive in Columns 4 and 5), none of which, however, are statistically significant. It is interesting to note however, that although the elections variables were insignificant in Table 3, in general, presidential election periods in Taiwan coincided with *negative* effects on cross-Strait interaction.

I have noted that the results from the regressions testing Hypothesis 2 are perhaps the most valuable or the most interesting of the empirical results. The main difference between the regressions in Table 3 above and Table 4 below is again with the dependent variable: the dependent variable in Table 4 is the count of solely positive interactions between China and Taiwan, labeled "pctAB." Again, results show that of the independent variables, trade dependence and the lag on trade dependence measures for State B, are significant, but negative, or in the opposite direction of that predicted. Across both of the methods for testing Hypothesis 2 (as reported in Tables 3 and 4), trade dependence, or previous trade dependence, corresponds with more negative interactions from State A to State B.

Table 4 Regressions of Presidential Election Periods and Trade Dependence Variables on Count of Cooperative/Positive Interactions from State A to State B (1991-2004)

Dependent Variable pctAB (Count of positive interactions between States A & B)	1-Do presidential elections and trade dependence together affect the count of positive interactions?	2-Do presidential elections and recent trade dependence together affect the count of positive interactions?	3- Do presidential elections and past trade dependence together affect the count of positive interactions?
Qtr in which State A holds a Pres Election	13.2*** (3.20)	13.5*** (3.23)	12.6*** (3.25)
Qtr in which State B holds a Pres Election	3.85 (3.20)	4.36 (3.23)	3.24 (3.25)
State A's Trade Dependence on State B[1]	-80.6 (59.1)		
State B's Trade Dependence on State A[1]	-222***≠ (59.1)		
1 Qtr Lag in State A's Trade Dep on State B[1]		-95.4 (65.3)	
1 Qtr Lag in State B's Trade Dep on State A[1]		-249***≠ (65.3)	
4 Qtr Lag in State A's Trade Dep on State B[1]			-110 (92.2)
4 Qtr Lag in State B's Trade Dep on State A[1]			-342***≠ (92.2)
Number of Obs	**108**	**106**	**100**
R-squared	**.2523**	**.2600**	**.2549**

(Standard errors in parentheses)
Tests are two-tailed.
*** p<0.01, ** p<0.05, * p<0.1
≠Indicates significance in the opposite direction of the one predicted.
[1] *Trade dependence* was derived from a state's imports+exports/GDP for each quarter.

The election variables results in Table 4 show the major difference in the results within the regressions on Hypothesis 2: the quarter in which a presidential election is held for State A (the sender of the interaction) is significant in every column in Table 4. Not only are presidential election periods significant for the sender (State A), they are also positive; whereas in Table 3 presidential election variables were found insignificant and negative. For the sender of events, a presidential election corresponds with an increase in

the cooperation it direct at the target state. Additionally, lagged and non-lagged increases in State B's trade dependence coincide with a decrease in the count of positive interactions, or less cooperation from State A.

Compared to the results for Hypotheses 1 and 3, Hypothesis 2, with presidential election periods and trade dependence as independent variables, shows the most consistent amount of statistical significance across the various columns. Presidential election periods coincide with a decline in net cooperation, yet an increase in the count of cooperative interactions. Therefore, there must have been enough severity in the weight of the negative words and deeds exchanged during election periods as to offset the increase in the count of positive interactions. At the same time, State B's trade dependence coincides with a decline in both net cooperation and the count of positive interactions; and it is significant in every column. I will test similar regressions on the non-direct dyad dataset later in this results chapter, so as to better understand this relationship between trade dependence, elections, and China-Taiwan interaction. For now I briefly summarize the results of the regressions for the third hypothesis.

The third hypothesis again involved two separate dependent variables: net cooperation (*netAB*) and count of positive interactions (*pctAB*). In Hypothesis 3, however capital flows indicators, rather than trade indicators, are tested as independent variables. Of the three hypotheses tested however, Hypothesis 3 had the least amount of statistically significant variables.

Table 5 Regressions of Capital Market Integration (globally) Variables on Net Cooperation from State A to State B (1991-2004)

Dependent Variable netAB (Avg Net Interactions)	1-Does global capital integration affect net interaction?	2-Do global direct investments affect net interaction?	3-Do ties to global capital markets affect net interaction?
State A's Direct Investments Abroad	.00221 (.00206)	-.000317 (.00100)	
State B's Direct Investments Abroad	.00125 (.00206)	.000647 (.00100)	
Overall Direct Investment in State A	.0010973 (.0042519)	.000251 (.00139)	
Overall Direct Investment in State B	-.000580 (.00425)	.00161 (.00139)	
State A's Other Investments (assets)	-.0000762 (.000193)		
State B's Other Investments (assets)	-.000205 (.000193)		
State A's Other Investments (liabilities)	.000217 (.000467)		
State B's Other Investment (liabilities)	.0000135 (.000467)		
State A's Securities Abroad (assets)	.000271 (.000176)		.000199 (.000106)
State B's Securities Abroad (assets)	.000269 (.000176)		.000263 (.000106)
State A's Securities Abroad (liabilities)	.000488 (.000442)		.000205* (.000113)
State B's Securities Abroad (liabilities)	-.0000548 (.000442)		-.0000867 (.000113)
Number of Obs	**16.0**	**16.0**	**16.0**
R-squared	**.847**	**.364**	**.6709**

(Standard errors in parentheses)
Tests are two-tailed.
*** p<0.01, ** p<0.05, * p<0.1
≠Indicates significance in the opposite direction of the one predicted.

I include some of most representative regressions in Table 5 below, the results of regressing net cooperation with the capital flows variables: direct investment abroad, direct investment from other countries, other investments in assets and liabilities, and securities in assets and liabilities. Because the results of the "pct," positive count, regressions are similarly insignificant, I chose not to display those findings here –Table 5 will serve as a representation of both sets of regressions.

Column 1 of Table 5 combines all of the indicators for capital flows and shows the results of the regressions on net interactions from State A to State B. All variables for global capital flows prove statistically insignificant. Most of the variables report positive coefficients, while only four variables–*Overall Direct Investment in State B*, *State A's Other Investments (assets), State B's Other Investments (assets)*, and *State B's Securities Abroad (liabilities)*–report negative, but similarly insignificant results. Column 2 reports the results of solely the direct global capital flows indicators, with direct investment abroad and FDI into both states, as the independent variables. All variables except for *State A's Direct Investment Abroad* have a statistically insignificant, positive effect on net cooperation, while *State A's Direct Investment Abroad* is significant, with a negative effect on net cooperation. Column 3 reports *State A's Securities Abroad (in liabilities)* as significant and positive. However, this variable is not consistently significant across other columns. None of the other independent variables reported in Column 3 are significant.

Because each of the independent variables in Table 5 is derived from various types of capital flows data, the lack of substantive results for the third hypothesis could potentially be the result of multicollinearity. What is more likely, however, is that such

results reflect the brevity of the time periods of capital flows measures used in the regressions. Note the number of observations across all columns in Table 5: 16 observations (compared with approximately 100 observations in the regressions for Hypotheses 1 and 2). The capital flows data available for China were very limited, spanning only the years 2001-2008, while the events data (for the dependent variable) ended with observations in year 2004.

The results from Tables 1-5 provide evidence against the hypothesis that greater economic interdependence leads to less conflict and more cooperation between states. Such results also indicate that Hypothesis 2 is worth examining in greater depth, as is reported the most significant variables of any other regressions in this study. To better understand the specific effects of elections and trade dependence on the words and deeds from each state to the other specifically, I turn to regressions using non-direct dyad data construction.

The following tables, Tables 6 and 7, report the results of regressions run on three different dependent variables: net interaction (*net*), average cooperation (*ap*), and average conflict (*an*). The first four columns in the table are regressions on net interactions between Taiwan and the PRC. Again, net is scaled so that positive values indicate cooperation and negative values indicate conflict. The first column differs from the second in the inclusion of the presidential election period variable: in the first column, there is a variable for the exact quarter in which the election is held; while in the second column, there is a variable for the six months prior to the election, or the quarter in which the election is held plus the quarter immediately preceding that quarter. The second column is included simply to help provide a better understanding of whether the period

leading up to a presidential election has an influence on the nature of interactions between China and Taiwan.

In the first column, presidential elections show no effect on the net interaction from Taiwan directed to the PRC. However, in this column aside from all others, the lag in trade dependence of both states affects the interactions Taiwan directs at the PRC. In this column, Taiwan's previous quarter trade dependence on China is statistically significant but in the wrong direction, meaning that as Taiwan's trade dependence increases, relations become less cooperative. Conversely, China's trade dependence on Taiwan was also statistically significant in this column, but significant in the positive direction, indicating that as China's trade dependence increases, Taiwan's interactions become more cooperative. Column 1 controls for the PRC's net words and deeds toward Taiwan, as well as Taiwan to PRC lagged net interaction and PRC to Taiwan lagged net interaction. None of these three variables are significant, which tells us that Taiwan's past behavior is not affecting the model, nor is the PRC's behavior for the corresponding quarter or for the past quarter, affecting the model. In sum, for Column 1, as Taiwan's trade dependence on China increases, Taiwan's behavior toward the PRC becomes less cooperative. However, as China's trade dependence increases, Taiwan improves its behavior or becomes more cooperative toward the PRC.

Column 2 shows similar results with regard to the effect of trade dependence on Taiwan's actions: Taiwan's trade dependence with China is statistically significant in the opposite direction, while China's trade dependence is statistically significant and positive. The difference in this column lies in the presidential elections indicator. In Column 2, the six months period preceding presidential elections is statistically

significant (the quarter during which a presidential election was held was not significant, by contrast, in Column 1).[10] This elections variable is also negative and therefore indicates that the six months surrounding a presidential election correspond with a negative effect on Taiwan's net interactions toward the PRC. This means that in the six months period preceding a presidential election Taiwan tends to be less cooperative toward the PRC. Column 2 also controls for the lagged PRC to Taiwan net interaction as well as the current and lagged Taiwan to PRC net interaction. In the period leading up to a presidential election in Taiwan, therefore, Taiwan's word and deeds toward the PRC are more conflictual or less cooperative.

The third and fourth columns test the opposite direction of interaction, or words and deeds from the PRC to Taiwan. Like Columns 1 and 2, Columns 3 and 4 differ in the range of presidential period they test: Column 3 tests the quarter in which a presidential election is held, or the *immediate* period, while Column 4 tests the *extended*, approximately six month period before an election. In Column 3, the sole significant variable is the quarter in which Taiwan holds a presidential election. Column 3 reports Taiwan election periods have a negative effect on the net words and deeds the PRC directs toward Taiwan. Interestingly, Column 4 does not find the extended election period variable significant. Therefore, the more negative words and deeds the PRC is directing toward Taiwan during election periods must only be occurring as the election in Taiwan draws nearer.

[10] For Taiwan, presidential elections fall in mid-March (usually around the 20th), putting them somewhere toward the end of the first quarter in the datasets. To say "six months surrounding a presidential election," is to say nearly the six months preceding the election.

Table 6 Regressions of Election Periods, Trade Dependence, and Reciprocal Interaction on Net Interaction (1991-2004)

	(1)	(2)	(3)	(4)
	Taiwan to PRC Net Interaction	**Taiwan to PRC Net Interaction**	**PRC to Taiwan Net Interaction**	**PRC to Taiwan Net Interaction**
COEFFICIENT	**t2pnet**	**t2pnet**	**p2tnet**	**p2tnet**
PRC to Taiwan Net Interaction (*p2tnet*)	0.185 (0.130)	0.189 (0.120)		
Taiwan to PRC Net Interaction (*t2pnet*)			0.146 (0.140)	0.158 (0.140)
1 Qtr Lag Taiwan to PRC Net Interaction (*L.t2pnet*)	0.0774 (0.100)	0.0842 (0.10)	-0.128 (0.094)	-0.115 (0.091)
1 Qtr Lag PRC to Taiwan Net Interaction (*L.p2tnet*)	-0.133 (0.150)	-0.111 (0.150)	0.0109 (0.150)	0.0198 (0.160)
Taiwan Presidential Elections Quarter	-1.158 (0.750)		-1.661**≠ (0.730)	
1 Qtr Lag Taiwan Pres Elections + Taiwan Pres Elections Quarter		-1.083**≠ (0.440)		-0.663 (0.760)
Taiwan's Trade Dependence on the PRC	643.7 (448)	607.8 (445)	374.7 (530)	306.3 (539)
China's Trade Dependence on Taiwan	-2560 (1698)	-2208 (1694)	-2370 (2264)	-1732 (2215)
1 Qtr Lag Taiwan's Trade Dependence	-854.3*≠ (434)	-874.5**≠ (432)	-125.2 (557)	-63.72 (577)
1 Qtr Lag China's Trade Dependence	3696**≠ (1644)	3702**≠ (1658)	462.8 (2439)	-148.7 (2465)
Number of Obs	**53.0**	**53.0**	**53.0**	**53.0**
R-squared	**0.120**	**0.140**	**0.310**	**0.280**

(Robust standard errors in parentheses)
Tests are two-tailed.
*** p<0.01, ** p<0.05, * p<0.1
≠Indicates significance in the opposite direction of the one predicted.

In the Appendix I break down the events data for Taiwan election periods into months and weeks to better understand when PRC action toward Taiwan is changing or is more conflictual.

Columns 5-8 in Table 7 below, report the regressions results of two entirely different types of dependent variables: cooperative events (*ap*) and conflictual events

(*an*). These columns are the best representations of the regressions run on the solely positive or cooperative weighted interaction and the solely negative or hostile interactions from Taiwan to the PRC and from the PRC to Taiwan. Notice that for Columns 5-8, only the cooperative events regressions are reported for Taiwan to PRC interaction (*t2pap*), while only the conflictual events regressions are reported for PRC to Taiwan interaction (*p2tan*). While regressions were run for both types of interaction measures in both directions, only the positive interaction variable proved relevant for Taiwan, and only the hostile interaction variable proved relevant for the PRC. For the sake of brevity, I simply did not include the non-relevant results for these regressions (however, they are included in the Appendix). To analyze the results of the latter four regression types, I begin with Column 5. Column 5 is the regression of the Taiwan presidential election quarters, trade dependence and lagged trade dependence on Taiwan to PRC positively weighted interactions (cooperative interactions). The column also includes the independent variables, "L.t2pap," "p2tap," and "L.p2tap," which represent the lagged cooperative interaction from Taiwan to the PRC as well as the PRC's cooperative interaction with Taiwan and its lagged measure, respectively. Column 5 shows that Taiwan's presidential elections have a statistically significant and negative effect on Taiwan to PRC cooperation. Therefore, in periods in which Taiwan holds a presidential election, its cooperative actions toward China decline. These results contradict Hypothesis 2, which predicts Taiwan as more cooperative to China during its presidential election periods. Trade dependence of either state has no effect in this column.

Table 7 Regressions of Election Periods, Trade Dependence, and Reciprocal Interaction on Cooperative and Conflictual Interaction (1991-2004)

	(5)	(6)	(7)	(8)
	Taiwan to PRC Cooperation	**Taiwan to PRC Cooperation**	**PRC to Taiwan Conflict**	**PRC to Taiwan Conflict**
COEFFICIENT	**t2pap**	**t2pap**	**ip2tan**	**ip2tan**
Taiwan Presidential Elections Quarter	-0.782**≠ (0.380)		1.711** (0.740)	
1 Qtr Lag Taiwan Pres Elections + Taiwan Pres Elections Quarter		-0.539**≠ (0.260)		0.827 (0.750)
Taiwan's Trade Dependence on the PRC	188.7 (202)	145.9 (201)	-527.8 (436)	-464.8 (436)
China's Trade Dependence on Taiwan	-1228 (829)	-916.1 (809)	2969 (1789)	2347 (1765)
1 Qtr Lag Taiwan's Trade Dependence	-131.1 (203)	-113.5 (201)	272.2 (482)	231.9 (481)
1 Qtr Lag China's Trade Dependence	656.7 (812)	511.7 (794)	-1333 (1970)	-831.9 (1970)
1 Qtr Lag Taiwan to PRC Avg. Conflict-INVERTED (L.it2pan)			-0.0666 (0.091)	-0.0646 (0.091)
Taiwan to PRC Avg Conflict -Inverted (*it2pan*)			0.0473 (0.12)	0.0503 (0.12)
1 Qtr Lag PRC to Taiwan Avg. Conflict-Inverted (*L.it2pan*)			-0.110 (0.130)	-0.0932 (0.130)
1 Qtr. Lag Taiwan to PRC Avg Cooperation (*L.t2pap*)	-0.271* (0.140)	-0.210 (0.140)		
PRC to Taiwan Avg Cooperation (*p2tap*)	0.0153 (0.110)	0.0220 (0.110)		
1 Qtr Lag PRC to Taiwan Avg Cooperation (*L.p2tap*)	-0.213* (0.110)	-0.206* (0.110)		
Number of Obs	**53.0**	**53.0**	**53.0**	**53.0**
R-squared	**0.350**	**0.350**	**0.170**	**0.140**

(Robust standard errors in parentheses.)
Tests are two-tailed.
*** p<0.01, ** p<0.05, * p<0.1
≠Indicates significance in the opposite direction of the one predicted.

Notice that Taiwan to PRC lagged cooperative interaction (L.t2pap) has a slightly significant ($p<.01$) and negative effect on current Taiwan to PRC interaction, which probably indicates a regression toward the mean. PRC to Taiwan cooperative interaction (p2tap), however, also has the same slightly significant ($p<.01$), negative effect on Taiwan to PRC cooperation, indicating that PRC to Taiwan cooperation in the previous period will make it less likely there will be cooperation by Taiwan in the next period.

Column 6 is again nearly the same regression column as Column 5, save for the extended measure of presidential election periods. This allows us to see how the six months preceding an election in Taiwan affect the cooperative events Taiwan exchanges with the PRC. In Column 6, the Taiwan elections variable remains statistically significant and negative, indicating the approximately six months before a presidential election in Taiwan corresponds with a decline in Taiwan to PRC cooperative events. In Column 6, like in Column 5, the lagged measure of PRC to Taiwan cooperation is also negative and slightly significant ($p<.01$). This shows that PRC to Taiwan cooperation in the previous period makes it less likely there will be cooperation from Taiwan in the next period.

Columns 7 and 8 switch to the measures of average negative or conflictual interaction as the dependent variable.[11] Notice in both Columns 7 and 8, the dependent variable is not simply "p2tan," but rather "ip2tan." For the sake of clarity, the "i" represents the inverted quality of this variable, as before the variable values were

[11] In this Table, only the PRC to Taiwan conflict variable is reported, as Taiwan-to-PRC conflict regression shows no significant variables in a similar column.

inverted, all numerical values were negative (as they report weighted conflict instead of cooperation), which made the results difficult to interpret. The values for negative interaction are now simply positive; the results in the regressions are not affected by the change.

In Column 7, Taiwan's presidential election periods are again statistically significant. This variable is also positive, meaning that Taiwan's presidential elections can have a positive effect on the conflict the PRC directs toward Taiwan. Or, in the quarter in which a presidential election is held in Taiwan, the PRC directs *more* conflictual words and deeds toward Taiwan. The control variable, or previous PRC to Taiwan conflict (*L.p2tan*) is insignificant, as are the variables for Taiwan to PRC conflict (*t2pan, L.t2pan*). Reciprocal interaction, therefore, has no effect on this column. Notice also that trade dependence is similarly insignificant in Column 7.

Column 8 reports a similar regression, albeit with the extended lagged elections variable rather than the single-quarter elections variable. Interestingly, when we substitute the longer period as the presidential elections variable, the variable is statistically insignificant. In this case, while presidential elections have a significant effect on the conflictual words and deeds the PRC directs toward Taiwan in the quarter in which an election is held, elections have no effect on the conflictual words and deeds the PRC directs at Taiwan in the six month period in which a presidential election is held in Taiwan. This shows that the PRC increases their conflictual interactions with Taiwan as elections draw nearer, or within the three months surrounding a presidential election in Taiwan, but does not seem to do so before that three months mark, or four to six months before the election (at least not on a statistically significant basis). The presidential

elections variable is insignificant in Column 8, as are all other variables, including trade dependence variables and other conflictual interaction control variables.

The above regressions from Tables 6 and 7, cover a variety of columns aimed at testing the relationship between trade dependence, presidential election periods, and the reciprocal cooperation and conflict between Taiwan and China. Trade dependence was only significant in regressions run on Taiwan to PRC net interaction, and even in these columns (Columns 1 and 2), trade dependence had an opposite effect than that expected: Taiwan's trade dependence negatively affects Taiwan to PRC interaction, while China's trade dependence positively affects PRC to Taiwan interaction. This perhaps reflects the direct dyad regression results that showed trade dependence of the target state (State B) coincided with less cooperation or more conflict. While trade ties did not consistently have a significant effect on cooperation, conflict, or overall interactions, the above regressions did reveal interesting trends in cross-Strait interaction.

Presidential election periods, however show a significant effect on words and deeds between China and Taiwan in quite a few columns. The results show that for Taiwan, presidential elections have no effect on conflict, but correspond with a decrease in cooperation; while for the PRC, presidential elections have no effect on cooperation but correspond with an increase in conflictual interaction. This means that the net behavior (or interaction) results are driven by increases in conflict for the PRC and by decreases in cooperation for Taiwan.

Reciprocity, as reported in the results from Tables 6 and 7, only has a significant effect on the Taiwan to PRC cooperation: previous PRC cooperation toward Taiwan showed a decline in present Taiwan cooperation toward the PRC.

The results of this empirical study, through both the direct as well as non-direct dyad regressions, did not support the initial hypotheses presented. First, trade, whether imports and exports as measured in some of the direct dyad regressions, or trade dependence, as measured in regressions for both dyad types, did not have the significant, positive effect on the nature of events between states that the hypotheses predicted. In fact, in some models, trade actually had a significant negative effect on the nature of interaction. This negative effect was usually with State B, so that State B's trade dependence corresponded with negative interaction from State A toward State B. There was no initial theory presented in this paper to support or explain such a finding. One explanation might be that State B closed off from State A more as State B's ties with or dependence on State A increases, producing a negative response from State A. Consider China as State A and Taiwan, the more economically dependent state, as State B – the context under which this explanation is perhaps most plausible. However, such a theory could be tested with further study. Overall, the above results report that trade ties do have some significant effects on cross-Strait relations.

The results do not show economic ties or trade dependence as a significant constraint during elections (as was suggested by Hypothesis 2), however, they do show that election periods correspond with an increase in conflictual interactions from both sides (albeit in slightly different periods). The results may not support the second hypothesis, but they do show that in China-Taiwan relations, Taiwan's presidential elections significantly affect the cooperative and conflictual words and deeds exchanged across the Taiwan Strait.

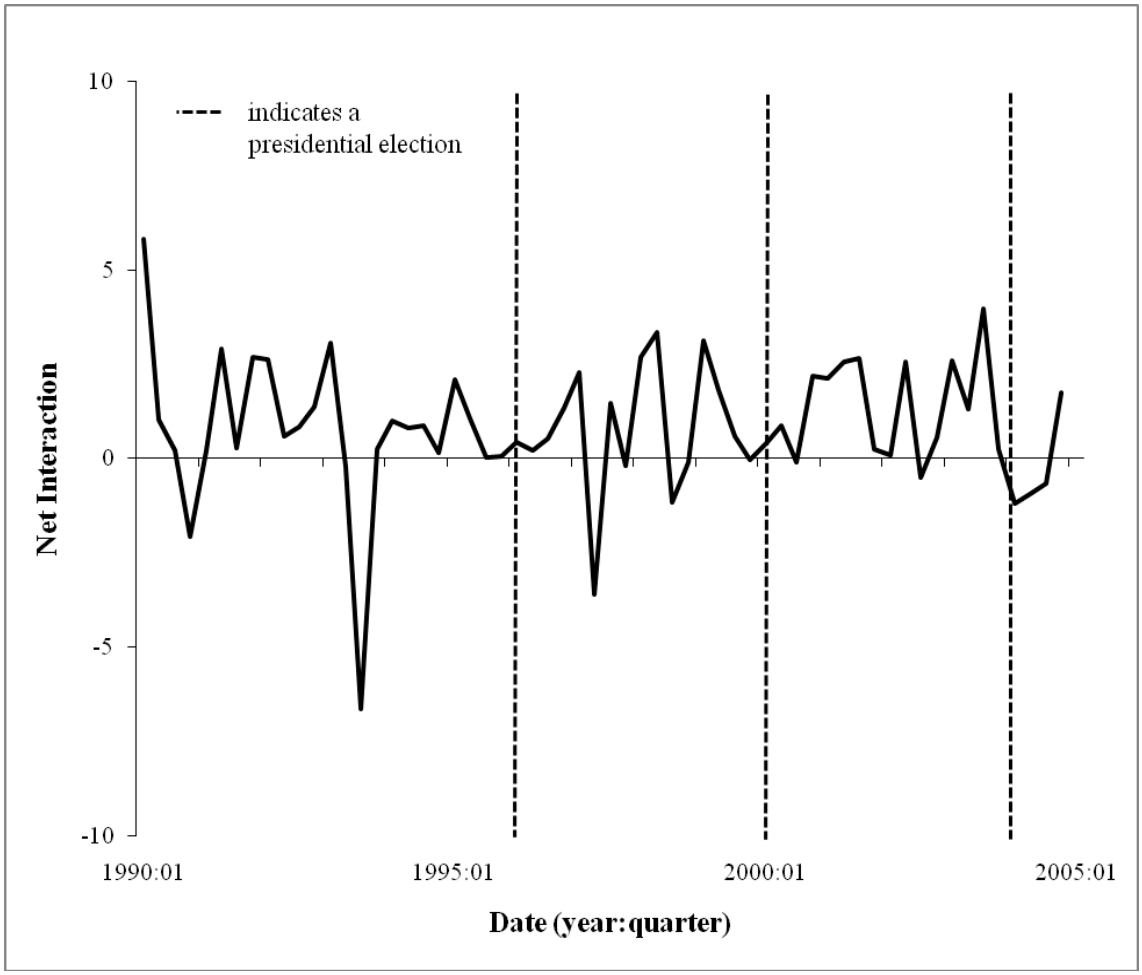
Taiwan's Presidential Elections: A Case Study

The empirical results showed that presidential elections affected cross-Strait interaction—they made less cooperation and more conflict between Taiwan and China, respectively. Through a brief case study of Taiwan's presidential elections I will further explore the relationship between Taiwan's presidential elections and deterioration in cross-Strait relations.

The results of the empirical studies showed that Taiwan directed less cooperative words or deeds toward the PRC specifically in the more extended, six month period prior to Taiwan's presidential elections. However, China directed more conflictual words or deeds toward Taiwan in the more immediate election period. Did Taiwan incite China to more conflictual interaction during election periods? Are Taiwan elections potentially periods of high levels of reciprocity between Taiwan and the PRC? One main question worth examining is why Taiwan's cooperation toward China declines before presidential elections in Taiwan. Figure 1 below is a graph of Taiwan to PRC net interaction (recall the rise in PRC to Taiwan conflict in election periods). The three vertical dashed lines mark the three quarters during which presidential elections were held in Taiwan (in 1996, 2000, and 2004).

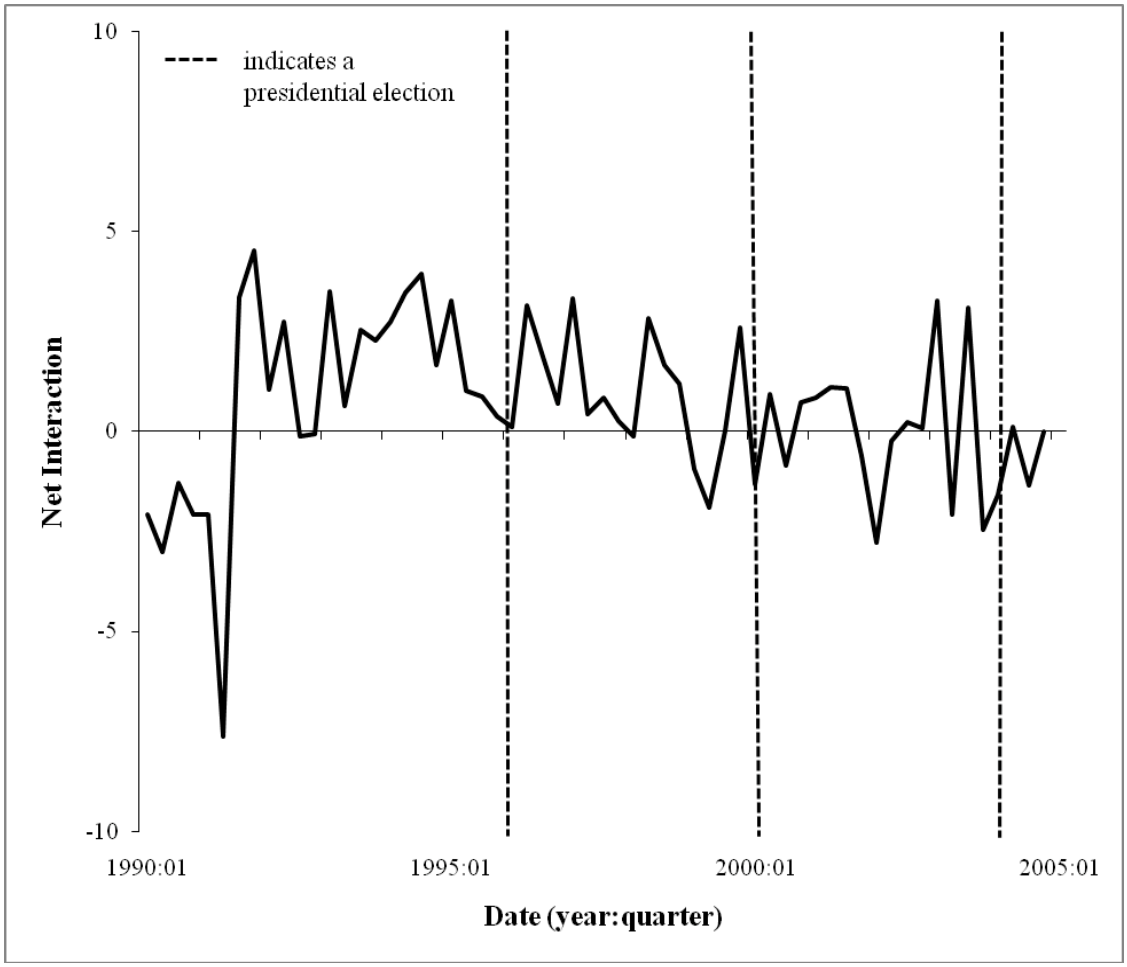
Notice a decline in the nature of Taiwan interactions before every election (based on the empirical results, for Taiwan this indicates a decline in cooperation). One theory for such a pattern has to do with "diversionary use of force" (Oneal and Tir 2006).

Figure 1 Taiwan to PRC Net Interaction during Presidential Election Periods



For instance, Larry Diamond explains that in 2004 president and candidate Chen Shui-bian made issues surrounding Taiwan's sovereignty a focal point during his reelection campaign to pull campaign debate away from an economy headed toward recession, and away from some of his other domestic failures (Alagappa ed. 2001). Figure 2 below is a graph showing PRC to Taiwan net interaction. Again, the three vertical dashed lines represents the three presidential election periods.

Figure 2 PRC to Taiwan Net Interaction during Presidential Election Periods



There is a drop in PRC to Taiwan net interaction right before each election: for the PRC this indicates a rise in conflict and therefore a decline in the nature of average net interaction. In what context did Taiwan's decline in cooperation, and China's rise in conflict, occur during presidential elections in Taiwan?

In the lead up to Taiwan's first-ever popular presidential election in 1996, relations with China were at one of their most tense periods to date (Alagappa ed. 2001). After Lee's speech at Cornell University and optimistic showing in campaign

polls, China responded with threats in an attempt to thwart Lee's chances at winning the election (Alagappa ed. 2001). China soon began military maneuvers in the Taiwan Strait, going as far as firing missiles into the Strait in 1996 (Alagappa ed. 2001).

In 2000, Goldstein and Chang explain that "the Taiwan election campaign [also took] place against the backdrop of a sharp deterioration in cross-Strait relations which had followed Lee's assertion of his "two states theory" in July 1999" (2008). Notice the sharp drop in PRC to Taiwan interaction preceding the 2000 mark. In the 2000 presidential election, President Lee Teng-hui was to step down, and there were three primary candidates campaigning: Lien Chan of the *Kuomintang* (KMT –of the same party as then-President Lee), James Soong of the People's First Party (PFP), and Chen Shui-bian of the Democratic Progressive Party (DPP) (Alagappa ed. 2001). As part of his campaign platform Chen called for more cross-Strait interaction, including diplomatic talks and further liberalization of Taiwan's restrictions toward trade and investment with the mainland (Goldstein and Chang 2008). Specifically, Chen called for "…a comprehensive strategy of economic security and development…achieved by replacing a passive policy with one of active management; and negotiations with China over cross-Strait economic issues" (Goldstein and Chang 2008). This likely accounts for the rise in positive interaction from Taipei to Beijing during the 2000 election (as seen in Figure 1, after the drop indicating Lee's 1999 provocation). For a DPP candidate, this moderation in regard to sovereignty issues was a step away from the party's historically more pro-independence leanings (Fell ed. 2008; Goldstein and Chang 2008). However, it was a

step worth taking, as Chen won the 2000 election with 39.3% of the popular vote[12] (Fell ed. 2008; Goldstein and Chang 2008). While Beijing certainly felt pressure to respond aggressively to the election of the DPP and potentially pro-independence candidate, Beijing was instead patient: "a foreign ministry spokesperson noted, [Beijing] "…would need time to listen to what they say and see what they do" (Goldstein and Chang 2008; FBIS 2000). Despite heightened tensions in the lead up to the 2000 presidential election in Taiwan, the results were surprisingly mild–the status quo between China and Taiwan remained intact.

In the 2004 campaigns, cross-Strait relations were yet again an issue of contention.

> "There is a stark contrast between the pattern of convergence of the 2000 presidential elections and the race toward independence in the 2004 elections, although basic logic was the same: all the political parties repositioned themselves on the mainland China policy map to maximize their votes." (Fell ed. 2008, 220)

In 2004 Chen ran as the incumbent against the now-joint ticket of Lien Chan of the KMT and Soong of the PFP, winning by only a 50.1 to 49.9 percent margin (Clark 2005). Incumbent candidate Chen faced difficult questions concerning his record, but is thought to have prevailed in 2004 by campaigning to his political base with appeals to Taiwanese nationalism and sovereignty issues (Clark 2005). In the period preceding this election, Taiwan entered a period of significant economic stagnation, or recession. This is a factor that made economic ties with China a distinct priority in the election (Fell ed. 2008). Additionally, Chen's administration had not upheld 2000 campaign promises of reform on government corruption (2008). Lastly, in the years before his reelection campaign,

[12] Chen was able to secure the presidency without a majority vote because the electorate was split three ways (Fell ed. 2008; Goldstein and Chang 2008).

beginning in 2002, Chen went from a president who relaxed trade restrictions with the mainland through his "integration theory," to a president who issued calls for a new constitution by the year 2006, significantly and perhaps riskily, pushing the perception of a pro-independence stance for Chen (Goldstein and Chang 2008; Clark 2005). In fact, Taiwan saw no further significant relaxations on economic restriction with the mainland after 2002 (Goldstein and Chang 2008). Yu-Shan Wu notes that during his first term, Chen promoted ties with China, yet "changed his tone rapidly whenever he deemed it beneficial to do so for domestic political purposes or tit-for-tat strategy against the mainland's pressure" (Fell ed. 2008). In the lead up to the 2004 presidential election, Chen issued his "one country on each side" statement, and additionally called for national referenda on the issue of Taiwan's "defensive" position as well as for a new constitution.[13] The distinct decline in Taiwan cooperation during this period reflects such action and rhetoric. For Chen's reelection campaign, the need to distract voters from some of his political failures seems to have outweighed the risk of provoking Beijing (Fell ed. 2008).

The history of periods of decline in cross-Strait cooperation during Taiwan's presidential elections demonstrates how democratic institutions like elections may not always constrain leaders to peaceful relations with other states (Kastner 2009**).** Furthermore, there may be no all-encompassing formula to explain the decline in cooperation or increase in hostility between China and Taiwan during Taiwan's presidential election periods. While relations with Beijing were certainly key issues of debate in presidential elections, the context of Taiwan's domestic politics, the state of

[13] The calls for a new constitution were significant because the ROC constitution is the major document that still officially ties Taiwan to the Mainland (Fell ed. 2008).

Taiwan's economy, as well as the field of presidential candidates in each election period, all worked to varying degrees in influencing the nature of Taiwan-to-Beijing interaction during election periods.

Conclusion: Applying the Liberal Peace

In this study there were three original hypotheses aimed at testing the existence of liberal peace in cross-Strait relations: 1. Greater ties through trade will make states more cooperative toward each other. 2. Greater integration into global capital markets will make states more cooperative toward each other. 3. Democratic leaders will be especially constrained to cooperative relations with trading partners during presidential elections. The results did not support the hypotheses, and in fact, quite a few sets of results even contradicted the hypotheses. Tests of trade dependence on cross-Strait interaction showed that an increase in trade dependence for Taiwan made Taiwan less cooperative toward China, while an increase in *China's* trade dependence made Taiwan more cooperative toward China. The former contradicts the first hypothesis –that trade ties will lead to more peaceful relations– and the latter was not anticipated by any of the hypotheses. Together these results demonstrate the intrinsically complex nature of cross-Strait relations: factors such as domestic politics and security concerns might well take priority for Taiwan leaders, especially during election periods.

While bilateral reciprocity between China and Taiwan showed little to no significance over the range of empirical tests, one major factor in cross-Strait relations, accounted for in much of the cross-Strait relations literature, and certainly applicable to this type of study, is the influence of the U.S. in relations between China and Taiwan.

While time constraints prevented an examination of the impact of trilateral reciprocity in cross-Strait relations in this paper, it would certainly be the next logical step in a continuation of this study.

Perhaps the most significant finding is that for cross-Strait relations, Taiwan's presidential elections matter a great deal. Throughout the results, the dummy variable for Taiwan's presidential election periods is consistently significant. For Taiwan, internal presidential elections mean a drop in cooperation toward China. Conversely, for China, Taiwan's presidential elections are a catalyst for an increase in the conflictual words or actions toward Taiwan. Further examination of Taiwan presidential elections history showed that an upcoming change or potential for change in leadership in Taiwan provoked Beijing; while election campaigns in Taiwan tend to bring issues over Taiwan's sovereignty and over relations with China to the forefront of national debate. The one causal mechanism from liberal peace theory on which this study focused reasons that as economic ties grow between states, democratic leaders specifically, will be more constrained to uphold ties and will thus be forced to engage in cooperative relations with economic partners. This hypothesis did not hold true for Taiwan, the democratic state in the dyad. If this mechanism is not true for Taiwan, then there are exceptions to the economic-ties-constrain mechanism, and certainly, other democratic states for which this mechanism of the liberal peace will also not apply. If this mechanism is not true for Taiwan, then there are exceptions to the economic-ties-constrain mechanism, and certainly, other democratic states for which this mechanism of the liberal peace will also not apply. The findings in this paper demonstrate that the factors influencing cross-Strait interaction extend beyond considerations of economic ties alone.

Appendix

Descriptive Statistics; Full Regressions Table; Elections Tables

Table 8 Descriptive Statistics: Variables from Tables 1-4

Variable	Variable Name	Obs	Mean	Std. Dev.	Min	Max
A to B Net Interaction	*netAB*	120	0.725	2.00	-7.63	5.813
A to B Count of Positive Interaction	*pctAB*	120	7.125	6.09	0	41
Presidential Elections in State A	*preselectA*	225	0.0178	0.132	0	1
Presidential Elections in State B	*preselectB*	226	0.0177	0.132	0	1
1 Qtr Lag Pres Elections in State A	*lagpreselectA*	224	0.0179	0.133	0	1
1 Qtr Lag Pres Elections in State B	*lagpreselectB*	224	0.0179	0.133	0	1
Imports to State A from State B	*importAB*	134	3605	4679	2	19307
Exports from State A to State B	*exportAB*	134	3605	4679	2	19307
1 Qtr Lag on Imports to State A from State B	*lagimportAB*	134	3605	4679	2	19307
1 Qtr Lag on Exports from State A to State B	*lagexportAB*	134	3605	4679	2	19307
4 Qtr Lag on Imports to State A from State B	*lag4importAB*	131	3505	4684	2	19307
4 Qtr Lag on Exports from State A to State B	*lag4exportAB*	131	3316	4290	2	18339
State A's Trade Dependence on State B	*tradedepA*	140	0.0113	0.0177	0.000306	0.0708
State B's Trade Dependence on State A	*tradedepB*	140	0.0113	0.0177	0.000306	0.0708
1 Qtr Lag in State A's Trade Dep on State B	*lagtradedepA*	140	0.0113	0.0177	0.000306	0.0708
1 Qtr Lag in State B's Trade Dep on State A	*lagtradedepB*	140	0.0113	0.0177	0.000306	0.0708
4 Qtr Lag in State A's Trade Dep on State B	*lag4traded~A*	137	0.0103	0.0162	0.000306	0.067
4 Qtr Lag in State B's Trade Dep on State A	*lag4traded~B*	137	0.0115	0.0179	0.000306	0.0708

Table 9 Descriptive Statistics: Variables from Table 5

Variable	Variable Name	Obs	Mean	Std. Dev.	Min	Max
A to B Net Interaction	*netAB*	120	0.725	2	-7.63	5.81
A to B Count of Positive Interaction	*pctAB*	120	7.125	6.09	0	41
State A's Direct Investments Abroad	*invabrA*	126	-877	826	-4370	1.52
State B's Direct Investments Abroad	*invabrB*	126	-877	826	-4370	1.52
Overall Direct Investment in State A	*dfiinA*	126	471	545	-985	2910
Overall Direct Investment in State B	*dfiinB*	126	471	545	-985	2910
State A's Other Investments (assets)	*invasA*	126	-610	2757	-9004	10157
State B's Other Investments (assets)	*invasB*	126	-610	2757	-9004	10157
State A's Other Investments (liabilities)	*oinvliaA*	126	1159	2912	-9087	12848
State B's Other Investment (liabilities)	*oinvliaB*	126	1159	2912	-9087	12848
State A's Securities Abroad (assets)	*secasA*	126	-2017	3428	-17120	4164
State B's Securities Abroad (assets)	*secasB*	126	-2017	3428	-17120	4164
State A's Securities Abroad (liabilities)	*secliaA*	126	1200	3298	-15227	13468
State B's Securities Abroad (liabilities)	*secliaB*	126	1200	3298	-15227	13468

Table 10 Descriptive Statistics: Variables from Tables 6-7

Variable	Variable Name	Obs	Mean	Std. Dev.	Min	Max
PRC to Taiwan Net Interaction	*p2tnet*	60	0.572	2.17	-7.63	4.53
Taiwan to PRC Net Interaction	*t2pnet*	60	0.878	1.83	-6.63	5.81
PRC to Taiwan Cooperation	*p2tap*	60	2.54	1.17	0	4.53
Taiwan to PRC Cooperation	*t2pap*	60	2.57	0.851	0	5.81
PRC to Taiwan Conflict	*p2tan*	60	-1.97	1.65	-10.0	0
Taiwan to PRC Conflict	*t2pan*	60	-1.69	1.68	-9.87	0
Inverted Conflict: PRC to Taiwan	*ip2tan*	60	1.97	1.65	0	10
Inverted Conflict: Taiwan to PRC	*it2pan*	60	1.69	1.68	0	9.88
Taiwan Pres Elections	*twpresele*	112	0.0357	0.186	0	1
Taiwan's Trade Dependence on China	*twtradedep*	70	0.0196	0.0221	0.000745	0.0708
China's Trade Dependence on Taiwan	*chtradedep*	70	0.00306	0.00257	0.000306	0.00808
1 Qtr Lag Taiwan's Trade Dependence	*lagtwtrade~p*	70	0.0196	0.0221	0.000745	0.0708
1 Qtr Lag China's Trade Dependence	*lagchtrade~p*	70	0.00306	0.00257	0.000306	0.00808

The following table is an extension of Table 7 on page 41. In Table 7, only Taiwan to PRC cooperation and PRC to Taiwan conflict were reported, as those were the two interaction-types for which election periods reported significance. Below is the full report of results, including Taiwan to PRC and PRC to Taiwan cooperation as well as PRC to Taiwan and Taiwan to PRC Conflict.

Table 11 Regressions of Election Periods, Trade Dependence, and Reciprocal Interaction on Net Interaction, Cooperation, and Conflict (1991-2004)

	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
	Taiwan to PRC Cooperation	**Taiwan to PRC Cooperation**	**PRC to Taiwan Cooperation**	**PRC to Taiwan Cooperation**	**PRC to Taiwan Conflict**	**PRC to Taiwan Conflict**	**Taiwan to PRC Conflict**	**Taiwan to PRC Conflict**
COEFFICIENT	**t2pap**	**t2pap**	**p2tap**	**p2tap**	**ip2tan**	**ip2tan**	**it2pan**	**it2pan**
Taiwan Presidential Elections Quarter	-0.782**≠ (0.38)		-.003 (.583)		1.711** (0.74)		.714 (.877)	
1 Qtr Lag Taiwan Pres Elections		-0.539**≠ (0.26)		.080 (.310)		0.827 (0.75)		.678 (.544)
Taiwan's Trade Dependence on the PRC	188.7 (202)	145.9 (201)	-151 (395)	-153 (392)	-527.8 (436)	-464.8 (436)	-547 (447)	-521 (441)
China's Trade Dependence on Taiwan	-1228 (829)	-916.1 (809)	529 (1414)	550 (1361)	2969 (1789)	2347 (1765)	1830 (1865)	1600 (1820)
1 Qtr Lag Taiwan's Trade Dependence	-131.1 (203)	-113.5 (201)	159 (391)	166 (393)	272.2 (482)	231.9 (481)	803 (460)	814 (453)
1 Qtr Lag China's Trade Dependence	656.7 (812)	511.7 (794)	-904 (1372)	-957 (1352)	-1333 (1970)	-831.9 (1970)	-3346 (1993)	-3347 (1955)
1 Qtr Lag Taiwan to PRC Avg.					-0.0666 (0.091)	-0.0646 (0.091)	.120 (.103)	.120 (.103)

1 Qtr Lag Taiwan to PRC Avg. Conflict-Inverted					-0.0666 (0.091)	-0.0646 (0.091)	.120 (.103)	.120 (.103)
Taiwan to PRC Avg Conflict -Inverted					0.0473 (0.120)	0.0503 (0.120)		
PRC to Taiwan Avg Conflict-Inverted							.087 (.210)	.088 (.205)
1 Qtr Lag PRC to Taiwan Avg. Conflict-Inverted					-0.110 (0.130)	-0.0932 (0.130)	.064 (.250)	.082 (.256)
1 Qtr. Lag Taiwan to PRC Avg Cooperation	-0.271* (0.140)	-0.210 (0.140)	.050 (.208)	.050 (.209)				
PRC to Taiwan Avg Cooperation	0.0153 (0.110)	0.0220 (0.110)						
Taiwan to PRC Avg Cooperation			.030 (.312)	.044 (.321)				
1 Qtr Lag PRC to Taiwan Avg Cooperation	-0.213* (0.110)	-0.206* (0.11)	-.066 (.167)	-.065 (.167)				

Standard errors in parentheses)
Tests are two-tailed.
*** p<0.01, ** p<0.05, * p<0.1
≠Indicates significance in the opposite direction of the one predicted.
[1] *Trade dependence* was derived from a state's imports+exports/GDP for each quarter.

Taiwan Election Periods Compared with PRC to Taiwan Conflict: By *Week*

The following three tables show Taiwan presidential election periods broken down into months and weeks (as oppose to quarters) in order to provide a better picture of when PRC action toward Taiwan is changing to become more conflictual within the quarter. The three tables below can be thought of as a magnification of Column 3 from

Table 6, in which the presidential election periods variable reported a significant effect on PRC to Taiwan conflict. This indicated that for the more immediate election periods (within the quarter), the PRC increased their conflictual words and deeds directed at Taiwan. The tables below show that within those election quarters, the spike in conflict from the PRC occurred very close to the election (the election for each year falls in the third week of March), mostly in the second, third and fourth weeks of March.

Table 12 PRC to Taiwan Conflict: 1996 Presidential Election Period

PRC to Taiwan Conflict Indicator	Year	Month	Week in the Month
0	1996	March	1
-6.31	1996	March	2
-1.42	1996	March	3
-.126	1996	March	4
0	1996	March	5*

Table 13 PRC to Taiwan Conflict: 2000 Presidential Election Period

PRC to Taiwan Conflict Indicator	Year	Month	Week in the Quarter
0	2000	March	1
-4.97	2000	March	2
0	2000	March	3
0	2000	March	4
0	2000	March	5*

Table 14 PRC to Taiwan Conflict: 2004 Presidential Election Period

PRC to Taiwan Conflict Indicator	Year	Month	Week in the Quarter
-2.06	2004	March	1
0	2004	March	2
-2.06	2004	March	3
-1.77	2004	March	4
0	2004	March	5*

*Explanation for 5 weeks in a quarter: Some weeks may have been shortened in order to divide the quarters evenly.

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