Dying to Win? Casualty Sensitivity, Partnership, and Willingness for Self-Defense in Taiwan

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Abstract

Casualty tolerance is one of the most important factors that influences war support in the literature of war support. Unfortunately, such theories are rarely examined in another context. In this paper, we use a hypothetical conflict across the Taiwan Strait to ask the following questions: 1) are citizens in Taiwan sensitive to battle deaths, 2) are they more sensitive to civilian deaths as opposed to military deaths? 3) does their assessment of the likelihood of success in a conflict with China moderate their casualty tolerance, and 4) Does their military experience also help moderate casualty tolerance? We fielded an experiment with varying vignettes in Taiwan in September 2023. The results provide critical theoretical and policy contributions to the existing literature on war support.

Keywords: War Support, Taiwanese Self-Defense, Casualties, Cross-Strait Relations

Introduction

The growing tensions across the Strait have attracted increasing attention to analyzing the various dimensions of public opinion surrounding a potential military conflict between Taiwan and China. The ensuing literature on Taiwanese war support, or Taiwanese support for self-defense, has pointed out several key factors that would influence citizens' war attitudes, ranging from the military intervention of troops by the United States, one's political predisposition, one's perception of Taiwan's military ability to defend the country, to sociodemographic variables such as one's age or gender (Lee 2024; Wu and Lin 2024; Rich, Banerjee, and Tkach 2023; Wu et al. 2022; Wang et al. 2013; Wu et al. 2023; Yeh and Wu 2019).

Those familiar with the traditional or Western literature of war support would readily point out that, as a topic, potential causalities in the conflict have not been explored in this literature. Battle deaths have been one of the most critical indicators that shape public support for ongoing military operations overseas (Mueller 1973, Gartner and Segura 1998). For instance, in the humanitarian intervention of Mogadishu in 1993, the public, appalled by the image of mutilated soldiers drawn through the street by local militia, angrily demanded the Clinton administration to withdraw troops. Even though graphic images of casualties are less visible in mainstream news networks and media nowadays, the findings – mounting deaths leading to an inexorable decline in war support – largely hold true in other contexts.

To this day, there have been very limited studies, policy and academic, on Taiwanese tolerance of or sensitivity to battle deaths. An oft-cited report by the Center for Strategic and International Studies (CSIS) in 2023 estimated that Taiwan would incur around 3,500 military casualties in a war with China (Cancian, Cancian, and Heginbotham 2023). A war game by a Japanese think tank in the same year revealed an estimated 13,000 casualties for Taiwan (Lin and

Chin 2023). Within Taiwan, the only discussion revolves around an unverified military report in 2005, stating that within a week, the death tolls of the military and civilians could total up to 240,000. The defense minister later clarified that such a number is the estimate of war mobilizations, not projected casualties (Yzahou Zoukan 2021). The lack of information from the government is understandable. Such information, though critical, is likely to induce panic and fear among the public.

To fill this void in the literature, in this paper, we utilize an original survey experiment to understand how Taiwanese citizens react to information about potential casualties in a hypothetical conflict with China. We designed vignettes using different levels (high (250K) vs. low (25k)) and types (civilian vs. military) of casualties to determine whether 1) citizens would retract their support when casualties increase, 2) different types of causalities elicit divergent responses, 3) tolerance of casualties would be moderated by the likelihood of victory in a conflict, and 4) partisans react differently to casualty information.

We found that citizens in Taiwan do not follow existing patterns of behavior laid out in casualty research. That is, higher casualties did not lead to a lower level of willingness for self-defense. Instead, the public seems to be influenced by casualty type more - civilian deaths on both levels used in the experiment resulted in lower support than military deaths. Contrary to existing literature, we found evidence suggesting that belief of Taiwan's likelihood of success on the battlefield would buffer citizens' tolerance for more casualties. Last, there were clearly partisan differences with respect to battle deaths. KMT supporters were more sensitive to battle deaths than DPP ones. In the following, we will first review the literature before moving on to hypotheses and our experimental design. After presenting our analytical results, we then discuss our contributions to literature and policy implications.

Literature Review

Extensive research on public support for overseas military interventions in the Western world has highlighted a variety of influencing factors, with combat deaths consistently standing out as one of the most impactful. Studies on how the number of battle deaths influences public opinion have reached several key conclusions. First, rising military casualties lead to decreased support for ongoing military operations overseas (e.g., Mueller 1973; Gartner and Segura 1998). However, later research by Gelpi et al. (2009) suggests that the public may become more tolerant of casualties if they believe the U.S. will win the conflict and that the operation is justified. Second, the dampening effects on war support are particularly salient among those whose family or community members are directly affected (Fazal 2021; Althaus, Bramlett, and Gimpel 2012). Third, casualties can have electoral costs and consequences for politicians, including presidents (Kriner and Shen 2021; Gartner 1997).

Last, in recent years, the casualty literature has shifted its attention to including civilian casualties (Friedrich and Dood 2009). The line of inquiry is still undetermined as to which type of casualty, military or civilian, would play a larger role in reducing war support. Scholars have studied this issue under varying conditions. Johns and Davies (2019) found that military casualties above a certain threshold, 500 deaths, could lead to a larger reduction in war support than civilian casualties. Using media reports during the Iraq War, Larson and Savych (2006) conclude that citizens prioritize military casualties, instead of civilian ones, as their primary concern of the war. On the other hand, Walsh (2015) discovered that civilian causalities carried a larger impact than military ones while using precision weapons abroad. Clearly, the debate has not been settled yet.

Probing public response to casualty is critical for both theoretical and practical reasons. For the war support literature, the nature of the conflict sets the Taiwan case apart from other war support cases. As Yeh and Wu (2019) put it, a conflict with China for citizens in Taiwan is a "war of necessity," whereas for traditional war support cases, the use of force is often a choice for the public and policymakers. Aside from Taiwan, very few publications focus on casualties outside of the U.S. context (for exceptions, see Komiya 2019; Hamanaka 2018; Boucher 2010). Komiya's (2019) work focuses on Japan, but its applicability to the situation in Taiwan is limited. Japan's self-defense force (SDF) must abide by the constitution and can only use force under specified conditions. Their case of a humanitarian intervention is different from a "war of necessity." Other cases in Israel also raise critical insights (Hamanaka 2018), but those studies gauge support for existing and ongoing operations against terrorist organizations. A war between Taiwan and China has remained hypothetical, with no casualties incurred. These differences help justify studying Taiwan as a new case.

For policymakers, the topic has become more relevant as international society is getting more concerned about a potential conflict across the Strait after the onset of the Russo-Ukrainian War. The war, for citizens in Taiwan, amplifies the salience of the threats to their survival.

Research has also shown that war has a distinct impact on citizens' willingness for self-defense (Rich, Banerjee, and Tkach 2023; Wang et al. 2024; Wang et al. 2024). On the topic of Taiwanese casualty tolerance, Wu et al. (2022) showed that, in 2018, when subjects were asked beyond what level of casualties they would stop supporting a war with China, there were equally sizable portions of respondents choosing "over 50,000 deaths" and "0 death." The polarization of response among the citizens could indicate the public's unfamiliarity with such a topic. Our

research will help ascertain if such polarization still holds even after the citizens are now more informed and aware of a potential conflict with China.

Casualties and Taiwanese public support for war

In recent years, a public support for war literature for Taiwan to answer questions on public willingness to defend themselves has emerged, resulting in the following findings. First, U.S. involvement (diplomatic or military), be it practical or symbolic, makes citizens in Taiwan more willing to defend themselves and have confidence in their military's ability to defend them (Lee 2024; Wu and Lin 2024; Rich, Banerjee, and Tkach 2023; Wu et al. 2022; Wang et al. 2013; Wu et al. 2023; Yeh and Wu 2019).

Second, partisanship is a powerful indicator. The supporters of the independence-leaning Democratic Progressive Party (DPP) tend to hold an exclusive Taiwanese identity. In contrast, the unification-leaning Kuomintang (KMT) and other more pro-China parties are more likely to hold a Chinese-only identity or dual identity. Regarding defense, DPP supporters are more willing to fight on the battlefield, exhibit greater confidence in Taiwan's military capabilities, and hold a more optimistic view of U.S. military support in a conflict with China. They also believe Taiwan could win a war against China and express confidence that Russia will ultimately fail in its war against Ukraine. Furthermore, the determination of fellow citizens strengthens their motivation to defend Taiwan. Since the onset of the Russo-Ukrainian War, this ideological divide has only intensified, with polarization between DPP and KMT supporters widening, particularly on matters of national defense and the potential role of external military support (Wu et al. 2022; Rich, Banerjee, and Tkach 2023; Wang et al. 2024; Wang and Eldemerdash 2023).

Despite these contributions, the Taiwanese public support for war literature has not made headway in exploring the topic of casualty. Thus, in the following, we formulate a few hypotheses based on existing knowledge of the topic in the war support literature. This will help us understand the conditions under which information about casualties could sway public opinion on war in Taiwan.

The unique contextual background of Taiwan drives our first hypothesis. In cases where war support is a choice, public support tends to decrease as casualties increase, but we might expect the case of Taiwan might be different. When survival is at stake, the citizens might bear great pains knowing that conceding defeat is tantamount to the extinction of their statehood. In the case of Japan during WWI, even the threat of nuclear bombs did not bring Japan into submission among high casualties nor weakened public morale for the war to continue (Page 1993). In a more contemporary and comparable example, eight months after the conflict began, most Ukrainians (70%) still support the country fighting the war. Nineteen months after the war started, 60% still hold this view (Vigers 2023). Thus, for hypothesis 1, we propose a neutral hypothesis: public support for war may not significantly decline with increasing casualties. As a corollary, since Western war support literature has suggested that the likelihood of success can mitigate the reduction in war support (e.g., Gelpi 2009), we hypothesize that the expectation of success will moderate the relationship between casualties and public support for war (H2).

Third, although the research on the relative impact of civilian and military battle deaths on war support remains inconclusive in the Western war support literature, we have reasons to believe that the public in Taiwan might be swayed more by civilian casualties for several reasons. First, although Taiwan operates under a conscription system, military training is often criticized for being ineffective and suffering from low morale. Scandals involving corruption,

mismanagement, and incidents where retired generals were caught serving as spies for China have further eroded public confidence. Finally, the fact that Taiwan has not experienced a military conflict with China limits the military's ability to demonstrate its effectiveness and utility as it would in wartime. Thus, we can argue that Taiwanese citizens are more alienated from the military, and their disapproval is likely to turn into indifference toward military casualties compared to civilian ones (Cheung 2023; Chien 2023; Chong 2020). Taken together, we hypothesize that Taiwanese citizens would reduce their support more if the casualties were civilian rather than military (H3).

Aside from the above hypotheses, extrapolating from existing Taiwanese war support studies leads us to believe that partisans should react differently to information about casualties. We argue that DPP supporters might be less sensitive to casualties. Their confidence and outlook on the conflicts are buoyed by their willingness to get involved and their belief that the U.S. will provide necessary assistance. They also tend to believe that Taiwan will achieve victory from the conflict more than their KMT counterparts (Wu et al. 2022; Rich, Banerjee, and Tkach 2023; Wang et al. 2024; Wang and Eldemerdash 2023). In this sense, we could hypothesize that DPP supporters would exhibit higher levels of support than their KMT counterparts across different levels of battle deaths.

But there are arguments to believe otherwise. One could argue that although both partisans hold major ideological differences, they still maintain an overarching identity of being a citizen. Thus, even if partisans hold different views regarding a potential conflict, they might show sympathy, solidarity, or camaraderie when their living environments are being intruded. Citizens' identities are often awakened or made more salient during difficult times, diminishing the impact of partisanship (Levendusky 2018). Bush's approval after the September 11 attack is

a case in point. Days prior to the attack, Bush's approvals among Republicans and Democrats were 87% and 27%, respectively. Three days after the terrorist attacks, the approval for both groups went up to 95% and 78%. Support from Democrats alone increased by over 50% (Gallup 2008). Similar findings in cross-national research suggest that during crises, citizens across political divides can rally around national leaders or symbols, transcending partisanship (Chowanietz 2010; Birch 2022; Boittin et al. 2019; Lazarev et al. 2014; Ramos and Sanz 2020; Bol et al. 2021; Johansson et al. 2021)

From this viewpoint, we could also hypothesize that citizens might be motivated to reduce their cognitive bias toward outgroups when they learn of civilian casualties in wartime. Research on civilian casualties has found that citizens often withdraw their support when civilian casualties increase, and the findings are robust in a wide range of scenarios (Johns and Davies 2019). Taken together, we decided to propose a neutral hypothesis: partisans (DPP and KMT supporters) should react similarly to information about civilian casualties (Hypothesis 4).

Research Design

A total of 1629 respondents were recruited for the survey experiment conducted by Rakuten Insight. The sample was recruited using quote sampling to mimic the key demographic factors of Taiwan, such as age, gender, and education. The data collection process began from November 23 to 30, 2023. Table 1 compares the sample to the national demographic parameters of Taiwan). From the table, we can conclude that our sample is quite similar to the population in terms of gender and some age groups, but older individuals and those with higher education are overrepresented in the sample.

Table 1 Comparison between sample and population demographic indicators

	Sample	Population
Gender		
Female	53%	51%
Age		
20-29	14.7%	12.2%
30-39	18.8%	13.8%
40-49	21.7%	16.6%
50-59	24.4%	15.1%
60 or older	20.3%	22.4%
Education		
College degree or above	83.6%	46.5%

(Source Executive Yuan and Ministry of the Interior)

To test the above hypotheses, we manipulated two key independent variables in our experiments: casualty type and number of deaths. This resulted in a 2X2 factorial design (see below for the vignettes each group read). We designed high and low casualty numbers based on a Taiwanese report that provided an estimate of the potential deaths on the Taiwan side in a conflict with China (Yang 2019). As mentioned, the Taiwanese government has never released an official estimate of possible casualties. To maximize the possibility of observing differences in how citizens perceive this information, we arbitrarily used estimates of 40,000 and 400,000 to gauge public responses. These modest and extreme estimates were chosen to ascertain the effect of casualty numbers on public opinion. The following is what the subjects read:

[Group 1 Low Military Casualties Group]: As Chinese fighter jets continue to harass Taiwan, many now consider cross-Strait relations at their lowest point in four decades. Although the government has never released an estimate of the casualties that could occur after a war begins, the public is very interested in this information. In a recent international

academic conference in Taipei, many experts have indicated that once a war begins, Taiwan could incur about **40,000 military** deaths in the first month.

[Group 2 High Military Casualties Group]: As Chinese fighter jets continue to harass Taiwan, many now consider cross-Strait relations at their lowest point in four decades. Although the government has never released an estimate of the casualties that could occur after a war begins, the public is very interested in this information. In a recent international academic conference in Taipei, many experts have indicated that once a war begins, Taiwan could incur about **400,000 military** deaths in the first month.

[Group 3 Low Civilian Casualties Group]: As Chinese fighter jets continue to harass Taiwan, many now consider cross-Strait relations at their lowest point in four decades. Although the government has never released an estimate of the casualties that could occur after a war begins, the public is very interested in this information. In a recent international academic conference in Taipei, many experts have indicated that once a war begins, Taiwan could incur about **40,000 civilian** deaths in the first month.

[Group 4 High Civilian Casualties Group]: As Chinese fighter jets continue to harass Taiwan, many now consider cross-Strait relations at their lowest point in four decades. Although the government has never released an estimate of the casualties that could occur after a war begins, the public is very interested in this information. In a recent international academic conference in Taipei, many experts have indicated that once a war begins, Taiwan could incur about **400,000 civilian** deaths in the first month.

After receiving their treatments, respondents moved on to express their support across a wide range of policy items: 1) Willingness to Fight: on a scale from 0 to 10 (0 = extremelyunwilling, 10 = extremely willing), participants were asked how willing they would be to defend Taiwan if China were to invade, including actions such as donating resources, working in logistics, or serving on the battlefield; (including donating resources, working in logistics, and going into the battlefield), 2) Confidence in Military: also measured on an 11-point scale (0 =not confident at all, 10 = extremely confident), participants rated their confidence in Taiwan's military to defend the country; 3) Victory Likelihood: respondents assessed Taiwan's chances of winning a war with China, using a scale from 0 to 10 (0 indicating extremely unlikely and 10 indicating extremely likely). 4) U.S. Military Assistance: lastly, respondents were asked how likely they believed the United States would send troops to assist Taiwan in the event of war, using a scale from 0 (absolutely will not) to 10 (absolutely will). Aside from these policy stances, respondents' demographic information, including age, gender, education level, party identification, national identity, and family income level, was also collected. We also asked the extent to which they considered the U.S. as an ally.

We ran randomization checks to ascertain if the subjects in the four experimental groups had similar backgrounds on various demographic variables. ANOVA tests showed that the means of the following variables were not significantly different: gender (p=0.77), party identification (p=0.82), education (p=0.70), family income (p=0.49), seeing the U.S. as an ally (p=0.75), and age (p=0.43). In the following, we turn to statistical analyses to determine if any of the hypotheses above were supported.

Difference by Experimental Groups

For hypothesis one, we wonder, for all citizens, whether higher death tolls led to lower support. We ran regression models with the treatment groups and all the covariates. The predictions of the dependent variable, willingness to fight, for each group are displayed in Figure 1 below. The regression results are displayed in Table 1 below. Figure 1 provides support for hypothesis 1 – higher casualties do not translate into lower support, as the confidence intervals for both dyads, Group 1 and 2, Group 3 and 4, nearly overlap. What is clear is that the *type* of battle deaths matters. The results also helped support hypothesis 3, which is that the type of battle deaths created a difference in the reduction in war support. Using the regression results from Table 1 with both military casualties as the baseline in Model 1 and Model 2, we could see that, compared to Group 1 (low military casualties), Groups 3 (low civilian casualties) and 4 (high civilian casualties), respectively, was associated with a reduction of willingness compared to group at the .05 level. The result remained even when we switched to a higher level of military casualties in Model 2. We thus conclude that Taiwanese citizens retract their support more when the deaths are civilian.

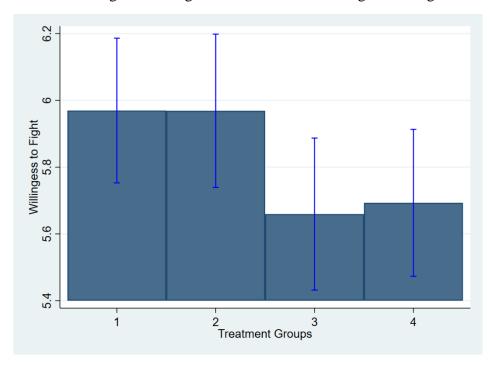
Table 2. Regression Estimates on Willingness to Fight

DV: Willingness to Fight	(1)	(2)
40K Military (G1)		-0.003
		(0.162)
400K Military (G2)	-0.002	
	(0.161)	
40K Civilian (G3)	-0.291*	-0.320*
	(0.161)	(0.166)
400K Civilian (G4)	-0.258	-0.283*
	(0.158)	(0.163)
Partisanship	-0.035	-0.043
-	(0.046)	(0.046)
Female	-0.014	0.022
	(0.118)	(0.119)

Age	0.012** 0.007*	
	(0.004)	(0.004)
Income	-0.008	-0.007
	(0.017)	(0.170)
Education	-0.021	0.002
	(0.158)	(0.159)
US Ally	0.156	0.195
	(0.125)	(0.125)
Taiwanese	0.182*	0.025
	(0.098)	(0.090)
Confidence	0.549***	0.562***
	(0.028)	(0.028)
TaiwanWin	0.616***	0.178***
	(0.152)	(0.044)
USHELP	0.247***	0.267***
	(0.030)	(0.029)
Constant	0.330	1.408**
	(0.557)	(0.492)
Observations	1467	1467

Note: *p<0.1, **p<0.05, ***p<0.001

Figure 1: Marginal Predictions on Willingness to Fight



We then moved on to ascertain if victory likelihood would moderate the impact of casualties of war support (H2). In other words, we wonder if higher levels of belief in Taiwan's victory against China in a war will buffer the impact of higher casualties. We ran a regression with the interaction of citizens' assessment of Taiwan's likelihood of victory and the experimental groups and a list of control variables. The results of the regression are shown in Table 3. From the regression table, we could see that the coefficients for the interactions were non-significant. However, to get more clarity about the predictions for each specific group, we resort to the margin plots, as shown in Figure 2 below. The margin plots show that, as victory likelihood increases, each group's willingness to fight has a corresponding upward trend. Some groups, such as Group 4, show a more substantial increase in the fight score as victory likelihood increases compared to other groups (like Group 2). However, overall, we could conclude that citizens will be willing to tolerate more casualties when they believe they can prevail in the conflict.

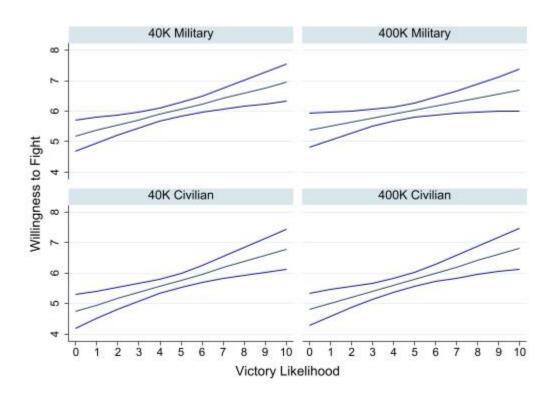
Table 3: Interaction Model

DV: Willingness to Fight	(1)
40OK Military	0.190
	(0.297)
40K Civilian	-0.438
	(0.308)
400K Civilian	-0.379
	(0.288)
TaiwanWin	0.175**
	(0.054)
40OK Military*TaiwanWin	-0.044
	(0.056)
40K Civilian*TaiwanWin	0.028
	(0.058)
400K Civilian*TaiwanWin	0.024
	(0.055)
Partisanship	-0.047
	(0.046)
Confidence	0.434***
	(0.042)
Female	0.004

(0.118)
0.007
(0.004)
-0.004
(0.017)
0.024
(0.158)
0.229***
(0.031)
0.205
(0.125)
0.041
(0.090)
1.373**
(0.514)
1467

Note: *p<0.1, **p<0.05, ***p<0.001

Figure 2: Marginal Predictions on Willingness to Fight with Interactions



The last hypothesis is whether partisans would react similarly to information about civilian casualties. Table 4 below could help us examine our hypotheses. There is a clear partisan difference. Support for the war among DPP supporters for both civilian casualties categories is

visibly higher than that of their KMT counterparts. This finding supports the view that the public in Taiwan could be influenced by partisanship when making war-support decisions. We also run a few regressions to increase our confidence in our results and rule out the potential confounding effects. In Table 5, the dependent variable is the respondent's support for U.S. intervention. Model 1 set 40,000 military deaths as the baseline and partnership with DPP as the baseline. The second includes an additional interaction between partisanship and the various experimental groups. The third model includes all the sociodemographic variables.

From the first model, we could see that partisanship is more influential than the experimental groups in shaping willingness for war support – KMT supporters are much less willing to support self-defense. Turning over to Model 2, we find that the interaction between KMT and the vignettes was non-significant, suggesting that the difference result largely comes from partisanship. Adding the other control variables did weaken the impact of the partisanship on the outcome, but the direction remains the same.

Table 4: Partisan' Willingness to Defend Taiwan by Scenarios

Respondents' Party ID	KMT	DPP
40K Military	4.68	8.17
40K Civilian	3.84	7.95
400K Military	5.11	8.02
400K Civilian	4.57	8.04

Table 5. Regression Models of Partisan Willingness to Fight

	0	2	<u>U</u>
DV: Willingness to Fight	(1)	(2)	(3)
400K Military	-0.041	-0.154	0.209
	(0.290)	(0.512)	(0.387)
40K Civilian	-0.241	-0.225	0.090
	(0.285)	(0.477)	(0.359)
400K Civilian	-0.263	-0.136	0.028
	(0.288)	(0.514)	(0.386)
KMT	-3.487***	-3.491***	-0.764*
	(0.249)	(0.477)	(0.382)

KMT X 400K Military		0.583	0.142
		(0.708)	(0.536)
KMT X 40K Civilian		-0.571	-0.877
		(0.812)	(0.613)
KMT X 400K Civilian		0.344	0.161
		(0.999)	(0.754)
Female			0.254
			(0.159)
Age			0.016**
			(0.006)
Income			0.001
			(0.023)
Education			-0.178
			(0.232)
US Ally			0.407**
			(0.167)
Taiwanese			0.181
			(0.124)
U.S. Help			0.244***
_			(0.040)
Confidence			0.513***
			(0.040)
Constant	8.179***	8.171***	0.820
	(0.247)	(0.343)	(0.695)
Observations	1472	785	785

Note: *p<0.1, **p<0.05, ***p<0.001

Since interaction effects are challenging to interpret without visualization, we rely on a margins plot to illustrate the interaction between partisanship and treatments. Figure 3 below is based on the results from Model 3. In this figure, the Y axis is the predicted willingness to fight. The X-axis then denotes each of the results from each experimental group. The left box in the left contains results from DPP supporters, while the right displays the results of KMT supporters. Since we are focused only on civilian casualties, we can compare the mean differences between the partisans in Groups 3 and 4. There was a significant difference in Group 3 for both parties (DPP 95% confidence interval: 5.97–6.99; KMT 95% confidence interval: 4.57–5.66). However, the same was not true for Group 4 (DPP 95% confidence interval: 5.84–7.00; KMT 95% confidence interval: 5.02–6.02). Taken together, we can conclude that DPP and KMT partisans react

differently to civilian casualties, but this difference disappears when the number increases dramatically to 400,000.

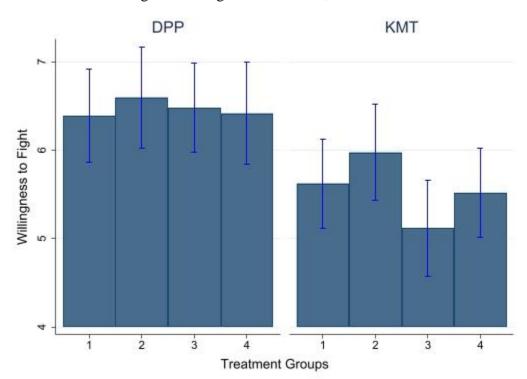


Figure 3: Marginal Predictions, Model 3 of Table 5

Discussion and Conclusion

Does information about military casualties reduce citizens' support for war when the outcome of the war determines their country's survival and future? This is the biggest difference between the case of Taiwan and the existing literature on Western war support, where fighting the war is a necessity rather than a choice. In this paper, we extend and empirically examine core hypotheses on casualties from the Western war support literature to assess their applicability to the context of Taiwan. First, we hypothesize that citizens will retract their support for a conflict as casualties increase. Second, we propose that different types of casualties, such as military versus civilian, will elicit divergent responses from the public. Third, we hypothesize that the perceived likelihood of victory in the conflict will moderate the tolerance for casualties. Finally,

we suggest that partisans react differently to casualty information, varying responses based on political affiliation.

Contrary to studies that assert that war support has various forms of negative linear relationship with casualties (Mueller 1973; Gartner and Segura 1998), we found that the impact of casualties on Taiwanese war support is context-dependent. We found that citizens in Taiwan do not follow the existing patterns of behavior outlined in casualty research; for the citizenry as a whole, higher casualties did not result in a lower willingness for self-defense. Instead, the public appears to be more influenced by the type of casualties—civilian deaths at both levels used in the experiment led to significantly lower support compared to military deaths. In agreement with the existing literature (Gelpi, Feaver, and Reifler 2009), we found evidence that belief in Taiwan's likelihood of success on the battlefield helps bolster citizens' tolerance for increased casualties. Lastly, clear partisan differences emerged, with KMT supporters being more sensitive to battle deaths than DPP supporters, although the difference ceases to exist when the casualties reach a higher level.

From the war support literature, our most significant contribution is that casualty tolerance is largely determined by partisanship, providing a lens through which citizens perceive and determine their attitudes toward war (Bernisky 2009). Boettcher and Cobb (2006) find that certain partisans (Republicans) demonstrated higher levels of tolerance toward casualties. Two decades later, Lee (2022) similarly found that conservatives are less likely to lower their support for military interventions despite mounting casualties. In our case, DPP supporters were much more willing to tolerate higher levels of battle deaths. This finding adds to a growing list of Taiwanese war support that highlights the importance of partisan difference (Wu et al. 2022; Rich, Banerjee, and Tkach 2023; Wang et al. 2024; Wang and Eldemerdash 2023).

Additionally, our work aligns with an emerging number of studies demonstrating the importance of civilian casualties. We support the finding that choosing between military and civilian casualties is domestic; the public seems to pull away their support more when the casualties are civilian (e.g., Walsh 2015). Contrary to Johns and Davies (2019) and Larson and Savych (2006), we do not find evidence to suggest citizens in Taiwan reduce war support with the increase in military casualties. In some cases, higher military casualties were even associated with higher war support. The result makes sense that many citizens in Taiwan are unfamiliar with the military or do not perceive them in a positive light, so they are likely more swayed by casualties that are close to them, their fellow citizens (Althaus, Bramlett, and Gimpel 2012; Davenport 2015; Gartner and Segura 1998).

In terms of the generalizability of our study, we believe that our focus—on a country responding to an invasion where the use of force is a matter of survival—makes our findings transferable to other countries currently or potentially facing invasions, such as South Korea, Palestine, and Ukraine. However, this study has several limitations that should be considered. First, we do not account for the primary policy objective behind the use of force. Existing research has shown that citizens react differently to wars in which Taiwan declares independence versus those in which China unilaterally breaks the status quo (Wu et al., 2022). The justification for the conflict is likely to influence citizens' tolerance for casualties. We do not explore whether U.S. intervention would increase citizens' tolerance for casualties. Another limitation is that, as of January 1st, Taiwan has reinstated one-year mandatory military service and implemented significant changes to military training, including active collaboration with U.S. forces. Since our survey concluded at the end of 2023, we were unable to capture the effects of these structural changes.

References

- Althaus, S. L., Bramlett, B. H., & Gimpel, J. G. (2012). When War Hits Home: The Geography of Military Losses and Support for War in Time and Space. *Journal of Conflict Resolution*, 56(3), 382-412. https://doi.org/10.1177/0022002711422340.
- Berinsky, Adam J. 2009. In Time of War: Understanding American Public Opinion from World War II to Iraq. Princeton, NJ: Princeton University Press.
- Birch, S. (2023), The electoral benefits of environmental position-taking: Floods and electoral outcomes in England 2010–2019. European Journal of Political Research, 62: 95-117. https://doi.org/10.1111/1475-6765.12522
- Bol, Damien, Marco Ginai, André Blais and Peter Loewen. 2021. "The effect of COVID-19 lockdowns on political support: Some good news for democracy." *European Journal of Political Research* 60: 497-505.
- Boittin, Margaret, Cecilia Hyunjung Mo and Stephen Utych. 2019. Can natural disasters have a rally' round the flag effect? The political consequences of Nepal's 2015 earthquake.

 Working paper, UC Berkeley, University of Colorado Boulder, and Boise State University.
- Boucher, J. C. (2010). Evaluating the "Trenton Effect": Canadian Public Opinion and Military Casualties in Afghanistan (2006–2010). *American Review of Canadian Studies*, 40(2), 237–258. https://doi.org/10.1080/02722011003734753
- Chang, Y.-b. (2019). 世代之間的正義與分配:年齡與經濟世代對薪資公平正義認知 [Justice and redistribution among cohorts: Perceptions of just earnings among age and economic cohorts]. Taiwanese Political Science Review, 23(1), 103–158.
- Chong, J. I. "A matter of trust: Understanding limited public support for Taiwan's defense

- reform." *Taiwan in Dynamic Transition: Nation Building and Democratization* (2020): 181-198.
- Chien, Jimmy. (2023, November). Conversations with the Taiwanese about Taiwan's defense.

 Global Taiwan Institute. https://globaltaiwan.org/2023/11/conversations-with-the-taiwanese-about-taiwans-defense/
- Cancian, Mark F., Matthew Cancian, and Eric Heginbotham. 2023. "The First Battle of the Next War: Wargaming a Chinese Invasion of Taiwan." Washington, DC: Center for Strategic and International Studies
- Chowanietz, Christophe. 2010. "Rallying around the flag or railing against the government?"

 Political parties' reactions to terrorist acts." *Party Politics* 17(5): 673-698
- Fazal, T. 2021. Life and Limb: New Estimates of Casualty Aversion in the United States. *International Studies Quarterly* 65 (1): 160–172.
- Friedrich, James, and Tiffany L. Dood. 2009. "How Many Casualties Are Too Many?

 Proportional Reasoning in the Valuation of Military and Civilian Lives. *Journal of Applied Social Psychology* 39 (11): 2541-69.
- Gartner, S. 1997. Strategic Assessment in War. New Haven: Yale University Press.
- Gartner, Scott Sigmund, and Gary M. Segura. 1998. "War, Casualties, and Public Opinion." *Journal of Conflict Resolution* 42(3): 278–300.
- Gartner Scott Sigmund. 2008. "The Multiple Effects of Casualties on Public Support for War:

 An Experimental Approach." *American Political Science Review* 102:95–106.
- Gelpi, Christopher, Peter D. Feaver, and Jason Reifler. 2009. Paying the Human Costs of War:

 American Public Opinion and Casualties in Military Conflicts. Princeton, NJ: Princeton
 University Press.

- Huang, C. (2019). Generation effects? Evolution of independence-unification views in Taiwan, 1996–2016. *Electoral Studies*, 58, 103–112.
- Hamanaka, S. (2018). Sensitivity to Casualties in the Battlefield: The Case of Israel. *Asian Journal of Comparative Politics*, 3(1), 46-60. https://doi.org/10.1177/2057891117725209
- Huang, C., & Kuo, T. ching. (2022). Actual and perceived polarization on independence-unification views in Taiwan. *Asian Journal of Communication*, 32(2), 75–92. https://doi.org/10.1080/01292986.2021.2022174
- Gallup Inc, "Presidential Approval Ratings -- George W. Bush," Gallup.com, January 20, 2008, https://news.gallup.com/poll/116500/presidential-approval-ratings-george-bush.aspx?version=print
- Johansson, Bengt, David Nicolas Hopmann and Adam Shehata. 2021. "When the rally-around the-flag effect disappears, or: when the COVID-19 pandemic becomes 'normalized'." *Journal of Elections, Public Opinion and Parties* 31 (1): 321-334.
- Johns, R., & Davies, G. A. M. (2019). Civilian Casualties and Public Support for Military

 Action: Experimental Evidence. *Journal of Conflict Resolution*, 63(1), 251
 281. https://doi.org/10.1177/0022002717729733
- Lee, Kuan-Chen. Contextual and Situational Influences on Taiwanese Fighting Will: An Empirical Analysis From 2021 to 2023
- Kriner, D., and F. Shen. 2021. The Casualty Gap: The Causes and Consequences of American Wartime Inequalities. New York: Oxford University Press.
- Larson, Eric, and Bogdan Savych. 2006. Misfortunes of war: Press and public reactions to civilian deaths in wartime. Santa Monica: Rand.
- Lazarev, E., Sobolev, A., Soboleva, I. V., & Sokolov, B. (2014). Trial by fire: A natural

- disaster's impact on support for the authorities in rural Russia. *World Politics*, 66(4), 641–668.
- Levendusky, M. S. 2018. "Americans, Not Partisans: Can Priming American National Identity Reduce Affective Polarization?" *Journal of Politics* 80:59–70.
- Lin and Chin 2023. https://www.taipeitimes.com/News/taiwan/archives/2023/02/25/2003795010
- Pape, R.A. (1993) 'Why Japan Surrendered', International Security, 18(2), pp. 154–201.
- Komiya, Y. (2019). Casualty sensitivity in Japan: Information underlying certainty and uncertainty. *International Area Studies Review*, 22(3), 258-276. https://doi.org/10.1177/2233865919833978
- Mueller, John E. 1973. War, presidents and public opinion. New York: John Wiley.
- Vigers, B. (2023). 'Ukrainians Stand Behind War Effort Despite Some Fatigue'. Gallup.Com. 9

 October. Available at: https://news.gallup.com/poll/512258/ukrainians-stand-behind-war-effort-despitefatigue.aspx (accessed 6 December 2023).
- Wang, A. H. E., Wu, C. K. S., Yeh, Y. Y., & Chen, F. Y. (2023). High-level visit and national security policy: Evidence from a quasi-experiment in Taiwan. *International Interactions*, 49(1), 132–146. https://doi.org/10.1080/03050629.2023.2162512
- Wu, Charles K.S., Austin Horng-En Wang, Yao-Yuan Yeh, and Fang-Yu Chen. 2022. "Public Support for the Use of Force in Non-Western and Non-Major Powers: The Case of a China-Taiwan War." *International Political Science Review*.
- Wu, Wen-Chin, Mao-Chia Sun, Wen-Cheng Fu, and Wen-Jian Huang. 2023. "Taiwanese Public Opinion on the Chinese and U.S. Military Presence in the Taiwan Strait." The China Quarterly, April 1–14. https://doi.org/10.1017/s0305741023000218.
 Yang 2019.

https://tw.news.yahoo.com/%E5%85%A9%E5%B2%B8%E8%8B%A5%E9%96%8B% E6%88%B0-

<u>%E5%8F%B07%E5%A4%A9%E5%85%A7%E6%81%90%E6%AD%BB24%E8%90%</u>
AC%E4%BA%BA-215003714--finance.html

- Yeh, Yao-Yuan, and Charles K S Wu. 2019. "When War Hits Home: Taiwanese Public Support for War of Necessity." *International Relations of the Asia-Pacific* 21 (2): 265–93. https://doi.org/10.10 93/irap/lcz023.
- Wang, A. H.-E., & Eldemerdash, N. (2023). National identity, willingness to fight, and collective action. *Journal of Peace Research*, 60(5), 745-759. https://doi.org/10.1177/00223433221099058
- T.Y. Wang, Su-feng Cheng; Strategic Clarity and Taiwanese Citizens' Confidence in the U.S. Security Commitment. Asian Survey 1 February 2024; 64 (1): 54–78. doi: https://doi.org/10.1525/as.2023.2017828
- Walsh, James Igoe. 2015. "Precision Weapons, Civilian Casualties, and Support for the Use of Force." Political Psychology 36 (5): 507-23.
- Chung-li Wu, Alex Min-Wei Lin, Will the United States come to Taiwan's defense? Analysis of public opinion in Taiwan and the United States, *International Relations of the Asia-Pacific*, Volume 24, Issue 1, January 2024, Pages 131–170, https://doi.org/10.1093/irap/lcac013
- Ramos, Roberto and Carlos Sanz. 2020. "Backing the incumbent in difficult times: The electoral impact of wildfires." *Comparative Political Studies* 53(3): 469–499.
- Rich, Timothy S., Vasabjit Banerjee, Benjamin Tkach; How Has the War in Ukraine Shaped

Taiwanese Concerns about Their Own Defense? Asian Survey 1 December 2023; 63 (6):

952–979. doi: https://doi.org/10.1525/as.2023.2010035