

CDDRL

WORKING PAPERS

Number 144
October 2013

The Mexican War on Drugs: Crime and the Limits of Government Persuasion

Beatriz Magaloni

Stanford University

Alberto Díaz-Cayeros

Stanford University

Vidal Romero

Instituto Tecnológico Autónomo de México

Center on Democracy, Development, and The Rule of Law
Freeman Spogli Institute for International Studies



Additional working papers appear on CDDRL's website: <http://cddrl.stanford.edu>.

Center on Democracy, Development,
and The Rule of Law
Freeman Spogli Institute for International Studies
Stanford University
Encina Hall
Stanford, CA 94305
Phone: 650-724-7197
Fax: 650-724-2996
<http://cddrl.stanford.edu/>

About the Center on Democracy, Development and the Rule of Law (CDDRL)

CDDRL was founded by a generous grant from the Bill and Flora Hewlett Foundation in October in 2002 as part of the Stanford Institute for International Studies at Stanford University. The Center supports analytic studies, policy relevant research, training and outreach activities to assist developing countries in the design and implementation of policies to foster growth, democracy, and the rule of law.

**The Mexican War on Drugs:
Crime and the Limits of Government Persuasion¹**

Beatriz Magaloni (Stanford University), magaloni@stanford.edu

Alberto Díaz-Cayeros (Stanford University), albertod@stanford.edu

Vidal Romero (Instituto Tecnológico Autónomo de México), vromero@itam.mx

Abstract

In order to successfully battle organized crime, governments require a certain degree of citizens' support. Governments are sometimes able to influence citizens' opinions, but sometimes they are not. Under what circumstances do pro-government frames influence citizens' opinions? Will individuals who are victims of crime be equally sensitive to frames than those who are not? We argue that crime victimization desensitizes citizens to pro-government frames. This further complicates governments' fights against criminals, creating a vicious circle of insecurity, distrust, and frustrated policy interventions. To test our argument, we conducted a frame experiment embedded in a nationwide survey in Mexico. The empirical evidence supports our argument in most circumstances; yet, desensitization is moderated by low media-exposure and identification with the president's party.

Keywords: Frame effects, persuasion, survey experiments, Mexico, crime, war on drugs.

¹ Paper prepared for delivery at the 2013 Annual Meeting of the American Political Science Association, August 29-September 1, 2013. Beatriz Magaloni thanks the support from the Center on Democracy, Development and the Rule of Law (CDDRL) at Stanford University. Alberto Díaz-Cayeros thanks the Freeman Spogli Institute at Stanford University. Vidal Romero thanks the Asociación Mexicana de Cultura A.C., and the Sistema Nacional de Investigadores of Conacyt.

Drug related crime and violence have become increasingly worrisome phenomena in many countries around the world. Large-scale violence is mostly related to the ubiquitous presence of criminal organizations. In most developed countries, crime and violence tend to be limited to particular settings; this minimizes negative externalities to society as a whole. Developing countries, on the other hand, suffer the presence of organized crime in many aspects of daily life, and it is far less geographically contained. This situation threatens citizens' lives and property, but perhaps more importantly, it also threatens the survival of democratic states (Unodc, 2011)

The Mexican case is a troubling example. According to data from Mexico's Public Security National System, between 2007 and 2012 there were more than 60,000 homicides related to criminal activities. Around 160,000 people in Mexico have been physically displaced due to safety concerns (IDMC, 2012). It is estimated that in the first semester of 2011, criminals extorted one out of every ten citizens, a disturbingly similar proportion to those who were extorted by the police (Magaloni et al., 2012).

Drug trafficking organizations (DTOs henceforth) have proven to be very resilient, enduring local and global market changes, and a wide variety of governmental policies. High profits associated with the drug trade have created strong incentives for these organizations to adapt and survive.

In order for governments to have a realistic opportunity of fighting criminal organizations effectively, they require a measure of support from their citizens, be it active or passive (Berman et al., 2011; Bullock et al., 2011; Fearon & Laitin, 2003; Lyall et al., 2011; Magaloni et al., 2012). If citizens distrust their governments—for the right or wrong reasons—then most policy interventions may be doomed to fail.

In an environment of mistrust, citizens will tend not to denounce criminals, and they may even cooperate with them. Additionally, incumbent politicians will have a hard time obtaining support for their policies. As a result, negative outlooks become self-fulfilling prophecies: citizens decide that government policy is failing, this weakens their trust in government institutions, less societal trust weakens the government's ability to effectively fight crime, and the likelihood of government success further decreases. Criminal organizations are the winners in this vicious circle. Political incumbents and, most importantly, citizens are the losers.

To gain citizens' support, incumbent politicians take their case to the people, framing viewpoints, policies, and interventions as highly effective (Chong & Druckman, 2007; Kinder & Berinsky, 1999; Sniderman & Theriault, 2004). This is not necessarily easy: individuals have priors determined by information, ideology, or direct experiences that condition their sensitivity to governmental messages. There are limits to the influence of frames on citizens' opinions (Druckman, 2001).

We examine the effects of pro-government frames regarding issues of crime and violence. Under which circumstances do pro-governmental frames influence citizens? What are the limits of government persuasion? What is the effect of crime victimization on an individuals' sensitivity to governmental messages?

To help answer these questions, we develop a theory on the desensitizing effects of crime victimization. The theory identifies specific circumstances under which citizens are not receptive to governmental messages. In a nutshell, we argue that crime victimization is an important limit to a government's capacity to persuade. Individuals who have been victims of a crime become desensitized to pro-government frames. Such a traumatic event on life and/or property decreases an individual's trust in government institutions (Ceobanu et al., 2011; Corbacho et al., 2012;

Cruz, 2008; Fernandez & Kuenzi, 2010). As a result, incumbent politicians' claims of policy success have little effect on victims of crime.

The war on drugs declared by Mexican President Felipe Calderon in December 2006 provides an excellent setting to test our theory. Most Mexican citizens were not directly exposed to crime related violence or to the specific policy intervention. Yet, the strategy implemented by the Calderon administration was exceedingly controversial, igniting a heated debate between the government and those against the policy. Mexicans were exposed to highly conflicting information regarding the strategy's success (or lack thereof) from both the government and its opponents.

To verify our theory empirically, we conducted a frame experiment, which was embedded in a nationwide survey in Mexico in July 2011. We analyzed the effect that pro-government frames have on citizens' assessments of who was winning the war on drugs. The design considers two randomized groups: a treatment group that was exposed to a pro-government frame, and a control group that did not receive the treatment. We then asked individuals in both groups who they thought were winning the war on drugs: the government or the criminal organizations.

We find sufficient evidence to support our theory. Among victims of crime, there is no statistically significant effect of the pro-government frame on declaring that the government is winning the war on drugs. Yet, among non-victims, there is a statistically significant increase in the proportion of individuals assessing that the government is winning the war on drugs. The proportion goes from 26.5% to 33.8%; this represents a 27.6% increase of individuals that responded that the government is winning.

We also tested our argument conditional on three of the most recurrent types of explanations in the literature concerning public support for governments: event-response, information effects,

and elite-cues. Under most circumstances, we found that those who have been victims of a crime are immune to pro-government frames. There are, however, two conditions under which victims are still influenced: when they are exposed to little or no news from the media, or when they identify with the president's political party.

In the next section we present our theory and hypotheses in the context of the existing literature. In the third section, we briefly describe the Mexican war on DTOs launched in December 2006; we then present the results of the frame experiment we conducted. Finally, we discuss the implications of our findings on states' efforts in combating organized crime.

Crime, Trust, and Frame Effects

The existing literature concerning government conflict with organizations that aim to control its territory agrees that a necessary condition for an effective strategy is a significant degree of societal support. Such is the case in civil conflicts (Berman et al., 2011; Bullock et al., 2011; Fearon & Laitin, 2003; Lyall et al., 2011), wars (Berinsky, 2007; Brody, 1991; Gelpi et al., 2006), and the fight against criminal organizations (Magaloni et al., 2012).

Support from society is inherently related to the degree of trust that citizens have in their government. However, crime and violence erode trust in public institutions (Ceobanu et al., 2011; Corbacho et al., 2012; Cruz, 2008; Fernandez & Kuenzi, 2010), and low trust in the government undermines the incumbent's leverage against criminal organizations. Mistrust reduces citizens' incentives to denounce criminals; it also affects incumbents' capabilities by reducing their ability to acquire political support, and funding for their policies.

Trust, as a determinant of citizens' support of governmental policies, becomes paramount in settings in which a significant proportion of citizens does not directly experience all events

related to the issue at hand. Crime and violence tends to be focalized in a few specific localities, and areas within such localities. Under these circumstances, much of public opinion—and thus of citizens' support—is determined by the information that is made available through the media and through word of mouth. Therefore, governments and their opponents have incentives to attempt to influence how information is framed to the public.

A frame is a “central organizing idea or story line that provides meaning to an unfolding strip of events, weaving a connection among them. The frame suggests what the controversy is about, the essence of the issue” (Gamson & Modigliani 1989, p. 143). Frames provide significance to public issues, highlighting certain information, but not other.

There is ample evidence of the effects of frames on individuals' opinions in different settings (Callaghan & Schnell, 2005; Chong & Druckman, 2007; De Vreese, 2012; Kinder & Nelson, 2005; Sniderman & Theriault, 2004). Nevertheless there are limits to the effects of frames. Some individuals are more influenced than others, and some issues are more easily framed than others (Druckman, 2001; Gabrielson, 2005; Kinder & Herzog, 1993; Sniderman & Theriault, 2004). Citizens discriminate between information in favor or against policies according to certain priors. Governments cannot realistically expect citizens to believe everything they advertise.

Few studies exist regarding frame effects on crime related topics. Existing studies for the United States show that race-profiling biases have an impact upon citizens' perceptions of crime (e.g. Hurwitz & Peffley, 1997; Gilliam & Iyengar, 2005). Other work has found that information has a significant effect on perceptions of safety (Ardanaz *et al.*, 2013). However, there are no explanations on the limits of frame effects on citizens' evaluations of crime policy interventions.

A Theory on the Limits of Government Persuasion

Our theory contributes to an understanding of the limits that a government is subject to when it tries to influence public opinion, specifically on issues of crime and violence. Our core hypothesis states that *individuals who have been victims of a crime become desensitized from messages communicating the success of governments' policy interventions on crime and violence (H1).*

The theoretical mechanism we propose goes as follows: personal experiences with crime will trigger an increasing distrust in government institutions. Lack of confidence in government institutions turns the government into an unreliable source of information. As a result, individuals become skeptical of government messages advertising its success in regard to crime policy interventions.

In the literature, there are three types of explanations that are relevant to understanding citizens' approval of the government's performance, and how receptive citizens are to pro-government messages. These explanations are: event-response, information effects, and elite-cues. We argue that citizens' desensitization should hold even in the presence of these three variables.

Event-response theories hold that citizens will evaluate a government's performance by reacting to the current state of affairs. Multiple studies have found evidence of a close relationship between the number of war casualties and support for incumbent governments (e.g. Brody, 1991; Gelpi et al., 2006; Muller, 1973). In regard to public safety, Banerjee *et al.* (2012) found significant effects on citizens' satisfaction with police performance after a successful policy intervention in the Indian state of Rajasthan.

According to the logic of this type of theories, governments have limited capacities to influence citizens' opinions on the success of their performance through the use of frames. A frame is only believable if it matches events.

Therefore, low crime rates should be associated with high sensitivity to pro-government frames. Conditional on our core hypothesis (*H1*), we contend that, *individuals who live in areas with less crime and violence will be more likely to be influenced by pro-government frames, but only if they have not being victims of a crime (H2)*.

The second set of theories that we test is related to **information effects**. Many times, citizens are not witnesses to, or not directly affected by the circumstances the policy intervention is directed at. Politicians, thus, have room to influence citizens' evaluations of government performance through the media. The existing literature has found significant effects of media priming and framing on citizens' attitudes towards armed conflicts (e.g. Berinsky, 2007; Edi & Meirick, 2007; Iyengar & Simon, 1993) and violent events (e.g. Haider-Markel & Joslyn, 2001).

Ardanaz et al. (2013) provide evidence that communicating objective information on crime trends in Bogota has had a significant impact upon citizens' perceptions of public safety. However, crime victimization is a substantial predictor of overestimating public insecurity. There is also evidence, although contested, that long-term exposure to violence in the media makes individuals exaggerate their likelihood of becoming a victim of crime (Potter, 1990, pp. 41-42). Another strand of the literature has found evidence of the potential short-term desensitizing effect of exposure to violence in the media (Potter, 1990, p. 39).

We would expect that overestimating the likelihood of being victimized and/or a desensitizing effect would reduce individuals' sensitivity to government messages. Applied to our inquiry, and conditional on *H1*, we would expect that *as individuals' exposure to media news*

on crime and violence decreases, they would tend to become increasingly sensitized to pro-government frames, but only if they have not been victims of a crime (H3).

Finally, **elite-cues** theories state that citizens would be sensitive to political messages when they come from sources they trust—such as politicians, political parties or others with whom they share ideological positions or other affinities (Druckman, 2001; Popkin, 1991; Sniderman et al., 1991; Zaller, 1992). In these theories, citizens are relatively easy prey to framing, as long as the messages come from the “right” source.

Studies on public opinion dynamics in countries undergoing armed conflicts have found that the source of the message will create significant differences in which combatant citizens endorse. Lyall et al. (2011) use an endorsement experiment to examine support for the International Security Assistance Force and the Taliban in Afghanistan. Bullock et al. (2011) apply the same method to analyze political support for Islamic militant groups in Pakistan.

If it is the case that individuals’ opinions are influenced by sources they trust, then it should be the case that, conditional on *H1*, *if individuals’ trusted sources are pro-government, then they would be more sensitive to pro-government frames, except if they were victims of a crime (H4).*

Public Opinion and the Mexican War on Drugs

The Mexican war on drugs provides an excellent setting for testing our hypotheses on the desensitizing effects of crime victimization. A few days after Mexican President Felipe Calderon of the National Action Party (PAN) took office on December 1st, 2006, he declared war on criminal organizations in Mexico.² The reason, the government argued, was the increase in crime

² See Guerrero (2010), Poiré (2011), and Ríos & Shirk (2011) for different narratives on Mexico’s war on drugs.

levels in the country since the late 1990's. The announcement was well received at that time; a month after Calderon's announcement, 76% of citizens approved the government intervention.³

As the fight between the government and criminal organizations intensified, the number of homicides rapidly increased. By the end of Calderon's administration, the death toll numbered more than 60,000. The gruesome violence used in the assassinations became the trademark of Mexico's war on drugs. Terrible images became common place in the media: dismembered bodies thrown in the middle of busy avenues, men hanged from bridges, decapitated heads left at the entrance of police stations, or dead bodies piled in the middle on highways.⁴

As the body count increased, support for the incumbent decreased. When the conflict began in January 2007, 51% approved and 24% disapproved of the government's performance regarding public safety. By July 2011, approval had dropped to 33% and disapproval doubled to 48%.⁵

Yet, while the issue captured wide national attention, the actual fight against DTOs and the unfortunate violence related to it were concentrated in a few localities. Between 2007 and the end of 2010, 78% of homicides related to organized crime in Mexico were concentrated in only 10% of its municipalities. In contrast, 20% of all municipalities reported zero homicides in the same period; and 55% of municipalities had only between one and four homicides from 2007 to 2010.

³ Data from a survey conducted by the Public Opinion Coordination at the Office of the Mexican Presidency.

⁴ See Proceso (2012) for a quite explicit recompilation of images on Mexico's war on drugs.

⁵ Data from surveys conducted by the Public Opinion Coordination at the Office of the Mexican Presidency.

A majority of citizens became aware of the violence through the mass media, word of mouth, or electronic social networks, with all the potential biases that this may imply. High profile events—such as the 2008 kidnapping and assassination of Fernando Marti, the son of an important businessman; or the massacre of 72 Central and South American immigrants in 2010 in the northern state of Tamaulipas—periodically introduced further “noise” into the public’s assessment of the government’s policy intervention.

Opposition to the Federal Government came from many diverse segments of society: groups representing victims of crime, human rights organizations, opposition parties, academics, and op-ed editorialists at Mexico’s main media networks. While the opposition to the government varied on its specific focus and intensity, all agreed on the point that the government’s intervention had failed, and had resulted in more harm than good (Guerrero, 2010; Escalante, 2010; Merino, 2011).⁶

The Mexican government argued that the interventions were not causing the increase in crime, but rather that the increase in criminal activity had caused the government to intervene. It also portrayed the existing violence as a short-term consequence of the war on drugs, a sort of necessary evil, for the greater good of a future safer society. Additionally, it argued that casualties were mainly criminals working for the drug cartels.

Regardless of the particular merits of the intervention, incumbent government officials were put in a complex position, they had to present their case to the public, but they confronted a

⁶ It should be noted that problems of data availability and quality of the same put a severe limit on reaching definite conclusions on the matter of positive/negative effects of intervention. Other work that presents methodological improvements questions whether this significant violence effect exists (Rosas, 2012; Calderon et al., 2012).

typical problem relating to public policy interventions: proving a negative. That is, they had to convince citizens that things would have been worse if the government had not intervened.

Under these circumstances, winning the hearts and minds of Mexicans, and enticing them to join in the government's efforts against criminal organizations did not seem like an easy endeavor. In the following section we empirically examine the room that the Mexican government had to maneuver and attempt to influence citizens' opinions on its success at fighting criminal organizations.

An Experiment on the Limits of Government Persuasion

In order to explore the limits of government persuasion, we designed a randomized experiment to test for the potential influence that pro-government framing would have on individuals' assessments. In particular, we evaluated the assessment of whether the government or the criminal organizations were winning the war on drugs.

The experiment was embedded in a nationwide face-to-face probabilistic survey conducted in Mexico from July 9 to July 17 of 2011.⁷ It included a control group (n=900) and a treatment group (n=900).⁸ The interviews were conducted at 300 randomly selected sample points, using the list of electoral sections from the Mexican Federal Electoral Institute as our sampling frame.

⁷ The survey was conducted by the Public Opinion Coordination of the Office of the Mexican Presidency. We thank Rafael Giménez and Lorena Becerra for generously facilitating access to the data. The authors participated in the design of the survey.

⁸ The complete survey considered a total of 2,700 cases divided in three experimental groups, each of n=900. For this investigation we utilize two of these groups.

The only exclusion in the sampling frame was the northeastern state of Tamaulipas because of security concerns.⁹

In addition to conducting the interviews and ensuring an adequate randomization of the sample, one of the biggest challenges we faced in implementing the experiments was ensuring the safety of the enumerators. The personnel in charge of the fieldwork took measures to reduce the likelihood of any dangerous situation for the enumerators, while at the same time minimizing the incidence of biases in the information we collected.

The frame items were placed close to the beginning of the questionnaire, and before any performance evaluation item; thus, we do not have any reason to suspect potential contamination of the interviewees' responses. We pre-tested the questionnaire in a pilot survey three weeks before the actual survey to calibrate the frames' wording, validity, and length. The issue does not place excessive requirements on individuals' cognition, since it is a widely known subject. We have, thus, sufficient confidence in the validity of the experiment.

When constructing the pro-government frame that we tested, we followed Entman's (1993, p. 52) *selection* and *salience* characteristics: "To frame is to select some aspects of a perceived reality and make them more salient in a communicating text, in such a way as to promote a particular problem definition, causal interpretation, moral evaluation, and/or treatment recommendation for the item described." The frame's content replicates the main discourse of the Federal Government, which emphasized the capture of DTOs kingpins as the "right" way of evaluating success in the fight against organized crime. The capture of drug lords was highly publicized in the media, and the government ran intensive ad campaigns in radio and television

⁹ However, Tamaulipas accounts for only 2.9% of Mexico's total population. Thus, if any bias exists due to the exclusion of Tamaulipas, its effect on our results should be trivial in magnitude.

showcasing the captures as proof of the progress it was making on fighting DTOs. The information we provided highlighted the government's argument, but was not new information. Our frame was designed to influence people to think about the war on drugs in terms of government captures of DTOs bosses. It reads as follows:

Felipe Calderon's government has been characterized for its open fight against drug trafficking. During his administration, the most important captures of powerful and dangerous leaders of criminal organizations have taken place, from hit men up to the bosses of cartels and criminal organizations. Among the apprehended are Édgar Valdez Villarreal alias "La Barbie", José Gerardo Álvarez Vázquez alias "El Indio", Vicente Zambada Niebla alias "El Vicentillo", and Francisco Javier Arellano Félix alias "El Tigriillo".

After exposing individuals in the treatment groups to the frame, and no-exposure for those in the control group, the survey asked all individuals in sample the following question: *In the Federal Government's fight against organized crime, who do you believe is winning: the Federal Government or the organized crime?*

The treatment effect for individual i (δ_i) results from the difference between the expected value of our outcome of interest (Y_i)—in this case whether the government, or the criminal organizations, are winning the fight—in two different states of the world determined by the treatment ($T=j$), that is Y_{ij} conditional on a set of observable variables (X_i) that partially determine Y_i , such that, $\delta_i = E(Y_{i1}|X_i, T_i=1) - E(Y_{i0}|X_i, T_i=0)$.

There is evidence of a frame effect if the proportion of individuals that responded that the government or the criminal organizations are winning the war on drugs is statistically different in the treatment group ($T=1$) than it is in the control group ($T=0$).

Balance

In our design, if the groups' randomization produces a sufficient statistical balance between the control and the treatment groups, the treatment effect is the difference in the proportion of individuals (i) that answered that the government is winning the war in the treatment group ($T=1$) and the proportion of individuals that also responded that the government is winning in the control group ($T=0$). That the experimental groups are balanced implies that, $E(X_i|T_i=1) = E(X_i|T_i=0)$.

An adequate group balance implies that the experimental groups are equivalent in the relevant characteristics that may determine their opinion on who is winning the war on drugs, except for whether they received the pro-government treatment or no treatment at all.

To test for our groups balance, we specified a logit regression model using as dependent variable whether the individual had received the treatment or not; as independent variables we utilize a set of variables that approximate the characteristics that may affect individuals' sensitivity to frames. If the distribution of these variables differs in the treatment group as compared to the control group, then the difference in proportions between our experimental groups could not be fully attributed to exposure to the frame. The model considers fixed effect by state and standard errors clustered by municipality.

In the regression model, all coefficients are statistically not significant, implying that our groups are well balanced. Thus, we have no reason to distrust our results, within the certainty of the statistical methods we use. The complete regression results are shown in the Appendix (Table A1).

Results

To verify our hypotheses, provided adequate balance, we conducted difference-in-proportions tests between individuals in the control and in the treatment groups who answered that either the government or the criminal organizations were winning the war on drugs. The baseline frequencies in the control group are as follows: 26.5% answered the Federal Government is winning, 53.2% answered the criminal organizations are winning, the remaining 20.3% either answered that they “do not know”, that “neither is winning”, or declined to provide an answer.

At the most aggregated level, we find that the pro-government frame induced a 5.3% percent increase ($p < .01$) on the proportion of individuals responding that the government is winning the war. This represents a 20% increase from the baseline of 26.5%. The proportion of individuals answering that organized crime is winning was reduced due to frame exposure in 2.6%, yet this difference is not statistically significant.

Changes in citizens' positions on an issue induced by exposure to frames imply that a proportion of them are ambivalent about the matter at hand. They may have “good” motives both to favor and to oppose the issue, depending upon the particular argument that is highlighted (Sniderman & Theriault, 2004). Therefore, politicians have spaces available to persuade their fellow citizens. Yet, as we show in the following sections, there are limits to this as well.

To verify our theory on the limits of frames, we conducted tests at two levels of segmentation. First, we compared individuals who were victims of a crime and those who were not both in the control and treatment groups. According to the survey we use, a disturbing 46% of Mexicans reported being victims of at least one crime in the year previous to the survey.

Second, we provided a more robust test of our theory by segmenting our sample using variables that approximate the three main explanations in the literature concerning citizens' support of incumbent governments. We then further segmented by whether the individuals were victims of crime or not.

The results support our theoretical expectations at both levels of segmentation. Table 1 shows the difference-in-proportion tests at the first level. As compared to non-victims in the control group, non-victims who were exposed to the pro-government frame showed a significantly higher proportion of individuals answering that the government is winning the war on drugs, 7.3% more ($p < .01$), and a lower proportion answering that the organized crime is winning, 5.1% less ($p < .10$). On the other hand, the pro-government frame did not have an effect upon victims of crime, since the differences between the treatment and control groups are non-significant (Table 1).¹⁰

[Table 1 about here]

If our theory holds, being victim to a crime should inure citizens from pro-government frames, even in population segments that the literature has proven to be more sensitive to frames and more supportive of the incumbent government. In the following paragraphs we show the tests' results for variables approximating the three different explanations in the literature: event-response, information effects, and elite-cues.

¹⁰ For space reasons we do not show the differences in proportions for all the categories of response to facilitate reading of the tables for this and all subsequent tables. The complete output is available upon request to the authors.

Event-Response. We posited that individuals who live in areas with less crime will be more likely to be influenced by pro-government frames, but only if they have not being victims of a crime (*H2*).

We approximated the crime and violence context by using the number of homicides related to criminal activities at the municipal level from December 2006, when president Calderon declared the war on drugs, up to June 2011, the month previous to the survey's interviews. We used data from Mexico's Public Security National System. Three categories were created: the first category, "non-violent", includes individuals living in the first three quartiles of cumulative homicides, which covers municipalities with zero to four homicides in the period we analyze. The second category, "violent", includes individuals living in municipalities with a number of homicides above the third quartile and up to the 99.8% of Mexican municipalities. Finally, the third category, "extremely violent", contains individuals in the top 0.02% most violent municipalities, which consists of the four municipalities with the highest number of homicides. These four cases jump in the distribution, and we considered them worthy of their own category.

Table 2 shows the results of the difference-in-proportion tests. The columns in Table 2 show the difference in proportions for the full sample and for the segments of victims and non-victims, and its significance level.

[Table 2 about here]

We find that only individuals living in extremely violent places are sensitive to pro-government frames; it is a very strong effect, twice the size of the effect that the frame has on the overall population.

However, once we segment the sample by victimization, we find no effect of pro-government frames at any level of violence, which confirms our theoretical expectations on this matter. Pro-government frames do influence individuals who have not been victims of crimes in both violent and extremely violent places. Contrary to what could be expected, based on event response theories, contextual violence does not predispose individuals against the incumbent.

More intriguing is the absence of frame effects on individuals inhabiting non-violent communities. Our initial hypothesis is that these individuals have a more steady assessment of the war on drugs, absent the noise generated by a local violent context. Further research should look into this finding.

Information Effects. Based on the literature, we stated that low exposure to crime-related information should be associated with a higher acceptance of pro-government frames; yet, this sensitizing effect should not occur if the individual was the victim of a crime.

We approximate this hypothesis by using two variables. First, we use the level of news consumption at the individual level, which we measure on the basis of an additive index of the number of days that individuals reported to having been exposed to news through television, radio, and newspapers. From this index we produced two categorical variables: “low exposure”, comprising cases up to the first quartile of this index, and “high exposure”, encompassing cases in the fourth quartile.

Second, we measured whether the individual was exposed to explicit images of violence in television, newspapers, or the internet in the week previous to the survey interview. Of the sample, 54% reported they were exposed to explicit images in at least one of these sources.

Table 3 presents the results of the difference-in-proportion tests that we conducted. Individuals in the high news consumption category conform to our theoretical expectations: if

they were victims of a crime, pro-government frames did not influence them. Yet, high consumption by itself does not immunize individuals against frame effects.

Interestingly, when news consumption is low, there is no evidence of desensitization among victims of crime. We hypothesize that this segment should be relatively uncontaminated, and thus relatively more receptive to messages—likely not only from the government, but also from other sources—even if they have been victims of a crime.

[Table 3 about here]

Regarding exposure to explicit violence images in the media, we do not find evidence showing that it induces desensitization. Individuals exposed to violence, and those not exposed to violence, are receptive to pro-government frames at very similar rates. However, as our theory predicted, crime victimization desensitizes individuals from pro-government frames regardless of exposure. As we can see from Table 3, the frame does not affect victims of crime.

Elite-Cues. Finally, we tested for elite-cues arguments. We approximate elite-cues using two variables: presidential approval, and identification with the president’s party, the PAN. We posited that those individuals closer to the incumbent should be more sensitive to pro-government frames. This would consist of those who approve of the president, and “panistas”. However, if they were the victims of a crime, we should not observe any frame effect (*H4*).

Table 4 presents the difference-in-proportions tests for these two variables and for victimization.

[Table 4 about here]

We find that presidential approval does not work the way that elite-cues explanations would predict it to. The frame influenced both those who approve of the president and those who do not, and in similar proportions. And, as our theory predicted, victims of a crime were insulated from pro-government frame effects, even if they approved of the president (Table 4).

With regard to party identity, our results mostly conform to the elite-cues predictions. The frame we tested influenced the opinion of both panistas and non-panistas, but the effect on panistas was twice as large.

Once we further segmented the population by victimization to test for our core hypotheses, we found a rather robust effect of the frame on panistas that have been victims of crime. This implies that partisanship prevents individuals from becoming inured to pro-government frames. Non-panistas, as we expected, become insulated from pro-government frames when they have been victims of a crime.

An alternative hypothesis may assume that population segments closer to the incumbent would not be affected by pro-government frames because they would support the government policy intervention regardless of the additional impulse that the frame provides. These results show otherwise. It is a rather complicated public opinion environment for a government, in which even supposedly empathetic segments require an additional incentive to demonstrate their support.

Conclusions

In this paper we delve into the limits of governmental influence on public opinion regarding policy interventions on issues of crime and violence. Our main argument is that individuals will

become desensitized to pro-government messages on a particular issue if they have directly suffered the condition that the public policy is claiming to fight against. In this case, we examine the impact of pro-government messages upon victims of crime.

Our results indicate that, under many conditions, victims of crime do become desensitized to pro-government frames regarding public policies against criminal organizations. We find that only low levels of news consumption and/or identification with the president's party mitigate this desensitizing effect of victimization. In terms of policy-making, this is of not much help for a government trying to make its case to its citizens. A government in a democratic state would have a hard time limiting news consumption, and support from partisans is almost a given, since this segment would likely support the incumbent's policy at some point.

This is not an easy scenario for governments. Citizens' support is a necessary condition for the state to successfully fight criminal organizations. In a scenario like the one Mexico is facing, in which a high proportion of the population has been victim of a crime, most government propaganda is doomed to fail.

The implications of this paper are noteworthy. The conjunction of poor government performance and distrust in government institutions is a perfect recipe for the erosion of democracy (Diamond 1999; Lagos 2001). Lack of credibility for governments' actions turns anti-government arguments into a self-fulfilling prophecy: citizens believe that the government is failing in its fight against criminal organizations and decrease their support for the government. Less societal support means a weaker government is fighting organized crime, as a consequence, the likelihood of government success further decreases, creating the conditions for crime and violence to reproduce.

References

- Ardanaz, M., Corbacho, A. Ibarra, P. & Ruiz-Vega, M. (2013). *Mind the Gap: Bridging Perception and Reality with Crime Information*. (Inter-American Development Bank Working paper).
- Banerjee, A., Duflo, E., Keniston, D., & Singh, N. (2012). Making Police Reform Real: The Rajasthan Experiment (Working paper).
- Berinsky, A. J. (2007). *Assuming the Costs of War: Events, Elites, and American Public Support for Military Conflict*. *The Journal of Politics*, 69(4), 975-997
- Berman, E., Shapiro J. N., & Felter, J. H. (2011). Can Hearts and Minds Be Bought? The Economics of Counterinsurgency in Iraq. *Journal of Political Economy*, 119(4), 766-81.
- Brody, R. A. (1991). *Assessing the President*. Stanford. CA: Stanford University Press.
- Bullock, W., Imai K., & Shapiro, J. N. (2011). Statistical Analysis of Endorsement Experiments: Measuring Support for Militant Groups in Pakistan. *Political Analysis*, 19(4), 363-384.
- Calderon, G., Magaloni, B., Diaz-Cayeros, A., & Robles, G. (2012). *The Beheading of Criminal Organizations and the Dynamics of Violence in Mexico's Drug War*. (Working paper).
- Callaghan, K., & Schnell, F. (2005). Introduction: Framing Political Issues in American Politics. In K. Callaghan & F. Schnell (Eds.), *Framing American Politics*. Pittsburgh, PA: University of Pittsburgh Press.
- Ceobanu, A. M., Wood, C. H., & Ribeiro, L. (2011). Crime Victimization and Public Support for Democracy: Evidence from Latin America. *International Journal of Public Opinion Research*, 23(1), 56-78.
- Chong, D., & Druckman, J. N. (2007). A Theory of Framing and Opinion Formation in Competitive Elite Environments. *Journal of Communication*, 57, 99-118.

- Corbacho, A., Philipp, J., & Ruiz-Vega, M. (2012). *Crime and Erosion of Trust. Evidence for Latin America* (Inter-American Development Bank Working paper).
- Cruz, J. M. (2008). The Impact of Violent Crime on the Political Culture of Latin America: The Special Case of Central America. In M. A. Seligson, (Ed.), *Challenges to Democracy in Latin America and the Caribbean: Evidence from the Americas Barometer 2006-2007*. Vanderbilt University.
- de Vreese, C. H. (2012). New Avenues for Framing Research. *American Behavioral Scientist*, 56, 365-375.
- Diamond, L. (1999). *Developing Democracy. Toward Consolidation*. Baltimore, MA: The John Hopkins University Press.
- Druckman, J. N. (2001). On the Limits of Framing Effects: Who Can Frame? *The Journal of Politics* 63(4), 1041-1066.
- Entman, R. M. (1993). Framing: Toward Clarification of a Fractured Paradigm. *Journal of Communication*, 43(4), 51-58.
- Escalante, F. (2011, March). Homicidios 2008-2009. La Muerte Tiene Permiso. *Nexos en Línea*. Retrieved from <http://www.nexos.com.mx/?P=leerarticulo&Article=1943189>.
- Fearon, J. D. & Laitin, D. D. (2003). Ethnicity, Insurgency, and Civil War. *American Political Science Review*, 97(1), 75-90.
- Fernandez, K. E. & Kuenzi, M. (2010). Crime and Support for Democracy in Africa and Latin America. *Political Studies*, 58, 450–471.
- Gabrielson, T. (2005). Obstacles and Opportunities: Factors that Constrain Elected Officials' Ability to Frame Political Issues. In K. Callaghan and F. Schnell (Eds.), *Framing American Politics*. Pittsburgh, PA: University of Pittsburgh Press.

- Gamson, W. A., & Modigliani, A. (1989). Media Discourse and Public Opinion on Nuclear Power: A Constructionist Approach. *American Journal of Sociology*, 95, 1–37.
- Gelpi, C., Feaver P. D., & Reifler, J. (2006). Success Matters: Casualty Sensitivity and the War in Iraq. *International Security*, 30(3), 7–46.
- Gilliam, F. D. & Iyengar, S. (2005). Super-Predators or Victims of Societal Neglect? Framing Effects in Juvenile Crime Coverage In K. Callaghan and F. Schnell (Eds.), *Framing American Politics*. Pittsburgh, PA: University of Pittsburgh Press.
- Guerrero, E. (2010). *Security, Drugs and Violence in Mexico: A Survey*. Paper presented at the Sixth North American Forum 2010, San Miguel de Allende, Mexico.
- Haider-Markel, D. P., & Joslyn, M. R. (2001). Gun Policy, Opinion, Tragedy, and Blame Attribution: The Conditional Influence of Issue Frames. *The Journal of Politics*, 63(2), 520–543.
- Hurwitz, J., & Peffley, M. (1997). Playing the Race Card in the Post-Willie Horton Era. The Impact of Racialized Code Words on Support for Punitive Crime Policy. *Public Opinion Quarterly*, 69(1), 99-112.
- Internal Displacement Monitoring Centre (2012). *Internal Displacement in the Americas*. Retrieved April 10, 2013, from <http://www.internal-displacement.org/publications/global-overview-2012-americas.pdf>
- Kinder, D. & Berinsky, A. (1999). Making Sense of Issue through Frames. *The Political Psychologist*, 4(2), 3-8.
- Kinder, D. R. & Nelson, T. E. (2005). Democratic Debate and Real Opinions. In K. Callaghan and F. Schnell (Eds.), *Framing American Politics*. Pittsburgh, PA: University of Pittsburgh Press.

- Kinder, D. R., & Herzog, D. (1993). Democratic Discussion. In G. E. Marcus and R. L. Hanson (Eds.), *Reconsidering the Democratic Public*. University Park, PA: Pennsylvania State University Press.
- Lagos, M. (2001). Between Stability and Crisis in Latin America. How People View Democracy. *Journal of Democracy*, 12(1), 137-145.
- Lyall, J., Imai, K., & Blair, G. (2011). *Explaining Support for Combatants during Wartime: A Survey Experiment in Afghanistan*. Typescript.
- Magaloni, B., Díaz-Cayeros, A., Romero, V., & Matanock, A. (2012). *The Enemy at Home: Exploring the Social Roots of Criminal Organizations in Mexico* (Working paper).
- Merino, J. (2011, June 1). Los Operativos Conjuntos y la Tasa de Homicidios: Una Medición. *Nexos*. Retrieved from <http://www.nexos.com.mx/?P=leerarticulo&Article=2099329>
- Mueller, J. E. (1973). *War, Presidents, and Public Opinion*. New York: Wiley.
- Poire, A. (2011, February 1). Los Homicidios y la Violencia del Crimen Organizado. *Nexos en Línea*. Retrieved from <http://www.nexos.com.mx/?P=leerarticulo&Article=2047020>
- Popkin, S. L. (1991). *The Reasoning Voter: Communication and Persuasion in Presidential Campaigns*. Chicago: University of Chicago Press.
- Potter, W. J. (1999). *On Media Violence*. Thousand Oaks, CA: Sage.
- Proceso (2012, October). El Sexenio de la Muerte. Memoria Gráfica del Horror. Special Edition.
- Ríos, V. & Shirk, D. (2011). *Drug Violence in Mexico. Data and Analysis through 2010*. San Diego, CA: University of San Diego, Trans-Border Institute.
- Rosas, G. (2012, January 5). Los Numeros de la Guerra: ¿Error de Cálculo Político o Estadístico? Respuesta a Jose Merino. *Nexos*. Retrieved from <http://redaccion.nexos.com.mx/?p=3698> (accessed April 19, 2012).

- Sniderman, P. M., & Theriault, S. M. (2004). The Structure of Political Argument and the Logic of Issue Framing. In W. E. Saris and P. M. Sniderman (Eds.), *Studies in Public Opinion*. Princeton, NJ: Princeton University Press.
- Sniderman, P. M., Brody, R. A., & Tetlock, P. E. (1991). *Reasoning and Choice: Explorations in Political Psychology*. Cambridge, UK: Cambridge University Press.
- United Nations Office on Drugs and Crime (2012). *World Drug Report*. Retrieved October 15, 2012, from <http://www.unodc.org/unodc/en/data-and-analysis/WDR-2012.html>
- Zaller, J. R. (1992). *The Nature and Origins of Mass Opinion*. New York: Cambridge University Press.

List of Tables and Figures

Table 1- Frame Effects by Victimization.

		PROPORTION (%)		DIFFERENCE (%)
		Control	Treatment	
CRIME VICTIMS (n=716)				
<i>The (...) is</i>	Federal Government	22.4	24.6	2.2
<i>winning</i>	Organized crime	58.9	60.1	1.1
NON-CRIME VICTIMS (n=1043)				
<i>The (...) is</i>	Federal Government	29.4	36.7	7.3***
<i>winning</i>	Organized crime	49.2	44.2	-5.1*

* p < .10, ** p < .05, *** p < .01.

Table 2- Frame Effects by Level of Violence and Victimization.

		DIFFERENCE (%)		
		Full sample	Victims	Non-victims
NON-VIOLENT (n=212)				
<i>The (...) is</i>	Federal Government	1.9	11.3	-3.7
<i>winning</i>	Organized crime	-6.6	-6.4	-6.6
VIOLENT (n=1128)				
<i>The (...) is</i>	Federal Government	3.3	-0.6	6.0**
<i>winning</i>	Organized crime	1.1	4.5	-1.5
EXTREMELY VIOLENT (n=419)				
<i>The (...) is</i>	Federal Government	12.3***	5.2	17.7***
<i>winning</i>	Organized crime	-10.3**	-3.4	-15.0**

Note: Entries are differences in proportions of the treated group minus the control group.

* p < .10, ** p < .05, *** p < .01.

Table 3- Frame Effects by Approval, Party Identification, and Victimization.

		DIFFERENCE (%)		
		Full sample	Victims	Non-victims
APPROVE (n=975)				
<i>The (...) is</i>	Federal Government	4.2*	0.5	6.8**
<i>winning</i>	Organized crime	-1.1	1.2	-2.9
DISAPPROVE (n=450)				
<i>The (...) is</i>	Federal Government	5.9**	0.7	11.5***
<i>winning</i>	Organized crime	-3.8	-0.6	-5.8
PID: PANISTA (n=394)				
<i>The (...) is</i>	Federal Government	9.5**	11.0*	9.3*
<i>winning</i>	Organized crime	-4.4	-10.9*	-0.8
PID: NON-PANISTA (n=1,332)				
<i>The (...) is</i>	Federal Government	4.5**	-0.8	7.5**
<i>winning</i>	Organized crime	-2.6	5.1	-7.0**

Note: Entries are differences in proportions of the treated group minus the control group.

* $p < .10$, ** $p < .05$, *** $p < .01$.

Table 4- Frame Effects by Exposure to News, Violence Images, and Victimization.

		DIFFERENCE (%)		
		Full sample	Victims	Non-victims
NEWS CONSUMPTION: LOW (n= 472)				
<i>The (...) is</i>	Federal Government	9.7***	14.5**	7.0*
<i>winning</i>	Organized crime	-9.9**	-5.0	-10.5**
NEWS CONSUMPTION: HIGH (n=500)				
<i>The (...) is</i>	Federal Government	3.6	-2.4	10.5**
<i>winning</i>	Organized crime	1.4	1.9	0.6
NOT-EXPOSED TO VIOLENCE (n=804)				
<i>The (...) is</i>	Federal Government	5.0*	6.5	4.6
<i>winning</i>	Organized crime	-4.3	-0.8	-6.0*
EXPOSED TO VIOLENCE (n=955)				
<i>The (...) is</i>	Federal Government	5.2**	-0.6	10.5***
<i>winning</i>	Organized crime	0.7	3.2	-4.0

Note: Entries are differences in proportions of the treated group minus the control group.

* $p < .10$, ** $p < .05$, *** $p < .01$.

Appendix

Table A1- Balance across experimental groups.

Logit regression models, clustered by state and fixed effects by municipality.

Dependent variable: Treatment group.

n = 1,334, **Log pseudolikelihood** = -23177845, **Pseudo R²** = 0.0472

	Coef.	Std. Err.	P>z	Variable description
Woman	0.243	0.191	0.204	Sex.
Age	-0.009	0.006	0.163	Continuous age.
Education: Low	-0.103	0.260	0.691	None and elementary.
Education: High	-0.181	0.267	0.498	High school and above.
Income: \$1,501 - \$3,000 pesos	0.022	0.251	0.929	Self-reported income.
Income: \$3,001 - \$6,000 pesos	-0.066	0.253	0.795	Self-reported income.
Income: \$6,001 - \$12,000 pesos	0.123	0.362	0.734	Self-reported income.
Income: More than \$12,000 pesos	-0.511	0.436	0.241	Self-reported income.
Approve	0.398	0.245	0.104	Presidential approval.
Not approve nor disapprove	-0.408	0.359	0.256	Presidential approval.
Violence: Medium	0.353	0.307	0.249	Municipalities in the top 75% to 99.98% in homicides.
Violence: High	0.351	0.297	0.237	0.02% municipalities with most homicides.
Panista	-0.341	0.242	0.158	Party identification.
Interview rejection	-0.028	0.030	0.353	Rejections before each successful interview.
Media exposure index	-0.019	0.012	0.122	Additive index of the number of days that individuals were exposed to news in newspapers, TV, and radio.
Social networks index	-0.014	0.024	0.556	Social connectedness based on the number of known individuals with a given first name, on the basis of Magaloni et al., (2012).
Crime victim	0.043	0.174	0.802	Dummy variable on whether the individual was the victim of a crime in the previous 6 months.
Constant	0.091	0.447	0.838	