Making Sense of Issues Through Media Frames: Understanding the Kosovo Crisis

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How do people make sense of politics? Integrating empirical results in communication studies on framing with models of comprehension in cognitive psychology, we argue that people understand complicated event sequences by organizing information in a manner that conforms to the structure of a good story. To test this claim, we carried out a pair of experiments. In each, we presented people with news reports on the 1999 Kosovo crisis that were framed in story form, either to promote or prevent U.S. intervention. Consistent with expectations, we found that framing news about the crisis as a story affected what people remembered, how they structured what they remembered, and the opinions they expressed on the actions government should take.

If, as Walter Lippmann once wrote, politics is a "swarming confusion of problems" (1925, 24), how do ordinary people make sense of it? Lippmann wasn't so sure that they ever did. Preoccupied with private affairs, assaulted by the clamor of modern life, parochial in interest and modest in intellect, common citizens, as Lippmann portrayed them, were no match for the complicated and messy business of politics.

Perhaps Lippmann was right, but his argument was all conjecture: he had no empirical method, no theory of mass communications, and no model of the mind. Now we have all three, and so one might expect, by this time, good answers to Lippmann's question. But in the vast and impressive scholarship devoted to public opinion, we have managed to learn surprisingly little about how people make sense of politics. With a few notable exceptions, understanding has been passed over as a subject fit for investigation.

Our purpose here is to set the foundation for a theory of political understanding. We do so by integrating recent developments in communication studies and cognitive psychology. By "political understanding" we mean the process by which citizens grasp meaning, and we will look for evidence of understanding in how well citizens organize and retain information. We argue that seemingly subtle differences in the presentation of identical information in the news media can affect the organization and recall of information and ultimately influence political judgments.

First we take up the literature in communication studies on framing: on how elites compete to define issues their way and how such definitions—or "frames in discourse"—are disseminated to the general public through the news media. This is an important part of our story, but only part, for most framing studies lack a cognitive theory. So in the next section, we turn to cognitive psychology and models of understanding—what we call "frames in cognition." Such models are broadly consistent with what is known about human cognition and are supported by an extensive body of experimental evidence. We seek to bring these two strands of research together in an explicitly political context; after all, a theory of political understanding requires attention *both* to communication frames *and* to cognitive process. From theory in cognitive psychology, we propose that citizens understand particular event sequences when they can organize the relevant information into coherent stories. Citizens should therefore understand a political event better when the event is framed by the media to conform to a narrative structure. We posit that attempts by elites to define issues in a particular way—the dissemina-

tion of frames in communication—shape how individuals process and store relevant information and understand politics—the creation of frames in cognition.

To test this claim, we designed and carried out a pair of experiments. In each, we presented people with reports of an unfolding crisis—the political conflict that began in the summer of 1998 in Kosovo. These reports were presented as a series of five articles. In the control conditions, information was presented as it would be in a typical daily newspaper. In the experimental conditions, the same information was presented, but now organized to conform to the structure of a good story. Specifically, the information was organized as one of two particular frames; one emphasizing the need to intervene in Kosovo, the other highlighting the importance of staying out of that conflict. The text contained in the complete set of articles was identical to the set of articles in the other conditions. Every subject therefore received the exact same information. Thus we are able to directly measure the effects of the particular media "frame" on political understanding. Consistent with expectations, we find that framing news about the crisis as a particular story affects what people remember, how they structure what they remember, and, under some circumstances, what opinions they express on the actions that government should take.

Stories in Communication: Elite Frames

Because politics is "altogether too big, too complex, and too fleeting for direct acquaintance" (Lippmann 1922, 16), citizens must depend on others for their news about national and world affairs. Such affairs are inevitably complex and therefore always subject to alternative interpretation. Under some circumstances, individuals may construct their understanding of political realities on their own. But more often than not, the hard work of defining what an issue is about will likely be done by those who have real interests at stake. Presidents, members of Congress, activists, policy analysts, candidates, and officials are all engaged in a more or less continuous conversation over the meaning of current events. This conversation is formulated at least in part with the public in mind, and it becomes available to ordinary citizens through the media in a multitude of ways: television news programs, newspaper editorials and syndicated columns, talk radio, Internet news services, and more. Increas-

ingly, media contribute their own frames, and this may be especially true in the realm of foreign affairs (Entman 2004).[1] Americans live in a "high choice" media environment (Prior 2005). They may watch Fox or PBS. Through multiple channels, citizens are bombarded with suggestions about how events should be understood, and these suggestions may differ appreciably.

In one useful and common vocabulary, these suggestions are "frames" (Druckman 2001; Entman 1993, 2004). Following Gamson (Gamson 1992, 1996; Gamson and Lasch 1983; Gamson and Modigliani 1987, 1989), 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 and Modigliani 1987, 143)

Described this way, frames are never neutral. By defining what the essential issue is and suggesting how to think about it, frames imply what, if anything, should be done.

Gamson assumes that successful frames—frames that prevail in conversations among elites—have consequences for ordinary citizens. But this is not something his own work takes up. Others have pursued this question, however, and have gone a fair distance towards establishing a general connection between elite frames and public opinion.

In this line of research, the effects of frames carried through the news media are detected by examining changes in opinion that are induced by systematic experimental alterations in the way that issue questions are posed, or "framed." By framing questions in different ways, so the argument goes, it is possible to simulate the actual conversation under way between the political elite and the general public. If so, then this line of work points to the importance of elite frames, for the experiments clearly demonstrate that opinion depends in a systematic and intelligible way on how issues are framed (e.g., Bobo and Kluegel 1993; Chong 1993, 2000; Druckman 2001, 2004; Gilens 1999; Haider-Markel and Joslyn 2001; Kinder and Nelson 2005; Kinder and Sanders 1990, 1996; Koch 1998; Mendelberg 1997; Nelson and Kinder 1996; Nelson, Clawson, and Oxley 1997; Nelson,

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[1] Entman argues that with the passing of the Cold War, the media no longer merely parrots the White House line—as hegemony theorists would suggest—nor does it "index" elite disagreement in a straightforward way. Instead, the news media play an increasingly larger role in determining the nature of coverage of foreign affairs. This independent ability to define coverage of foreign policy is especially important in the modern media environment.

Oxley, and Clawson 1997; Price 1989; Simon and Xenos 2000).

But while these studies make a persuasive case that frames affect opinion, they actually skip over our principal concern here: namely, how people make sense of the matters they are asked to judge in the first place. To date scholars have almost exclusively investigated the impact of frames on opinion. Thus, in all the studies of frames and framing—many of them excellent—understanding itself is almost never addressed or measured.[2] The lack of focus on understanding leaves a large gap in our knowledge of frames, a gap we attempt to fill in the next section.

Frames in Cognition: Models of Comprehension

The best way to determine how citizens use frames to comprehend political issues is to examine what makes certain frames successful. Like Gamson, we take an issue frame to be a central organizing theme or story line. A good frame is at its heart a good story. To understand why some frames succeed and others fail, we need to understand what makes an effective story. We must, in other words, investigate how politically relevant information can be presented by the news media in a way that increases citizens' ability to synthesize and grasp that information. In this way, we can see why citizens comprehend an issue in a particular way when there are several ways that the issue may reasonably be understood. Most pertinent to this enterprise, we believe, are Pennington and Hastie's models of jury decision-making (Hastie and Pennington 1995; Hastie, Penrod, and Pennington 1983; Pennington and Hastie 1986, 1988, 1992, 1993) and Kintsch's (1998) theories of text comprehension. Though these theories were designed to explain processes far removed from the world of politics, we believe they can illuminate our comprehension of political understanding.

Pennington and Hastie argue that, for the individual juror, the trial presents a serious challenge to understanding: an avalanche of facts and claims, progressing in no particular order or chronological sequence, full of puzzling gaps. In this way, the complications of the trial are perhaps not so different from what a person encounters over several days as she opens her morning newspaper. Certainly, important differences exist between juries and individual

members of the mass public. The face-to-face deliberations of a jury are not the same as the "deliberations" of ordinary citizens. But both individual jurors and ordinary citizens must process large quantities of sometimes contradictory information and come to an understanding that can guide decision making on a particular issue. How can this be done?

Pennington and Hastie argue that jurors make sense of the trial by organizing the evidence into a coherent mental representation that takes the form of a story: "Meaning is assigned to trial evidence through the incorporation of that evidence into one or more plausible accounts or stories describing 'what happened' during events testified to at the trial" (1986, 243). In constructing their stories, jurors draw on knowledge they may possess about similar stories and generic expectations about what makes a complete story. People know what makes a good story, and this knowledge influences how they understand text and how they represent such text in their minds (e.g., Kintsch 1998; Rumelhart 1975; Schank and Abelson 1977). Jurors also draw upon evidence from the case itself and—when constructing stories—organize the raw material of the trial testimony into a coherent narrative.

Put another way, for jurors a good story organizes and orders the jumble of facts and claims that cascade upon them during the course of the trial. Evidence is unscrambled. Causal and intentional relations are established, gaps are filled, and plot turns are identified. However, because trial evidence is usually consistent with more than one story, jurors must pick the story they deem best. According to Pennington and Hastie, jurors decide this on the basis of three considerations: (1) coverage—how much of the trial evidence is accounted for by the story, (2) coherence—the consistency, plausibility, and completeness of the story, and (3) uniqueness—the number of plausible competing stories. Once the best story has been selected, individual jurors—ordinary citizens charged with making a decision concerning guilt or innocence—consider the decision alternatives put before them and choose the verdict that provides the closest fit to the story they have constructed from the evidence of the trial and their personal experiences.

Considerable evidence underpins Pennington and Hastie's claims. Actual jurors' accounts of real trials in fact conform to the structure of well-formed stories (Pennington and Hastie 1986). In experimental recreations of trials, subjects recognize facts that belong to the story line associated with the verdict they choose and then falsely "remember" facts not actually present

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[2]For an exception, see Schlesinger and Lau (2000).

in the trial but that support their verdict's corresponding story line (Pennington and Hastie 1988).

Most important for our purposes, organizing trial evidence in story form generates more extreme and confident judgments of guilt and innocence. For instance, Pennington and Hastie ran an experiment where they presented evidence from a murder trial in one of several ways. In the "trial" condition, individuals were presented with evidence as it was organized in the trial, haphazardly, one witness at a time. A policeman first testified about the fight that led to the death of the victim, and then a friend of the victim testified about events that preceded the fight. In the "prosecution story" condition, that same trial evidence was reorganized in temporal sequence and causal order to follow the prosecution's story. In this condition, the events preceding the fight were presented before detailed testimony about the fight itself, thereby linking the two sets of events in a causal chain, across seemingly disparate pieces of testimony. Subjects in the "prosecution story" condition were more inclined to return a guilty verdict than those in the trial condition. Likewise, when presented with evidence reorganized in sequence to follow the defense attorney's story—the "defense story" condition—jurors were more inclined to return a verdict of innocence, compared again to subjects who were presented with the same evidence but in "trial" form (Pennington and Hastie 1988, 1992).

Also relevant to our interest in how citizens make sense of politics is the research of Kintsch and his colleagues on text comprehension (Kintsch 1998). Kintsch's work seeks to explain how readers can best comprehend written texts. Similar to Pennington and Hastie, Kintsch argues that learning from a text—be it a textbook, a computer manual, or a newspaper story—requires readers to construct a coherent mental representation of the text. While individuals differ in their language skills and relevant background knowledge, texts can be constructed to facilitate or impede comprehension for *all* readers.

According to Kintsch, the macrostructure of a text—the overall organization of the component pieces of that text—plays an especially important role in memory and comprehension. Comprehension depends on how easily readers can form a coherent mental representation of the macrostructure. While the macrostructure must be inferred by the reader, that structure can be directly signaled in a properly constructed text. Authors can aid or hinder the reader's ability to comprehend a text depending on how easy they make it for the reader to form a well-structured internal representation of the macrostruc-

ture. Research by Kintsch has found that the macrostructure of a text can be made explicit through some simple narrative devices, for instance by dividing a long text into relevant sections, providing headings, and marking topic sentences (Kintsch 1998; McNamara et al. 1996).

In sum, these two lines of research in cognitive psychology suggest what constitutes a good story and, by implication, what makes for an effective frame. First, drawing on Pennington and Hastie, frames that organize developments in chronological order and contain information about the causes and effects of relevant events should increase understanding. Second, from Kintsch, a good frame organizes text by setting out an explicit macrostructure.

Experimental Tests of Understanding

To see whether citizens' understanding of a complicated political subject is augmented when they are presented with news reports that are "properly organized" into a specific frame, we designed and carried out a pair of experiments. Here, properly organized means two things. First, from Pennington and Hastie, the reports take a series of statements and reorganize them to follow a coherent story line; developments are arranged in chronological order and causes of events are explicitly linked to their effects. Second, from Kintsch, the reports contain an explicit macrostructure, one punctuated with headings that mark the story's progression. In each experiment, we compared how well ordinary Americans understood a complicated political subject when news was framed to increase comprehension against when the same news was presented under standard newspaper conventions. We assessed what people remembered, how they structured what they remembered, and ultimately what opinions they expressed on the actions government should take.

The complicated political subject taken up in our experiments is the crisis in Kosovo, which became American news in the summer of 1998, when Serbian President Slobodan Milosevic launched an offensive against Kosovo's ethnic Albanian majority. Serb forces attacked civilian populations, destroyed villages, and drove hundreds of thousands of Kosovar Albanians from their homes. In October of 1998, under threat of NATO air strikes, Milosevic signed a cease-fire agreement. Western diplomats had hoped that the cessation of hostilities would give them an opportunity to press

the Serbs and representatives of the Kosovo Liberation Army into a settlement, but the negotiations failed. In late March of 1999, NATO began a two-month aerial assault of Serbia. When the Serbian government promised to withdraw troops from Kosovo, the bombing was halted. By the end of June, Serbian forces had withdrawn completely. With UN Security approval, a contingent of international peacekeepers moved into Kosovo and remains there today.

As it unfolded, the crisis in Kosovo made headlines in the United States. It preoccupied American foreign policy experts, inside and outside of the Clinton White House, and became a prominent issue in the 2000 presidential campaign. Yet the events took place half a world away, far from the everyday concerns of most ordinary Americans. We know that the intensity of the public's attention declines when the focus of policy turns to foreign affairs. Kosovo therefore represents precisely the sort of event that Lippmann believed common citizens just could not manage to get their minds around. We attempt to determine if, in fact, citizens can make sense of the situation or at least see if they can do better than they otherwise would, when they are presented with news that is organized to emphasize a particular storyline.

Experiment 1

Procedure

Our first experiment was a between-subjects design carried out in the spring of 2000 in and around Ann Arbor, Michigan. Participants (n = 141) were enlisted through posting advertisements and recruiting at local businesses and voluntary associations and were paid for their participation. We deliberately avoided college students (for reasons spelled out in Sears 1986). As we had hoped, participants came from virtually all walks of life: men and women, black and white, poorly educated and well-educated, young and old, Democratic, Independent, and Republican, engaged in and indifferent to politics (see the supplemental appendix on the *Journal of Politics* web site (http: //journalof politics.org/articles.html) for respondent characteristics). Thus, the sample contains considerable variety and includes segments of society that might be expected to have the most trouble making sense of ethnic conflict in Serbia.

After completing a brief questionnaire, participants were randomly assigned to one of three conditions—a control condition, a "humanitarian crisis" condition, and a "risk to America" condition—and asked to read through a series of five newspaper arti-

cles dealing with Kosovo, drawn from a series of reports that had appeared in *The Washington Post*. Each treatment contained the same text across the five articles, but the articles in any given treatment differed from those in other treatments with regards to ordering and structuring of the text, or the "frame," of the articles. In the control condition, the articles follow the conventions of newspaper reporting. That is, they provide factual descriptions of what an on-the-scene observer saw and heard and, more importantly, they are organized according to the principle of the "inverted pyramid": crammed into the first several sentences are all the important aspects of the story, the traditional who, what, where, and when of current events. The individual articles do not present information in a random or haphazard fashion—they mirror coverage found in a typical daily news report—but neither do they present a coherent story of the crisis or provide guidance through headings. Readers can confirm on their own by referring to the full text of the treatments, available in the supplemental web site appendix. Notice that the first article in the control condition looks and reads like a conventional newspaper report. "Breaking news" appears at the very top of the article, and then more facts follow, apparently in descending order of importance. But there are no headings, and the events that precipitated the crisis are presented out of chronological order. This condition is analogous to Pennington and Hastie's "trial" condition—information is presented as it would be in the natural setting. In Pennington and Hastie's case the natural setting was the form of trial testimony—presenting one witness at a time. In our case, the natural setting is that of a typical daily newspaper story.

In the other two conditions, we applied the lessons from research in cognitive psychology to generate news reports that would enhance comprehension in a manner consistent with a particular frame. In each of the two experimental treatments, we reorganized the text from the control conditions with headings and a coherent story line. These frames are intended to capture the ways in which different media outlets could present the same information in qualitatively different ways. The events that led to the current crisis are presented in chronological order and these events are linked in a chain of cause and effect relationships. In effect, we created a good story from the raw material of the newspaper stories.

In the first experimental treatment, we reorganized the text in a direction that supported U.S. intervention. We call this frame the "humanitarian crisis" condition. The lead article in this condition, presented

in the web appendix, mentions Serbian attacks on Albanian villages in a heading and highlights the human cost of these attacks in the middle of the story. Furthermore, we made the attacks on Albanians the central story of the text.

In the second experimental treatment, the newspaper articles were again reorganized to enhance comprehension, but this time in a direction that opposed U.S. intervention. We call this the "risk to America" condition. The first article in this condition included a heading that drew attention to the dangers posed by NATO air strikes for American troops on the ground. We scattered information about atrocities committed against ethnic Albanians in order to downplay their importance.

In all conditions, the only difference among the three treatments is the organization of the text and the presence of headers, which are drawn from the text of the treatments. The emphasis of the stories is different, but the text contained in the complete set of articles is *identical*.[3] Every subject received the *same* raw information. By holding information constant, we are therefore able to isolate the effect of "frame" on political understanding.

The rearrangement of the text into different frames is central to the theoretic motivation of the experiment that follows. Here, we use Pennington and Hastie's trial experiments as our guide. Pennington and Hastie took text concerning an event—the presentation of evidence in a trial—that was presented in a haphazard way and rearranged that text to facilitate understanding of a particular story. The same raw text from the "trial" order was rearranged to fit the prosecution's storyline, thereby increasing the likelihood that a juror would find the prosecution story satisfactory. A similar exercise was performed to fit the defense's story. In our experiment, we follow a nearly identical procedure, drawing additional insight from Kintsch's work on the importance of macrostructure. We take a news story and rearrange the text to highlight the pro-intervention story or the anti-intervention story. These conditions mirror Pennington and Hastie's treatments. Like Pennington and Hastie, we have one treatment in which we manipulate the information presented to make the case for intervention (the prosecution story) and one in which the exact same information has been arranged in such a way to discourage intervention (the defense). The media frame that will win over the audience in our case is the

theme with the most coherent and believable story in a given treatment. Our experiments therefore allow us to determine if the rearrangement of information leads to different understanding and judgments, as it did for Pennington and Hastie and Kintsch.

To give a feel for the treatments, we present the two oppositely framed versions of the same text here. In an article used in the "risk to America" condition (see web appendix for full text) we organized the text to highlight danger to American pilots, thereby increasing the plausibility and appeal of the anti-intervention story:

> Gen. Wesley C. Clark, said he had 400 aircraft and dozens of ships armed with cruise missiles ready to strike. "The crews are ready, the equipment is ready," he said. "We know what the Serb capabilities are. We know what the Serb vulnerabilities are. If required, we will strike in swift and severe fashion."
>
> Clark warned President Slobodan Milosevic of Yugoslavia that the alliance is prepared to strike Serbia with a "vast air armada" if he blocks the peace process.
>
> Targets would be all over Serbia, not just in Kosovo, and could include air bases, anti-aircraft defenses, communications systems and military installations. Pentagon officials say "a very heavy blow" could be delivered quickly.
>
> But with thousands of antiaircraft missiles and artillery hidden in the valleys and woods of Serbia, manned by the well-trained 75,000-man Yugoslav army, the assault is expected to be very different from the antiseptic air campaign against Iraq, with its swiftly disabled defenses.

In the humanitarian crisis condition version of the same story, the text is rearranged to highlight American preparedness:[4]

> With thousands of antiaircraft missiles and artillery hidden in the valleys and woods of Serbia, manned by the well-trained 75,000-man Yugoslav army, the assault is expected to be very different from the antiseptic air campaign against Iraq, with its swiftly disabled defenses.
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> Targets would be all over Serbia, not just in Kosovo, and could include air bases, anti-aircraft defenses, communications systems and military installations. Pentagon officials say "a very heavy blow" could be delivered quickly.
>
> "The crews are ready, the equipment is ready," he said. "We know what the Serb capabilities are. We know what the Serb vulnerabilities are. If required, we will strike in swift and severe fashion."

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[3]To be precise, in some cases, we use conjunctions to modify the story flow. But aside from the use of conjunctions (and the topic headers) the text in the articles is precisely identical.

[4]The one difference between the two versions of the text is that the conjunction "but" is used before the description of the Serbian military in the "risk to America" story, but not in the "humanitarian crisis" story.

To prepare these materials for the experiment, we first reprinted the articles. We smudged the text with newsprint. We cut and pasted each onto a separate page. And then we photocopied them to make it appear as if they had been clipped from a newspaper. Participants were given the articles to read one by one. They were permitted as much time as they wanted. Once they finished an article, they were required to put it aside and not return to it. Participants were asked to read each article in the treatment. Though we did not enforce this request, the experimental supervisors reported that most took the task seriously and read each of the articles in turn.

After subjects made their way at their own pace through the articles, we sought to directly measure the impact of the frames on their understanding—the retention and ordering of politically relevant knowledge in a meaningful way. As psychologists have long known, learning and memory are inexorably related (Kintsch 1998; Pollatsek and Rayner 1999; Roediger and Goff 1999). Thus, it is convention in the cognitive science literature to equate differences in understanding and learning on the one hand with differences in memory and associations between concepts on the other (see, for example, Kintsch 1998). The research of Pennington and Hastie and Kintsch points to two cognitive mechanisms that underlie the power of media "frames in communication" to shape the "frames in cognition" of the mass public in ways consistent with our definition of understanding. First, successful frames should increase citizens' ability to remember facts pertinent to that frame. Second, frames should lead citizens to organize facts in their memory into clusters that follow the essential logic of the frame.

To see if this was so, we first asked subjects to complete a free-recall task, which entailed the mindful retrieval of information. Our expectation was that subjects who were in a particular framed condition— the "humanitarian crisis" frame or the "risk to America" frame—would better comprehend the particular themes emphasized in the articles in that treatment. Following Kintsch (1998) we assessed comprehension by examining patterns of recall across experimental conditions.

We first recorded what participants could recollect from their reading, asking them to:

> List the first thing you remember from the stories in the box below. Whether you agree or disagree with the particular statement is irrelevant. We are simply interested in finding out how much you remember from what you have read . . . Now, please list the next thing you remember in the box below . . . Please keep listing things you

remember from the stories in the boxes until you read the words "Stop Listing Items."

Up to as many as 10 distinct "thoughts" were recorded. We used this memory probe to measure political understanding as well as recall because, as Kintsch argues, "In most cases, deep understanding and mere memory for the words of a text are intermingled to various degrees" (1998, 291). The particular structure of our probe is especially well suited to tap political understanding. We did not ask subjects to recall the text verbatim; rather we asked them to recall relevant facts from the story. Thus, though our probes may measure text memory—the ability to reproduce a text verbatim (Kintsch 1998)—they also tap deeper understanding of particular aspects of the Kosovo crisis obtained by learning from our text.

If we are correct, subjects presented with the "risk to America" frame should accept the anti-intervention story and, as a result, should better recall facts from the articles that support the United States taking a cautious approach regarding the Kosovo crisis. Conversely, subjects given the "humanitarian crisis" frame should adopt the pro-intervention story and be better able to recall facts that make the case for U.S. involvement.

To measure the structure of memory, we presented participants with a categorization task, or sorting task, which is widely used in sociology, anthropology, and psychology.[5] Each participant was given the same set of terms, each printed on a separate card. We randomized the order of the cards before presenting them to each subject. Each term had something to do with the Kosovo crisis—"NATO," "Milosevic," "ethnic cleansing," 41 in all—and it was the participant's job to sort the terms into common categories.[6] We generated the full set of terms by identifying what we took to be the key elements of the Kosovo story: principal players, historical analogies, key concepts, and emotional reactions. Terms that belonged together, in the participant's judgment, were to be placed in the same grouping, and there could be as many groupings, or as few, as each participant

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[5]See Boster and Johnson 1989; Brewer and Lui 1989; Chi, Feltovich, and Glaser 1981; Coxon 1999; Coxon and Jones 1979; Kintsch 1998.

[6]The 41 terms were: aggression, Albania, Albanians, airstrikes, ambivalence, anger, bombs, Bosnia, casualties, children, Clinton, Congress, danger, ethnic cleansing, genocide, hatred, Hitler, Holocaust, Iraq, Jews, KLA, Kosovo, Kuwait, mass graves, Milosevic, NATO, peacekeepers, POWs, refugees, revenge, Russia, Saddam Hussein, Serbia, Serbian police, sorrow, troops, UN, U.S., victim, Vietnam, and WWII.

wished.[7] This task is especially appropriate for our purposes because psychologists—including Kintsch—have used this task to assess the structure of knowledge in a particular domain (Kintsch 1998). Our expectation was that subjects in different conditions would group these terms in systematically different ways.

Finally, although comprehension of information concerning Kosovo was our central concern, we were also interested in how the treatments might alter the political judgments of the subjects. To that end, we asked participants to evaluate the success of US policy towards Kosovo.[8]

Results

Participants were randomly assigned to one of the three conditions. According to information supplied by the initial questionnaire, randomization had the intended effect. That is, prior to administration of the experimental treatment, participants assigned to the control condition did not differ from those assigned to the humanitarian crisis condition nor did they differ from those assigned to the risk to America condition.[9] This means that whatever post-experimental differences between groups we are able to detect can be attributed to manipulated differences within the news stories—to differences, we would say, in how the news was framed.

Our first hypothesis was that organizing the news to emphasize narrative progression would affect their

comprehension of the crisis, thereby changing what people remembered about Kosovo. More precisely, we expected that participants in the framed conditions would come to a particular understanding of the Kosovo crisis and, as a result, would remember better those aspects of news about Kosovo that fit the overall frame underlying the articles they read. Participants in the humanitarian crisis condition should be more likely to recollect facts that make the case *for* U.S. involvement. For example, they might recall that NATO was well equipped for an air conflict with Serbia or that Milosevic had backed out of agreements in the past and could not be trusted to resolve the issue fairly. Conversely, participants in the risk to America condition should be more likely to recall facts from the articles that argue *against* involvement. For example, they might recall disagreements within NATO concerning the wisdom of intervention or the formidable military force that the United States would have to face if ground combat became a reality.

To see if this was so, we first coded participants' free recall from the news stories into four categories: facts that favored U.S. intervention, facts that opposed U.S. intervention, facts relating to the political information questions in the pre-test and other facts about the conflict.[10] For purposes of analyses, we were most interested in the pro-intervention and anti-intervention categories. Across the entire sample, the number of pro-intervention facts ranged from zero to seven with a mean of 2.4 (S.D. = 1.6); the number of anti-intervention facts ranged from zero to eight, with a mean of 3.0 (S.D. = 1.7).

As hypothesized, participants' recall of pro-intervention and anti-intervention facts varied by experimental condition, and in the way we had expected.[11] These results are shown in Table 1. On average, participants in the risk to America story condition remembered significantly more anti-intervention facts than did participants assigned to the humanitar-

[7]The specific instructions for the sorting task were: "We are now going to ask you to organize a number of people, places, and things relevant to the Serbian Conflict into piles that 'go together.' (1) Familiarize yourself with these concepts by reading each one. (2) Put the cards into piles according to how you think they should go together. Make as few or as many piles or categories as you think. There need not be the same number of cards in each pile. You can change your mind and reorganize the piles at any time. Remember, there is no correct or incorrect way to make the piles. We are interested only in your intuitions about which of the words are related to each other." The instructions to this task ensure that we are not merely tapping the associations remembered from the task. We ask the respondents to organize the terms "according to how you think they should go together," not how the stories presented those associations.

[8]At the conclusion of both experiments, participants were thoroughly briefed as to our purpose.

[9]We ran a series of chi-square tests to see whether the characteristics of the respondents varied by condition. All of these tests indicated that we could not reject the null hypothesis of "no difference" across all the respondent characteristics. Specifically the chi square test statistics and p-values are: Education (χ^2 (8, 140) = 9.20; p = .33), Party Identification (χ^2 (6, 141) = 8.22; p = .22); Gender (χ^2 (2, 141) = .19; p = .91); Race (χ^2 (2, 140) = .68; p = .71); Interest in politics (χ^2 (6, 141) = .81; p = .99) and Age (χ^2 (12, 140) = 11.61; p = .48).

[10]The coding was done by a research assistant blind to experimental condition. We include the coding instructions in the web appendix. As expected, there were no differences among the conditions on the "political information test facts" and "other facts" measures. To check the reliability of the codings, we had a second assistant code the same items for six of the experimental participants. The two coders agreed on over 75% of the coding decisions. It should also be noted that we used separate coders for the two experiments. The degree of convergence in the results of the two experiments speaks to the robustness of the recall effects we find in the paper (see below).

[11]Here, and in the analyses that follow, we sought to see if the framing effects were moderated by the subjects' levels of political information, measured using a standard factual question test (Zaller 1992). We found no such effects.

TABLE 1   Number of Pro- and Anti-Intervention Thoughts Recalled, by Experimental Condition

	Experiment 1		
	Experimental Condition		
	Humanitarian Crisis Mean (SE Mean)	Control Mean (SE Mean)	Risk to America Mean (SE Mean)
Number of Anti-Intervention Thoughts	2.55 (.19)	2.98 (.24)	3.57 (.29)
Number of Pro-Intervention Thoughts	2.70 (.26)	2.28 (.23)	2.25 (.20)

ian crisis condition (3.57 versus 2.55). A one-way analysis of variance indicates that the overall difference is statistically significant: ($F_{(2, 138)} = 4.31, p < .02$).[12] Likewise, and also as predicted, participants in the humanitarian crisis condition remembered more pro-intervention facts than did participants in the risk to America story condition (2.70 facts recalled versus 2.25), though the overall difference is not significant ($F_{(2, 138)} = 1.12$, ns).[13]

Next we turned to analysis of the categorization data. The first step was to convert each participant's pattern of groupings into a "co-occurrence matrix," a symmetric matrix with each of the sorted terms represented by both a column and a row (Coxon 1999). The matrix entries are 1 where terms are grouped together and 0 where they are not. So, for example, if Smith placed Kosovo and Serbia into the same grouping and put the United States into a different one, Smith's co-occurrence matrix would have a 1 at the intersection of the "Kosovo" column and the "Serbia" row, and a 0 at the intersection of the "Kosovo" column and the "U.S." row.[14]

These individualized matrices were then combined across participants to create three aggregate co-occurrence (or abundance) matrices, one for each condition. For ease of analysis, each of the three aggregate co-occurrence matrices was divided by the number of participants, thereby bounding the matrix entries between 0 and 1. These matrices contain entries that represent the frequency with which terms are put in the same category. So, for example, of the 46 participants in the humanitarian crisis story condition who completed the task, 65% placed "KLA" and "Serbian Military Police" into the same category, indicating a fairly high degree of similarity between these terms. On the other hand only one of the participants sorted "KLA" and "U.S. POWs" into the same category, indicating a high degree of distance between these terms. Thus, the aggregate co-occurrence matrix for this condition has .65 at the intersection of the "KLA" column and the "Serbian Military Police" row, and a .02 at the intersection of the "KLA" column and the "U.S. POWs" row.

To analyze these matrices, we relied upon hierarchical agglomerative clustering methods (Aldenderfer and Blashfield 1984; Coxon 1999) using the CLUSTAN program. Hierarchical clustering creates a nested set of partitions. The two most similar terms are first combined to form a cluster and the proximities between the new cluster and all the other terms are updated. At subsequent steps, this process is repeated, with the two most similar terms (or clusters) combined until all the terms are allocated to a particular grouping (Wishart 2000). So for instance, in the humanitarian crisis condition, the "KLA" and "Serbian Military Police" terms had a high degree of similarity and were combined together into a single grouping quickly. On the other hand, the "U.S. POW" term was highly dissimilar to both of these terms and was in another cluster.

The results of this analysis are summarized in Figure 1. The figures represent, for each experimental

[12]We also ran our analyses with political information and need for cognition (Bizer et al. 2000) as additional covariates. While these measures were positively related to the recall measures—subjects with high levels of political information and need for cognition remembered more facts than subjects low on those measures—there were no interactive effects between these traits and the experimental treatments.

[13]The superior power of the "Risk to America" frame relative to the "Humanitarian Crisis" frame may be due to the heightened salience of negative information in the Risk to America frame. Negative information has been proven to be more consequential in information processing than positive information (Marcus, Neuman, and MacKuen 2000).
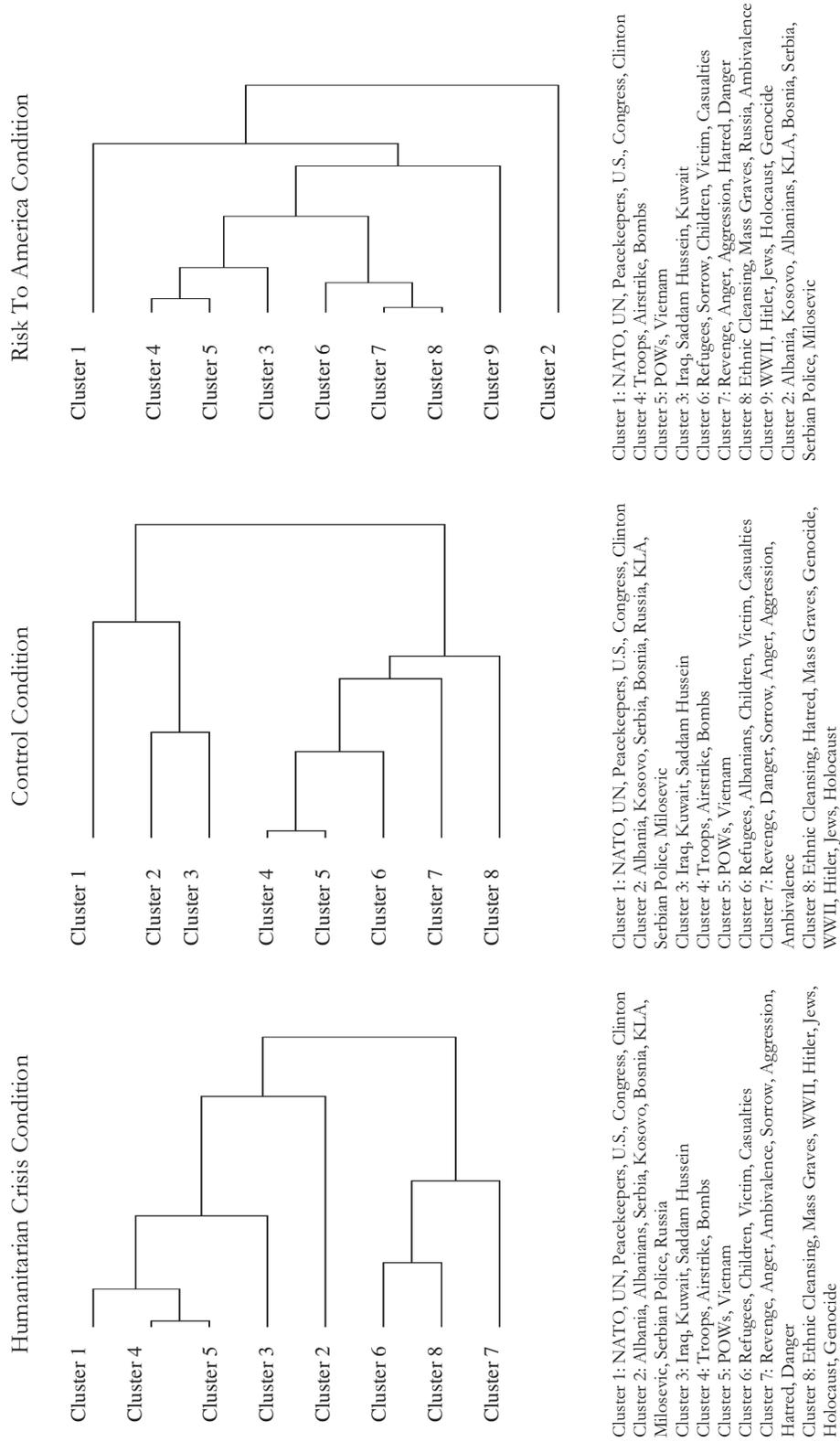
[14]These matrices were constructed using the ANTHROPAC software package. The original classification data were incorrectly transcribed for seven of the participants. In four cases, the grouping of one of the 41 terms was not reported and in three cases the same term was incorrectly entered into two separate groupings. These data transcription errors appear to be random; we discarded these participants from the analysis and treated them as missing at random (Little and Rubin 1987).

FIGURE 1   **Cluster Analysis**

Humanitarian Crisis Condition

Cluster 1: NATO, UN, Peacekeepers, U.S., Congress, Clinton
Cluster 2: Albania, Albanians, Serbia, Kosovo, Bosnia, KLA, Milosevic, Serbian Police, Russia
Cluster 3: Iraq, Kuwait, Saddam Hussein
Cluster 4: Troops, Airstrike, Bombs
Cluster 5: POWs, Vietnam
Cluster 6: Refugees, Children, Victim, Casualties
Cluster 7: Revenge, Anger, Ambivalence, Sorrow, Aggression, Hatred, Danger
Cluster 8: Ethnic Cleansing, Mass Graves, WWII, Hitler, Jews, Holocaust, Genocide

Control Condition

Cluster 1: NATO, UN, Peacekeepers, U.S., Congress, Clinton
Cluster 2: Albania, Kosovo, Serbia, Bosnia, Russia, KLA, Serbian Police, Milosevic
Cluster 3: Iraq, Kuwait, Saddam Hussein
Cluster 4: Troops, Airstrike, Bombs
Cluster 5: POWs, Vietnam
Cluster 6: Refugees, Albanians, Children, Victim, Casualties
Cluster 7: Revenge, Danger, Sorrow, Anger, Aggression, Ambivalence
Cluster 8: Ethnic Cleansing, Hatred, Mass Graves, Genocide, WWII, Hitler, Jews, Holocaust

Risk To America Condition

Cluster 1: NATO, UN, Peacekeepers, U.S., Congress, Clinton
Cluster 4: Troops, Airstrike, Bombs
Cluster 5: POWs, Vietnam
Cluster 3: Iraq, Saddam Hussein, Kuwait
Cluster 6: Refugees, Sorrow, Children, Victim, Casualties
Cluster 7: Revenge, Anger, Aggression, Hatred, Danger
Cluster 8: Ethnic Cleansing, Mass Graves, Russia, Ambivalence
Cluster 9: WWII, Hitler, Jews, Holocaust, Genocide
Cluster 2: Albania, Kosovo, Albanians, KLA, Bosnia, Serbia, Serbian Police, Milosevic

condition, a nested set of groupings where each higher level is a coarser generalization of those groupings beneath it.[15] The chart runs from left to right, with groupings on the right "higher" than those on the left. We choose the composition of the initial clusters on the basis of "best cut" function in CLUSTAN. Significance tests on the fusion values indicated that there were eight clusters in the humanitarian crisis and control conditions, and nine clusters in the risk to America condition (for details, see Wishart 2000).

Worth noting first of all is that the number and composition of the clusters are quite similar across the different treatments. In each of the three conditions, a cluster of terms pertaining to the United States and its allies emerged; as did a cluster collecting together the major players in the Kosovo conflict; the elements of warfare; aspects of the conflicts in Vietnam and, in a separate grouping, Iraq; the emotions of war and reaction to war; and the human casualties of Kosovo. In short, there appears to be considerable consensus across the treatment conditions concerning how these various terms are grouped together into initial clusters.[16]

At the same time, however, there are also several important differences. The most notable concerns the nature of the Kosovo conflict. The issue here is whether an analogy can be drawn between Milosevic's ethnic cleansing and Hitler's Holocaust. Participants in the humanitarian crisis condition (and in the control condition as well) seemed to accept this analogy. For them, "ethnic cleansing," "mass graves," "WWII," "Hitler," "Jews," "Holocaust," and "genocide" are all part of the same category. Participants in the risk to America story condition, in contrast, drew a clear distinction between the terms used to describe the Serbian actions in Kosovo (ethnic cleansing and mass graves), on the one hand, and those relating to the attempted extermination of the Jews (WWII, Hitler, Jews, Holocaust, genocide), on the other. This result suggests that participants came to understand the Kosovo crisis in ways that were subtly but fundamentally different, depending on how their news was organized. Framing news reports to highlight the humanitarian aspects of the crisis encouraged participants to see a connection between Kosovo and Germany, between Milosevic and Hitler, between ethnic cleansing and the Holocaust.

This brings us finally to the question of opinion. We are interested in understanding for its own sake but also because understanding seems likely to precede and shape opinion. How people come to understand an event should affect their view about what—if anything—government should do in response. With that in mind, we asked participants in Experiment 1 three questions about the success of the United States' policy towards Kosovo:

1. Considering everything, do you think the United States did the right thing in getting involved in a military conflict in Serbia, or do you think it was a mistake?
2. Do you think the United States and NATO did the right thing in conducting air strikes against Serbia, or do you think it was a mistake?
3. As you may know, the United States sent 7,000 ground troops into Kosovo as part of a larger NATO peacekeeping force after the peace agreement with Serbia was finalized. Do you support or oppose this plan?

On balance, participants strongly approved of U.S. policy: upwards of three-quarters of the full sample thought that the United States should have gotten involved in the Serbian conflict; even more said that the United States was right to carry out air strikes against Serbia; and still more supported U.S. policy of sending American troops into Kosovo to help keep the peace. We expected that participants in the humanitarian crisis condition would be more likely to approve of U.S. policy than participants in the risk to America story condition—and this turned out to be true, on all three measures. However, the differences were small. Because the three items scaled together well (Cronbach's alpha = .77) we conducted an analysis where the dependent variable was an additive scale of the items. A one-way ANOVA indicates that there are no significant differences on this scale by treatment condition ($F_{(2, 138)} = .31$, ns).

Experiment 2

The results from Experiment 1 seemed promising. In line with theoretical expectations, subtle alterations in news reports appeared to enhance ordinary citizens' understanding of the conflict in Kosovo in ways consistent with the particular frame to which they were exposed. We carried out Experiment 2 in part to probe the robustness of these findings and in part to take up the major puzzle left behind by Experiment 1: namely,

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[15]The figures report results based on Ward's clustering algorithm. Because the results of cluster analysis can be sensitive to the method used, we re-ran our analysis following a variety of clustering algorithms, without major differences.

[16]Clustering techniques of the sort we rely on here are primarily descriptive tools; they do not permit statistical tests of differences across conditions.

TABLE 2   **Number of Pro- and Anti-Intervention Thoughts Recalled, by Experimental Condition**

	Experiment 2		
	Experimental Condition		
	Humanitarian Crisis Mean (SE Mean)	**Control Mean (SE Mean)**	**Risk to America Mean (SE Mean)**
Number of Anti-Intervention Thoughts	1.87 (.23)	2.17 (.21)	2.82 (.27)
Number of Pro-Intervention Thoughts	3.24 (.26)	3.00 (.25)	2.86 (.22)

that the framed conditions affected understanding but not opinion. In Experiment 2, we used the same experimental treatments as Experiment 1, but included a new set of questions about U.S. policy in the post-treatment questionnaire. Perhaps the association between understanding and public opinion was so slight in Experiment 1 because the opinions we asked about were anchored in and overwhelmed by the recent past, by the actual outcome of U.S. intervention in Kosovo, at least as ordinary American citizens saw it. After all, the survey was taken mere months after an apparently successful resolution to the Kosovo crisis and our dependent variables were measures of support for this intervention. In Experiment 2, we therefore asked participants not only to assess the success of past policy in Kosovo, as we had in Experiment 1, but also to express their opinions about what the United States should do next, both in Kosovo and in other trouble spots around the world. We suspected that the implications of subtly different understandings of Kosovo would be more apparent both as time passed from the intervention and as we tapped prospective views about U.S. foreign policy in an uncertain future.

Experiment 2 was another between-subjects design, conducted in the spring of 2002 in central New Jersey. As before, participants (n = 163) were recruited in such a way as to guarantee a broad representation of citizens (see the web appendix) and were paid for their participation. After completing an initial questionnaire, participants were randomly assigned to one of three conditions and asked to read through one of the series of five newspaper articles dealing with Kosovo (the treatments were identical to those used in Experiment 1). As in Experiment 1, randomization had its intended effect; participants were not significantly different on measured characteristics across conditions. After reading the articles, participants were asked to write down what they could remember about the crisis in Kosovo and then to record their opinions about U.S. policy.

Results

Our principal hypothesis was again that turning news reports into purposefully framed stories would affect our subjects' understanding of the Kosovo crisis. More precisely, we expected that participants in the humanitarian crisis condition should be more likely to recollect facts that made the case *for* U.S. involvement, while participants in the risk to America condition should be more likely to recall facts from the articles that argued *against* involvement. Once again we coded participants' free recall into these two categories. This time, across the entire sample, the number of pro-intervention facts ranged from 0 to 7 with a mean of 3.0 (S.D. = 1.8); the number of anti-intervention facts ranged from 0 to 9, with a mean of 2.3 (S.D. = 1.8). Compared to participants in Experiment 1, then, participants in Experiment 2 recollected more pro-intervention facts and fewer anti-intervention facts. But more important for our purposes, the pattern of recall across conditions is virtually identical in the two experiments.[17] The results for Experiment 2 are presented in Table 2.

Just as in Experiment 1, participants in Experiment 2 assigned to the risk to America story condition remembered significantly more anti-intervention facts than did participants assigned to the humanitarian crisis condition. A one-way ANOVA indicates that the overall difference is statistically significant ($F_{(2, 160)}$ = 4.26, $p < .02$). Participants in the humanitarian crisis condition remembered more pro-intervention facts

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[17]This result is especially strong because we used separate coders for the two experiments. While the coders were guided by the same instruction sheet (see the web appendix), the coder for the Experiment 2 protocols never spoke to the coder for the protocols from the first experiment. The degree of convergence in the results of the two experiments therefore speaks to the robustness of the recall effect. In addition, we had a separate assistant code 14 protocols. The two coders agreed on over 60% of the rating. However, many of these disagreements involved the "fact" and "other" category. The coders disagreed on only 9% of the "pro-intervention" versus "anti-intervention" coding decisions.

TABLE 3   Support for US Intervention, by Experimental Condition

| | Experiment 2 | | |
| | Experimental Condition | | |
	Humanitarian Crisis Mean (SE Mean)	Control Mean (SE Mean)	Risk to America Mean (SE Mean)
Past Intervention in Kosovo	.90 (.04)	.72 (.06)	.74 (.06)
Intervention in Kosovo in the Future	.57 (.02)	.53 (.03)	.50 (.02)
Intervention Elsewhere	.62 (.03)	.64 (.03)	.55 (.03)

than did participants in the risk to America story condition, though—as in Experiment 1—the size of this effect is considerably smaller and statistically insignificant ($F_{(2, 160)}$ = .64, ns). We had of course hoped to find essentially the same result in Experiment 2 as in Experiment 1, but the crispness of the replication exceeded our expectations.

That Experiment 2 shows (again) that news reports which employ a particular frame can enhance comprehension in a manner consistent with that frame is a welcome result in and of itself, but it also enables us to take up the question of whether such news reports also have implications for opinion.[18]

First we looked at opinion about the success of U.S. policy in Kosovo. For this purpose we repeated in Experiment 2 one of the questions we had asked in Experiment 1: "Considering everything, do you think the United States did the right thing in getting involved in a military conflict with Serbia, or do you think it was a mistake?" As before, our participants generally supported U.S. policy. And as before, participants in the humanitarian crisis condition were more likely to say that the United States did the right thing in Kosovo than did participants in the risk to America story condition. This time, however, the difference is both substantively and statistically significant.[19] As Table 3 shows, 90.3% of the first group lent their support to U.S. policy, compared to 74.1% of the second group. The effect of the treatment is statistically significant ($F_{(2, 150)}$ = 4.94, $p < .01$). It appears that assessing the overall success of the mission nearly three years after the Kosovo crisis (and two years after the first experiment) allowed for larger effects on support for the intervention to emerge.

We also asked a series of questions (all but the last presented in a five-category Likert format[20]) concerning future American involvement in Kosovo:

1. The United States should contribute significant amounts of money and material to help rebuild Kosovo.

[18]For these analyses of opinion direction, we controlled for our subjects' levels of internationalism. Previous research suggests that the general beliefs of citizens concerning U.S. involvement in foreign affairs is a powerful predictor of specific policy judgments (for a review, see Holsti 1996; Hurwitz and Peffley 1999). Thus, on the pre-test, we measured the subjects' overall support for U.S. participation in international affairs. Specifically, we asked the subjects' level of agreement or disagreement with the following statements: (1) "This country would be better off if we just stayed home and did not concern ourselves with problems in the other parts of the world." (2) "The U.S. government should take into account the interests of other nations when it makes foreign policy" and (3) "In the long run, the best way for the U.S. to avoid problems like terrorism is to not get too involved with international problems." We also included items deigned to tap the specific constructs of cooperative and militant internationalism (see Wittkopf 1990), but these items did not have independent predictive validity. Our results do not change if these items are added to the internationalism scale. For the purposes of the analysis below, we split our sample at the median, creating a variable scored "1" for high internationalists, and "0" for low internationalists. We used this scale as a factor in the ANOVAs that follow, both on its own and in interaction with the treatment factor. We included the interaction to control for the possibility that preexisting attitudes towards international involvement—what Hastie and Pennington term preexisting knowledge—might condition the effects of the frames (see also Lodge, McGraw, and Stroh 1989). Though the internationalism factor was significant in all the analysis that follows, the interaction of the condition and internationalism terms was not. The use of the internationalism factor strengthens somewhat the power of the experimental treatments because there are a few more low internationalist subjects in the pro-interven-

tion condition than in the other conditions, though the difference in levels of internationalism across conditions is not significant ($F_{(2, 160)}$ = .87, ns).

[19]Unlike the first experiment, we used a 4-point Likert response format for this question. For the purposes of this analysis we collapse the "strongly" and "somewhat" categories for the purpose of comparison across the experiments. The results are somewhat stronger if the full 4-category response set is employed in analysis.

[20]The five response categories were: Agree strongly, agree somewhat, neither agree nor disagree, disagree somewhat, and disagree strongly.

2. Kosovo is a European problem that Europe should be able to handle without American troops.
3. It is not worth risking American lives to bring peace to Kosovo.
4. The United States should guarantee the return of ethnic Albanian refugees to their former homes in Kosovo.
5. The United States should seek to establish a permanent peacekeeping force in Kosovo and other troubled areas in the Balkans.
6. It would be worth the loss of some American soldier's lives if the United States could help bring peace to Kosovo.
7. America's vital interests are at stake in the situation involving Kosovo.
8. The United States is headed for trouble with our involvement in the former Yugoslavia.
9. With respect to the United States' military involvement in the former Yugoslavia, do you think that the United States should step up its military involvement, scale back its military involvement, or maintain its current level of military involvement?

These items scaled together well (Cronbach's alpha = .75), and so we created a composite index by averaging responses over the nine questions. Each item, and therefore the overall scale, was coded to range from 0 (against intervention) to 1 (favoring intervention). The scale had a mean of .53, and a standard deviation of .17. As Table 3 reveals, by this measure, participants in the humanitarian crisis condition gave more support to maintaining the United States commitment in Kosovo than did participants in the risk to America story condition. The overall difference is significant as well ($F_{(2, 153)} = 3.50$, $p < .05$).

Finally, we were interested if differences in understanding of Kosovo might "spill over" into opinion about U.S. foreign policy in other parts of the world. And so we asked:

1. How much do you agree or disagree with the following statement? The United States should keep military forces in Afghanistan in order to maintain civil order in that country.
2. As you may know, the United Nations is considering the deployment of over 5,000 troops to Congo to monitor a cease-fire signed between the government and rebel forces. Would you favor or oppose the United States sending in military troops as part of the international peacekeeping force in Congo?
3. Would you favor or oppose sending military troops to Iraq if the United States found evidence that Saddam Hussein was violating the human rights of the people of Iraq?

Because opinions on intervention in Afghanistan, in Congo, and in Iraq were reasonably correlated (Cronbach's alpha = .56), we created a composite index by averaging responses over the questions, with each item and therefore the overall scale coded to range from 0 (against intervention) to 1 (favoring intervention). This scale has a mean of .61, and a standard deviation of .24. As Table 3 shows, compared to those who were assigned to the story that highlighted the risks of intervening, participants assigned to the story emphasizing the humanitarian aspects of the crisis were more likely to favor U.S. intervention, not just in Kosovo but elsewhere around the world. This difference is sizeable and statistically significant ($F_{(2, 155)} = 2.63$, $p < .08$).[21]

Conclusion

Drawing on recent theorizing in political communication and cognitive psychology, we carried out a pair of experiments to see whether ordinary citizens' understanding of a complicated political subject—the crisis in Kosovo—was affected by the particular media "frame" used to structure information about that crisis. Participants in our experiments who read news reports on Kosovo that were framed to suggest a particular story line came to a distinct understanding of the crisis: their memory was structured in a different manner, their conception of Kosovo was in certain respects more differentiated, and their opinions about what the United States had done in Kosovo and what it should do in the future—both in Kosovo and in other trouble spots around the world—tilted in a direction consistent with the story they were told.

[21]Before we conclude, however, a word about the relationship of the framed conditions to the control conditions is in order. To this point, our analysis has focused on the difference across all three conditions. Here, we find significant differences on opinion direction. But taking the control condition as the baseline—in effect using the control condition to represent the manner in which people "naturally" think about foreign affairs—we find that the different frames have power in different issue areas. Relative to the control condition, the humanitarian crisis frame increases support for intervention in Kosovo, both in the past and in the future. The America at risk frame condition, however, is statistically indistinguishable from the control condition. Moving beyond the purview of Kosovo, this pattern is reversed. On the questions concerning intervention abroad, it is the America at risk frame that is powerful, relative to the control condition. More specifically the America at risk frame had spillover effects on opinion concerning foreign intervention more generally, while the humanitarian crisis frame had no spillover effects. These results suggest that the translation of different patterns of understanding concerning the Kosovo crisis—apparent from the results on the memory tasks—into opinions concerning government action may work differently in different domains of foreign policy.

These several effects are not huge, but we should not expect them to be. Our experimental manipulations were quite subtle: all of our participants, regardless of condition, were presented with the same information. Thus we can be certain that it is variation in the *presentation* of information and not variation in information itself that produces our effects. Even with our subtle manipulation, we find consistent effects on understanding, and the effects seem quite robust. They appear in two independent studies, conducted on two quite different populations, and carried out in two quite different historical moments (before and after September 11, 2001).

Taken all around, our findings suggest that ordinary citizens' understanding of politics depends in systematic and intelligible ways on how information is presented to them. Consistent with current theorizing in cognitive psychology, framing information in ways that conform to the structure of a good story appears to change understanding, and understanding, in turn, appears to shape opinion. Frames not only enhance understanding; they influence opinions. Our experiments demonstrate that subtle changes in the presentation of information can alter the structure of understanding and move opinion toward a particular side in a controversy. Frames therefore do not need to present strong arguments for one side or another—a strategy criticized by Sniderman and Theriault (2004)—in order to change public opinion. Small and subtle differences in the presentation of information can sometimes do the trick. Given the heterogeneity in the presentation styles of the vast choices of the modern media, this result carries important implications for general political understanding. The same story covered in subtly different ways by different media outlets can lead to very different understandings of important political events.

Our argument and results point to the importance of studying more closely the process of political understanding. Some scholars have argued that citizens can form reasonable opinions and make good political choices in the absence of understanding by relying on sensible shortcuts or heuristics (Lupia 1994; Popkin 1994; Sniderman, Brody, and Tetlock 1991). Surely, this can and does happen to some degree, but cue taking cannot be a full substitute for political understanding (Kuklinski et al. 2000; Lau and Redlawsk 2001). Future work on political understanding could investigate a series of interesting questions. The Kosovo experiments demonstrate that frames that arrange text by setting out an explicit macrostructure, organizing events and developments in chronological order, and implying causal sequences, ultimately enhance issue understanding. This theoretic framework could be refined to assess which of the cognitive mechanisms—or combination of mechanisms—discussed by Pennington and Hastie and Kintsch give frames their power to shape mass political understanding of complex issues. Future experiments could cleanly separate successful frames into their different structural components to see precisely what makes a successful frame—such as the Kosovo anti-intervention frame—work. In addition experiments could be designed to see how individuals evaluate novel information in light of the frames to which they have been exposed and how individuals might evaluate the same facts against competing story frames to decide in favor of one frame over another. More generally, by drawing opportunistically on contributions from psychology—both theoretical and methodological—and applying them to political science, we believe it will be possible to fashion a more authoritative account of how citizens make sense of the "mystery off there" than Lippmann could manage in his time.

Acknowledgments

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