WORLD POLITICS

CONTENTS

INTERVENTION AND INTRANSITIVITY

Public Opinion, Social Choice, and the Use of Military Force Abroad

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W E have watched with horror the unceasing and brutal unfolding of events in the former Yugoslavia. And while there are some analysts who proffer simple answers for this complex and difficult situation, the majority response seems to be one of indecision. On a number of occasions the American administration has indicated a readiness to use military force to deal with a situation that seems as insoluble as it is intolerable; but a sustained and coherent policy has proved hard to come by. The public response has been similarly inchoate. In 1992 and 1993 different polls found as little as 12 percent or as much as 94 percent of the population supportive of American military action in Bosnia or similar situations.[1] Contrary to some recent assertions about the underlying stability and rationality of aggregate public opinion, such incoherence has not been unusual in public responses to recent questions about the use of military force abroad. Somalia, the Persian Gulf, Central America, Panama, Grenada, Lebanon, and of course Vietnam all generated public discussions that contained elements of considerable indeterminacy.

The most common explanations for the unstable and indeterminate nature of aggregate public opinion focus on the problems of question wording and on the underlying incoherence in the way that members

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[1] The 12% figure comes from an ABC News poll on May 6, 1993, when respondents were asked if the U.S. should try to stop the fighting if the Europeans refuse to help. The 94% figure comes from an Americans Talk Issues/W. Alton Jones Foundation poll in the last week of March 1993, when respondents were asked if they find the use of military force to ensure the delivery of food and relief supplies in conflict situations like Bosnia or Somalia a "preferable or somewhat preferable option." In that same poll, the use of sufficient force to arrest the leaders of the warring parties and bring them to trial before a world court was preferred or somewhat preferred by 83% of the respondents. These and most of the other poll results used in this paper were provided by the Roper Center for Public Opinion Research.

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of the public think—or more aptly *fail to think*—about public policy in general and foreign policy in particular. These are clearly important issues that have generated considerable discussion in the literature on public opinion and foreign policy. The focus here, however, will be on a phenomenon that Bruce Russett has called "a key point missed by all existing theories [of the structure of belief systems]."[2] I contend that the indeterminacy of public opinion in recent policy debates about military intervention may owe as much to intransitivities in the underlying distribution of public preferences as to the technical difficulties of polling or the inherent complexity and seriousness of the issues in question.

THE CONFUSION OF PUBLIC ATTITUDES ABOUT MILITARY INTERVENTION

One of the dynamics driving the study of public opinion and foreign policy has been the debate over whether in fact the public cares about foreign policy and, if it does, whether or not public opinion makes any difference in the policy process.[3] This debate is a subset of a larger discussion about the nature of public opinion in general.[4] But foreign policy has been seen as a particularly acute forum for problems in the assessment of public opinion. This situation should not surprise us in the case of issues that are complex and distant. The public would be unlikely to have sophisticated views on the fine points of arms control and trade agreements. It is more surprising to find a high degree of incoherence, uncertainty, and instability on high-profile issues of international conflict. There are, in fact, significant gaps in public knowledge on these issues.[5]

[2] Bruce Russett, *Controlling the Sword: The Democratic Governance of National Security* (Cambridge: Harvard University Press, 1990), 88.

[3] For a useful overview of this debate, see Russett (fn. 2). See also Benjamin Page and Robert Shapiro, *The Rational Public: Fifty Years of Trends in Americans' Policy Preferences* (Chicago: University of Chicago Press, 1991); John Aldrich, John Sullivan, and Eugene Borgida, "Foreign Affairs and Issue Voting: Do Presidential Candidates Waltz before a Blind Audience?" *American Political Science Review* 83 (March 1989); Robert Shapiro and Lawrence Jacobs, "The Relationship between Public Opinion and Public Policy: A Review," in Samuel Long, ed., *Political Behavior Annual*, vol. 2 (Boulder, Colo.: Westview Press, 1989); Robert Shapiro and Benjamin Page, "Foreign Policy and the Rational Public," *Journal of Conflict Resolution* 32 (June 1988); Bernard Cohen, *The Public's Impact on Foreign Policy* (Boston: Little Brown, 1973).

[4] See Philip Converse, "The Nature of Belief Systems in Mass Publics," in David Apter, ed., *Ideology and Discontent* (New York: Free Press, 1964); Richard Niemi and Herbert Weisberg, eds., *Controversies in American Voting Behavior* (Washington, D.C.: Congressional Quarterly Press, 1984); John Zaller, *The Nature and Origins of Mass Opinion* (Cambridge: Cambridge University Press, 1992).

[5] A dramatic example of the lack of knowledge in this area is suggested by the fact that in January 1979, only 23% of the population could correctly identify the two nations involved in the SALT negotiations. See Thomas Graham, "The Pattern and Importance of Public Knowledge in the Nuclear Age," *Journal of Conflict Resolution* 32 (June 1988).

It is not difficult to find examples of foreign policy attitudes that seem inconsistent or that fail to fit cleanly on the expected political spectrum, even for many highly dramatic foreign policy conflicts. On May 6, 1993, pollsters made two separate attempts to assess American attitudes toward the use of air strikes in Bosnia—and reached strikingly different conclusions.[6] A Gallup/CNN/USA Today poll found that 36 percent of the respondents supported U.S. air strikes in Bosnia. On the same day, an ABC News poll found that 65 percent supported air strikes. The critical difference in this case was the inclusion of the phrase "along with its allies in Europe" for the second poll.[7] Such sensitivity to context has long been endemic to opinion polling on these kinds of issues. Sidney Verba and his coauthors argued in 1967 that public attitudes were consistent and well ordered but did not fit the standard hawk/dove categories. While 88 percent of the public was willing to negotiate with the Vietcong, 81 percent opposed immediate withdrawal.[8] Even before the advent of television and other insidious mechanisms for diminishing collective intelligence, polling on foreign policy issues revealed both inconsistencies and a very high sensitivity to context and question wording. Public-opinion polling in the period leading up to the American election of 1940 showed the public overwhelmingly supportive of Roosevelt's foreign policy. Despite strong opposition on the part of many isolationist leaders, two-thirds of the public favored giving the British and the French as much help as they wanted, short of sending the army and navy. At the same time, a very large majority wanted the government "to keep us out of war, unless we are attacked, no matter what happens abroad."[9]

The first class of explanations for the apparent incoherence of foreign policy opinions focuses on the basic inability of the general public to form and express opinions. The reason we do not see coherent aggregate public opinion, according to this view, is that individuals do not have coherent attitudes: foreign policy is simply too complex and too remote for most of them.[10] John Zaller presents a strong formula-

tion of this view in his discussion of public opinion surrounding the Gulf War:

> [M]ost people, on most issues, do not "really think" any particular thing. With respect to a major issue like the Gulf crisis, for example, most people monitor the news to some extent and collect information, but they rarely if ever have occasion to pull everything together into a single, coherent opinion.[11]

The second class of explanations for the incoherence of poll results focuses on the technical difficulties of crafting effective polls.[12] Thus, even those who expect individuals to have genuine and consistent attitudes about foreign policy issues have reason to expect incoherent polling data. In particular, there is a broad literature on the sensitivity of polls to minor changes in question wording or even in question order. Subtle differences can change the way respondents interpret questions, because the words that make up questions carry substantive and emotional contexts and provide cues that will bias the responses.[13]

> [T]wo polls taken at the same time on the same topic sometimes will produce results that appear to differ, perhaps substantially. . . . An examination of the data usually reveals differences in questionnaire wording that do not seem very large but are influencing the responses.[14]

My goal here is to demonstrate the importance of a third class of issues that can make the identification and interpretation of aggregate public opinion problematic. This class consists of structural problems that emerge from basic difficulties in the logic of aggregating individual preferences into social choices. Although the basic nature of these social choice problems has been well known and intensively studied for a number of years now, their strong implications for the study of public opinion have been remarkably underappreciated. I offer here first a brief review of the social choice problem. I then turn to a general discussion of the distribution of public attitudes toward the use of mili-

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[6] John Brennan, "Why Polls Can Be Poles Apart," *Los Angeles Times*, May 20, 1993, p. A5.

[7] Ibid.

[8] Sidney Verba et al., "Public Opinion and the War in Vietnam," *American Political Science Review* 61 (June 1967).

[9] See Robert Divine, *Foreign Policy and U.S. Presidential Elections, 1940–1948*, vol. 1 (New York: New Viewpoints, 1974), chap. 1; Michael Leigh, *Mobilizing Consent: Public Opinion and American Foreign Policy, 1937–1947* (Westport, Conn.: Greenwood Press, 1976), 29–51.

[10] The foundational text for this perspective is Converse (fn. 4). See also Zaller (fn. 4), esp. chap. 5.

[11] John Zaller, "Elite Leadership of Mass Opinion: New Evidence from the Gulf War," in Lance Bennett and David Paletz, eds., *Taken by Storm: The Media, Public Opinion, and U.S. Foreign Policy in the Gulf War* (Chicago: University of Chicago Press, 1994), 194.

[12] Howard Schuman and Stanley Presser, *Questions and Answers in Attitude Surveys: Experiments on Question Form, Wording, and Context* (New York: Academic Press, 1981); Brad Lockerbie and Stephen Borrelli, "Question Wording and Public Support for Contra Aid, 1983–1986," *Public Opinion Quarterly* 54 (Summer 1990).

[13] John Mueller, *Policy and Opinion in the Gulf War* (Chicago: University of Chicago Press, 1994), chap. 1. For an argument about the effects of these factors on concrete choices, see, for example, Amos Tversky and Daniel Kahneman, "The Framing of Decisions and the Psychology of Choice," in Robin Hogarth, ed., *Question Framing and Response Consistency* (San Francisco: Jossey-Bass, 1982).

[14] Norman Bradburn and Seymour Sudman, *Polls and Surveys: Understanding What They Tell Us* (San Francisco: Jossey-Bass, 1988), 146.

tary force abroad, using intervention in the Persian Gulf War as a specific example to illustrate these dynamics.

SOCIAL CHOICE THEORY AND THE PROBLEM OF INTRANSITIVITY

As a graduate student, the Nobel prize-winning economist Kenneth Arrow became interested in the question of whether or not nations could be said to have preferences. This interest led to his landmark book, *Social Choice and Individual Values*, in which he shows that logically there is no reasonable voting mechanism for aggregating diverse opinions into coherent societal choices.[15] Philosophers had recognized the basic nature of this problem by the Middle Ages, when the particular concern was with designing procedures for aggregating preferences in the selection of religious leaders. Later, with the rise of democratic thought in the eighteenth and nineteenth centuries, the issue was raised again by the French philosopher Condorcet and by the English mathematician and philosopher Charles Dodgson (better known as Lewis Carroll).[16]

One of the central elements in Arrow's formulation of the social choice problem is the concept of transitivity. Transitivity is a familiar concept to those who remember grammar school math: if a>b and b>c then a>c. In the analysis of behavior the transitivity rule simply means that if some outcome a is preferred to some outcome b, and that outcome b is preferred to an outcome c, then outcome a should be preferred to outcome c. This simple principle is the basic underpinning of rationality. Of course, many political scientists are happy to abandon the notion of rationality, especially as applied to the mass public. But transitivity is not a concept that should be abandoned cavalierly.[17] Few public opinion polls have been conducted in a way that allows the

[15] Arrow, *Social Choice and Individual Values* (1951; reprint, New Haven: Yale University Press, 1963). Arrow presents four criteria for a desirable social choice function and argues that logically there is no function that can satisfy all four criteria at once. Those criteria are:
   1. The choice function should be able to deal with every possible ordering of preferences.
   2. If everyone in the society prefers option *x* to option *y*, then society should prefer *x* to *y*.
   3. The preference ranking of any two options should be independent of the inclusion or exclusion of any third option.
   4. No one should be a dictator; that is, no one individual's preference should become society's preference irrespective of the preferences of everyone else.

[16] McLean argues that the basic problem was independently discovered three different times. Two good introductions to social choice theory and voting problems are Iain McLean, *Public Choice: An Introduction* (Oxford: Basil Blackwell, 1987); and William Riker, *Liberalism against Populism: A Confrontation between the Theory of Democracy and the Theory of Social Choice* (San Francisco: W. H. Freeman, 1982).

[17] Riker (fn. 16), 130.

transitivity issue to be addressed. Without some indicator of when it is a problem and when it is not, any claims to understand or express an aggregate sense of public opinion will be suspect.

A simple illustration should demonstrate the nature of the intransitivity problem. Suppose that there are three voters, or three similarly sized groups of voters—A,B,C—and three choices—white, gray, and black. Table 1 indicates the preferences of voters A, B, and C for the three colors. For each voter the top color is the first choice, the second is the second choice, and the bottom color is the least preferred outcome.

Even if there were no ambiguities in question wording and we were quite certain about the stability and sincerity of these preferences, it would be very difficult to identify something that we would want to think of as "public opinion" in an aggregate sense in this example. How we ask the questions will determine what we see as aggregate opinion. If we ask each person to identify his or her favorite color, we will find that one-third of the group likes each color. If we ask people if they prefer white or black, we will find that two-thirds prefer white. Similar questions will also reveal, however, that gray is preferred to white, and that black is preferred to gray by the same margins. At the aggregate level these preferences are intransitive. Following the voting analogy, we would say that there is a cycle in this structure of preferences: an attempt to find a social preference by majority vote could get stuck cycling through the alternatives indefinitely, since white beats black, and black beats gray, but gray in turn beats white.

On the face of it, this simplistic illustration may seem highly artificial. Unfortunately, it is all too real, and the problems of cycling have been shown to be all the more pernicious when the situation is made more complex. The gist of the considerable work that has been done on the social choice problem is that whenever there are two or more dimensions on which an issue can be evaluated, it is highly unlikely that there will be a natural majority rule equilibrium.[18] Cycles in the majority preference lead to a situation where the order in which alternatives are evaluated determines the outcome. Indeed, McKelvey has shown that with the right order and with a few quite unrestrictive assumptions about the nature of preference distributions, *any* alternative can emerge as the social choice.[19] This result suggests a critical role for

[18] Charles Plott, "A Notion of Equilibrium and Its Possibility under Majority Rule," *American Economic Review* 57 (September 1967); Gerald Kramer, "On a Class of Equilibrium Conditions for Majority Rule," *Econometrica* 41 (March 1973).

[19] Richard McKelvey, "Intransitivities in Multidimensional Voting Models and Some Implications for Agenda Control," *Journal of Economic Theory* 12 (June 1976).

TABLE 1
THE SOCIAL CHOICE PROBLEM ILLUSTRATED

A	B	C
White	Black	Gray
Black	Gray	White
Gray	White	Black

the ways in which alternatives are expressed and understood in the process of polling public opinion.[20] The way that questions are asked— the order in which alternatives are compared in an absolute sense, not simply in the sense of cuing or framing—may be more critical to our sense of what public opinion is on an issue than the actual underlying distribution of preferences.[21] For social choice analysts the bottom line is that it is unlikely that aggregations of opinion will reflect a notion of democratic preference in any philosophically acceptable way.[22]

The problems inherent in the conceptualization of social choice are well known. Economists and those studying formal models of legislative choice have made considerable strides in the enumeration and analysis of these dynamics. Most political scientists are surely aware of the basic shape of these problems. Nonetheless, the logical dilemmas attendant to social choice problems have been virtually ignored in the study of public opinion in general and of public opinion and foreign policy in particular. A consideration of American public opinion on the question of military intervention illustrates the potential problems raised by these issues and demonstrates that these questions are not simply academic or restricted to highly artificial and constructed examples.

POPULAR PREFERENCES AND THE ISSUE OF MILITARY INTERVENTION

The presence of more than two actors is a sine qua non in the study of public opinion. The critical question, then, is the presence of two or more dimensions. It is tempting to think of military intervention along

[20] Peter Ordeshook and Thomas Schwartz, "Agendas and the Control of Political Outcomes," *American Political Science Review* 81 (March 1987).

[21] Kenneth Shepsle, "Institutional Arrangements and Equilibrium in Multidimensional Voting Models," *American Journal of Political Science* 23 (February 1979); William Riker, "Implications from the Disequilibrium of Majority Rule for the Study of Institutions," *American Political Science Review* 74 (June 1980).

[22] See Riker (fn. 16).

a single hawk/dove continuum. But there are clearly other dimensions at work as well. At a minimum, there may be differing perceptions of the seriousness of a given threat to national interest and the expected costs of intervention. Not even the most ardent interventionist is going to advocate World War II levels of mobilization to deal with Grenada levels of threat to the national interest. Likewise, none but the most religiously motivated pacifist is going to object to a Grenada level of effort that clearly prevents a World War II level of threat. The higher the costs of intervention, the more effective a case for intervention leaders will have to make. An intervention that is supported because of an expectation of low costs will quickly lose its public support if it turns out to involve very high costs.

In most cases the expectations about relative costs and benefits will be strongly influenced by underlying beliefs about the nature of international politics and the role of force. In this regard there is a consistent thread in the analysis of public opinion in this issue-area that rejects the single hawk/dove division and points to the presence of at least two dimensions and often more.[23] Ronald Hinckley identifies three dimensions reflected in the foreign policy attitudes of the American public.[24] The first dimension is support for the use of military force. The second is the support for international involvement—the isolationist/internationalist dimension. The third dimension subdivides those in favor of international involvement according to whether they prefer unilateral or multilateral action. Reviewing a number of opinion polls and the broad literature on public opinion on foreign policy issues, he developed a summary of the distribution of popular attitudes, presented here as Table 2.

Hinckley concluded on the basis of his typology that the foreign policy debate both among the public and at the elite level would

focus on one specific policy after another with opinion coalitions forming and shifting on the basis of whether the particular issue involves the United States

[23] Eugene Wittkopf has been particularly active in analyzing the underlying dimensions of American foreign policy attitudes. See, for example, Wittkopf and Charles Kegley, "Beyond Consensus: The Domestic Context of American Foreign Policy," *International Journal* 38 (Winter 1982–83), 86–92. For another detailed discussion of the dimensionality of foreign policy attitudes, see William Chittick, Keith Billingsley, and Rick Travis, "A Taxonomy of Foreign Policy Beliefs" (Paper presented at the annual meeting of the American Political Science Association, Chicago, September 1992).

[24] Ronald Hinckley, "Public Attitudes toward Key Foreign Policy Events," *Journal of Conflict Resolution* 32 (June 1988). The advantage of Hinckley's take on the dimensionality issue is that he provides a clear breakdown by percentages, suggests plausible demographic correlates, and makes a case for the stability of these dimensions over the entire postwar era.

TABLE 2
HINCKLEY'S TYPOLOGY OF ATTITUDES

		International Involvement		
		Unilateralist	Multilateralist	Isolationist
Use of military force abroad	Yes	Hard-liner (18%)	Internationalist (26%)	Forceful (13%)
	No	Soft (7%)	Accommodationist (19%)	Restrained (17%)

SOURCE: Hinckley (fn. 24), 301

in international affairs, how it involves America in those affairs, and what the military implications of that involvement are, regardless of the real objective of the particular policy.[25]

Hinckley is surely right about the dangers of shifting coalitions, but a more careful consideration of this distribution of attitudes in light of the transitivity problem reveals that the problem may be even more insidious. Coalitions may change not just from issue to issue; but even on a single issue simultaneous coalitions may form around different positions with no clearly superior aggregate social choice. These dynamics can be concretely illustrated with an examination of public opinion in the recent Persian Gulf War.

A CASE IN POINT: THE GULF WAR

Public attitudes toward the use of military force to reverse the Iraqi invasion of Kuwait in 1990 reflect many of the dynamics of opinion complexity discussed above. Consider the following three poll results, all obtained about the same time in the fall of 1990.[26]

—Seventy percent of the public agreed that the United States should take "all necessary action, including the use of military force, to make sure Iraq withdraws its forces from Kuwait."
—Forty-five percent agreed that the United States should "engage in combat if Iraq . . . refuses to leave Kuwait."
—Thirty-two percent agreed that "the United States should increase the level of its troops to force Iraq to leave Kuwait."

[25] Ibid., 316.
[26] Zaller (fn. 11), 195. For a more extensive survey of public opinion trends during the Persian Gulf War, see Mueller (fn. 13).

Obviously there were important differences of wording and context in the way these three questions were asked. Mueller argues that changes in question wording led to a difference of more than 40 percentage points in support for a hard-line approach to the Iraqi invasion of Kuwait.[27] But why is it that changing wording alters the apparent distribution of attitudes? It is plausible that the dilemmas of defining a public choice are at work here. If we look at the distribution of American attitudes toward the use of military force as described by Hinckley, it is not difficult to construct a structural explanation for the apparent inconsistencies in public preferences as interpreted through the medium of opinion polling.

In broad terms, there were four approaches for dealing with the Iraqi invasion of Kuwait. They are listed here with a code letter that will be used in the subsequent analysis.

1. W=withdrawal, doing nothing
2. S=multilateral sanctions
3. U=unilateral military intervention
4. M=multilateral military intervention

If one assumes that the preferences for these four options come from the underlying distribution of attitudes identified by Hinckley, then certain kinds of aggregate opinions are to be expected. If the choice were presented as "use military force" versus "do not use military force," as Hinckley presents it and as it is often presented in the polls, the division might be based on the row marginals in Table 2. Fifty-seven percent of the population would be in favor of intervention (hard-liners, multilateralists, and forceful isolationists), while 43 percent would be opposed (soft unilateralists, accommodationist multilateralists, and restrained isolationists). If, however, one throws in the question of multilateral versus unilateral intervention and the question of multilateral sanctions, the picture could look quite different. For each of the six kinds of attitudes identified by Hinckley, I propose a plausible distribution of preferences. These are then summarized in Table 3.

1. *Unilateral hard-liners* (18 percent). Presumably this segment of the public would prefer unilateral military interention. Since unilateral hard-liners favor a more activist American role in the international system, their second choice would be multilateral military intervention should they fail to achieve their first goal. Their third, grudging, choice would be multilateral sanctions. At the bottom of the list would be withdrawal.

[27] John Mueller, "American Public Opinion and the Gulf War: Some Polling Issues," *Public Opinion Quarterly* 57 (Spring 1993).

TABLE 3
PREFERENCE ORDERINGS[a]

Unilateralists		Multilateralists		Isolationists	
Hard-liner 18%	Soft 7%	Internationalist 26%	Accommodationist 19%	Forceful 13%	Restrained 17%
U	W	M	S	W	W
M	S	S	W	U	S
S	U	U	M	M	U
W	M	W	U	S	M

·W=withdrawal; S=sanctions; U=unilateral intervention; M=multilateral intervention.

2. *Soft unilateralists* (7 percent). For this group, it is very important to avoid both military action and multilateral entanglements. Thus, this group would rather have us withdraw than get involved in either kind of military action. Sanctions against Iraq are sufficiently devoid of international commitment to be a plausible second choice. If military action is called for, the third choice would have to be unilateral military action. Multilateral military action is the least favored approach for this small group.

3. *Internationalist multilateralists* (26 percent). This, the largest segment of the American public, clearly favors a more interventionist foreign policy, but in coordination with other states. Multilateral intervention is a strong favorite. If this cannot be achieved, this group would likely go with the dictum that our international involvement should be based on following the lead of the UN and similar multilateral agencies. Thus, multilateral sanctions would be the second choice. Since this group is strongly internationalist in its outlook, unilateral military action would likely be its third choice, with withdrawal at the bottom of the stack.

4. *Accommodationist multilateralists* (19 percent). The accommodationists see international involvement as very important but are unenthusiastic about the use of force. Their first choice, then, would be multilateral sanctions. Failing that, they would counsel withdrawal. If force had to be used, it should be multilateral. Their least preferred option is unilateral military action.

5. *Forceful isolationists* (13 percent). For this category avoiding entanglements but being assertive are dual, if sometimes conflicting, goals. As distinct from the hard-line unilateralists, this group has as its primary goal avoidance of international entanglements. Its first choice will therefore be withdrawal. If a clear case of national interest cannot be made, this group would keep America strong but uninvolved. If the United States has to be involved, minimizing international entanglements is still the goal, so unilateral military action would be the second choice. Beyond this, multilateral military action offers some chance of achieving the goal, while sanctions are the last choice, as both entangling and unlikely to do any good.

6. *Restrained isolationists* (17 percent). This segment of the public likes neither international involvement nor the use of military force. This group will

have a clear preference for withdrawal. If involvement is unavoidable, sanctions seem the next least onerous choice. If we are going to use military force, it should be unilateral, with the entanglements of a multilateral military effort the least favored choice.

The sense of the aggregate policy preference that would emerge from a distribution of individual preferences such as this is very much a function of how the question is asked or of what mechanism is used to figure the result. If people are asked whether they are in favor of "intervention," 44 percent may be in favor, but this would mask the difficulties the unilateralists and multilateralists have in coming to agreement on the way to carry out intervention. If respondents are asked for their preferred course of action, the largest percentage of the population would favor simple withdrawal (37 percent, against 26 percent for multilateral military intervention, 19 percent for sanctions, and 18 percent for unilateral military intervention). But withdrawal is hardly a satisfactory description of the public preference, since at a minimum it is clear that even though the rest of the public cannot agree on their most preferred policy, all 63 percent of them agree that they prefer sanctions to withdrawal.

One traditional criterion for identifying a social choice is picking what is called a *Condorcet winner*. Named after the French philosopher who contributed some of the earliest systematic analysis of voting problems, a Condorcet winner is an alternative that can beat all of the other alternatives in pairwise voting. The intuition here is simply that in identifying a policy as the public's preference, there should not be another policy that a majority of the public prefers. If there are just two alternatives there will always be a Condorcet winner, except in the unlikely event of a tie. If there are three or more alternatives, there is a distinct danger that there will not be a Condorcet winner.

Is there a Condorcet winner for U.S. policy in the Persian Gulf? In Table 4 I show how each of these policy proposals would fare against each other under these conditions, with the numbers in the cells representing the percentage of votes the column option would get against the row option. The social choice implications of this distribution are quickly seen. If the starting proposal is to do nothing, we can see by reading across the W row that simple majorities prefer either multilateral intervention or sanctions. Sanctions, however, are also beaten by multilateral intervention. Reading across the M row, we see that multilateral intervention is, in turn, beaten by unilateral intervention. Unilateral intervention, finally, would lose out to either sanctions or withdrawal. This brings us back to the starting point. If the underlying

TABLE 4
POLICIES IN PAIRWISE COMPETITION[a]

	M	U	S	W
M		55	43	49
U	45		69	56
S	57	31		37
W	51	44	63	

[a] The numbers in the cells represent the percentage of votes the column option would get against the row option. W=withdrawal, doing nothing; S=multilateral sanctions; U=unilateral military intervention; M=multilateral military intervention.

attitudes identified in Table 3 and the preference orderings I have attached to them are accurate, there is no Condorcet winner. There is in this set of preferences a serious problem of intransitivity.

Figure 1 illustrates the intransitive policy path that could result from the preferences outlined above. The arrows indicate directions in which a policy selection process based on majority vote could go. To recap: a starting position of doing nothing can be beaten by either sanctions or multilateral intervention. Sanctions themselves can also be beaten by multilateral military action. Multilateral military action can be beaten by unilateral military action. Unilateral military action can be beaten by either sanctions or withdrawal, which returns us to the beginning of the cycle. Starting with any of these policies would lead to the same cycle. If alternative policies are evaluated sequentially, with each proposal compared with the current favorite, this cycle could continue indefinitely, and one would not be able to identify a stable foreign policy choice preferred by the general public.

This illustration of the intransitivity problem also demonstrates the dependence of our sense of public preferences on what the public perceives to be the viable alternatives. Arrow includes as one of his criteria of a desirable social choice function the idea that social preferences should not be affected by the inclusion or removal of independent alternatives.[28] The above example suggests that the particular alternatives that are included has a very significant effect on the societal choices that will be made. Removing sanctions from the list of possible actions does not eliminate the cycling problem. There is still the W->M->U->W cycle. If either unilateral or multilateral military action is ruled out as a possible strategy, the cycle would be broken. It is important to see how this is done. If unilateral military action is no
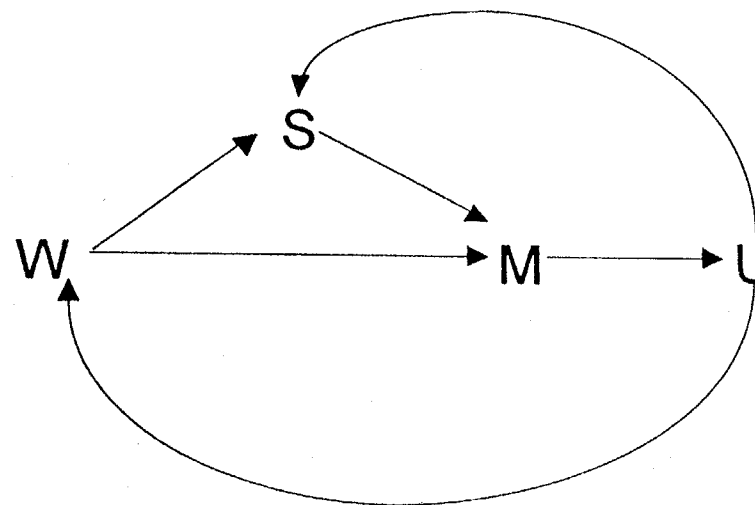
[28] Arrow (fn. 15), 26–28.

FIGURE 1
AN INTRANSITIVE POLICY PATH

longer a viable policy, then multilateral intervention would be preferred by simple majorities to both sanctions and withdrawal. If, however, multilateral intervention is not seen as possible, sanctions would be the clear winner against both unilateral intervention and withdrawal.

THE SENSITIVITY OF INTRANSITIVITY

An important question to consider is how sensitive the findings in Table 3 are to marginal changes in the preference orderings of the different groups. There are twenty-four possible orderings of the four policy options. For the purposes of this paper it is illustrative to look at the sensitivity of the example presented above to the most plausible changes in some of these orders. (I will leave it to eager readers to track down all of the possibilities that could emerge from these six groups.)

As Hinckley acknowledged, it is difficult to pin down the forceful isolationists.[29] The seemingly contradictory stance between the desire to isolate the United States from international events and the willingness to send military forces abroad is difficult to characterize fully.

[29] Hinckley (fn. 24), 303.

Nonetheless, the relative preferences of this group prove critical to whether a stable foreign policy majority can be formed. Above, I suggested that forceful isolationists might not see Kuwait as a sufficiently critical issue over which to compromise their isolationism. This would lead to the preference for withdrawal and the W>U>M>S preference ordering. If, however, the connection to American economic well-being[30] or some other argument convinced this segment of the population that this was in fact an issue for which it was worth sacrificing some of its isolationist tendencies, we could imagine several other plausible distributions. With a touch of casuistry, this group could hold almost any of the twenty-four possible orderings. There are, however, just a few critical possibilities that need to be considered.

As just 13 percent of the population, the forceful isolationists cannot affect the preference for sanctions over withdrawal, for multilateral intervention over withdrawal, or for sanctions over unilateral intervention, regardless of how they order those options. A preference for multilateral intervention over unilateral intervention would reverse that part of the cycle, but that seems an unlikely preference for isolationists. A more plausible scenario would put the forceful isolationists in favor of unilateral military intervention over withdrawal. This would change the nature of the cycle, but it would not eliminate the intransitivity. In this case, any other option would beat withdrawal. We could then say that the public clearly favors doing something over doing nothing, but the cycle between unilateral intervention, multilateral intervention, and sanctions would continue unabated.

The one important part of the cycle that the forceful isolationists can affect is the relationship between multilateral intervention and sanctions. I presented the forceful isolationists as preferring multilateral military intervention to sanctions. If this order is switched, such that the forceful isolationists preferred sanctions to multilateral military intervention (perhaps on the grounds that it was less entangling), then sanctions would beat multilateral military intervention by a 56 to 44 percent margin. This would solve the intransitivity and break the cycle. Sanctions would be an unbeatable proposal in pairwise competition, even though it is the first choice of only 19 percent of the population.

The emergence of a stable majority for sanctions with this switch in the preferences of the forceful isolationists should not be too comforting vis-à-vis our more general conceptual concerns about the nature of

[30] Secretary of State James Baker argued that the reason for opposing Saddam Hussein in Iraq could be summed up in one word: "jobs." *New York Times*, November 14, 1990, p. A8.

public opinion on this issue. In this case, the choice of sanctions occurs because of a shift in the relative preferences of 13 percent of the population over their two least favored options. Needless to say, public opinion polling is rarely conducted in a manner that can pick up this kind of nuance.

CYCLES AND SUPERMAJORITIES

Policy cycles can also be broken by increasing the size of a majority required for approving or implementing a policy. The larger the majority required for identifying public support for a policy, the easier it is to avoid cycles. This is an attractive notion for the question of military intervention. While public leaders do not have to go immediately to the voters to seek approval of military action, there is certainly a sense that some degree of initial public support is important. In this regard, it may well be that military intervention requires a sizable rather than a simple majority. Military intervention is usually a very risky proposition. Political leaders will need to be either confident of the prospects for a relatively quick victory or very confident of the strength of their support.[31] Precisely because of the problem of shifting majorities, few leaders will relish the prospect of undertaking so risky a venture without confidence that they have solid and sustainable public backing. In the Persian Gulf case, a supermajority requirement eliminates the cycles very quickly. If we require better than a 55 percent majority, it will be impossible for unilateral intervention to beat multilateral intervention. A supermajority requirement breaks the cycle and allows multilateral intervention to emerge as the most preferred policy.

Supermajorities are not, however, an entirely satisfactory solution to the aggregation problem. In the Persian Gulf case, the requirement of a better than 55 percent majority will always lead to the choice of multilateral intervention. If we raise the requirement higher we begin to get less satisfactory results because the aggregation solution then becomes entirely dependent on the starting point. If we require a majority greater than 57 percent, and start at any proposal except multilateral intervention, we will end up with sanctions. If we start at multilateral intervention, there is no other policy that is socially preferred at the 57 percent level. Above a 63 percent requirement, we will be able to select a policy of withdrawal, sanctions, or multilateral intervention, depending on

[31] Bruce Bueno de Mesquita, Randolph Siverson, and Gary Woller argue that performance in international conflicts has important effects on domestic political fortunes. Bueno de Mesquita, Siverson, and Woller, "War and the Fate of Regimes: A Comparative Analysis," *American Political Science Review* 86 (September 1992).

the starting point. The higher the supermajority requirement the less likely it will be that any policy will be able to beat the default policy. If the default policy is usually to do nothing, then that will increasingly be the outcome.[32]

In the end, of course, the Bush administration pushed forward on a policy that was basically unilateral intervention with a veneer of multi-lateral approval and participation. It is not at all clear that such a policy could have garnered majority approval vis-à-vis continuing santions before the war actually began.[33] Once the war was under way, the stability of support for the intervention policy rested not only on the rally effect but also on the increasing realization that the costs to the United States were going to be considerably lower than almost anyone had anticipated.[34] Furthermore, there were no fundamental conflicts or controversies about command and control that could force the multilateral/unilateral issue.

THE IMPLICATIONS OF INTRANSITIVE PREFERENCES

The case of the Gulf War illustrates the basic importance of considering the problems of social choice in the way aggregate public opinion is interpreted. There are a number of further implications to be drawn from the possibility of preference intransitivities. In particular there are implications for the way public opinion polls are conducted and interpreted, and there are the broader implications for understanding foreign policy and its relationship to democracy and the forces of public opinion.

IMPLICATIONS FOR THE STUDY OF PUBLIC OPINION

Public opinion analysts have given considerable thought to the problems of sampling, of question wording, and of framing effects, with little regard for the underlying issues that may dramatically affect our sense of what the public likes or does not like.[35] In studying public opinion at the aggregate level, the process of aggregation itself must be

[32] This might correspond with Walter Lippmann's view of public opinion as the "great veto," simply saying no to any change of course. Lippmann, *Essays in the Public Philosophy* (Boston: Little Brown, 1955).

[33] On December 18, 1990, 55% could be found supporting war with Iraq. This rose to 63% by January 6, 1991, but this support can be seen in that in the same poll only 44% were willing to approve of war if it would mean one thousand American casualties (*Washington Post* polls).

[34] Defense Department casualty estimates before the war ran as high as twenty thousand. See David Broder, "U.S. Was Ready for 20,000 Casualties," *Los Angeles Times*, June 13, 1991, p. A1.

[35] Russett (fn. 2), 88. For some examples of prominent pieces in this literature that do not consider these problems, see Bradburn and Sudman (fn. 14); Paul Brace and Barbara Hinckley, *Follow the Leader: Opinion Polls and the Modern Presidents* (New York: Basic Books, 1992); Ronald Hinckley,

included in the analysis. Polls must be designed and conducted with social choice problems in mind. Unless expectations of voters are so low that one's interest lies only in the flavor of the affective relationship between voters and certain policies, it is important to specify the relative position of policy preferences. A richer sense of how people evaluate alternatives relative to each other should yield an understanding of what majorities are likely to form. In particular, it is important to determine the alternatives to which policies are implicitly compared. It makes a very big difference, for example, whether respondents see limited air strikes as an alternative to doing nothing or as an alternative to the large-scale deployment of ground troops.

In this regard it is important to recognize that many polls are conducted in response to significant foreign policy events. These events may determine what respondents see as the implicit alternative to which a policy option is compared. A poll assessing attitudes about limited air strikes when the implicit alternative is set by vocal U.S. threats to send troops abroad may look very different from one taken when the implicit alternative is allowing some petty dictator to get away with pillage and murder.

As significant as these problems are, it is also important to emphasize that the recognition of social choice problems does not eviscerate the process of public opinion polling. Armed with an awareness of social choice dynamics, one is better equipped to recognize that polls are more revealing of some kinds of information than of others. As the Persian Gulf case suggests, aggregate attitudes toward specific policies may be particularly problematic if the menu of alternatives is left unspecified. Majority votes or simple statements of public attitudes toward a single policy option carry relatively little meaning.[36] If we wish to gain insights into public reactions to specific policies, we will need to adjust our polling practices to elicit clear comparisons of policies or to determine the implicit comparisons respondents are making.

In the meantime, there are some more limited kinds of public-opinion polling that operate within unidimensional realms. Presidential approval ratings, for example, operate on a single dimension and therefore remain a relatively coherent measure of overall satisfaction with a president's work.[37] In a two-party system, questions that tap into a

People, Polls, and Policymakers: American Public Opinion and National Security (New York: Lexington, 1992).

[36] Riker (fn. 16), 136.

[37] Richard Brody, *Assessing the President: The Media, Elite Opinion, and Public Support* (Stanford, Calif.: Stanford University Press, 1991); Brace and Hinckley (fn. 35).

central dimension that defines party divisions will also escape the problem of indeterminate majorities. Indeed, one of the principal ways that the American political system avoids policy cycles is by organizing issues around a relatively simple party continuum. This brings us to the larger question of the implications of intransitive policy preferences for the formation and conduct of foreign policy.

IMPLICATIONS FOR FOREIGN POLICY

How one makes the move from a consideration of the implications of social choice problems for the conduct and analysis of public-opinion polling to a consideration of the implications of these dynamics for foreign policy hinges on one's understanding of the role of public opinion in foreign policy. It is well beyond the scope of this analysis to delve into the significance of public opinion for foreign policy. Many books and articles have weighed in on that issue.[38] While several recent observers have made a strong case for the importance of public opinion in the foreign policy process,[39] the argument here can be sustained with even a relatively minimal public role in foreign policy decision making. At a minimum, the use of military force abroad is a high-visibility public issue. Leaders are very likely to feel constrained by the need for public support to sustain such military activities. In the case of the Persian Gulf War, for example, Mueller asserts that American public opinion was a major consideration in the policy process.[40]

Several authors have recently advanced arguments for the general stability of democratic foreign policy.[41] This literature has emerged in response to the traditional view of democracies as shifting and unstable, a view Machiavelli once attributed to "all writers" and "all historians."[42] The existence of intransitive public preferences is one significant reason it may be difficult to sustain stable policies in democratic polities. The presence of public opinion intransitivities is not, however, sufficient grounds for rejecting the view that democracies can establish relatively stable foreign policies. The important analytic implication of these intransitivities is that the source of foreign policy stability is going to be found in the *institutions* that aggregate public opinion and translate it into policy effects, rather than in some underlying stability in either individual or aggregate public preferences. Particularly important in this regard will be institutions that allow elites to shape the agenda in ways that overcome or even exploit public intransitivities.

In the presence of intransitivities, the degree to which public opinion will either constrain or force action is a function of the ability of elites to develop and maintain observable majorities. When pollsters and pundits can order the debate, there is an impression of a stable public-opinion majority, even where structurally no such majority exists. Saddam Hussein, it would seem, had the sense that there was sufficient antiwar sentiment in the United States to prevent President Bush from sustaining an effort to reverse the Iraqi annexation of Kuwait. It may be that the more sophisticated analysis of public attitudes available to the White House—some of it sponsored by a group called Citizens for a Free Kuwait[43]—allowed the Bush administration to see the potential for garnering public support for a more interventionist policy.

The problems of aggregating public opinion present both opportunities and dangers for political leaders. The opportunity is reflected in the fact that any proposal in the cycle can get the approval of a majority. The concomitant danger is that any proposal in the cycle can be beaten by another policy. To the degree that effective leaders can set the agenda to order the alternatives, they will be able to point to the existence of public support. The difficulty is that there are other political elites who have other priorities and will also be working to shape the debate. Presidential leadership is particularly critical. A president will need to take the initiative to set the terms of the public debate. Failing this, the president must be aware that what looks like a majority today may prove vulnerable to other actors who can effectively change the agenda tomorrow.

Social choice problems thus pose a challenge for our conceptions of democracy that should not be underestimated. But in thinking about the implications for the ultimate stability and rationality of foreign policy it is important to maintain a comparative perspective. Elites, too, in both democratic and nondemocratic states can also have collectively intransitive preferences. Rosenau and Holsti, for example, have

[38] Two recent pointers to this large literature are Russett (fn. 2); and Page and Shapiro (fn. 3).

[39] Aldrich, Sullivan, and Borgida (fn. 3); Page and Shapiro (fn. 3).

[40] Mueller (fn. 13), xiii.

[41] Miroslav Nincic, *Democracy and Foreign Policy: The Fallacy of Political Realism* (New York: Columbia University Press, 1994); Bruce Russett, *Grasping the Democratic Peace: Principles for a Post-Cold War World* (Princeton: Princeton University Press, 1993); Kurt Taylor Gaubatz, "Democratic States and Commitment in International Relations," *International Organization* (forthcoming); Page and Shapiro (fn. 3); Russett (fn. 2).

[42] Niccolo Machiavelli, *The Discourses*, trans. Leslie Walker and ed. Bernard Crick (1531; Middlesex, England: Penguin, 1970), bk. 1, discourse 58, p. 252.

[43] Brace and Hinckley (fn. 35).

chronicled the breakdown of the American elite foreign policy consensus that emerged from World War II.[44] Not surprisingly, given the inevitable links between elite and mass opinion, the dimensions they identify are quite similar to the dimensions identified by Hinckley and others in American public opinion. Effective foreign policy will require decision-making institutions that can effectively control the potential for cycles among both elites and the public.[45]

CONCLUSIONS

In the study of public opinion, we have learned much about the depth of public knowledge and the vagaries of political communication. Important advances have been made in understanding the role of question wording and of the context in which questionnaires are crafted and polls are conducted. While these developments are important, there remains a need for more sophistication in how we collect and interpret the opinions we observe as societal preferences. Too often the study of public opinion has been conducted without adequate reference to the dynamics of social choice. Our ability to derive an aggregate sense of popular attitudes will be limited until the conduct and interpretation of polls is more fully informed by an understanding of the underlying dimensions of the issues at hand.

I have demonstrated here the applicability of the well-developed theories of social choice to some of the problems in analyzing public opinion on the question of military intervention. As should be clear by the fact that the most famous formulation of the public choice problem was produced by Kenneth Arrow in response to a question about identifying national preferences in the conduct of international affairs, this is not a novel enterprise. But despite some forty years of rigorous work on these problems, they remain surprisingly unacknowledged in the literature on public opinion and foreign policy.[46] These issues deserve more careful and systematic consideration in the public opinion literature; they are ignored only at considerable cost to our understandings and analytics.

[44] James Rosenau and Ole Holsti, "U.S. Leadership in a Shrinking World: The Breakdown of Consensuses and the Emergence of Conflicting Belief Systems," *World Politics* 35 (April 1983).
   [45] Bruce Bueno de Mesquita, *The War Trap* (New Haven: Yale University Press, 1981), 12-18.
   [46] One exception to this point is the recent work of Bruce Russett on the dynamics of democracy and security policy. See Russett (fn. 2), 115-18. Page and Shapiro (fn. 3) mention the problem (p. 27, and p. 438 n. 2) but give little consideration to its implications.