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Research psychologists cannot tell us the ultimate motives behind Soviet foreign policy or the true causes of the cold war. They can, however, use content analysis methods with records of successful application in other contexts to explore the links between rhetoric and action in American–Soviet relations. This article describes a series of studies on the integrative complexity of American and Soviet foreign policy rhetoric. An ongoing time-series study (1945–1986) reveals a variety of determinants of policy rhetoric: the rhetoric of the other side, impending or current policy initiatives, American presidential election campaigns, and changes in both the American and Soviet leadership. The paper also describes preliminary work on the integrative complexity of statements of key Soviet leaders on economic and foreign policy issues, demonstrating that the current Soviet leader, Mikhail Gorbachev, is significantly more complex than either his immediate predecessors or his traditionalist rivals for the leadership. The article considers implications of the “Gorbachev effect” for our understanding of domestic Soviet politics and for designing American policy toward the Soviet Union.

Debates over the political intentions of the Soviet leadership provoke sharp conflicts among American foreign policy analysts. Advocates of “liberal” conflict-spiral positions argue that Soviet motives are fundamentally defensive (driven by security concerns) and that the current geopolitical and military competition between the superpowers derives less from the incompatibility of the actual interests of the United States and Soviet Union, and more from the propensity of

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each side to exaggerate the hostile intent of the other (cf. Deutsch, 1983; White, 1984). Advocates of "conservative" deterrence positions argue that Soviet motives are fundamentally offensive (driven by expansionist objectives) and that further Soviet encroachments on Western interests can only be prevented by firm displays of power and the willingness to use it (cf. R. Osgood, 1981; Wildavsky, 1983). And there are, of course, many shades of opinion between these two positions. Soviet foreign policy may be guided by a complex mixture of defensive and opportunity offensive motives. The appropriate Western reaction may require a delicate balancing of reassurance (tension-reduction initiatives) and deterrence (implicit or explicit threats), with the exact blend depending on the issues in contention and the surrounding political context (Breslauer, 1983; George, 1983; Lebow & Stein, 1987; Tetlock, 1987).

From the standpoint of preserving world peace, the critical question is: Who is right? How can debates among these competing schools of thought be adjudicated? Unfortunately, investigators have been able to make little headway here. A key obstacle to progress has been the looseness of the ground rules that govern debates over Soviet foreign policy objectives. As I have noted elsewhere (Tetlock, 1983a), it is disconcertingly easy to attribute apparently conciliatory Soviet acts (e.g., interest in arms control) to aggressive motives (e.g., effort to gain some political–military advantage), and likewise to attribute apparently expansionist acts (e.g., intervention in Afghanistan) to defensive motives (e.g., to prevent fundamentalist Islamic unrest from spilling over into Soviet Central Asia). As long as participants in these debates lack shared standards of evidence and methods for interpreting Soviet conduct, it is difficult to see any escape from this intellectual impasse.

I do not claim in this article to have resolved the now 41-year-old debate over Soviet geopolitical objectives. My goals are both more modest and more attainable. The essence of my argument can be summarized in two key propositions: (1) research methods—derived from work in the behavioral sciences—can be directly applied to the analysis of both American–Soviet interactions and internal developments within the Soviet Union; and (2) these methods will not reveal the "true intentions" of the Soviet leadership, but they can be powerful tools for detecting empirical regularities with important theoretical and policy implications.

This article focuses on applications of one particular research method—integrative complexity coding—to the analysis of American–Soviet relations. Its first section describes the integrative complexity coding system and provides a brief overview of previous archival and experimental research on the construct. The second section presents research data from an ongoing time series study (1945–1986) of links between the integrative complexity of American and Soviet foreign policy rhetoric and major political–military developments within the superpower relationship. The third section presents data on the impact of recent changes in the Soviet leadership on the integrative complexity of both economic and foreign policy statements. The paper concludes by exploring possible psychological and political explanations as well as potential policy implications of the data.

Background of the Integrative Complexity Construct

My research has focused on assessing the "integrative complexity" of statements that key officials of the American and Soviet governments make on relations between their two countries. The coding system used in this work has an extensive history of applications in other research contexts—both archival and experimental (for detailed reviews, see Schroder, Driver, & Streufert, 1967; Streufert & Streufert, 1978; Tetlock, 1986b). To understand the research on American–Soviet relations, it is critical to understand these earlier applications of the integrative complexity coding system.

The Early Trait View

Integrative complexity theory was originally developed to explain individual differences in the complexity of the cognitive rules that people use to analyze incoming information and to make decisions (Harvey, Hunt, & Schroeder, 1961; Schroder et al., 1967). The theory focused on two cognitive stylistic variables: differentiation and integration. Differentiation refers to the number of distinct dimensions of a problem that are taken into account in interpreting events. For instance, a politician might analyze policy options in an undifferentiated way by placing options into one of two value-laden categories: the "good socialist policies," which promote redistribution of wealth, and the "bad capitalist policies," which preserve or exacerbate inequality. A highly differentiated speaker would recognize that different policies can have many, often contradictory, effects that cannot be readily classified on a single evaluative dimension of judgment—for example, effects on the gross national product, the government deficit, interest rates, inflation, unemployment, the balance of trade, and a host of other economic and political variables. Integration refers to the development of complex connections among differentiated characteristics. (Differentiation is thus a prerequisite for integration.) The complexity of integration depends on whether the decision maker perceives the differentiated characteristics as operating in isolation (low integration), in first-order or simple interactions (the effects of A on B depend on levels of C—moderate integration), or in multiple contingent patterns (high integration).

Advocates of the early trait view of integrative complexity relied heavily on the semiprojective Paragraph Completion Test for assessing individual differences in cognitive functioning. Subjects were presented with sentence stems,
and asked to complete each stem and to write at least one additional sentence. Trained coders rated subjects' responses on a 7-point scale designed to measure the complexity of thinking in the topic area. Scores of 1 reflected low differentiation (lack of awareness of alternative perspectives on events, reliance on rigid rules for making decisions). For example:

Rules are made to keep society from deteriorating into complete anarchy and chaos. We have law enforcement agencies to make sure that people follow rules. If people fail to regulate their behavior in accord with the rules, punishment follows. No society has ever been able to survive without rules and some form of punishment to back those rules up.

Scores of 3 reflected moderate to high differentiation, but low integration (awareness of alternative ways of viewing problems, but no recognition of relationships between viewpoints). For example:

Rules have both positive and negative features. On the positive side, rules are critical for maintaining social order and cohesion. On the negative side, rules can prevent people from thinking for themselves.

Scores of 5 reflected moderate to high differentiation and moderate integration (development of comparison rules to integrate differentiated perspectives). For example:

Rules are necessary for society to function well. However, obeying a bad rule or law can sometimes be worse than disobeying it. Obedience to bad rules gives them added strength. The rules we use to guide our behavior must therefore be subject to examination and, when necessary, be revised to deal with a changing world.

Scores of 7 reflected high differentiation and high integration (development of complex comparison rules to integrate differentiated perspectives). For example:

Rules are one way by which human beings regulate their social relationships. Rules serve different functions in different situations. Sometimes rules are instruments of oppression; sometimes they prevent oppression; sometimes rules promote efficiency; sometimes they impede it. The functions rules serve change over time. Rules are the product of constantly changing relationships among the individuals who make up a society. As such, rules are shaped by the evolving needs of both individuals and society.

Scores of 2, 4, and 6 represented transition points between adjacent levels (e.g., implicit differentiation or integration).

Two points concerning the integrative complexity coding system deserve mention here. First, with adequate training (two to three weeks), coders can rate verbal responses for integrative complexity with high levels of reliability (inter-rater correlations between .85 and .95). Second, the complexity coding system focuses on the cognitive structure—not the content—of expressed beliefs, and is not biased for or against any particular philosophy. One can be simple or complex in the advocacy of a wide range of political positions. For instance, Karl Marx and Adam Smith developed highly complex arguments to support polar opposite positions on fundamental economic issues (communism versus capitalism). This does not mean, however, that integrative complexity is equally distributed across the political continuum. We shall see later that integrative complexity of political thought is related—although in rather complex ways—to the content of political thought.

Early laboratory research showed that systematic individual differences do, indeed, exist in integrative complexity. The Paragraph Completion Test demonstrated predictive power in a variety of experimental settings, including Inter-Nation Simulations of crisis decision making (Driver, 1965; Schröder et al., 1967; Streufert & Streufert, 1978), studies of bargaining and negotiation behavior (Pruitt & Lewis, 1975; Streufert & Streufert, 1978), and studies of attitude change (Crano & Schroeder, 1967; Streufert & Fromkin, 1972). Relative to integratively simple subjects, subjects classified as integratively complex utilized a broader range of information in forming impressions of others and in making decisions, were more tolerant of dissonant or incongruent information, and were more likely to achieve mutually beneficial compromise agreements in mixed-motive bargaining games. This latter finding is particularly relevant to the time-series data on American–Soviet relations to be discussed later.

The Interactionist View of Integrative Complexity

These empirical successes notwithstanding, it became clear by the late 1960s that a static trait model of integrative complexity was inadequate. Integrative complexity of cognitive functioning in a given point in time was not just a function of stable dispositional variables (e.g., the early learning and socialization experiences stressed in the developmental theory of Harvey, Hunt, and Schroeder, 1961). Several experiments indicated that situational variables—threats to important values, time pressure, and information load—also influenced integrative complexity (Driver, 1965; Schröder et al., 1967). Some environments were much more conducive to complex information processing than were others. For instance, a series of Inter-Nation Simulation experiments revealed the following:

1. Integratively complex thought is particularly difficult to achieve under crisis conditions (high threat, time pressure, and information load). Integratively complex thought is most likely to emerge under moderate levels of these "environmental stressor" variables.

2. Individual differences in integrative complexity influence how people react to changing levels of these environmental variables (e.g., one's dispositional integrative complexity influences the "optimal level" of environmental variables for encouraging complex thought).

Another critical development in the evolution of integrative complexity theory occurred in the mid-1970s. Prior to that time, research was limited to
experimental studies that examined the interactive effects of dispositional integrative complexity (assessed by the Paragraph Completion Test) and situational variables (environmental stressors) on subjects’ selection of “low-involvement” response options (i.e., endorsing attitudes or making decisions with no important consequences for subjects’ own futures or those of others). The external validity limitations of such studies are well known (cf. Janis & Mann, 1977; Tetlock, 1983b). In an innovative study of revolutionary leaders, Suedfeld and Runk (1976) showed that, unlike other measures of cognitive style, which are linked to specific paper-and-pencil tests (e.g., the Dogmatism or Tolerance of Ambiguity scales), the integrative complexity coding system is a flexible methodological tool that can be used to analyze a variety of archival documents, including letters, diaries, essays, and speeches of revolutionary leaders.

Since then, many studies have used the integrative complexity coding system to analyze a broad range of archival documents and to test an even broader range of hypotheses (for a review, see Tetlock, 1986b). These novel applications of the coding system have enormously expanded the data base of integrative complexity theory. The coding system has been used to analyze diplomatic communications during major international crises, transcripts of Japanese cabinet meetings prior to the attack on Pearl Harbor, pre- and post-election speeches of American presidents, senatorial policy statements, confidential interviews with British parliamentarians, Supreme Court opinions, and newspaper and magazine editorials. These archival studies have also accelerated the theoretical movement away from the static trait model of integrative complexity. The “nomological network” (Cronbach & Meehl, 1955) surrounding the integrative complexity construct has expanded to include a much wider array of hypotheses than even the later “interactionist” theories of integrative complexity had anticipated. Consider, for instance, the following list of ideological and social determinants of integrative complexity (all relevant to our later discussion of determinants of American and Soviet foreign policy rhetoric):

1. The integrative complexity of U.S. presidential candidates rises dramatically almost immediately upon their election to office (Tetlock, 1981a). Most candidates evidently believe the best way to rally electoral support is to present issues in sharp, dichotomous, good-versus-bad terms (my policies will lead only to positive consequences; my opponent’s policies, only to disaster). Most presidents evidently believe a more complex rhetorical approach is appropriate once they are responsible for making difficult trade-off decisions that require balancing conflicting values and that inevitably offend influential constituencies (e.g., on the one hand, we want to balance the budget; on the other hand, we recognize the need to help the poor and keep taxes down).

2. Policy makers in minority roles in legislative or judicial bodies (e.g., Senate, Supreme Court) make less complex policy statements than policy makers in majority roles (Tetlock, Hannum, & Michelleti, 1984; Tetlock, Bernzweig, & Gallant, 1985). One explanation is that occupants of the majority role are accountable for the actual consequences of the policies that they endorse, and thus feel a need to anticipate potential problems or shortcomings in those policies. By contrast, occupants of the minority role work within fewer reality constraints. They are free to blast the policies advocated by the ruling majority and to exaggerate the benefits that would flow from pursuing their preferred alternative.

3. Although politicians do adjust the complexity of their rhetoric to changing situations, certain ideological groups have lower “baseline” levels of integrative complexity than other ideological groups. Highly conservative or traditional politicians, for instance, generally make less complex statements than do centrists or moderate left-wing reformers (true in the U.S. Senate and the British House of Commons). If, however, one goes far enough to the left (e.g., radical socialist members of the British Labour party), one finds a sharp decline in integrative complexity (Tetlock, 1984).

4. The complexity–ideology relationship is partly mediated by the intensity of value conflict activated by different issues for different political groups (Tetlock, 1986b). Centrist and moderate left-wing groups tend—in Western democracies—to be more integratively complex, in part because they hold more (at least superficially) contradictory political values—e.g., economic efficiency versus social equality in domestic policies, deterrence versus tension reduction in superpower relations, crime control versus due process in the law. It is possible, however, to identify issues on which conservatives are as integratively complex as moderates and liberals—e.g., issues that activate conflicting values such as defense spending versus fiscal prudence.

5. Although researchers have identified both role-by-ideology effects and issue-by-ideology interactions in integrative complexity, we should not completely dismiss the trait model of integrative complexity. Certain types of individuals (ideologues in general and highly nationalistic ideologues in particular) show remarkably little variance—across audiences and issues—in the integrative complexity of their policy statements.

Integrative Complexity Trends in American–Soviet Relations

The foregoing remarks reveal that the integrative complexity of a person’s style of reasoning can be shaped by a wide range of variables—including the personality of the individual, the issue domain under discussion, the social and
informational environment, and impression management objectives. My research on American–Soviet relations points to a similar conclusion. This work has revealed the integrative complexity of American and Soviet foreign policy rhetoric to be a complex function of individual differences among leaders, the policy initiatives of the two countries, and major domestic political and international events.

It is useful to begin by examining the forms that integratively simple versus complex rhetoric take in American–Soviet relations. Integratively simple rhetoric typically draws an undifferentiated portrait of both one's own motives and those of one's adversary. Thus, an American policy maker might argue that détente failed for "essentially one reason—bad faith on the part of the Soviets" (Tetlock, 1985, p. 1570)—e.g., the Soviets perceived a lack of resolve on the part of Western powers in the mid-1970s and tried to capitalize on this weakness through a series of interventions in Third World countries (e.g., Cambodia, Angola, Ethiopia, Afghanistan), and the result was a powerful political backlash against the Soviet Union. Or a Soviet policy maker might argue that the arms race between the two countries is driven by the unwillingness of the American government to accept the principle of superpower equality—the American government is determined to achieve strategic nuclear superiority over the Soviet Union, no matter what the cost.

Integratively complex rhetoric offers more differentiated appraisals of the motives of the other side. An American policy maker might argue, for example, that détente failed in part because of "Soviet duplicity," but also in part because of the vagueness of the political understandings on which détente was originally based—each side interpreted these understandings in highly self-interested ways (e.g., different assessments of what types of restraint were expected in interventions in Third World conflicts or of what counts as a "new missile" as opposed to an "upgrading of an old system"). Or a Soviet policy maker might argue that serious internal political divisions exist within the United States—one political faction with close links to the "military–industrial complex" seeks to pursue a policy of "encirclement" of the Soviet Union ("playing the China card"); the other faction recognizes the futility of seeking geopolitical dominance in an era of mutually assured destruction.

The most integratively complex statements go beyond offering differentiated assessments of adversaries and note (a) how differentiated motives interact to produce policy outcomes and (b) the types of trade-offs that each superpower must make in order to avoid nuclear war. Thus an American policy maker might argue that strategic nuclear policy requires balancing the need to maintain a credible deterrent (which may even include weapons with "first-strike potential") and the need to reassure the Soviet Union that the United States is not attempting to upset the nuclear balance of power (a trade-off rule). Or a Soviet commentator might argue that American foreign policy is so "erratic" because...
the general secretary of the Soviet Communist Party, the foreign minister, and official editorials in the government-controlled newspapers Pravda and Izvestiya.

2. The statement had to be primarily concerned with problems that bore directly on American–Soviet relations. Examples included disputes over

Berlin, the role of West Germany in NATO, Iran, Greece, Turkey, Czechoslovakia, Korea, Austria, the Hungarian crisis, the Suez crisis, Cuba, Vietnam, the Arab–Israeli conflicts, the Ethiopian–Somalian war, and Afghanistan. Also included were statements on American–Soviet negotiations on such topics as trade, scientific–cultural cooperation, and conventional and nuclear arms control.

The actual scoring of these policy statements was conducted by four trained coders (two of whom were unaware of both the hypotheses tested and the sources of the material analyzed). Mean interrater agreement was high ($r = .91$). Research staff also checked on the possible confounding influence of length of statements on integrative complexity. No significant differences were observed in the length of American and Soviet statements, and only low positive correlations existed between length of statement and integrative complexity for both superpowers ($r = .10$).

The data were subjected to a variety of multivariate statistical techniques, including ARIMA time-series and two-stage least squares regression procedures (cf. Tetlock, 1985; Tetlock & McGuire, 1984). Below, I sketch the major findings that have emerged from these analyses.

Parallel Monologues or Dialogue?

Some influential observers of American–Soviet relations have suggested that policy rhetoric is essentially epiphenomenal. The Soviet government, in this
view, pays a good deal of attention to real indices of power (e.g., economic growth, defense spending, NATO solidarity), but pays little attention to the symbolic posturing of the American government. Our data suggest that this interpretation is at least partly wrong. The integrative complexity of Soviet rhetoric appears to be a direct function of the integrative complexity of American rhetoric in the same time period. These findings support the claims of those Sovietologists who contend that the Soviet government is indeed highly sensitive to the tone and content of Western policy pronouncements (e.g., Bialer, 1981; Daflin, 1981).

The influence process also works in the other direction. The integrative complexity of American rhetoric appears to be a direct function of Soviet rhetoric in the immediately preceding quarter-year period. It is also worth noting that to the degree that an asymmetry exists, American rhetoric seems less responsive to Soviet rhetoric than vice versa. American rhetoric on the Soviet Union may often be as much directed to domestic audiences as to foreign ones.

The Impact of Domestic American Politics

Our time-series model revealed American presidential elections to have a generally depressing effect on the integrative complexity of American policy statements on the Soviet Union. Presidents appear to believe low-complexity statements work to their political advantage (it is good politics not to seem "soft" on the Soviets). And presidents may well be correct in this supposition. Popular support for presidents rises when the United States threatens or actually initiates military action against foreign powers (a rather robust rally-around-the-flag effect). The invocation of outgroup threat is an effective means of increasing ingroup solidarity and support for unifying symbols such as the presidency, at least in the short term (cf. Brewer & Kramer, 1985; Mueller, 1973; Russett, in press).

It is disconcerting to suppose that in this nuclear age politicians might be tempted to engage in saber rattling for short-term political advantage. It is important to realize, however, that the election effect is not an absolute or immutable law. Inspection of Fig. 4, for instance, reveals an intriguing exception to the election effect: 1984. Here the primary challenge to the president was perceived to come from the political left (e.g., the "freeze" movement); the Reagan administration's response was to increase—albeit only slightly—the integrative complexity of its policy statements on the Soviet Union. Although the effect was small, it illustrates the need to take into account boundary conditions on the effects that emerge from our time-series and regression analyses. The main effects of time period A can quickly become the interactive effects of time periods A and B. The climate of public opinion—and the norms that regulate political debate—can and do change.

Links Between Words and Deeds in American–Soviet Relations

Our time-series analyses revealed powerful relationships between the integrative complexity of policy rhetoric and the actual policy behavior of the superpowers. For both the United States and the Soviet Union, low integrative complexity was associated with undertaking major military–political interventions in other countries (e.g., Iran, Berlin, Korea, Lebanon, Cuba, Vietnam, Cambodia, Angola); high integrative complexity was associated with the successful culmination of negotiations on issues that had been major sources of tension in the superpower relationship (e.g., the partial test-ban treaty, the non-proliferation treaty, SALT I and II). These findings make sense from both a psychological and a political perspective.

From a psychological point of view, policy statements reflect, albeit imperfectly, how key government officials perceive and interpret events. The integrative complexity of these perceptions shapes foreign policy behavior. Low integrative complexity predisposes policy makers to adopt competitive initiatives that give little consideration to the concerns of the other side; high integrative complexity encourages policy makers to seek compromise agreements that take into account the interests of both parties. In the words of Pruitt and Lewis (1975, p. 628), integratively complex bargainers are more likely "to gather information about one another's utility structures" and to achieve insights into how to "coordinate" those different structures. The Tetlock (1985) findings amount to a conceptual replication of earlier experimental work that documented relationships between integrative complexity (as a cognitive style variable) and preference for coordinative solutions to conflicts of interest (cf. Driver, 1965; Pruitt & Lewis, 1975).

From a political impression-management point of view, policy statements are best thought of not as reflections of how policy makers think, but rather as strategic communications designed to manipulate the views of important domestic and international audiences. The integrative complexity of policy statements is not a cause but rather an integral part of a competitive or coordinative bargaining strategy. Integratively simple statements that present issues in stark, black-white terms are means of communicating firmness of resolve and unwillingness to abandon core commitments. Integratively complex statements, which differentiate issues into component parts and suggest methods of resolving conflicts or trade-offs, are means of communicating interest in coordinative initiatives.

Disentangling the perceptual–cognitive and impression-management interpretations of the data is extremely difficult (cf. Tetlock & Maustead, 1985). For now, it must suffice to note that both viewpoints help explain the powerful association between integrative complexity of policy statements and international conduct. The high points of integrative complexity in the last 41 years are also, by historical consensus, the periods of the greatest cooperation in American–
Soviet relations: the end of World War II (1945), the aftermath of the Cuban missile crisis (1962), the détente period of the Richard Nixon/Henry Kissinger administration (1972–1974), and the last flickering of détente at the end of Jimmy Carter's administration (1979). The low points of integrative complexity are widely regarded as periods of the most intense American–Soviet rivalry: the Berlin blockade crisis of 1948, the Korean War (1950–1953), the hostile atmosphere throughout the 1950s, the renewal of much of that hostility in the aftermath of the invasion of Afghanistan (December 1979) and the election of Ronald Reagan (November 1980). If nothing else, the integrative complexity of policy rhetoric provides us with a highly face-valid measure of tension in the superpower relationship.

The robustness of the association between integrative complexity and competitive-coordinative policy is impressive, but perhaps not surprising. Other investigators have documented similar relationships. The data on the timing of the complexity-policy relationship are equally robust, but much less intuitively obvious. In the American case, integrative complexity tends to shift in the same quarter-year periods as those in which American policy initiatives occur. Thus, integrative complexity falls at about the same time as the signing of major treaties with the Soviet Union. In the Soviet case, by contrast, rhetorical shifts tend to precede policy initiatives. Thus, Soviet integrative complexity falls approximately one quarter-year prior to major Soviet military interventions abroad; Soviet integrative complexity rises approximately one quarter-year prior to the signing of major treaties with the United States.

I can only speculate on why rhetorical shifts predict Soviet international behavior, but not American. Is Soviet foreign policy more premeditated than American policy? Are the Soviets deliberately trying to create a political atmosphere supportive of what they plan to do in the near future? Or do these anticipatory rhetorical shifts provide us with unintended clues as to future Soviet behavior (a “leakage” hypothesis)? It is, at any rate, certainly curious that a society with a reputation for secrecy should issue foreign policy statements that are more predictive of future behavior than a society with a reputation for openness.

Whatever the ultimate explanation, the policy implications of the findings should be noted carefully. The integrative complexity of policy rhetoric may be useful not only for monitoring but for predicting trends in American–Soviet relations. In the jargon of economic forecasting, integrative complexity is a "lead indicator." For instance, Tetlock and McGuire (1984) used a combination of Bayesian and regression estimation procedures to explore the predictive power of the integrative complexity variable. For the years between 1945 and 1983 (154 quarter-year periods), they used regression procedures to identify 17 unexpected downward shifts in Soviet integrative complexity (below the 80% confidence interval) and 14 unexpected upward shifts (above the 80% confidence interval). These rhetorical shifts permitted surprisingly accurate predictions of foreign policy behavior. The 17 downward shifts immediately preceded 6 major Soviet military–political interventions abroad, leaving 5 major interventions unpredicted and 11 false positives. The estimated probability of a major Soviet competitive act, given a downward shift in integrative complexity in the previous quarter-year period, was .35 (nearly a fivefold improvement over the chance accuracy rate of .073). Among the successful predictions (hits) were the Soviet coup in Czechoslovakia (February 1948), the North Korean invasion of South Korea (June 1950), the erection of the Berlin Wall (August 1961), the Soviet attempt to place intermediate range nuclear missiles in Cuba (July–September 1962), and the invasion of Afghanistan (December 1979). Among the unsuccessful predictions (false negatives) were the Soviet invasion of Czechoslovakia (August 1968), the Soviet threat to intervene in the Yom Kippur War (October 1973), and the large-scale Soviet–Cuban interventions in Angola (October–November 1975) and Ethiopia (December 1977–January 1978).

Even more impressive results were obtained for predicting major American–Soviet agreements. The 14 upward shifts immediately preceded 9 major agreements, leaving two agreements unpredicted and 5 false positives. The estimated probability of a major American–Soviet agreement, given an upward shift in integrative complexity in the preceding quarter-year period, was .64 (approximately a ninefold improvement over the chance accuracy rate of .073). Among the successful predictions were the agreement to lift the Berlin blockade (April 1949), the truce agreement ending the Korean War (July 1953), the Geneva settlement of the Indo-Chinese conflict (July 1954), the Austrian peace treaty (May 1955), the peaceful resolution of the Cuban missile crisis (October 1962), the partial test-ban treaty (July 1963), the nuclear nonproliferation treaty (May 1968), the SALT I treaty limiting antiballistic missile systems and certain types of strategic delivery vehicles (April 1972), and the SALT II treaty placing further limits on strategic nuclear weapons systems (June 1979). Among the unsuccessful predictions were the Vladivostok understanding on the arms race (November 1974) and the Helsinki declaration on European boundaries and human rights (August 1975).

These forecasting data raise intriguing questions. Can the statistical procedures used for “postdiction” also be used for prediction? Is it possible, for example, to predict competitive Soviet behavior or Soviet interest in reaching agreements from careful monitoring of rhetorical cues? Cautious optimism appears justified. The forecasting power of the integrative complexity variable—taken alone—is impressive. And it may well be possible to improve forecasting accuracy even further by including additional variables (e.g., other aspects of rhetoric, and military–political–economic event data). That said, however, two qualifications also deserve note. First, Tetlock and McGuire (1984) report a
substantial number of "false positive" predictions (11 for competitive acts; 5 for coordinative ones). Second, time-series predictions are ultimately forms of inductive inference. Such predictions hold up well only to the degree that the same basic causal processes are at work in the future that were at work in the past. A major shift in the Soviet leadership and its style of conducting foreign policy—such as may be occurring now—could throw off our predictions. One should not, moreover, forget the dynamic strategic character of much foreign policy. If it were to become widely known that some property of Soviet rhetoric quite reliably predicts future Soviet behavior, the prediction might well become a self-negating prophecy.

Leadership Transitions

The integrative complexity of policy rhetoric also appears to depend on the nature of the current American and Soviet leadership. The American data do not, however, support the "ideological main effect" hypothesis that conservative administrations would issue consistently less complex statements than moderate or liberal administrations. The tone of American—Soviet relations, and the interest of the administration in pursuing some form of detente relationship with the Soviet Union, seem more critical determinants of integrative complexity than the general ideological orientation of the administration. The two most complex administrations—those of John Kennedy and Richard Nixon—are distinguished by their systematic efforts to moderate American—Soviet competition (e.g., weapons testing, arms control) and to foster cooperation. The least complex administrations—those of Harry Truman, Dwight Eisenhower, and Ronald Reagan—are distinguished by their emphasis on the need to deter Soviet "expansionism" and by their pessimism about achieving viable compromise agreements with the Soviet Union.

The Soviet data reveal two intriguing leadership transition effects. The first effect occurred immediately after the death of Stalin with the emergence of a collective leadership (the Georgy Malenkov/Nikita Khruushchev period). The official Stalinist image of the United States left little room for integrative complexity. The United States was depicted as a de facto one-party state governed by monopolists who manipulated the political and economic life of the country for their own benefit, and also pursued an aggressive policy of encirclement and intimidation toward the Soviet Union. Since 1953, this image of superpower relations—a world divided into two irreconcilable camps—has undergone major transformations (cf. Griffiths, 1984). Conceptual differentiation has emerged on several different levels: acknowledgment of the possibility of conflict within the American ruling class, of the possibility that American political life is not completely subordinate to monopolists and capitalists (e.g., limited autonomy of the presidency), and of the possibility that "reasonable capitalists" recognize the

futility of efforts to destroy the Soviet Union in the nuclear age (the necessity of peaceful coexistence). This trend toward complexity—noted by Griffiths (1984)—is by no means, however, a linear one, as our data make clear. Integrative complexity is higher in the post-Stalin era but shows a great deal of fluctuation within leadership periods.

The second effect has emerged only very recently. The integrative complexity of Soviet statements rose upon the death of Konstantin Cherneenko and the coming to power of Mikhail Gorbachev. As Fig. 4 indicates, Soviet integrative complexity has moved from a mean of 1.4 (first quarter 1985) to 1.8 (second quarter 1985) to 2.2 (first quarter 1986) to 2.4 (fourth quarter 1986). Tetlock and Boettger (1987) have labeled this statistically significant trend "the Gorbachev effect."

What conclusions should be drawn from these data? One possibility is that the current Soviet leadership is indeed genuinely interested in reversing the deterioration of American—Soviet relationships of the early 1980s, in placing limits on superpower competition, and in reaching mutually beneficial compromises on divisive issues. Gorbachev and his new Foreign Minister Shevardnadze have advanced a number of at least superficially conciliatory proposals: the elimination of intermediate range nuclear forces in Europe, a ban on weapons in space, "deep cuts" in strategic nuclear forces, and a moratorium on all nuclear testing. Once again, one can observe an association between coordinative policy initiatives and integrative complexity.

Another possibility is that the new Soviet leadership is not genuinely accommodative, but rather trying to achieve through subtle political means what it cannot achieve through military, technological, and economic competition. In the last six years, the United States has devoted enormous resources to an unprecedented peacetime military buildup—all at a time of lagging Soviet economic and technological growth. By sounding conciliatory and reasonable, the Soviets may hope to erode political support for defense spending in the West and encourage support for arms control. Arms control, at this time, may well be in the Soviets' interest. It would permit devoting increasingly scarce resources to agricultural and industrial modernization and reform. But, so the argument runs, once the Soviets have revitalized their domestic economy, they will assume a more truculent and belligerent international posture.

Which interpretation is correct? And, indeed, does it matter a great deal? (After all, Anwar Sadat may have traveled to Jerusalem in 1977 out of political—economic necessity, but the result was still an Israeli—Egyptian peace agreement.) My time-series data do not, of course, tell us the true motives underlying Gorbachev's foreign policy. Much hinges on one's assessment of the Soviet political—economic—military system. Is the Soviet system relentlessly expansionist—driven by its ideological commitments, its totalitarian nature, and its quest for domestic legitimacy? Do Gorbachev's policies merely illustrate the
tactical flexibility with which the Soviets pursue these expansionist goals? Or is this conservative deterrence analysis far too simplistic and deterministic to capture the complex and contradictory forces shaping current Soviet policy? Are the objectives of Soviet foreign policy continually being defined and redefined, depending on both domestic political and international developments? Is the notion of a master plan behind Soviet foreign policy nothing more than an historical illusion? My research does not answer these questions. My research only indicates that the Gorbachev effect resembles the upward shifts in integrative complexity that have, on numerous occasions, preceded major American--Soviet agreements. Whether the Gorbachev effect really represents a signal to the United States to enter into serious negotiations on key bilateral issues and which it is in the "national interest" of the United States to enter into such negotiations are issues that fall outside the scope of the current analysis.

How one interprets the Gorbachev effect depends not only on one’s factual assumptions about the nature of the Soviet Union, but also on one’s moral and political values. Decision makers must weigh the relative risks of two different perceptual errors. On the one hand, there is the danger of ascribing hostile intentions to a truly accommodative Soviet leadership (call this a Type I error). On the other, there is the danger of ascribing accommodative intentions to a truly hostile Soviet leadership that seeks merely to resume intense competition on more favorable terms at a later date (call this a Type II error). One’s policy preferences will be shaped not only by one’s estimate of the relative likelihoods of these two errors, but also by one’s relative distaste for the consequences of these two errors. Many deterrence theorists appear to prefer Type I to Type II errors; many spiral theorists appear to prefer Type II to Type I errors. Deterrence theorists abhor the prospect of repeating the errors of appeasement in the nuclear age; spiral theorists abhor the prospect of failing to seize an opportunity to reduce tensions in American--Soviet relations. [It would, from this latter point of view, be both tragic and ironic if history were to record that C. Osgood’s (1962) GRIT strategy was tested in the mid-1980s, but by the Soviets—not the Americans—and that the strategy failed due to the rigidity of American perceptions of the Soviet Union—not the other way around.]

**Differences in Integrative Complexity Among Soviet Leaders**

It is premature to pass judgment on the nature of the new Soviet leadership. The secrecy of Soviet society, and the lack of direct access to high-level officials, make it extremely difficult to glean much useful information on the attitudes, beliefs, motives, and decision styles of Mikhail Gorbachev and his recent appointees to key party and government jobs. It would, however, be a mistake simply to give up on the task. In the last 15 years, there have been important advances in the development of content analysis techniques that permit operationalizing psychological constructs (cognitive style, motivational imagery) from a distance (cf. Hermann, 1980; Tetlock, 1983c; Winter & Stewart, 1977). I suggest that these content analysis techniques can shed interesting light on individual differences among Soviet leaders, as well as on variations in what these leaders say on different issues to different audiences.

I am certainly not the first investigator to use content analysis to study Soviet leaders or politics (see Hermann, 1980; Stewart, Warhola, & Blough, 1983; Triska & Finley, 1968). The study reported here does, however, represent the first attempt to apply a content analysis technique that has an extensive history of application in the psychological research literature to the statements of Soviet leaders. This methodological continuity may yield important interpretive advantages. A good deal is now known about both individual-difference correlates and situational determinants of integrative complexity in Western nations (e.g., political ideology, value conflict, accountability, stress). It is reasonable to ask to what extent these relationships hold up in the Soviet political system.

There is, for example, strong experimental evidence that people are likely to think about a policy issue in integratively complex ways to the degree that the policy issue activates two values that are perceived as both important and in conflict with each other (e.g., freedom of expression versus traditional moral values in debates over pornography; protecting nature versus promoting economic growth in debates over mining in public parks). Under such conditions, people feel greater psychological and political pressure to think in complex trade-off terms: How much of x am I willing to give up for this much y? (Cf. Tetlock, 1986a). A similar sort of process may be going on inside the Soviet Union. Analysts of Soviet politics who agree on little else agree on the difficulty of the choices currently confronting the Soviet leadership—choices between maintaining centralized political control versus improving economic efficiency by giving local managers more autonomy and by introducing market incentives; expanding influence in the Third World versus improving relations with the United States; and devoting resources to defense spending versus modernizing the agricultural and industrial sectors of the economy (Byrne, 1981). Soviet leaders who place high priority on both values in a trade-off equation should be more likely to discuss that issue in an integratively complex way than Soviet leaders who place high priority on only one of the values.

In an exploratory study, we assessed the integrative complexity of policy statements that a number of recent Soviet leaders have made on both American--Soviet relations and current economic conditions within the Soviet Union. We coded a minimum of 30 paragraph-sized statements on American--Soviet relations and on the domestic economy for Leonid Brezhnev (1972–1974, the détente period), Brezhnev (1980–1982, the new cold war period), Yuri Andropov (1983), Konstantin Chernenko (1984), Grigory Romanov (1984–1985), and Mikhail Gorbachev (1984–1985). Two coders, unaware of the hypotheses,
The integrative complexity of Brezhnev's rhetoric on economic issues is much more stable over time. He acknowledges the existence of economic problems (e.g., inefficiency, lack of accountability), but typically only briefly and

mainly in the context of qualifying otherwise optimistic assessments of the general economic situation. We detect signs of implicit differentiation in Brezhnev's rhetoric on the economy, but few signs that Brezhnev perceives any contradictions between fundamental political goals (Soviet economic growth, technological development, political stability) and the perpetuation of the status quo.

Yuri Andropov, former head of the KGB, became general party secretary upon the death of Leonid Brezhnev in November 1982. Andropov attempted to inject new life into détente in his first months in office by making concessions, for example, on SS-20 launchers to head off the American Euromissile deployments. Andropov's offers were rejected. The missile deployments proceeded, and the Soviets walked out of the intermediate range nuclear force talks. After the walkout (August 1983), all signs of integrative complexity disappeared in Andropov's policy statements:

Even if someone had illusions as to the possible evolution for the better in the policy of the American administration, the latest developments have dispelled them ...

The Soviet Union will be able to make an appropriate response to any attempt to disrupt the existing military-strategic balance, and its words and deeds will not be at variance. (Quoted in Breslauer, 1983, p. 11)

In short, Andropov held the United States directly responsible for the sharp deterioration in American-Soviet relations. The Reagan administration was, in his view, pursuing provocative and hostile policies.

The late Brezhnev and Andropov periods are characterized overall by quite similar levels of integrative complexity on American-Soviet relations—strong negative feelings qualified by occasional statements concerning the need to strike deals on key issues. There is, however, an interesting discontinuity between the Brezhnev and Andropov periods in the treatment of economic issues. Andropov was significantly more likely than Brezhnev to make integratively complex statements on the economy. Andropov would couple praise for Soviet economic achievements with sharp critiques of corruption, poor working practices, and the need for more effective coordination within and across industries. Andropov also offered rather complex analyses of what needed to be achieved to restimulate the Soviet economy; offer greater autonomy to farmers and factory managers, improve accountability, devote more resources to the development of the rural infrastructure (roads, transport, storage facilities), and further the development of "agro-industrial complexes."

Konstantin Chernenko became general party secretary in February 1984, upon the death of Yuri Andropov. Chernenko's policy statements on American-Soviet relations were generally low in integrative complexity—like the statements of the late Brezhnev and Andropov periods. Chernenko's policy statements on domestic economic issues reverted back to the simpler Brezhnev style. Chernenko was more likely to offer unqualified praise for Soviet economic
achievements and to emphasize a "Brezhnevist style of leadership, a Brezhnevist concern for the interests of the people, and a Brezhnevist relationship to events" [i.e., a high threshold should be set for the purging of incompetent but loyal party officials—Breslauer, 1985, p. 6]. Chernenko’s approach was very much not to rock the political-economic boat (cf. Breslauer, 1985; Brown, 1985; Hough, 1985).

Mikhail Gorbachev assumed power in March 1985 upon the death of Konstantin Chernenko. His major traditionalist rival for the succession, it is widely agreed (Brown, 1985; Hough, 1985), was Grigory Romanov. Figure 5 provides an opportunity to compare the integrative complexity of the policy statements of these two men. The most obvious point to make is that Romanov makes far fewer integratively complex statements—on both domestic and foreign policy issues—than Gorbachev. This effect is not, moreover, due to variation in the times at which the two men spoke or the political audiences being addressed. For example, when one compares the election nomination speeches of the two men—both delivered at almost exactly the same time in February 1985—the same result emerges (Gorbachev, mean = 2.3 on foreign policy issues, mean = 3.4 on domestic political issues; Romanov, mean = 1.4 on foreign policy issues, mean = 1.5 on domestic policy issues).

On domestic issues, Romanov was more likely than Gorbachev to boast of, Soviet economic achievements (the world’s largest producer of steel and oil), educational achievements (the growing number of skilled and professional workers), and revolutionary achievements (“The stream of new life and the historic movement of socialism are gaining momentum and confidently sweeping obstacles from their path. Such is the onward march of history. No one can reverse it.”—Current Digest of the Soviet Press, 1985, 37(8), p. 9). By contrast, Gorbachev noted that the Soviet Union had reached “a very critical stage in its social and economic development” and that “difficult questions” had to be addressed concerning how to promote “further increases in the people’s well-being and the improvement of their spiritual and living conditions.” This, Gorbachev declared, is “no simple matter.” “The improvement of the economic mechanism and the entire system of economic management and the implementation of a number of structural changes in production are on the agenda. The accomplishment of these tasks is linked with the need for the faster development of science and technology and the introduction of their achievements in practice.” And that is not all. Much also depends on the “mobilization of the people’s creative potential, the bringing into action of all social, ideological, and moral resources, and the heightening of responsibility for personnel at all levels.” [Reference to problems of corruption, alcoholism, absenteeism, etc.—Current Digest of the Soviet Press, 1985, 37(8), p. 6].

We see similar, although less stark, differences in the integrative complexity of Gorbachev’s and Romanov’s statements on foreign policy. Romanov’s attacks on the United States are particularly sharp (American imperialism is determined to halt the process of social development and the national liberation of peoples). The United States has triggered a mounting arms race and “is hatching ominous aggressive plans.” “The Soviet state and its friends have made the only correct decision—to administer a resolute rebuff to imperialism’s aggressive proclivities” [Current Digest of the Soviet Press, 1985, 37(8), p. 10].

Gorbachev also perceives the international situation as tense and blames the United States. But because the situation is tense, Gorbachev declares the Soviet Union requires a multifaceted strategy—one of “rebuffing the aggressive forces’ attempts to achieve military superiority and damage the socialist commonwealth,” of “seeking opportunities for reducing tension and distrust,” of “limiting the arms race and achieving real disarmament,” of “providing new impetus to détente,” and of “finding mutually acceptable solutions to disputed questions” [Current Digest of the Soviet Press, 1985, 37(8), p. 7].

Gorbachev, in short, exhibits a very different cognitive/rhetorical style from Romanov. Romanov appears to think in rigid dichotomous terms and to see essentially simple solutions to the problems confronting the Soviet Union; Gorbachev appears to think in flexible, multidimensional terms, and to see solutions that require the balancing of many sometimes complementary, sometimes contradictory objectives. This characterization of Gorbachev’s intellectual is, moreover, highly consistent with the impressions that a wide range of political leaders—British Prime Minister Margaret Thatcher, U.S. House Speaker Thomas P. O’Neill, Senator John Warner, and Soviet Foreign Minister Andrei Gromyko—have formed of Gorbachev from firsthand contact. In nominating Gorbachev for the chairmanship of the Politburo, for instance, Andrei Gromyko singled out for praise the degree of flexibility and lack of dogmatism in Gorbachev’s approach to problems in Politburo meetings. As he noted in an unusually informal address to the Central Committee:

‘‘After all, it is often very difficult to examine questions—domestic or foreign—if one is guided by the law of “black and white.” There may be intermediate colors, intermediate factors, and intermediate solutions. And Mikhail Sergeyevich is always able to find such solutions.” [Current Digest of the Soviet Press, 1985, 37(16) p. 4]

In effect, Gromyko chose to praise Gorbachev for his integratively complex decision-making style.

A final comment on Fig. 5 is in order. The similar levels of integrative complexity of Brezhnev and Chernenko, and of Andropov and Gorbachev, on domestic issues are very consistent with the speculations of Soviet experts on the nature of the succession struggles that took place in the early 1980s (cf. Hough, 1985). Breslauer (1985), in fact, suggests that the 1982–1985 period can be viewed as an extended, single succession struggle, in which the Andropov–Gorbachev tendency (economic efficiency/reformist school of thought) chal-
lenged, and was temporarily slowed by, the Brezhnev–Chernenko tendency (respect-for-cadres school of thought). Integratively complex statements, which balance praise for past Soviet accomplishments with a genuine sense of urgency about the need for reform, appear only in the rhetoric of Andropov and Gorbachev. The very different levels of integrative complexity of Gorbachev and Romanov are also consistent with the speculations of leading Soviet experts. Hough (1985), for instance, has characterized Romanov as an extreme nationalist and opponent of economic reform and political liberalization. From this point of view, it is no accident that Romanov’s cognitive/rhetorical style resembles that of extreme nationalists and conservatives in Western states (Tetlock, 1981b, 1983a, 1984); the resemblance may reflect the robustness of the relation between cognitive style and ideology across political cultures (cf. Stone, 1980). By contrast, Hough characterizes Gorbachev as an advocate of the emerging professional class in the Soviet Union (favorable to economic reform and good working relations with Western countries). From this point of view, it is no accident that Gorbachev’s cognitive/rhetorical style resembles that of moderate Western reformers who seek not to dismantle the systems within which they work, but to make the systems function more effectively and equitably (cf. Tetlock, 1983a and 1984, on Western liberals and social democrats). Moderate reformers may be under much greater pressure to cope with complex value trade-offs than are either defenders of the status quo or advocates of a radical transformation of society (moderate reformers, by definition, recognize both positive and negative aspects of current social arrangements and the desirability of integrating aspects of the status quo with their proposals for change).

Figure 6 breaks down Gorbachev’s policy statements (a total of 120 scorable paragraph-sized units) into finer categories to explore audience-by-issue variation in integrative complexity. Gorbachev, like many politicians, strategically adjusts the integrative complexity of his policy statements to both the audience and the political context. The specific pattern that emerges in Fig. 6 also makes a good deal of intuitive political sense. In discussing economic issues, Gorbachev is more complex in statements directed to Soviet than to Western audiences. This may reflect the greater need to explain and justify potentially unpleasant trade-offs to important domestic constituencies—constituencies that have to endure, at least temporarily, the sacrifices required by Gorbachev’s economic reform plans. The effect becomes, in this view, a special case of the more general tendency for integrative complexity to increase when a speaker is accountable to an audience that is initially skeptical of the stands the speaker is taking (Tetlock, 1983b; Tetlock et al., 1984). A similar line of reasoning helps to explain the tendency for Gorbachev to make more complex statements on American–Soviet relations to Western than to Soviet audiences. Gorbachev presumably seeks to convince Western audiences that he is reasonable and conciliatory, and integratively complex rhetoric is most useful for this purpose. But Gorbachev presumably also needs to convince influential groups within the Soviet Union that he is not “soft on imperialism,” and integratively simple rhetoric is most useful for this purpose (cf. Cohen, 1986).

Taken as a whole, the data reported in Figs. 5 and 6 are very consistent with the emerging impression of Gorbachev in the West as a pragmatic, albeit forceful, leader with an acknowledged ability to argue for his policies in flexible and reasonable ways. For instance, British politicians who had extensive dealings with Gorbachev during his trip to the United Kingdom in December 1984, remarked on his responsiveness, candor, and willingness to listen to specialist advisors and to subordinates. The British observers were particularly struck by his “easy relationship” with the Soviet delegation he led. There was neither bullying from one side nor obsequiousness from the other. Thomas P. O’Neil (former Speaker of the U.S. House of Representatives) has offered a similar

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There is another possible interpretation for the lower levels of integrative complexity of Gorynych Romanov: he may have represented the “political opposition” to the Andropov–Gorbachev reformist coalition (cf. Hough, 1985). (Romanov resigned from the Politburo shortly after the election of Gorbachev as general party secretary.) The Gorbachev–Romanov effect may be analogous to the tendency in Western democracies for members of governing parties or coalitions to make more integratively complex statements than members of opposition parties (Tetlock et al., 1984, 1985).
assessment: "About his abilities, his talents, his frankness, his openness, I was tremendously impressed" (Brown, 1985, p. 10). In short, cognitive structural analysis of Gorbachev's rhetoric leads us to conclusions that are strikingly similar to those that experienced politicians have drawn about Gorbachev. The cognitive style that Gorbachev exhibits in public policy statements is essentially the same cognitive style that he exhibits in direct one-on-one interpersonal encounters. This multimethod convergence provides suggestive evidence that integrative complexity coding is, indeed, a useful tool for assessing behavioral dispositions of Soviet leaders (cf. Tetlock, 1983c).

Concluding Remarks

The death of Konstantin Chernenko, and the ascension to the top leadership post of Mikhail Gorbachev, signaled the beginning of a massive intergenerational transfer of power in the Soviet Union. Since coming to power in March 1985, Gorbachev has moved forcefully and rapidly to consolidate his influence in the ruling Politburo, in the Central Committee, and in key government ministries. Many septuagenarian officeholders from the Brezhnev era have been replaced by a new cohort of younger, more vigorous leaders in their 40s and 50s.

What conclusions should Western observers draw from these recent events? Here we find considerable disagreement. My data, on balance, are most consistent with those who argue that the transition of power has brought to prominence a new, less ideological, and more conceptually complex group of leaders who can be expected to pursue pragmatic internal policies (e.g., economic reform, perhaps following the Hungarian or Chinese models) and flexible external policies (e.g., a willingness to compromise on arms control and to avoid confrontations in Third World zones of contested influence). The cognitive/rhetorical style of Mikhail Gorbachev very much resembles that of a pragmatic, reform-minded, Western politician. (That does not, of course, mean that Gorbachev subscribes to Jeffersonian ideals of democracy and freedom of expression.) And the upward shift in the integrative complexity of Soviet foreign policy rhetoric under Gorbachev very much resembles the upward shifts that have typically preceded major American–Soviet agreements in the post-World War II period.

To be sure, one's reaction to the above argument depends greatly on one's assumptions about how truly diagnostic high integrative complexity is of a pragmatic, reformist policy orientation and of interest in achieving mutually satisfactory agreements with adversaries. The relations between integrative complexity and these other constructs are certainly not of a magnitude that eliminates all reasonable doubt. But the relationships are also not so small that they should simply be ignored (cf. Tetlock, 1984, 1985). The data reported here represent one of a number of types of evidence that analysts should take into account in trying to gauge long-term Soviet intentions and likely reactions to Western initiatives.

Not all experts on the Soviet Union view the Gorbachev transition in the same light (cf. Pipes, 1986; Stewart, 1985). For example, Richard Pipes (1986), a former adviser to President Reagan, does not attach great significance to the change in leadership. He holds that the new Soviet leadership may be younger and more skilled at public relations, but that if we want to understand future trends in Soviet policies, we should focus not on the public personalities of the Politburo, but rather on the bureaucratic, political, and economic forces that have constrained Soviet policies in the past. Western observers, he suggests, exaggerate "the latitude a Soviet First Secretary enjoys." In response to this objection, I readily concede that my data need not be interpreted at a personological level of analysis. The increased integrative complexity of the new Soviet leadership may be best interpreted as a coping response to powerful systemic demands. Gorbachev may, for example, make more integratively complex statements not because he values East–West détente per se, but because, as Hough (1985) suggests, he wants to devote fewer resources to defense and more resources to increasing the productivity of the sluggish, technologically backward, and unresponsive Soviet economy. Variables operating at systemic levels of analysis may have "forced" the selection of an integratively complex general secretary or "forced" the existing general secretary to be integratively complex. My data do not allow us to disentangle these possible interpretations. My data do, however, point to an empirical phenomenon that analysts of Soviet politics need to explain.

Stewart (1985) does not share Pipes' antipathy toward a psychological explanation of Soviet policy. In his view, the Soviet leadership transition may indeed be consequential, but in a quite different way from what Hough and I have supposed. Under Gorbachev, Stewart suggests, we are once again witnessing the emergence of a Soviet leader determined and increasingly able to shape Soviet policy according to his own preferences. Stewart characterizes the policy shift as "movement from the moderate, outward, and Western orientation of the Brezhnev era to a tough, uncompromising, predominantly inward, nationalist or self-reliant perspective that is reminiscent of the late-Stalin era" (p. 3). Stewart may be right, but if he is, then Gorbachev's rhetoric is anomalous—indeed, downright misleading. In terms of integrative complexity, Gorbachev does not at all resemble the tough, uncompromising, nationalist isolationist whom researchers have studied in other political cultures (e.g., McClosky, 1967; Tetlock, 1981b).

The next ten years will put us in a much better position to assess the validity of the Stewart and Tetlock hypotheses on the Gorbachev transition. The image of Gorbachev as an integratively complex pragmatist leads one to expect a wide range of innovative domestic and foreign policy initiatives: for instance, diplomatic initiatives to improve Sino–Soviet relations (expansion of trade and joint projects, gradual demilitarization of the border), Soviet–Japanese relations (perhaps allowing equity ownership of foreign investment in resource-rich Siberia and face-saving accommodations on the southern Kuril Islands), Soviet–German
relations (perhaps allowing much closer East German–West German ties), and American–Soviet relations (continued efforts to reach understandings on strategic and intermediate range nuclear forces). There is, moreover, likely to be an intimate connection between domestic and foreign policy objectives here. Modernization of the Soviet economy may well require the stimuli of foreign competition, investment, and technology (Hough, 1985). The image of Gorbachev as an uncompromising nationalist and isolationist leads one to expect sharp resistance to openings to Western countries, efforts to prevent Warsaw Pact states from making such openings too, increased defense spending pretty much independent of Western levels of spending, and efforts to improve Soviet economic performance primarily through tighter worker discipline and anticorruption drives (not through structural reforms).

Which direction the Soviet Union turns will, of course, have a major impact on the nature of international relations in the early 21st century. Western policy makers who must deal with the Soviet Union face difficult choices that require making judgments on a mixture of factually and morally ambiguous issues. Any policy they choose raises risks—the risks of being too harsh and uncompromising toward a fundamentally defensive power (Type I error) or of being too accommodating toward a fundamentally hostile power (Type II error).

Research psychologists can help policy makers cope with these difficult choices in a variety of tangible ways (cf. Tetlock, 1986b); by suggesting bargaining and negotiation strategies designed to keep the risks of both Type I and Type II errors within acceptable ranges (e.g., Alexander George's 1980 and 1983 work on crisis management), by assessing the relative risks of Type I and Type II errors in particular situations (e.g., the current work on the Gorbachev effect), and by sensitizing policy makers to cognitive, motivational, and social sources of error in the decision-making process (e.g., the tendency to deny or avoid trade-offs, the tendency to belief perseverance). Research psychologists risk losing their professional credibility, however, when they presume to tell policy makers what they should do. Policy advocacy of that sort requires reaching beyond the psychological literature and making moral judgments concerning the relative importance of avoiding Type I and II errors. Psychologists must wrestle with their own personal and professional consciences in deciding how active a role they wish to have in shaping the political future and how wisely they can perform that role.  

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My position on this issue is similar, although by no means identical, to that of advocates of the traditional fact-value distinction. Since Hume, many analytical philosophers have sharply distinguished factual statements from normative statements and stressed that "is" cannot be converted into "ought." To confuse these categories is to commit the "naturalistic fallacy." The fact-value distinction is, to be sure, far from airtight (Graham, 1981), but the intellectual prohibition against confusing "is" and "ought" is still useful. It is important to be clear about when we speak as empirical investigators and when we speak as advocates of moral–political causes. Indeed, the long-term credibility of psychological research may well depend on our ability to make this distinction.