

# Evaluating Success in Counterinsurgency, 1804-2000: Does Regime Type Matter?

YURI M. ZHUKOV

*Institute for National Strategic Studies, National Defense University*

*Abstract:* This large-n study conceptualizes counterinsurgency success as an outcome of three factors: regime type (constraints on state action), situational difficulty (where, when and against whom a state fights), and power (what resources are available to a state). Using a new dataset of almost 200 insurgencies since 1804, this study finds empirical support for the view that democracies are more likely to succeed in counterinsurgency. However, regime type is not necessarily the strongest predictor of military effectiveness, depending on how strictly success is defined.

SINCE THE END OF THE COLD WAR, a growing body of literature has argued that democracy is strongly associated with success in war, due to democratic policy-makers' relative selectiveness in deciding which wars to fight and their willingness to commit sufficient resources to reduce the risk of policy failure.<sup>1</sup> While the public and academic discourse on this topic has been energetic, it has largely avoided the specific question—which has received renewed attention in the context of the

DRAFT (v. 10 Dec 2007): Please do not cite or circulate without permission of the author. The views expressed here are the author's own and do not represent the official policy or position of National Defense University, the Department of Defense or the U.S. Government.

<sup>1</sup> See David A. Lake, "Powerful Pacifists: Democratic States and War," *American Political Science Review* 86, no. 1 (March 1992): 2437; James D. Fearon, "Domestic Political Audiences and the Escalation of International Disputes," *The American Political Science Review* 88, no. 3 (September 1994): 577–592; Bruce Bueno De Mesquita and Randolph M. Siverson, "War and the Survival of Democratic Leaders: A Comparative Study of Regime Type and Political Accountability," *American Political Science Review* 89, no. 4 (December 1995); Dan Reiter and Allan C. Stam III, "Democracy, War Initiation and Victory," *American Political Science Review* 92, no. 2 (June 1998), 377–389; Bruce Bueno de Mesquita, James D. Morrow, Randolph M. Siverson and Alastair Smith, "An Institutional Explanation of the Democratic Peace," *The American Political Science Review* 93, no. 4 (December 1999), 791–807; Dan Reiter and Allan C. Stam III, *Democracies at War* (Princeton, NJ: Princeton University Press, 2002); Benjamin O Fordham and Thomas C Walker, "Kantian Liberalism, Regime Type, and Military Resource Allocation: Do Democracies Spend Less?" *International Studies Quarterly* 49, no. 1 (2005): 141–157; Benjamin E. Goldsmith, "Defense Effort and Institutional Theories of Democratic Peace and Victory," *Security Studies* 16, no. 2 (April–June 2007): 189–222; Max Abrams, "Why Democracies Make Superior Counterterrorists," *Security Studies* 16, no. 2 (April–June 2007): 223–253.

Global War on Terror—of whether regime type matters in fighting insurgents. Will the democratic United States have greater chances of success in Afghanistan than did the autocratic Soviet Union? Should Pakistan and Saudi Arabia have more to fear from domestic insurgents than India or Israel? Is it wise to outsource some of our "dirty work" to local autocrats? Does democracy affect the duration of low intensity conflict?

The study of regime type and counterinsurgency success lacks a firm empirical basis. Although several large-n studies have examined the relationship between democracy and military effectiveness, little applied research has been produced on low intensity conflict.<sup>2</sup> Recent works in counterinsurgency analysis have tended to rely on individual cases and comparative studies as a focus of inquiry, and the many insights of this field have not been tested against a large universe of cases.<sup>3</sup> Due in part to the fact that most mainstream

<sup>2</sup> Notable efforts to apply quantitative methods to the study of low-intensity conflict have included several rigorous studies of peace operations, including Michael W Doyle and Nicholas Sambanis, "International peacebuilding: A theoretical and quantitative analysis," *The American Political Science Review* 94, no.4 (2000): 779–801; and Michael W. Doyle and Nicholas Sambanis, *Making War and Building Peace: United Nations Peace Operations* (Princeton, NJ: Princeton University Press, 2006). No effort of this scale has been undertaken in counterinsurgency analysis. An exception is Jonathan Fox, "Trends in Low Intensity Ethnic Conflict in Democratic States in the Post-Cold War Era: A Large-N Study," in *Democracies and Small Wars*, ed. Efraim Inbar (London: Frank Cass, 2003): 54–70. As the title suggests, however, this study covers only post-Cold War cases.

<sup>3</sup> Noteworthy comparative studies have included Efraim Inbar, ed., *Democracies and Small Wars* (London: Frank Cass, 2003); Gil Merom, *How Democracies Lose Small Wars* (New York: Cambridge University Press, 2003). Recent case studies on regime type and counterinsurgency include Yuri Zhukov, "Examining the Authoritarian Model of Counterinsurgency: The Soviet Campaign Against the Ukrainian

counterinsurgency analysis literature is not intended for an academic audience, efforts comparable to those in quantitative civil war literature have been limited to nonexistent. As a result, propositions about democracy and success in counterinsurgency have not undergone rigorous empirical validation.

This paper asks which factors are beneficial and which are detrimental in defeating non-state opponents. Three models are offered to estimate the relative effects of regime type, situational difficulty and state power on three dependent variables: *lenient* success, *strict* success and conflict duration. These models are tested with a new dataset of approximately 200 insurgencies since the early 1800s.<sup>4</sup>

Results show that, although democracies have historically been more successful in counterinsurgency than autocratic or mixed regimes, this success can be more readily attributed to power characteristics—such as wealth, human defense burden, industrial output and military spending—than to domestic political organization. The relative advantages of regime type and state power depend heavily on how one defines success. If success is defined leniently as the containment of an insurgency's ability to sustain armed struggle, democratic institutions are best able to achieve this outcome. However, if criteria for success also include the assertion of government control over a contested territory and the establishment of a secure environment, state power is a far more reliable predictor of success than regime type.

This study begins with a brief review of the debate on regime type and other sources of counterinsurgent Army," *Small Wars and Insurgencies* 18, no. 3 (September 2007).

<sup>4</sup> The creation of a dedicated Counterinsurgency Dataset is significant for several reasons: (1) its period of observation (1804–2004) is longer than that of most civil war datasets, including Doyle and Sambanis (2000) and Fearon and Laitin (2003), which begin their observations in 1945; this time frame permits examination of variance according to historical period, including colonial expansion, the industrial revolution, decolonization, the two World Wars, the Cold War, the information age, globalization, the growth of religious extremism, etc.; (2) it includes numerous low-intensity cases otherwise excluded by the Correlates of War threshold of 1,000 battle deaths; (3) it includes domestic, frontier and expeditionary cases of counterinsurgency, permitting side-by-side comparisons of the dynamics of intrastate and external conflicts; (4) it includes over 100 variables, including several relatively new and untested ones, such as "mixed coalitions" and the "CNN Effect;" (5) the specific focus on counterinsurgency, as opposed to interstate or civil war, ethnic conflict, militarized interstate disputes or peacekeeping, offers a promising springboard for future research, possibly filling the data and methodological gap that currently exists between conflict processes literature and counterinsurgency analysis. The dataset and codebook (v. 2 Oct 2007) can be obtained from the author's website, [www.yurizhukov.com](http://www.yurizhukov.com).

gency success, from which a series of hypotheses is derived. The next section provides an overview of the research methodology and operational definitions for key variables. The third section offers a summary and interpretation of key findings. Finally, the broader theoretical and policy implications of this study are discussed, along with directions for future research.

## SOURCES OF SUCCESS

Three categories of explanations for success in counterinsurgency have been offered: regime type, situational difficulty and state power. The first of these concerns the state-level institutional and normative characteristics of the counterinsurgent, the incentives that guide his behavior, and the restraints and constraints on his employment of various instruments of power. The second category concerns the geographic, political and cultural characteristics of the operating environment, the goals and incentives of the opponent, and the historical context of the conflict in which the counterinsurgent is engaged. The final category concerns the quantity and quality of the human and material resources available to the counterinsurgent.

### *Regime type*

A growing body of literature argues that regime type is closely related to military effectiveness in conventional, interstate war. Because their political survival depends on support from a cost-sensitive domestic polity, democratic policymakers have an incentive to shape the public's cost-benefit considerations by minimizing the risk of policy failure. This is accomplished through greater selectiveness in war participation—democracies will tend to initiate only those wars in which they perceive themselves as having a high probability of success—and the diversion of sufficient economic, material and human resources to the war effort to ensure victory.<sup>5</sup>

This optimistic view of democratic military effectiveness has become an emerging conventional wisdom in studies of interstate war. Whether this view holds for more limited contingencies, however, remains an underexplored empirical question.<sup>6</sup> Clearly,

<sup>5</sup> For war initiation, see Bueno De Mesquita and Siverson (1995): 841–855; Reiter and Stam (1998): 378; Fearon (1994): 577–592; 577–578, 585–586. For resource allocation, see Bueno de Mesquita, Morrow, Siverson and Smith (1999): 793–794; Goldsmith: 209–216; Fordham and Walker (2005): 141–157.

<sup>6</sup> Most quantitative studies of democracy and civil war have explored the impact of regime type on war onset, rather than outcome. See Ted Gurr, *People Versus States: Minorities at Risk in the New Century* (Washington, D.C.: U.S. Institute of Peace, 2000); Ibrahim Elbadawi and Nicholas Sambanis, "Why Are There So Many Civil Wars in Africa? Understanding and Preventing Violent Conflict," *Journal of African Economies* 9, no. 3 (2000): 244–269;

insurgencies present states with a fundamentally different set of challenges than interstate wars. For instance, states have far less freedom to selectively initiate wars and individual battles. Domestic insurgencies “emerge rather than erupt,” as a result of state weakness, group grievance, elite manipulation, or a host of other factors.<sup>7</sup> A similar dynamic can be observed in expeditionary counterinsurgency, where the situation on the ground may deteriorate in unrecognizable ways from the moment of force insertion, as during U.S. intervention in the Dominican Republic in 1916–1924 and, most recently, in Iraq. This gradual nature of conflict emergence blurs the line between initiator and target, a distinction central to the war selectiveness thesis proposed by theories of democratic success in interstate war.

The extent to which the democratic advantage in resource commitment carries over to counterinsurgency has also been questioned. In limited conflicts where core national interests are not perceived to be at stake, democracies have often been associated with a low threshold for sustaining the human and material costs of war, and a general reluctance to commit sufficient resources to avoid defeat.<sup>8</sup> Moreover, the empirical record has witnessed numerous cases of counterinsurgency failure despite enormous material advantage, suggesting that relative indicators of resource allocation are by themselves an imperfect predictor of success in asymmetrical war.<sup>9</sup>

Håvard Hegre, et al., “Toward a Democratic Civil Peace? Democracy, Political Change and Civil War, 1816–1992,” *American Political Science Review* 95, no. 1 (2001): 33–48.

<sup>7</sup> For the gradual emergence hypothesis, see Inbar (2003), viii. For a survey of literature on the origins of civil wars and domestic rebellions, see Nicholas Sambanis, “A Review of Recent Advances and Future Directions in the Quantitative Literature on Civil War,” *Defence and Peace Economics* 13, no. 3 (2002): 215–243.

<sup>8</sup> See Inbar (2003): ix; Andrew Mack, “Why Big Nations Lose Small Wars: The Politics of Asymmetric Conflict,” *World Politics* 27, no. 2 (January 1975): 175–200: 184. For a similar argument in interstate war literature, see Reiter and Stam (2002): 164–192, 347, 349, 363.

<sup>9</sup> Examples include France in the Peninsula Wars in Spain (1808–1814); U.K. in the First Afghan War (1838–1842); Spain in the Ten Years’ War in Cuba (1868–1878); Spain in the Cuban War of Independence (1895–1898); U.S. against the Gavilleros in the Dominican Republic (1916–1924); U.S. against Cacos in Haiti (1915–1934); U.S. against Sandino in Nicaragua (1927–1933); U.K. against the Irgun in Palestine (1931–1948); U.K. against Faqir of Ipi in Waziristan (1936–1947); France against the Viet Minh in Indochina (1941–1954); The Netherlands against Sukarno in Indonesia (1947–1949); U.K. against the EOKA in Cyprus (1955–1959); France against the FLN in Algeria (1954–1962); Portugal in Angola (1957–1975); Portugal in Guinea-Bissau (1957–1974); Portugal against the FRELIMO in Mozambique (1962–1975); U.S. against the Viet Cong (1960–1974); U.K. against the NLF in the Aden Protectorate (1963–1967);

Other democratic advantages, however, can be expected to remain relevant. Some have contended that constitutional, legal and moral constraints on conflict escalation and use of excessive force benefit the counterinsurgent by minimizing overreaction to insurgent provocations and thus preserving support from domestic publics, moderates and the international community.<sup>10</sup> Other often-cited democratic advantages include more effective channels for corrective feedback, institutionalized protection of minority rights, a lower incidence of civil-military friction, and more flexible conflict resolution mechanisms than those often seen in autocratic regimes.<sup>11</sup> My first hypothesis thus favors the optimistic view of democratic effectiveness in counterinsurgency. *H1: Democratic regimes have higher odds of counterinsurgency success than non-democratic regimes.*

The literature on regime type and military effectiveness, while extensive on the relative merits of democracies and autocracies, has been far more limited in the analysis of other regime characteristics regularly seen in historical cases of counterinsurgency, particularly the phenomenon of mixed coalitions.<sup>12</sup> A mixed coalition in counterinsurgency USSR in the Soviet-Afghan War (1979–1989); Vietnam against the Khmer Rouge in Cambodia (1978–1989); India against the LTTE in Sri Lanka (1987–1990).

<sup>10</sup> Abrams (2007): 242–246; James Darnado, *Power in Numbers: The Political Strategy of Protest and Rebellion* (Princeton: Princeton University Press, 1985): 188, 209. For a counterargument, see Quan Li, “Does Democracy Promote or Reduce Transnational Terrorist Incidents?” *Journal of Conflict Resolution* 48, no. 2 (April 2005): 278–297: 283; Merom (2003): 19, 21–24, 46–47; Reiter and Stam (2002): 164–192, 347, 349, 363; Peter Chalk, “The Liberal Democratic Response to Terrorism,” *Terrorism and Political Violence* 4, no. 1 (Winter 1992): 10–44: 35.

<sup>11</sup> For discussions of regime type and civil-military relations, see Daniel Byman, “Going to War with the Allies You Have: Allies, Counterinsurgency, and the War on Terrorism,” Strategic Studies Institute (November 2005): 19; Stephen Biddle and Stephen Long, “Democracy and Military Effectiveness: A Deeper Look,” *Journal of Conflict Resolution* 48, no. 4 (2004): 525–546: 531–532; Inbar (2003): viii. For discussions of democratic conflict resolution mechanisms, see Raymond L. Hall, ed., *Ethnic Autonomy—Comparative Dynamics: the Americas, Europe and the Developing World* (New York: Pergamon Press, 1979): xxii–xxiii; Gurr (2000); Yash Ghai, ed., *Autonomy and Ethnicity: Negotiating Competing Claims in Multiethnic States* (Cambridge, UK: Cambridge University Press, 2000): 14–23; Marta Reynal-Querol, “Ethnicity, Political Systems and Civil Wars,” *Journal of Conflict Resolution* 46, no. 1 (February 2002): 29–54.

<sup>12</sup> A notable criticism of data used by Reiter and Stam, among others, has been the miscoding of victories by “mixed” democratic-autocratic coalitions as victories by democratic states. Michael C. Desch, “Democracy and Victory: Why Regime Type Hardly Matters,” *International Security* 27, no. 2 (Fall 2002): 5–47: 10–12.

would be an instance of a democratic state's assisting in the internal defense of a nondemocratic host nation, such as British support for the Sultanate of Oman during the communist insurgency in Dhofar in 1962–1976. The U.S. occupation of Haiti in 1915–1934 illustrates that such an arrangement can undermine many of the mechanisms often associated with democratic success, including constraints on executive decision-making and corrective feedback. The U.S.-supported administrations of President Philippe Sudre Dartiguenave and his successor, Louis Borno, dissolved the legislature, permitted foreign land ownership—a policy strongly opposed by most Haitians—excluded dark-skinned Haitians from positions of authority in the government and constabulary, imposed a *corvée* labor system on all local residents, and left intact grievances that first ignited the Cacos uprising, such as poverty, and economic and racial discrimination.<sup>13</sup> Similarly, the corruption, poor performance and neglect associated with the autocratic regime of Ngo Dinh Diem in Southern Vietnam were effectively exploited by the Vietcong during the formative years of the Vietnam War in 1958–1964.<sup>14</sup>

The implications of mixed coalitions for military effectiveness have thus far received very little attention in counterinsurgency analysis.<sup>15</sup> If the logic of the first hypothesis is extended to such cases, however, one would expect lower odds of success due to the reduced impact of democratic constraints on the conduct of operations.

#### *Situational Difficulty*

The second category of explanations of success, derived principally from counterinsurgency analysis literature, emphasizes the complexity of the physical and human environment. Situational difficulty is conceptualized here as a factor of geography, insurgent goals and identity, and historical context. The character of the physical terrain in the theater of operations can affect odds of success by shaping the patterns of movement of military units, enemy personnel and the

<sup>13</sup> See Richard A. Haggerty, ed., *Haiti: A Country Study* (Washington: GPO for the Library of Congress, 1989). <http://countrystudies.us/haiti/15.htm>

<sup>14</sup> See Seth Jacobs, *Cold War Mandarin: Ngo Dinh Diem and the Origins of America's War in Vietnam, 1950–1963* (Lanham, MD: Rowman & Littlefield Publishers, 2006).

<sup>15</sup> For a recent study that examines the use of nondemocratic proxies by democracies, see Byman (2005). For recent case studies on colonial counterinsurgency, see Branch (2005), DiMarco (2006); Wade Markel, "Draining the Swamp: The British Strategy of Population Control," *Parameters* 36, no. 1 (April 1, 2006): 35–48; John P. Cann, *Counterinsurgency in Africa: The Portuguese Way of War, 1961–1974* (Westport, CT: Greenwood Press, 1997); Susan Carruthers, *Winning Hearts and Minds: British Governments, the Media and Colonial Counterinsurgency, 1944–1960* (London: Leicester University, 1995).

local population, and determining the extent to which the counterinsurgent can fully exploit his technological and numerical advantages. Open, rolling terrain is assumed to favor the counterinsurgent, while rugged and urban terrains are both assumed to favor the insurgent.<sup>16</sup> The physical proximity of a theater of operations to the hub of the counterinsurgent's political, economic and military power is a second geographical consideration for situational difficulty. The ability of a state to project political, economic or military power over an enemy or a host nation has traditionally been seen as decaying with distance.<sup>17</sup> Expeditionary operations entail heavy costs and great logistical burdens, requiring high readiness, sustainable force generation, protection of extended and vulnerable lines of communication and a capability to sustain the force in austere environments, where host nation support may be deficient or unavailable.<sup>18</sup> These challenges suggest that odds of counterinsurgency success can be expected to be lower in distant theaters than in more proximate geographical areas.

A second source of situational difficulty emanates from the nature of the insurgency and its political, social and cultural context. Some studies have argued that, due to a fundamental mismatch in capabilities, "for the insurgents the war is 'total,' for the [counterinsurgent] it is necessarily 'limited.'"<sup>19</sup> Groups with

<sup>16</sup> For counterinsurgency analysis literature on terrain, see A.H. Shallom, "Nowhere Yet Everywhere," in Franklin Mark Osanka, ed., *Modern Guerilla Warfare* (New York: The Free Press of Glencoe, 1962): 19; United States, Department of the Army, "Counterinsurgency," *Field Manual-Interim*, no. 3–24 (Washington, D.C.: Headquarters, Department of the Army, December 2006): B-1.

For a political science perspective on terrain and conflict termination, see James Fearon, "Why Do Some Civil Wars Last So Much Longer Than Others?" *Journal of Peace Research* 41, no. 3 (May 2004): 275–302.

<sup>17</sup> See Alan K. Henrikson, "Distance and Foreign Policy: A Political Geography Approach," *International Political Science Review* 23, no. 4. (Oct 2002): 437–466: 444–450; Alan K. Henrikson, "The Emanation of Power," *International Security* 6, no. 1 (Summer 1981): 152–164.

<sup>18</sup> See Thierry Gongora, "Expeditionary Operations: Definitions and Requirements," *Military Technology* 28, no. 6 (Jun 2004): 106–114; Robert Fry, "Expeditionary Operations in the Modern Era," *RUSI Journal* 150, no. 6 (December 2005): 60–63; Jack Deverell, "Coalition warfare and expeditionary operations," *RUSI Journal* 147, no. 1 (February 2002): 18–21.

<sup>19</sup> Mack (1975): 175–200: p. 181. Through an examination of the Correlates of War data set, Arreguin-Toft has demonstrated that a statistically significant positive correlation exists between counterinsurgency failure and symmetrical strategic interaction, wherein a "direct" strategy targeted at enemy capabilities was countered with an "indirect" strategy targeted at the enemy's will to continue resistance, or vice versa. Ivan Arreguin-Toft, "How the Weak Win Wars:

far-reaching goals—such as the overthrow of a government or the redrawing of national borders—tend to view the conflict in existential terms and are expected to be more likely to continue resistance than groups with more limited aims, such as autonomy or political reforms.<sup>20</sup> For example, after the Hmar People's Convention (HPC) reached a settlement with the Indian government in 1994, a section of its cadres formed a splinter group (HPC-D) and elevated the objective from the creation of an autonomous *district* to an independent Hmar State, covering parts of Mizoram, Manipur and Assam. Meanwhile, identity-based insurgencies are able to capitalize on linguistic and religious differences between themselves and the counterinsurgent, thus creating significant potential for recruitment and mobilization.<sup>21</sup> Because absolutist and identity-based insurgencies are often highly motivated and not amenable to compromise, they are expected to reduce odds of counterinsurgency success.<sup>22</sup>

A third source of situational difficulty is historical context. Recent counterinsurgency analysis literature holds that insurgency has undergone several evolutions since the colonial era, and indeed since Mao Tse-Tung's refinement of revolutionary guerilla doctrine in the 1920s.<sup>23</sup> In particular, the increasing availability of information technology and round-the-clock media coverage has reduced communication costs for insurgents, facilitated new methods of recruitment and fundraising, and enabled immediate public awareness and scrutiny of states' strategic decisions and military operations.<sup>24</sup> The increased ca-

A Theory of Asymmetric Conflict," *International Security* 26, no. 1 (Summer 2001): 93–128: 111–112, 122.

<sup>20</sup> Monica Toft has argued that when a territory is seen as invariably tied to a group's identity, "control over territory means a secure identity." Monica Duffy Toft, "Indivisible Territory, Geo-graphic Concentration and Ethnic War," *Security Studies* 12, no. 2 (Winter 2002–03): 82–119: 84, 87. James Fearon has also demonstrated that conflicts in peripheral regions inhabited by ethnic minorities tend to be more intractable than other types of conflicts, see Fearon (2004): 283.

<sup>21</sup> See Bard O'Neill, *Insurgency and Terrorism: Inside Modern Revolutionary Warfare* (Herndon, VA: Brassey's, Inc., 1990): 59, 75–77; Rui DeFigueiredo and Barry Weingast, "The Rationality of Fear: Political Opportunism and Ethnic Conflict," in *Civil Wars, Insecurity, and Intervention*, ed. Barbara Walter and Jack Snyder (New York: Columbia University Press, 1999), 261–302.

<sup>22</sup> O'Neill (1990): 22–23

<sup>23</sup> See Mao Tse-Tung, *On Guerilla Warfare* (New York: Praeger Publishers, 1961).

<sup>24</sup> See Margaret H. Belknap, "The CNN Effect: Strategic Enabler or Operational Risk?" *Parameters* 32, no. 3 (Autumn 2002): 100–115; Bruce Hoffman, *Inside Terrorism* (New York: Columbia University Press, 2005): 198; Moises Naim, "The YouTube Effect," *Foreign Policy*, no. 158 (Jan/Feb 2007): 104–5; Frank G. Hoffman, "Neo-

pabilities afforded to non-state actors by information technology, and the resulting advent of "an evolved form of insurgency"—or Fourth Generation Warfare—has been associated with greater situational difficulty.<sup>25</sup> However, this literature in this field has relied on evidence from a limited set of cases—Vietnam, Somalia, the Palestinian Intifada and Iraq are frequent choices—and its central claim has not yet undergone rigorous quantitative testing.

The second hypothesis thus conceptualizes situational difficulty as being negatively associated with success. *H2: Odds of counterinsurgency success are lower where geographical conditions are forbidding, where insurgent goals are ambitious and identity-based, and where the historical context enables insurgent access to doctrinal and technological innovations.*

#### *State power*

The third category of explanations of success holds that conflict outcome is influenced by the quantity and quality of resources available to states engaged in counterinsurgency. Odds of success are seen as a function of wealth, force strength, military expenditures, economic resources, industrial production and population size. The greater the preponderance of these material and human resources, the greater the ability of the counterinsurgent to overcome the challenges of situational difficulty and achieve policy success.<sup>26</sup> For instance, greater military expenditures and industrial production can help a counterinsurgent more effectively conduct and sustain expeditionary operations and project power to distant theaters of operation.<sup>27</sup> Wealth and economic resources, mean-

Classical Insurgency?" *Parameters* 37, no. 2 (Summer 2007): 71–88. For analyses claiming that the CNN Effect is overstated, see Andrew Natsios, "Illusions of Influence: The CNN Effect in Complex Emergencies," in *From Massacres to Genocide: The Media, Public Policy, and Humanitarian Crises*, Robert Rotberg and Thomas Weiss, eds. (Cambridge, MA: The World Peace Foundation: 1996): 149–168; Peter Viggo Jacobsen, "National Interest, Humanitarianism or CNN: What Triggers UN Peace Enforcement After the Cold War," *Journal of Peace Research* 33, no. 2 (1996): 205–215.

<sup>25</sup> The most influential contribution on this subject has been Thomas X. Hammes, *The Sling and The Stone: On War in the 21st Century* (St. Paul, MN: Zenith Press, 2006): 207–8; For a shorter treatment of this work, see Thomas X. Hammes, "Insurgency: Modern Warfare Evolves into a Fourth Generation," *Strategic Forum*, no. 214 (January 2005).

<sup>26</sup> See Robert Gilpin, *War and Change in World Politics* (Cambridge, UK: Cambridge University Press, 1981); Paul Kennedy, *The Rise and Fall of Great Powers: Economic Change and Military Conflict from 1500 to 2000* (New York: Random House, 1987); John J. Mearsheimer, "Assessing the Conventional Balance: The 3:1 Rule and Its Critics," *International Security* 13, no. 4 (1989): 54–89.

<sup>27</sup> Henrikson (2002): 437–466: 447.

while, afford the counterinsurgent an ability to shape the environment and more readily address the underlying grievances of an insurgency's base of support, domestically or overseas. Major powers, which enjoy significant advantages in resources and power projection, are thus expected to be more successful in counter-insurgency than minor powers. *H3: Odds of counterinsurgency success are greater when significant material and human resources are available to the counterinsurgent.*

### RESEARCH DESIGN

To test these hypotheses and develop a preliminary conceptual framework for counterinsurgency success, three models are utilized. The first model estimates odds of success as an outcome of the impact of regime type and state-level institutional constraints, the situational difficulty of a particular insurgency, and state power. The second model tests the same explanatory variables against a more narrow definition of success, while the third model examines the impact of these variables on conflict duration. In each model, the dependent variable is conceptualized as an outcome of how a counterinsurgent fights, the conditions under which he is fighting, and the quantity and quality of resources at his disposal.

The relative impact of these variables on success and duration is measured with a new dataset developed specifically for this study. Its unit of analysis is a single insurgency, defined as a political-military campaign fought against domestic or foreign government forces by a substate or nonstate group or indigenous population.<sup>28</sup> The data set includes 197 closed-case observations that meet this definition, over a period of observation of 1804–2004.<sup>29</sup> 191 of these are used in the models, due to missing values.<sup>30</sup>

<sup>28</sup> This is a modified version of the definition given by Ian Beckett. See Ian F. Beckett, *Encyclopedia of Guerilla Warfare* (Santa Barbara, CA: ABC-CLIO, 1999): ix.

<sup>29</sup> Multi-phase campaigns—where the main actors changed on one or both sides, where a new war emerged while a previous conflict was ongoing, or where the conflict ended officially through an agreement but fighting did not subside—have been disaggregated into multiple observations. Same method as that used by Doyle and Sambanis (2000): 779–801.

<sup>30</sup> Sources include several armed conflict data bases, including *Correlates of War (COW)*, Doyle and Sambanis civil war data, the *MIPT Terrorism Knowledge Database*, *The Center for the Study of Civil War (CSCW) Battle Deaths Dataset version 2.0* and Ian Beckett's *Encyclopedia of Guerilla Warfare*, several country-year datasets, including *POLITY IV*, *the Banks Cross-National Time Series*, the *COW National Material Capabilities* data set, the *Fordham and Walker Democracy and Military Resource Allocation* data set, Angus Maddison's *Historical Statistics for the World Economy* data set, as well as a host of primary and secondary source historical literature. For *COW Inter-State War*

For each case, the data set includes values for counter-insurgency success, regime type, and the component variables of both situational difficulty and state power. An overview of the operational definitions and codings of these variables is provided below.

#### *Dependent Variables: Success and Duration*

Measuring success in counterinsurgency is inherently difficult, in part because the most intuitive measures of effectiveness—such as loss rates—have little explanatory power in gauging levels of popular support for an insurgency, widely considered to be the center of gravity for insurgent organizations.<sup>31</sup> The ability of the counterinsurgent to achieve his desired end state is a problematic metric, since a government's objectives may be vague, unknown, changing, overly-modest or overly-ambitious, leaving aside questions of interpretation.<sup>32</sup> Political settlements and ceasefire agreements—often used as criteria for success in the study of peace and stability operations—must similarly be assessed with a

*Data, 1816–1997 (v3.0), COW Extra-State War Data, 1816–1997 (v3.0), COW Intra-State War Data, 1816–1997 (v3.0)*, see Meredith Reid Sarkees, “The Correlates of War Data on War: An Update to 1997,” *Conflict Management and Peace Science* 18, no. 1 (2000): 123–144; *CSCW Battle Deaths Dataset v. 2.0* see Bethany Lacina and Nils Petter Gleditsch, “Monitoring Trends in Global Combat: A New Dataset of Battle Deaths,” *European Journal of Population* 21, no. 2–3 (2005): 145–166; Doyle and Sambanis (2000); *DeticaDFI's Database of Group and Leader Profiles*, see “DeticaDFI's Research Methodology on Terrorist Entities and Affiliations,” updated 30 Sep 2007, <http://www.tkb.org/DFI.jsp?page=method> (accessed 24 October 2007); Beckett (1999); *POLITY IV* see Monty G. Marshall and Keith Jagers, “Polity IV Project: Political Regime Characteristics and Transitions, 1800–2004. Dataset Users' Manual,” Center for Global Policy, School of Public Policy (Arlington, VA: George Mason University, 25 October 2005), [www.cidcm.umd.edu/polity/](http://www.cidcm.umd.edu/polity/), (accessed 24 October 2007); *Cross-National Time-Series Data Archive, 1815–2003* [electronic resource] (Binghamton, NY: Databanks International, 2005); *COW National Material Capabilities (v3.02) dataset*, see J. David Singer, “Reconstructing the Correlates of War Dataset on Material Capabilities of States, 1816–1985,” *International Interactions*, no. 14 (1987): 115–32; Fordham and Walker (2005); Angus Maddison, *World Population, GDP and Per Capita GDP, 1–2003 AD (August 2007)*, available at <http://www.ggd.net/maddison> (accessed 24 October, 2007). Readers interested in the specifics of the empirical data used are encouraged to consult the *Codebook*, which cites major source material from which codings were derived. Available at [http://yurizhukov.com/doc/071003\\_YZ\\_COIN\\_Data\\_Notes.pdf](http://yurizhukov.com/doc/071003_YZ_COIN_Data_Notes.pdf) (accessed 24 October, 2007).

<sup>31</sup> O'Neill (1990): 70–73.

<sup>32</sup> Relatively few governments, particularly closed autocratic regimes, have a tradition of clearly stating their strategic objectives in publicly-available documents, while archival access to declassified strategy documents is generally uneven and logistically unfeasible for a large-n study.

great deal of caution, since such agreements are often violated and may serve only to entrench or worsen an already unfavorable status quo. Mandate implementation, a convenient and easily measurable variable in peace operations, also cannot be reliably used to gauge success in counterinsurgency since very few counterinsurgency campaigns have been conducted under an explicit legal mandate from an international or regional organization.

Recognizing these challenges, two thresholds of success are used in this study. The first definition, *lenient success*, requires (1) the disruption of an insurgency's ability to sustain its operations. Capacity to sustain operations is measured by the frequency of insurgent-related incidents, such as ambushes and bombings, the supply of materiel and recruits, and the availability of operational "safe havens."<sup>33</sup> Lower scores in each area are coded "1", while higher scores are coded "0".<sup>34</sup> Cases where insurgent activity by the same group reemerges within two years are coded "0".<sup>35</sup> There are 107 (56%) *lenient successes* and 84 (44%) *lenient failures*.

The second threshold, *strict success*, requires the same initial criterion as the more *lenient* definition, along with (2) the pacification of the affected region for at least five years and (3) the establishment of government authority over a contested territory. Pacification is coded "1" where the annual level of violence remains below 1,000 battle deaths and 100 civilian deaths for at least five consecutive years.<sup>36</sup> Government authority is coded "1" where state sovereignty or the administrative authority of the government is not credibly challenged by insurgents for a period of at least five years—through, for instance, the establishment of shadow controls and security

<sup>33</sup> These criteria were borrowed, in part, from James Clancy and Chuck Crossett, "Measuring Effectiveness in Irregular Warfare," *Parameters* 37, no. 2 (Summer 2007): 88–101. Due to gaps in data availability, no standard measures can be used for insurgent incidents, supplies and safe-havens. Instead, this judgment is made subjectively, upon close examination of secondary source literature on each case.

<sup>34</sup> This coding corresponds, roughly, to the status indicators used by IISS' Non-State Armed Groups dataset, wherein "1" indicates D (dormant) and X (defeated) group status and "0" indicates A (active) group status. "Non-State Armed Groups," *The Military Balance* 107, no. 1 (2007): 421–438.

<sup>35</sup> This coding excludes splinter groups, such as the Real Irish Republican Army (RIRA), which split from the Provisional Irish Republican Army in 1997, and has opposed the Belfast Agreement of 1998.

<sup>36</sup> This coding corresponds, roughly, to the WAREND5 and NVIOL5 variables in Doyle and Sambanis (2000). Where robust statistics are not available, particularly pre-1900, estimates are based on a survey of secondary source literature. Where violence dropped as a result of third-party intervention, such as in Kosovo, Abkhazia and Transnistria, or as a result of a drop in violence due to military victory by insurgents, the observation is coded "failure."

structures or attempts to seize control over state institutions or territory.<sup>37</sup> There are 32 (17%) *strict successes* and 159 (83%) *strict failures*.

The use of more than one threshold of success is helpful if one wishes to examine if and how requirements for a more enduring state of peace and stability differ from those needed for the short-term suppression of an insurgency.<sup>38</sup> Three examples can be used to illustrate these definitions of success. In 1911, Turkish forces were unable to suppress Yahya Muhammad Hamid ed-Din's rebellion in North Yemen in 1911, resulting in the effective secession of the region from the Ottoman Empire and the subsequent establishment of the independent Mutawakkilite Kingdom.<sup>39</sup> By contrast, the British campaign against the Mahsud tribes in Waziristan after the Third Afghan War was successful in suppressing the enemy's ability to sustain operations against the Raj, permitting the 1/4th Battalion and 1/5th Battalion Queens Regiment to re-deploy to Britain in 1920. However, sporadic low-intensity fighting continued in the region until 1925 and actual political control did not extend far beyond the British garrisons.<sup>40</sup> Finally, following the Third Seminole War of 1855–1858, Billy Bowlegs' band agreed to resettlement west of the Mississippi, leaving only some 100 battle-weary Seminoles in the state of Florida. State militiamen were demobilized, regular Army troops were reassigned, and forts built for the Seminole wars were decommissioned or converted to civilian use, permitting the continued establishment of government authority in the newly-created state.<sup>41</sup>

<sup>37</sup> A lack of challenges to state sovereignty was among the criteria for success as defined by Doyle and Sambanis (2000): 779–801. Here again, because this category does not lend itself well to quantitative measurement, judgments are made subjectively, upon close examination of secondary source literature on each case. I have made an effort to approximate the coding criteria for "Zone 1" used by Stathis Kalyvas, wherein "incumbent combatants and administrators operate freely during all times of day and night; no insurgent activity reported; insurgent clandestine organizations never set up or completely destroyed." Stathis Kalyvas, *The Logic of Violence in Civil War* (New York: Cambridge University Press, 2006): 421.

<sup>38</sup> Data for measurements of success were taken from Beckett (1999), the *COW*, *MIPT*, *CSCW*, Banks and Doyle and Sambanis datasets, and secondary source literature on each individual case.

<sup>39</sup> See Paul Dresch, *Tribes, Government and History in Yemen* (Oxford: Clarendon Press, 1989).

<sup>40</sup> See General Staff, Army Headquarters, India, *Operations in Waziristan 1919–1920* (Uckfield, UK: Naval and Military Press, Ltd., 2003).

<sup>41</sup> Although Florida would subsequently join the Confederacy during the American Civil War, this latter case is treated as a separate observation from the Seminole insurgency. See James W. Covington, *The Billy Bowlegs War, 1855–1858: The Final Stand of the Seminoles Against the Whites* (Chuluota, FL, 1982).

Based on the criteria specified above, the Turkish case is coded *failure*, the British case is coded *lenient success*, and the American case is coded *strict success*.

Recognizing that any definition of success will generate some codings that are debatable, a third dependent variable is provided: conflict duration. In keeping with the earlier caveats about the gradual nature of insurgency emergence, the following criteria are used to determine the start- and end-dates for a given conflict: (1) the start year is the first year in which 100 people—civilians or combatants—are killed as a result of insurgent or counterinsurgent-related violence; (2) the end year is the last year in which this level of violence is observed. For example, although the Organization of Ukrainian Nationalists (OUN) was founded in Vienna in 1929, the start and end dates of the insurgency in Western Ukraine are coded as 1944 and 1950, which mark the years of active operations against the Soviet Union by OUN's military arm, the Ukrainian Insurgent Army.<sup>42</sup> Two additional criteria are included to account for patterns that occur in several cases: (3) an observation of either a military victory, wholesale demobilization, truce or peace agreement followed by at least two years of peace is coded as conflict termination; (4) violence on the part of a separate insurgent group with distinct objectives, fighting on a separate front with little or no explicit coordination—such as various Naga, Hmar, Bodo and other insurgencies in northeast India—is treated as a separate case.<sup>43</sup> Duration is thus seen as conceptually and empirically distinct from counterinsurgency success or failure: violence levels may drop as a result of incumbent or insurgent victory, stalemate, third-party intervention or a host of other factors, irrespective of whom the resulting status quo may favor.<sup>44</sup> The question thus becomes why certain counterinsurgencies become protracted, rather than why some succeed and others fail.

#### *Regime Type*

The first group of explanatory variables includes dummies for *democracy*, *autocracy*, *mixed regime*, *polity* and *mixed coalition*. A democratic form of government is operationally defined as one in which executive recruitment is open and competitive, constraints on the chief executive are substantial, and

political participation is fully competitive.<sup>45</sup> When measured against Polity IV's Combined Polity Score, which places a state's overall regime type on a scale between +10 for full democracy and -10 for full autocracy, values of 6 and higher are coded as democracy, -6 and lower are coded as autocracy, and the range between these two scores is coded as mixed regime, including democratizing and autocratizing regimes.<sup>46</sup> By this definition, there are 67 *democracies*, 68 *autocracies* and 56 *mixed regimes* in the dataset. To test the robustness of the findings, a continuous regime type variable is also provided, measured as the Combined Polity Score (*polity*) of the incumbent during the last year of a conflict.

Cases of expeditionary operations are coded *mixed coalitions* where the regime type of the host nation differs from that of the foreign nation supporting it.<sup>47</sup> An example would be British (Polity score of 10) support for Saudi Arabia (Polity score of -10) during the Second Ikhwan Rebellion of 1929–1930. There are 20 *mixed coalitions* in the dataset. To examine whether participation in *mixed coalitions* affects democracies more than non-democracies, interaction terms are created for *democracy X mixed coalition* and *polity X mixed coalition*.

#### *Situational Difficulty*

The second group of explanatory variables includes component variables for geography, insurgency type and historical context. Geographical variables include physical terrain and distance. Terrain codings correspond to the region where most of the insurgent activity in a particular case was concentrated.<sup>48</sup> Heavy forests and jungles, mountains and swamps are coded *rugged terrain*, flat-to-rolling plains and deserts with hard, packed surfaces are coded *open terrain*, while areas characterized by a high density of settlement and a preponderance of

<sup>45</sup> The principal characteristics of internal political organization measured in the Polity IV dataset include: (1) executive recruitment, which measures the regulation, competitiveness and openness of the selection of the chief executive; (2) executive constraints, which measures the extent of institutionalized constraints on executive decision-making; and (3) political participation, which measures the regulation and competitiveness of competition for power. Marshall and Jagers (2005): 19–26.

<sup>46</sup> A cut-off point of “6” limits regime type categorization only to institutionally established democracies, facilitating a stronger test of the hypotheses than would have been the case with a cut-off point of “1”. This coding is consistent with that used in previous studies, including Lake (1992), Desch (2002) and Goldsmith (2007). For coding justifications and specifics, see Marshall and Jagers (2005).

<sup>47</sup> Foreign and host nation Polity scores must be separated by at least 6 points.

<sup>48</sup> Codings are derived from the *MacMillan World Atlas*, *Google Earth* and secondary source historical literature.

<sup>42</sup> See Zhukov (2007): 447–449.

<sup>43</sup> These criteria are modified versions of those used by Fearon (2004): 279–280.

<sup>44</sup> For both measures of success, the bivariate correlation with conflict duration is below .10.

man-made structures are coded *urban terrain*.<sup>49</sup> A dummy variable is provided for *expeditionary operations*, defined as a military operation conducted in a foreign country or colonial territory.<sup>50</sup> *Distance* is also provided as a continuous variable, measured as the estimated distance in a straight line (in kilometers; natural log) from a counterinsurgent's administrative capital to the theater of operations.<sup>51</sup> Unlike the *expeditionary operations* variable, which excludes cases of domestic and frontier counterinsurgency, *distance* considers domestic (Indians in Assam), frontier (American-Indian Wars) as well as expeditionary (Cubans in Angola) counterinsurgencies, thus permitting the examination of how increasingly extended lines of communication may impact odds of success, irrespective of territorial boundaries.

Component variables are also provided for insurgency goals and culture. Anarchist, Marxist, traditionalist and other groups seeking to supplant or otherwise fundamentally change the nature of an existing political system—such as the Hukbalahap in the postwar Philippines, which sought to overthrow the pro-Western government in Manila—are coded *revolutionary*. Groups seeking to withdraw from the political community of which they are formally a part and form an independent political entity—such as the Provisional Irish Republican Army, which sought independence from British rule—are coded *secessionist*. Finally, groups seeking to either preserve an existing status quo or attain certain political, economic and cultural privileges for their constituency without changing a political system or redrawing a state's territorial borders—such as the Bodo Liberation Tiger Force, which sought significant political concessions, but not independence, from New Delhi—are coded *limited goals*.<sup>52</sup> A dummy variable for *ethno-religious conflict* corresponds to linguistic and religious differences between the counterinsurgent and the popular base of the insurgent, wherein a value of “1” indicates differences in native language and writing system, intra- or inter-confessional religious differences,

<sup>49</sup> For example, the Florida Everglades, location of the Second Seminole War of 1835–42 can be coded as “rugged”, due to the swampland and thick vegetation that characterized the physical environment.

<sup>50</sup> This is a modified version of the definition used by the U.S. Defense Department. Department of Defense, Joint Chiefs of Staff, *Joint Publication 1–02, Department of Defense Dictionary of Military and Associated Terms*, Pentagon, Washington (12 April 2001, as amended through 14 September 2007), p. 193, available at [http://www.dtic.mil/doctrine/jel/new\\_pubs/jp1\\_02.pdf](http://www.dtic.mil/doctrine/jel/new_pubs/jp1_02.pdf) (accessed 24 October 2007).

<sup>51</sup> Because the data in this category cover a large range of values, a logarithmic scale is used to provide a more manageable range. Data was obtained from *Google Earth*'s “Ruler” function.

<sup>52</sup> These categories are borrowed from O'Neill (1990): 17–21.

or any combination of the above.<sup>53</sup>

Because situational difficulty can be expected to vary by historical period, particularly in a dataset that spans two centuries, dummy controls are provided for *Pre-WWI*, defined as any conflict terminated before 1914 (55 observations); *Inter-war-WWII*, or any conflict terminated between 1914 and 1945 (37 observations); *Cold War*, defined as any conflict terminated between 1945 and 1989 (58 observations); and *Post-Cold War*, or any conflict terminated after 1989 (41 observations).<sup>54</sup>

#### *State Power*

Variables for material and human resources include: *wealth*, measured as the natural log of gross domestic product (GDP) per capita; *human defense burden*, or military personnel as a percentage of total population; *defense burden*, measured as gross military expenditures as a percentage of GDP; *energy consumption* in thousands of coal-ton equivalents (natural log); an *industrial production* proxy, measured as thousands of tons of iron and steel production (natural log); and the size of the *total* and *urban population* in thousands (natural log).<sup>55</sup> Because in some cases a counterinsurgent's abundance of resources varied significantly between conflict initiation and termination—Iraq's GDP declined by 59% between 1988 and 1994, during the Kurd insurgency, while Chile's grew by 227% during the 1965–1994 Movimiento de la Izquierda Revolucionaria (MIR)

<sup>53</sup> Cases of mutually intelligible languages that use different writing systems include Serbian-Croatian and Hindi-Urdu. Examples of intra-confessional differences include Sunni-Shia and Catholic-Protestant. This definition can thus be distinguished from Samuel Huntington's “civilizational” fault lines, which do not include intra-confessional differences.

<sup>54</sup> These dates mark, respectively, the assassination of Archduke Franz Ferdinand on 28 June 1914, the signing of the Japanese Instrument of Surrender on 2 September 1945, and the fall of the Berlin Wall on 9 November 1989. While historians differ on the precise dates on which each historical period began, these admittedly symbolic dates are used for the sake of simplicity.

<sup>55</sup> Sources include the *COW National Material Capabilities* data set, the Fordham and Walker *Democracy and Military Resource Allocation* data set, Angus Madison's *Historical Statistics for the World Economy* data set, and a host of primary and secondary source historical literature. Absolute, rather than relative measures of state power are used due to the monadic nature of the dataset and this study's focus on variance in performance across states, rather than between combatants. Moreover, data availability across the period of observation renders impossible the task of generating relative measures in every category of interest. For instance, comparative force strength figures could conceivably be created for insurgents and counterinsurgents, but comparative energy consumption, wealth and industrial production figures present numerous methodological challenges.

insurgency—values from the final year of a conflict are used, in keeping with this study’s emphasis on war outcomes. A dummy is also provided for major power status, a composite measure from the *COW National Military Capabilities* dataset, based on population, military size and economic might, as well as subjective judgments on the part of *COW* Project Directors and historians “about which states were the most influential in the international system.”<sup>56</sup>

**DESCRIPTIVE STATISTICS**

Table 1 summarizes the observed probabilities of counterinsurgency success by regime type. Under the *lenient* definition of success, democracies experience a 78 percent success rate in counterinsurgency, compared to approximately 38 percent for autocracies and 52 percent for mixed regimes. Democracy correlates strongly with success, and this relationship is statistically significant. Under the *strict* definition, however, this relationship is weaker. Democracies succeed only 25 percent of the time, while autocracies outperform mixed regimes at 15 to 9 percent. When examined against conflict duration, democracies and mixed regimes tend to fight shorter wars than autocracies, with mean durations of 8.1, 8.3 and 9.5 years, respectively, and median durations of 4, 3 and 7.5 years.<sup>57</sup> Although the bivariate relationship between conflict duration and success is neither strong nor statistically significant, it appears that *strict* success requires a longer commitment—10.7 years on average, compared with 8.4 years for *lenient* success.<sup>58</sup>

The results for situational difficulty also vary by definition of success. Under the *lenient* definition, for instance, counterinsurgencies fought in open terrain are successful 82 percent of the time, against roughly 52 percent for both rugged and urban terrain. The advantage of open terrain diminishes under the second definition, where such campaigns are successful only 25 percent of the time, compared with 1 percent and 30 percent for rugged and urban terrain, respectively.<sup>59</sup> Expeditionary cases also have a far higher success rate under the *lenient* definition, at 56 percent, against just 7 percent for *strict* success.<sup>60</sup> Conflict duration,

<sup>56</sup> Paul F. Diehl [Director of Correlates of War Project], “RE: Operational Definition for ‘Major Power’,” 14:52, 26 April 2006, personal e-mail (26 April 2006).

<sup>57</sup> Standard errors for mean duration: 1.09, 1.24 and .93.

<sup>58</sup> A quick logistic regression test produces odds ratios of 1.03 (std. err.=.021, p=.180) and .995 (std. err.=.017, p=.756) for *lenient* and *strict* success, respectively, given a one-year increase in *conflict duration*.

<sup>59</sup> *Lenient* success and terrain: Pearson chi-squared (2), 9.0876, p<.05; *Strict* success and terrain: Pearson chi-squared (2), 8.71, p<.05.

<sup>60</sup> *Lenient* success and expeditionary operations: Pearson chi-squared (2), .012, p=.913; *Strict* success: Pearson chi-squared (2), 7.50, p<.01.

meanwhile, is longer in domestic cases, at 10 years on average (median 7 years), against 6.3 years (median 3 years) for expeditionary cases.<sup>61</sup> The rates of success by historical period are given in Table 2, indicating a general downward trend under the *lenient* definition and a significant dip—covering most of the 20th Century—under the *strict* definition.

**Table 1. Regime Type and Counterinsurgency Success**

Regime	Lenient		Strict		Total
	Failure	Success	Failure	Success	
Democracy	15 22%	52 78%	50 75%	17 25%	<b>67</b> <b>100%</b>
Autocracy	42 62%	26 38%	58 85%	10 15%	<b>68</b> <b>100%</b>
Mixed	27 48%	29 52%	51 91%	5 9%	<b>56</b> <b>100%</b>
<b>Total</b>	<b>84</b> <b>44%</b>	<b>107</b> <b>56%</b>	<b>159</b> <b>83%</b>	<b>32</b> <b>17%</b>	<b>191</b> <b>100%</b>
	Chi2(2)=21.82 p<.001		Chi2(2)=6.23 p<.05		

**Table 2. Success Rates by Historical Period**

Period	Lenient Success	Strict Success
Pre-WWI	67%	24%
Interwar and WWII	59%	11%
Cold War	52%	14%
Post-Cold War	44%	20%
<b>Overall</b>	<b>56%</b>	<b>17%</b>

Among state power characteristics, the *strict* definition of success favors greater wealth, industrial production and military spending. Countries that achieve *lenient* success have, on average, GDP per capita of \$4007, annual iron and steel production of approximately 9 million tons, and a defense burden equivalent to 2.5 percent of GDP, compared with \$5766, 15 million tons and 5.7 percent of GDP under the *strict* definition.<sup>62</sup> The average human defense burden, meanwhile, is slightly lower for *strict* success.<sup>63</sup> Wealthier countries also seem to outlast poorer ones in counterinsurgency. The mean duration of counterinsurgencies fought by states with a GDP over \$5766 is 11.5 years (median 10 years), compared to 8 years (median 4 years) for other states.<sup>64</sup>

<sup>61</sup> Std errors for mean duration: .857 and .786, respectively.

<sup>62</sup> Standard errors, respectively: 394.515, 1741.588 and .830; 1063.644, 4345.197 and 2.557.

<sup>63</sup> Lenient: mean HDB of .807, std. error of .068; Strict: mean HDB of .767, std. error of .133.

<sup>64</sup> Standard errors, respectively: 1.49 and .68.

**Table 3. Determinants of Counterinsurgency Success, 1804–2000**  
(Logistic Regression Odds Ratios and Ordinary Least Squares Coefficients)

<i>Model</i>	<i>Model 1</i>	<i>1a</i>	<i>Model 2</i>	<i>2a</i>	<i>Model 3</i>	<i>3a</i>
<i>Estimation Method</i>	<i>Logistic</i>		<i>Logistic</i>		<i>OLS</i>	
<i>Dependent Variable</i>	<i>Lenient Success</i>		<i>Strict Success</i>		<i>Conflict Duration</i>	
<b>Regime Type</b>						
Democracy (dummy) <sup>a</sup>	4.028 (2.34)**		0.882 (0.14)		-3.180 (1.71)*	
Mixed Regime (dummy) <sup>a</sup>	1.077 (0.15)		0.353 (1.06)		-0.634 (0.35)	
Polity (continuous)		1.066 (1.90)*		0.989 (0.21)		-0.209 (2.01)**
Mixed Coalition	1.385 (0.37)	7.687 (1.25)	1.776 (0.38)	0.386 (0.24)	-4.698 (2.08)**	-5.657 (1.43)
Dem X Mix Coalition	0.052 (2.37)**		0.598 (0.26)		3.260 (1.04)	
Polity X Mix Coalition		0.8 (2.12)**		1.066 (0.27)		0.196 (0.73)
<b>Situational Difficulty</b>						
Rugged Terrain <sup>b</sup>	0.132 (2.94)***	0.121 (3.03)***	0.138 (2.41)**	0.160 (2.32)**	0.481 (0.25)	0.552 (0.29)
Urban Terrain <sup>b</sup>	0.075 (3.05)***	0.066 (3.17)***	0.344 (1.05)	0.452 (0.83)	0.617 (0.24)	0.670 (0.27)
Expeditionary	0.276 (1.69)*	0.242 (1.86)*	0.081 (2.34)**	0.084 (2.32)**	-4.283 (1.82)*	-4.364 (1.87)*
Distance	1.020 (0.08)	1.020 (0.08)	1.2 (0.47)	1.147 (0.36)	1.094 (1.51)	1.080 (1.47)
Secessionist <sup>c</sup>	0.539 (1.10)	0.534 (1.10)	1.433 (0.42)	1.517 (0.50)	-1.382 (0.74)	-1.440 (0.79)
Limited Goals <sup>c</sup>	0.826 (0.22)	0.811 (0.24)	0.129 (1.49)	0.157 (1.41)	-0.218 (0.09)	-0.114 (0.05)
Ethnoreligious	0.611 (0.83)	0.561 (0.97)	0.512 (0.69)	0.535 (0.67)	-0.957 (0.51)	-0.690 (0.37)
Pre-WWI <sup>d</sup>	2.564 (1.33)	2.861 (1.53)	5.035 (1.48)	6.734 (1.78)*		
Interwar/WWII <sup>d</sup>	2.232 (1.23)	2.028 (1.11)	2.710 (0.94)	3.019 (1.02)		
Post-Cold War <sup>d</sup>	0.261 (2.30)**	0.235 (2.49)**	1.079 (0.08)	0.756 (0.33)		
<b>State power</b>						
Wealth	0.772 (0.70)	0.815 (0.56)	2.4 (1.45)	2.334 (1.79)*	2.123 (2.04)**	2.096 (2.07)**
Human Def Burden	0.339 (3.19)***	0.355 (3.13)***	0.290 (2.26)**	0.330 (2.12)**	-0.868 (1.97)*	-0.983 (2.19)**
Defense Burden	1.060 (1.22)	1.051 (1.18)	1.192 (2.57)**	1.194 (2.72)***	0.099 (0.82)	0.098 (0.82)
Energy	1.110 (0.68)	1.126 (0.78)	0.783 (0.88)	0.736 (1.11)	0.335 (0.74)	0.355 (0.77)
Industry	1.193 (1.66)*	1.176 (1.52)	1.925 (2.37)**	1.899 (2.30)**	-0.487 (1.36)	-0.418 (1.16)
Total Population	0.887 (0.41)	0.943 (0.21)	1.046 (0.10)	1.231 (0.46)	1.684 (1.83)*	1.525 (1.70)*
Urban Population	1.567 (1.10)	1.574 (1.12)	0.495 (1.00)	0.554 (0.86)	-0.744 (0.53)	-0.692 (0.50)
Major Power	1.986 (0.99)	2.540 (1.34)	0.657 (0.46)	0.571 (0.60)	0.813 (0.39)	0.616 (0.30)
Constant					-12.346 (1.23)	-10.531 (1.08)
Prob > F					0.4	0.010
Observations	191	191	191	191	191	191
Pseudo R-squared	0.30	0.29	0.43	0.42	0.15	0.15
R-squared						

*Notes:*

Models 1 and 2: Standard errors in parentheses;

Model 3: Robust standard errors in parentheses;

\* p ≤ 0.10, \*\* p ≤ 0.05, \*\*\* p ≤ 0.01;

*a* Reference category: Autocracy;

*b* Reference category: Open Terrain;

*c* Reference category: Revolutionary Insurgency;

*d* Reference category: Cold War.

### DATA ANALYSIS

To assess the relative significance of these variables in a multivariate setting, regression results are presented in Table 3 for three models. Models 1 and 2 employ logistic regression to estimate the determinants of *lenient* and *strict* success, respectively.<sup>66</sup> Model 3 employs ordinary least squares (OLS) regression to estimate *conflict duration*.<sup>67</sup>

The results, consistent with the descriptive statistics provided above, indicate that the direction and significance of the relationship between regime and success depend heavily on how the dependent variable is operationally defined—*leniently* as the short-term suppression of an insurgency, or *strictly* as long-term pacification and restoration of government authority. In achieving the more *lenient* threshold of success, the most decisive positive factors are democratic regime type and industrial production. Democratic participation in mixed coalitions, rugged or urban terrain, expeditionary operations and a high human defense burden are the strongest predictors of failure. Under the *strict* definition of success, however, state power characteristics are more prominent. Wealth, defense burden and industrial output are the most significant predictors of success, while high human defense burden, rugged terrain and expeditionary operations are the most significant predictors of failure.

Thus, democracies appear to be quite effective in containing insurgencies, though not necessarily in facilitating longer-term pacification and the establishment of government authority over a contested region.<sup>68</sup> This finding lends only partial support to H1

<sup>66</sup> The logistic regression model was chosen due to ease of interpretation and the nature of the research question, wherein there is a binary response of interest—counterinsurgency success—and the predictor variables of regime type, situational difficulty and state power are used to model the probability of that response. See Ronald Christensen, *Log-Linear Models and Logistic Regression* (Secaucus, NJ: Springer-Verlag New York, Inc., 1997): 116. Odds ratios for *democracy* and *mixed regime* are given relative to the omitted (reference) category of *autocracy*.

<sup>67</sup> OLS with robust standard errors is chosen for Model 3 due to the use of a continuous dependent variable (duration) and the need to estimate standard errors that are more robust to failure and meet assumptions concerning normality and homogeneity of variance of the residuals.

<sup>68</sup> Under the *lenient* definition of success, democracies are significantly more likely to succeed than nondemocracies, returning an odds ratio of 4.02 (4:1) against the reference category of *autocracy*. Mixed regimes have no apparent advantage over autocracies, returning roughly even odds of success. Under the *strict* definition of success, democratic regimes enjoy no apparent advantage over autocracies. None of the regime type variables is statistically significant. Moreover, odds of democratic success fall from 4:1 against autocracies in Model 1 to less than 1:1 in Model 2.

and suggests that the democratic advantage in interstate war may be weaker in low-intensity conflict, depending on one's understanding of success.

Conflict duration, meanwhile, appears to be reduced most significantly by democratic regime type, participation in expeditionary operations and high human defense burden. It is most significantly extended by greater wealth and larger populations. The observation that democracies tend to fight shorter wars than autocracies is largely consistent with earlier studies that have identified such patterns in interstate war.<sup>69</sup> The only factors positively and significantly associated with both *strict* success and extended duration are higher wealth, lower human defense burden and domestic counterinsurgency. Thus, at least among the cases included in the sample, state power and situational difficulty are more reliable determinants of success and staying power than regime type.

The implications of these findings for democratic military effectiveness depend on the nature of the relationship between state power and regime type. While the correlation coefficients for democracy and the various measures of state power are far from robust, it is clear that democracy is positively correlated with wealth, energy consumption and industrial production, and negatively with higher human defense burdens and levels of defense spending.<sup>70</sup> This connection, if indeed relevant, may explain why state power variables seemingly detracted from the significance of democratic regime type in Model 2—high wealth, high industrial production and low human defense burden are all positively associated with success. The positive association between a high defense burden and autocracy may also help explain why autocracies seem less likely to fail under the *strict* definition of success. If, however, these traits are considered to be unrelated to regime type, or if material preponderance is considered to be the enabler of democracy, rather than its effect, these findings may challenge the democratic military effectiveness thesis by identifying an alternative explanation.

The democratic advantage in suppressing insurgencies also does not appear to extend to mixed coalitions, where a democratic state provides support to a nondemocratic host nation government. Democratic participation in such coalitions is negatively and significantly related to success under the *lenient* defini-

The odds also decline for mixed regimes, which return 1:3 odds against autocracies.

<sup>69</sup> Reiter and Stam (2002); D. Scott Bennett and Allan C. Stam, "The Declining Advantages of Democracy: A Combined Model of War Outcomes and Duration," *Journal of Conflict Resolution* 42, no. 3 (June 1998): 344-366.

<sup>70</sup> Correlation coefficients for democracy: .4152 for wealth, .4514 for energy consumption and .4618 for industrial production; -.1490 for human defense burden, and -.1742 for defense spending.

tion, although the significance of this relationship weakens under the *strict* definition. Democratic-autocratic coalitions were able to achieve success only four times: twice in Iraqi Kurdistan in the 1920s and 1930s, once in Saudi Arabia in 1930 and once more in Oman in 1975. In each case, the state providing support to the incumbent was Britain. The U.S. has never been successful in mixed coalitions, as illustrated by its post-WWI experiences in Haiti and Nicaragua and, decades later, in Vietnam.

In assessing situational difficulty, this study's findings generally support H2. Expeditionary counterinsurgencies tend to be relatively brief and unsuccessful. Coefficients for this variable are statistically significant in every model, indicating low odds of success and short conflict duration. These results can be contrasted with negligible findings for physical distance to the theater of operations, which suggest that territorial boundaries and state sovereignty may be more significant to conflict outcomes than extended lines of communication alone. For example, the U.S. was ultimately successful against Modoc, Paiute and Apache Indians, despite longer lines of communication than those involved in the unsuccessful Soviet-Afghan War a century later. The most extended distances in the data set, such as the almost 19,000 km from the British Isles to New Zealand, did not prevent British success in the Third Maori War, while the relative proximity of Cambodia to Vietnam did not prevent Vietnamese failure against the Khmer Rouge in the 1980s.

Elsewhere, while rugged terrain, characterized by thick forests, swamps and mountains, is negatively and significantly associated with failure under both definitions of success, urban terrain is not as decisive a factor in the long term. Urban terrain becomes statistically insignificant under the *strict* definition in multivariate tests, while descriptive statistics show a higher *strict* success rate against urban insurgents than even those based in open terrain. These findings are consistent with empirical findings from civil war literature, as well as observations in counterinsurgency analysis literature that few urban groups have come close to achieving their strategic aims due to high population density and pervasive state security presence, despite notable initial advantages.<sup>71</sup> Most insurgencies that have had a critical urban component—including the Front de Libération Nationale during the Battle of Algiers in 1956–57 and Chechen separatists during the Battle of Grozny in 1994–95—

<sup>71</sup> Collier and Hoeffler find that a highly concentrated population is associated with fewer civil war outbreaks. Paul Collier and Anke Hoeffler, "Greed and Grievance in Civil War," World Bank Policy Research Working Paper No. 2355 (May 2000). Also see O'Neill (1990): 57; Ted Robert Gurr, *Why Men Rebel* (Princeton, NJ: Princeton University Press, 1970): 266; Arthur Campbell, *Guerillas* (New York: the John Day Company, 1968): 283.

nevertheless made their most critical gains in the countryside.

Success also appears to have become more elusive in recent years, a finding that supports hypotheses on Fourth Generation Warfare and the evolving capabilities of insurgents. Conflicts terminated in the post-Cold War era have been one fourth as likely result in *lenient* success than ones terminated during the Cold War. While the statistical significance of post-Cold War conflict termination declines under the *strict* definition of success, the broad historical trend is consistent with Model 1: odds of success in counterinsurgency have declined appreciably over the last several decades. Particularly striking are the odds of success prior to World War I, a period dominated by colonial wars. States were between five and seven times more likely to defeat insurgencies during the nineteenth and early twentieth centuries than during the Cold War and beyond.

In examining the impact of state power, this study's findings are consistent with H3. Additionally, they lend empirical support to the view that, while wealth, military spending and industrial output are key to success, higher levels of popular mobilization are neither necessary nor particularly helpful in low-intensity conflict.<sup>72</sup> Indeed, of the twelve cases in the dataset where the human defense burden exceeded three percent of the population, only three cases ended successfully—Jordan against the Palestinian Liberation Organization in 1971 and the Soviet Union against, respectively, the Revolutionary Insurrectionary Army of Ukraine in 1921 and the Lithuanian Forest Brothers in 1953. On the opposite end of the spectrum, as a result of congressional fears of tyranny and military coups, the force strength of the regular U.S. Army was kept artificially small throughout the 19th Century, not exceeding 45,000 men, which nonetheless did not prevent a string of successful campaigns during the American-Indian Wars.<sup>73</sup>

Although the results presented here are preliminary and based on an ongoing research project, this study has shown that the relative advantages of regime type and state power in counterinsurgency depend heavily on how success is defined—*leniently* as the disruption of an insurgency's ability to sustain its operations, or *strictly* as the suppression of the insurgency,

<sup>72</sup> For background on human defense burden as a variable, see Goldsmith (2007); Margaret Levi, *Consent, Dissent, and Patriotism* (New York, Cambridge University Press, 1997); Reiter and Stam (2002): 139–42. Bruce M. Russett, *What Price Vigilance? The Burdens of National Defense* (New Haven: Yale University Press, 1970): 2.

<sup>73</sup> John S. Eisenhower, *Agent of Destiny: The Life and Times of General Winfield Scott* (New York: Free Press, 1997): 251; John K. Mahon, *History of the Second Seminole War, 1835–1842* (Gainesville, FL: University of Florida Press, 1992): 197; Missall and Missall (2004): 47, 125.

the assertion of government authority and the pacification of the region. Hypotheses on democratic military effectiveness, derived from the literature on interstate war, are supported only under a *lenient* definition of success. Under the *strict* definition, the democratic advantage vanishes and state power becomes a far more significant explanation of success. Why the relative benefits of democratic institutions vary in such a way is an important question that warrants closer examination.

#### LOOKING AHEAD

The study of conflict outcomes presents an inherently difficult empirical task. Any definition of success is bound to generate some level of disagreement and produce codings that some may consider questionable. I have attempted to address this methodological challenge by offering two definitions of success, and by examining the impact of regime type, situational difficulty and state power on conflict duration—an alternative dependent variable that may seem less subjective than success, though it is certainly not without its own limitations. While some results were consistent across all models—expeditionary operations and human defense burden were negatively and significantly associated with each dependent variable—others, like democracy, were not. For example, democracies were far more successful than other types of regime in suppressing the sustainability of insurgencies, but the democratic advantage vanished when criteria for success also included pacification and restoration of government authority. At the same time, counterinsurgencies were shortest when the incumbent was democratic, a finding consistent with studies of conflict termination in interstate war.

The application of quantitative methods to the study of counterinsurgency is a relatively new field of inquiry. By constructing a dedicated counterinsurgency dataset with a 200-year period of observation, this study has been able to subject the field's conventional wisdoms to a series of empirical tests against a diverse and relatively comprehensive set of historical cases. While some insights from counterinsurgency analysis literature were supported by these initial tests, other results were inconclusive: terrain and historical context were significant, insurgent goals and ethnic cleavages were not. This study has additionally produced the notable finding that state boundaries are more significant determinants of success and failure than extended lines of communication, highlighting the non-geographical attributes of political distance.

The chosen methodology has also permitted the isolation and testing of several relatively new variables. Democratic participation in mixed coalitions—found to be a significant predictor of *lenient* failure—has not previously been examined in either conventional

or counterinsurgency literature, despite notable criticisms that have highlighted this empirical gap.<sup>74</sup> Similarly, defense burden and human defense burden have been examined as dependent variables in studies of defense resource allocation, but few analyses have investigated how these factors independently influence conflict outcomes.<sup>75</sup> As this study has shown, higher levels of defense spending per capita are positively and significantly related to *strict* success, while more military personnel per capita are significantly associated with shorter involvement in counterinsurgency and a high likelihood of failure under both definitions of success.

Although the above analysis may be an appropriate point of entry for empirical tests of hypotheses on counterinsurgency success, this study's findings should nevertheless be approached with a healthy dose of caution. Generic criticisms apply—macro-level quantitative studies can establish correlation, but not causation; no coding system can fully account for variance between and within individual cases; and data availability narrows the range of research questions that can realistically be answered. To gain a more nuanced understanding of how regime type and other factors affect the conduct and outcome of counterinsurgency, several directions for future research can be identified.

First, the fact that empirical results were so strongly affected by differences in the operationalization of the dependent variable suggests that future efforts should continue to explore various measures of success. Victory will always mean different things to different people—some policymakers will be content with a simple reduction in violence, others will seek more extensive, systemic change. The resulting idiosyncrasy of existing definitions—however frustrating it may initially seem—should be exploited by scholars to facilitate robustness tests, as well as to ascertain which conditions are associated with each type and level of success. For instance, which factors are most important in translating a series of tactical victories into success on the political-military and strategic levels?<sup>76</sup> If democratization and local capacity-building are among the criteria for success, would democracies regain the advantage lost under the *strict* definition? How would results differ if success were measured continuously—as rates of attrition, as the economic costs and benefits of war participation over time, as territory held, or as relative levels of public support for incumbents and insurgents?

<sup>74</sup> Desch (2005): 10–12.

<sup>75</sup> See Bueno de Mesquita, et al. (1999); Goldsmith (2007); Fordham and Walker (2000).

<sup>76</sup> A recent effort to construct a policy analysis framework for levels of victory is William Martel, *Victory in War: Foundations of Modern Military Policy* (Cambridge: Cambridge University Press: 2007).

Second, it would be of value to determine whether the macro-level patterns identified above are consistent with observations on the micro-level, where the unit of analysis could be a village or hamlet, battalion, company or platoon. Measures of effectiveness are far more tangible at this level of analysis, permitting, for example, an operationalization of the U.S. Army's clear-hold-build construct as a dependent variable.<sup>77</sup> Because micro-level counterinsurgency data are scarce—the Hamlet Evaluation System developed by the Department of Defense during the Vietnam War is a notable exception—such an effort would entail significant requirements for archival and field research. However, given the promise of micro-level research as demonstrated by recent influential works on civil war and rebellion, such a data collection effort could be a springboard for multiple tactical-level studies, which would have significant value for scholarly research, as well as simulation, forecasting, military analysis and military education.<sup>78</sup>

Third, illustrative comparative case studies could be used to develop a closer fit between macro and micro-level empirical findings. Macro-level research enables the identification of patterns across many states and conflicts, informing case selection and ensuring that the chosen cases are both representative and analytically interesting. By contrast, micro research could help account for spatial and temporal variation within each case and measure the extent to which the nature of a state's political system is reflected in its security forces at the small unit level. Meanwhile, the case study itself would provide the narrative and context in which quantitative findings should be interpreted, and could help trace the causal mechanism through which regime type, situational difficulty and state power influence how counterinsurgencies are fought and won.

Finally, this study has highlighted the need to better understand interrelationships between certain explanatory variables. For instance, a keener understanding of the sources of counterinsurgency success will require closer examination of the relationship between regime type and state power. Are democracies more likely to be rich, or are rich countries more likely to be democratic? Do democracies manage their defense resources differently than nondemocracies? How does regime type affect conscription policies, force sizing and force structure development? Does the nature of this relationship vary by the inten-

sity of the armed conflict?<sup>79</sup>

Similarly, one variable not included in this study due to data availability, but which should certainly be the focus of future data collection efforts on all levels of analysis, is the use of coercion. Does regime type affect numbers of extrajudicial detentions and executions? Are democracies more or less likely to apply policies of scorched earth or forcible resettlement? To what extent is the use of coercion indicative of culture, training and doctrine, as opposed to troop discipline? How does the use of coercion independently affect success?<sup>80</sup>

The empirical literature on counterinsurgency needs to be further developed. Given the prevalence of non-state political violence over the last two centuries and the centrality of counterinsurgency to ongoing efforts in the Global War on Terror, understanding sources of success is valuable not only as a field of interdisciplinary research, but is also of direct benefit to policymakers, who will need to identify the most effective mix of political, military, economic and technological instruments to forge successful strategies against non-state actors.

*The author would like to thank Donald Daniel, Jeffrey Friedman, the participants of the Spring 2007 Graduate Research Seminar in National Security Policy at Georgetown University and two anonymous reviewers at National Defense University for insightful comments on earlier drafts of this paper.*

*Feedback, comments are welcome: mail@yurizhukov.com.*

<sup>77</sup> US Department of the Army, *Counterinsurgency*, Field Manual-Interim, no. 3-24 (Washington, DC: Headquarters, Department of the Army, December 2006): 5.18–5.23.

<sup>78</sup> Notable recent micro-level studies have included Kalyvas (2006); Roger D. Petersen, *Resistance and Rebellion, Lessons from Eastern Europe* (Cambridge: Cambridge University Press, 2001).

<sup>79</sup> Although numerous studies have been written on democracy and resource allocation in wartime, the empirical focus of this research has been conventional war, not counterinsurgency. See Bueno de Mesquita, et al. (1999); Goldsmith (2007); Fordham and Walker (2000).

<sup>80</sup> For a recent case study on this topic, see Zhukov (2007).