Human Terrain Teams

Julia Page

Thesis submitted to the faculty of the Virginia Polytechnic Institute and State University
in partial fulfillment of the requirements for the degree of

Master of Arts
In
Political Science

Craig Brians, Committee Chair
Kenly Fenio
Laura Zanotti

February 23, 2012
Blacksburg, Virginia

Keywords: U.S. Army, Human Terrain Teams, Human Terrain System, Crossfunctional Teams

Copyright © Julia Page
Human Terrain Teams

Julia Page

ABSTRACT

This thesis extracts organizational lessons from the U.S. Army’s Human Terrain Teams. In the past, the Human Terrain Teams have been the topic of various debates, but none discussed their performance. Studying what influences how Human Terrain Teams perform is important to the National Security System to improve its use of socio-cultural knowledge during conflicts. A contextual narrative of team members formally involved with Human Terrain Teams and information from journalistic articles tells the story of what organizational characteristics affected the performance of the U.S. Army’s Human Terrain Teams.
# Table of Contents

Chapter 1: Introduction ........................................................................................................... 1
  Why Interesting .................................................................................................................. 2
  The Need for HTS within a Counterinsurgency Strategy ................................................. 4
  Research Questions .......................................................................................................... 7
  Chapter Overview ............................................................................................................ 8

Chapter 2: Literature Review ............................................................................................... 9
  Introduction ....................................................................................................................... 9
  Review of Literature on the Human Terrain System ....................................................... 9
  Review of Literature on Effective Cross-Functional Teams .......................................... 24
  Chapter Overview .......................................................................................................... 29

Chapter 3: Methodology ..................................................................................................... 31
  Introduction .................................................................................................................... 31
  Gathering HTT Member Experiences ............................................................................. 34
  Analysis ........................................................................................................................... 39
  Chapter Overview .......................................................................................................... 40

Chapter 4: Data-Team Purpose & Team Support ............................................................... 42
  Introduction .................................................................................................................... 42
  Team Purpose ................................................................................................................ 42
  Team Support .................................................................................................................. 48
  Chapter Overview .......................................................................................................... 55

Chapter 5: Data-- Team Culture & Team Composition ...................................................... 56
  Introduction .................................................................................................................... 56
  Team Culture .................................................................................................................. 56
  Team Composition ......................................................................................................... 62
  Chapter Overview .......................................................................................................... 71

Chapter 6: Conclusion & Implications ............................................................................... 72

Works Cited .......................................................................................................................... 76

Appendix 1: Background: Operational Need ................................................................. A
Appendix 2: Characteristics of Effective Crossfunctional Teams ...................................... B
Appendix 3: Developmental History ................................................................................ E
Appendix 4: Interview Questions for HTT Members ......................................................... F
Appendix 5: HTS Team Components ................................................................................. H
Appendix 6: Backgrounds of HTT Members found in Journalistic Articles .................. I
Appendix 7: Telecom Discussion Session ......................................................................... K
Appendix 8: Glossary of Acronyms .................................................................................. L
Appendix 9: HTS Recruitment Email ............................................................................... M
Appendix 10: IRB Permission Letters ............................................................................. N
List of Tables

Table 1: Summary of the Key Characteristics That Affect Team Effectiveness........27
Table 2. Interviewees........................................................................................................37
Table 3. Characteristics of Effective Cross-functional Teams .......................Appendix B
Chapter 1: Introduction

The set backs in the wars in Iraq and Afghanistan demonstrated the need for a new type of knowledge in warfare. In 2004, Major General Robert Scales (retired) stated that the U.S. military needs cultural awareness at the tactical level (Scales R., 2004). Understanding and empathy are important weapons of war; conduct and cultural awareness are as important as body armor and weapons skills (Scales R. H., 2009). The U.S. military recognized this change in warfare and implemented a new counterinsurgency strategy in 2007 (U.S. Army, 2007). A counterinsurgency strategy requires a socio-cultural knowledge of the area of military operations. I argue in this thesis that effective crossfunctional teams are needed to gain the cultural knowledge required for a successful counterinsurgency strategy.

By 2005 members of the defense communities began speaking out on how the military can gain cultural knowledge. In 2006, the U.S. Army created the Human Terrain System (HTS) as a response to the need for socio-cultural knowledge in the U.S. military. Human Terrain Teams (HTTs) are the primary tools of the HTS to gain this knowledge. HTTs are teams of soldiers, social scientists, research managers, and cultural analysts directed to create studies on socio-cultural knowledge and feed a database for use by current and future commanders in the area of military operations (U.S. Army, 2010d). The HTS was the U.S. Army’s pioneering effort at gaining socio-cultural knowledge to assist Commanders at the operational level. HTTs are the most important pillar of the HTS, yet what affects the teams’ performance is not usually the focal point of studies and reviews of the HTS.
The goal of this thesis is to identify the organizational characteristics based on crossfunctional team research that have affected the performance of HTTs. This thesis is a narrative of HTT members’ experiences with an analysis based on social science methodologies and research on crossfunctional teams. This thesis seeks to describe and analyze HTTs in order to provide insight and create evidence-based lessons learned for understanding the characteristics that affect team effectiveness. In this thesis, I investigate the possibility that by overlooking the basic tenets of the research literature on the characteristics that affect team effectiveness, the HTS managers created HTTs with structural performance obstacles. Interviews with former members of the HTS and secondary source interview data are explored in this thesis to gain insight into the team-level organizational weaknesses of the HTS. This thesis could remind the National Security System to develop the capabilities to gain socio-cultural knowledge and implement an effective counterinsurgency strategy.

This thesis will extract the organizational lessons—positive and not so positive—from the experiences of former HTT members and explain how research on crossfunctional teams might be applied in the future to the HTTs and other crossfunctional teams in the National Security System.

**Why Interesting**

This thesis has an implicit dual focus: 1) describing the use of social science methodologies in the National Security System and 2) investigating what affects the performance of HTTs. Both these foci are included in hopes that academics and practitioners from social science, management, and the National Security System will find the thesis interesting and useful. Increasingly, the National Security System needs
social scientists to assist in creating a more efficient and effective system. Social science research methodologies can be used as an alternative lens to better understand phenomena.

HTTs are interesting, current and controversial national security teams. The HTS created an interesting and novel merger of military members and academics. Currently, there is a great deal of energy, discussion, and uncertainty about the future of the HTS: a recently released documentary ‘Human Terrain’, and a recent review requested by the House Armed Services Committee (HASC) on the management of the HTS. The controversy has played out in numerous debates in various media venues over the past five years (Axe, 2010; Finney N. K., 2009; Gonzalez, 2008; Kipp, Grau, Prinslow, & Smith, 2006; McFate & Sewell, 2007; Mcfate, 2005a; Packer, 2006). These topics are further discussed in Chapter Two. The HTS and its HTTs created an interesting thesis because they are current and those within and surrounding the HTS are seeking solutions.

The HTS had problems with its conception, implementation, operation and organization. During its conception, the HTS immediately had to distinguish itself from the intelligence community and it had to explain its importance within the Army to receive funding (IPEN, 2007). During implementation, the program went public and the recruitment of anthropologists opened the door for an immediate attack by the academic community on the ethical use of anthropology within the military (Gonzalez, 2008; Gonzalez, 2009). During the HTS’s operation, the performances of HTTs have been discussed in the context of a soap opera narrative: sexual harassment charges, rumors of

---

1 A documentary film focused on the first death within the HTS, social scientist Michael Bhatia on May 7, 2008 in Khost Province, Afghanistan, won several awards in international film festivals (Urdis & Urdis, 2009).
inappropriate relationships, flamenco musicians, congressional hearings, deaths of members, and cliques among members.\textsuperscript{2} The organization of the HTS lacked proper oversight and did not mimic established military norms, which made it difficult to fit into the established Army units. These problems are further described in Chapter Two and analyzed in Chapters Four and Five.

**The Need for HTS within a Counterinsurgency Strategy**

A counterinsurgency strategy requires a focus on protecting the population to reduce the growth of insurgents in the area, this is known as a population-centric approach. The need for a counterinsurgency strategy arose with the change in war doctrines after the U.S. military’s invasions of Afghanistan and Iraq at the beginning of the twenty-first century.

Beginning in the mid-1980s the Weinberger doctrine\textsuperscript{3} called for overwhelming military force and clear campaign objectives when the U.S. military entered into any conflict (Mcfate, 2005a). In 1994 General Colin Powell restated the Weinberger doctrine to include, “force, when used, should be overwhelming & disproportionate to the force used by the enemy,” (Mcfate, 2005a, p. 27). The Powell-Weinberger doctrine for ‘big wars’ began eroding in the 1990’s when the U.S. military was no longer facing

\textsuperscript{2} See John Stanton’s blog on zeroanthropology.net. John Stanton, a blogger/high school football coach, publicly documented these problems beginning in the summer of 2008. He has contacts with approximately 100 former and current individuals associated with the HTS. This thesis will not use any information from sources cited on Stanton’s blog or in his articles. Although he has created a rich source of data on the HTS, to protect his sources he does not provide any documentation to verify subject identity or experiences; therefore, to ensure the highest level of validity in this study, I do not reference his articles or data set.

\textsuperscript{3} Weinberger doctrine was developed by Casper Weinberger, President Ronald Reagan’s Secretary of Defense from 1981-1987
conventional enemies (Mcfate, 2005a; McFate & Sewell, 2007). During and after the Clinton administration no alternative war doctrine emerged (Mcfate, 2005a).

The U.S. military’s invasion of Afghanistan and Iraq, in 2001 and 2003 respectively, and the 2006 rise of insurgent activity in Iraq lead to a change in strategy for the U.S. military. Record levels of insurgent activities showed a need for a re-focus on the real center of gravity, civil society, because the winner in an insurgent war must win the side of the civilian population (Kipp, Grau, Prinslow, & Smith, 2006). Insurgencies are local and are centered on political power (U.S. Army, 2007), run in families and social networks and are held together by persistent cultural narratives (Packer, 2006).

Future opponents will not fit easily on an organizational chart. Researchers from RAND suggest that insurgents are adapting into even more complex organizational structures and combining with existing criminal entities to form ‘federated insurgent complexes’ with potent resources and malevolent intentions...The need is acute for a framework and the modeling tools necessary to assist policymakers and military planners in understanding these organizations, their structures, recruiting methods, goals, and operating systems (Hoffman 2007, 75).


An effective counterinsurgency strategy requires that commanders know the roots of the conflict, the motivations of the insurgency, and the roles of the actors

---

4 During this time the U.S. military was involved in conflicts in Bosnia, Somalia, and Haiti.
involved (U.S. Army, 2007). Cultural knowledge is a prerequisite for implementing counterinsurgency strategies because that is the only way the U.S. military can compete with the insurgents for control of the population (Shachtman, 2007).

Counterinsurgencies are unique military strategies because of the amount of socio-cultural information that must be gathered and understood; it requires the U.S. military to be a learning organization (U.S. Army, 2007).

Cultures—organizational, ethical, national, religious or tribal—provide key links in the global jihad. Cultures determine how each actor in an insurgency perceives the actions of the others, and generate unperceived cultural boundaries that limit their freedom of action. Culture imbues otherwise random or apparently senseless acts with meaning and subjective rationality. Hence, it may be impossible for counterinsurgent forces to perceive the true meaning of insurgent actions, or influence populations and their perceptions, without access to local culture. Many links in the jihad—and virtually all the grievances and energies that circulate within it—are culturally determined. Culture is intimately connected with language, since humans use language to make sense of reality and communicate meaning. Therefore, in counterinsurgency, linguistic and cultural competence is a critical combat capability. It generates a permissive operating environment and enables access to cultural centers of gravity, situational awareness and interaction with the population. (Kilcullen 2005, 612-613)

General David Petraeus claims that knowing the ‘human terrain’ is a decisive element in counterinsurgency operations (Jean, 2010). In reference to the new strategy in Afghanistan, General Petraeus stated, “First and foremost, our forces and those of our Afghan partners have to strive to secure and serve the population. We have to recognize that the Afghan people are the decisive ‘terrain,’”(Petraeus, 2009).

General Petraeus continued with his claims when he assumed command of the U.S. Forces in Afghanistan in August 2010. At that time he released a guide for the

---

5 Socio-cultural factors that should be analyzed include: society, social structures, culture, language, power & authority, and interests (U.S. Army, 2007)
conduct of counterinsurgency operations in Afghanistan; the first point General Petraeus made was to secure and serve the population, he stated, “the decisive terrain is the human terrain,” (Petraeus, COMISAF’s Counterinsurgency Guidance, 2010).

The U.S. Army’s HTS is a result of an adoption of a counterinsurgency strategy by the U.S. military laid out in the Counterinsurgency Field Manual of 2007 (U.S. Army, 2007; Fick & Nagl, 2009). The HTS is meant to fill a critical gap in operational military knowledge to aid in the success of a counterinsurgency strategy (see Appendix 1).

**Research Questions**

The purpose of this thesis is to provide a contextual narrative analysis of HTTs using previously identified theoretical attributes of characteristics that affect the effectiveness of cross-functional teams. The narrative analysis will extract insights on what characteristics affect HTTs’ performance and possibly create obstacles to the teams’ performance. The scope of this study of HTTs covers four of the ten characteristics that affect team performance:⁶

- Team Purpose
- Team Support
- Team Culture
- Team Composition

It is important to analyze HTTs based on these characteristics in order to structure a narrative that will help to understand what affects the teams’ performance at the organizational-level, team-level, and subteam-level. The characteristics that have been identified seek to frame the following question: How have the characteristic(s) previously identified by research on crossfunctional teams affected HTTs performance?

---

⁶ These characteristics will be defined and described in Chapter 2. For a complete list of the characteristics see Appendix 2.
This thesis is a qualitative study emphasizing inductive, hypothesis-generating research, rather than deductive, hypothesis-testing research. This thesis will provide a contextualized descriptive narrative on HTTs, followed by an analysis of that narrative, based on the experiences of those involved with HTTs. The goal of constructing the narrative and its analysis is to provide a foundation on which to base the application of social science methodologies and research on crossfunctional teams to discover what affects the performance of HTTs. This thesis hopes to identify how these characteristics have affected HTT’s performance in a forum in which others may have access to the data, assessment, and results.

Chapter Overview

This thesis develops its study of what affects the performance of HTTs as follows: Chapter Two contains two literature reviews: the first on crossfunctional teams and the second on the HTS and HTTs. Chapter Three describes the qualitative methodologies used for this thesis: semi-structured interviews and secondary source interview data; additionally, this chapter describes the constraints on my research. Chapters Four and Five provide a conceptual descriptive narrative and analysis of HTTs based on four of the ten crossfunctional team performance characteristics: team purpose, team support, team culture, and team composition. The final chapter concludes with a description of implications of the thesis, and discusses the current situation.
Chapter 2: Literature Review

Introduction

To understand how the team characteristics affect the performance of Human Terrain Teams (HTTs), it is necessary to first understand the evolution of the Human Terrain System (HTS) and its HTTs. The events surrounding this evolution help define the HTTs. Knowing what the HTTs are is important to understanding how and why they perform in the way they do. The characteristics that affect crossfunctional team performance frame the narrative to follow in Chapters Four and Five.

The literature review is split into two parts. The first part reviews the literature surrounding the HTS and HTTs. The second part reviews the research on crossfunctional teams. This chapter concludes with a description of what is missing from the previous analyses of HTTs.

Review of Literature on the Human Terrain System

Development of the Human Terrain System

In order to understand the future of HTTs in Iraq, Afghanistan, and other countries, and in order to make sense of the present research context, it is helpful to describe events surrounding the conception of the HTS (see Appendix 3 for the official timeline). According to its developers, the HTS was “designed to address cultural awareness shortcomings at operational and tactical levels by giving brigade commanders and organic capability to help understand and deal with ‘human terrain’,” (Kipp, Grau, Prinslow, & Smith, 2006, p. 9). This section will describe how the HTS began, the controversy surrounding the HTS, and a discussion of its performance thus far.
Conception: 2005

At the time of the U.S. invasions of Afghanistan and Iraq, some in the Department of Defense (DoD) had identified a need for operationally relevant socio-cultural knowledge throughout the U.S. military. The prototype of the HTS was released to the public in 2006, but as early as 2003 senior leaders within the DoD were advocating for “cultural knowledge of the adversary,” (McFate, 2005a, p. 24). In a 2006 interview with New Yorker Magazine, Montgomery McFate said that if the counterinsurgency battlefield is local, the U.S. Government needs “granular knowledge of social terrains on which it is competing,” (Packer, 2006). Additionally, during that interview, McFate claimed that she had spent five years trying to get the DoD to understand the importance of cultural knowledge, (Packer, 2006).

In 2005, McFate co-authored a piece on the needs for cultural knowledge in the U.S. military (McFate & Jackson, 2005). She suggested the creation of an Office for Operational Cultural Knowledge, a prototype for gaining socio-cultural knowledge in the military (McFate & Jackson, 2005). This prototype called for a staff of 75 and a budget of $6.5 million, but did not mention of the use of teams (McFate & Jackson, 2005). McFate and Jackson’s (2005) prototype never came to be, but their claim for the need for socio-cultural knowledge in the military was heard.

Birth: 2006-2007

Responsibility for the HTS began to spread by 2006 as funds were allocated to its start-up. The Foreign Military Studies Office (FMSO), a U.S. Army Training and Doctrine Command (TRADOC) organization that supports the Combined Arms Center at
Fort Leavenworth, Kansas, oversaw the creation of the HTS\(^7\) in 2006 (Kipp, Grau, Prinslow, & Smith, 2006). In 2006, retired U.S. Army Special Operations Colonel Steve Fondacaro was recruited to start up the HTS; cultural anthropologist Montgomery McFate later joined HTS as the Senior Social Science Advisor. At that time, the project was still in its conception phase at TRADOC (Kimberlin, 2010a). Fondacaro and McFate heavily promoted the HTS and it was clear they were both passionate about the HTS succeeding. In an interview with a journalist, Fondacaro talked for nine hours straight about the HTS; the journalist recalls, “Seven hours in, he walked into a door, breaking his jaw, but resumed talking,” (Pelton, 2009).

The HTS was originally funded with $20.4 million from the Joint Improvised Explosive Device Defeat Organization (JIEDDO)\(^8\) (IARMY, 2007). That money was used to fund the first five teams and set-up the Reachback center in Ft. Leavenworth, Kansas (IARMY, 2007). “Funding would come from the Department of Defense…every dollar required a dogfight in the competition-heavy machine,” (Kimberlin, 2010a). Implementation of the HTS proof of concept phase was contracted out to BAE Systems (BAE) (a government defense contractor), without a bidding process (Ephron & Spring, 2008). In fall 2007, HTS was no longer a proof of concept and became institutionalized in the U.S. Army. BAE continued to manage the recruiting but the U.S. Army took over all other organizational functions: funding, training, and human resources. A report from

\(^7\) Each new program in the Department of Defense must have a sponsor or proponent. TRADOC manages HTS but the U.S. Army’s intelligence directorate (G2) is the proponent (IARMY, 2009).

\(^8\) "JIEDDO leads DoD actions to rapidly provide Counter Improvised Explosive Device capabilities in support of the Combatant Commanders and to enable the defeat of the IED as a weapon of strategic influence," (JIEDDO, 2010).
the Center for Naval Analysis (CNA) notes how changes in military policy in Iraq directly affected HTTs:

Prior to 2009 the deployed civilian jobs were filled by contract personnel. Changes made in 2009 to the Status of Forces Agreements (SOFA) in Iraq threatened to put deployed contractors at risk and TRADOC made a decision to convert all deployed civilian personnel to government status for their protection. During this process HTS lost about 30 percent of the team personnel either because they did not qualify under the new government criteria or because they chose to resign. Currently, all new civilian hires for team personnel are initially hired as contractors, but are converted to short-term government employees by the end of training (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010, 76).

According to Fondacaro, “Each step was a struggle [building up the HTS]…Even with three decades of Special Forces under his belt, HTS ‘is the hardest thing I’ve ever done,’” (Kimberlin, 2010a). Fondacaro told a journalist researching the HTS, “Inside the monolithic DoD fresh ideas are treated like ‘a virus that enters the body. First, they send out white blood cells to kill you. If you survive that, you move into a more dangerous, more insidious phase where DoD stops trying to kill you but tries to inject you with its DNA—to make you just like them. You have to keep fighting,’” (Kimberlin, 2010a).

The Debates

There have been many debates on how to obtain knowledge of human terrain, by whom it should be obtained and how it should be analyzed. The two most salient debates surround the use of anthropologists by the U.S. military and where the HTS should be located within the National Security System.

The use of anthropology in the military monopolized the debate surround the HTS at its conception and birth. This is not a new debate. A Military Review article authored by the creators of the HTS described the new project and further antagonized the

As the army launched HTS, some military analysts described it as ‘a CORDS for the 21st century’ (Kipp et al. 2006), in reference to Civil Operations Revolutionary Development Support, a Vietnam War-era counterinsurgency effort. CORDS gave birth to the infamous Phoenix Program, in which South Vietnamese officials and US agents gathered intelligence data to help target tens of thousands of people for ‘neutralization’ (incarceration or assassination), including many civilians (Valentine 1990). At the time, CORDS was publicly hailed as a humanitarian project for winning ‘hearts and minds’, while Phoenix simultaneously (and secretly) functioned as its paramilitary arm. This dubious history provides a critical reference point for understanding the potential uses of HTS (Gonzalez, 2008).

The use of anthropology in the military has been called the “prostituting of science” and the “militarization of anthropology” (Bryan, 2007). The American Anthropological Association (AAA) is the most outspoken group regarding the HTS and this has caused problems with the HTS’s ability to recruit anthropologists (AAA Commission on the Engagement of Anthropology with the US Security and Intelligence Communities, 2007; AAA Commission on the Engagement of Anthropology with the US Security and Intelligence Communities, 2009). Many anthropologists at universities across the US have spoken out against the HTS (Gonzalez, 2008; Gonzalez, 2009; Glenn, 2007a) and there is rumored backlash in the academic communities against PhD’s that enter the HTS. The AAA wanted the U.S. security and intelligence communities to recognize the problems with anthropologists gathering data for the military; Colonel Mark Crisci responded that this [anthropologists gathering data] is done carefully and HTTs walk a fine line between conducting research and collecting intelligence (Jean, 2010).  

---

9 This thesis does not attempt to determine if HTTs are conducting research or collecting intelligence. This is a debate surrounding HTS but beyond the scope of this thesis.
than creating a secure, less violent world, critical anthropologists claim that if they were to work for the military they are actually contributing to a “brutal war of occupation which has entailed massive casualties,” (Bryan, 2007). This debate has waned over time as HTS has moved away from recruiting only anthropologists.

The second debate occurs within the National Security System. Some U.S. military leaders are more open to the HTS than others (McFate & Sewell, 2007). The most popular military objection is that, “the HTS is inconsistent with standing doctrine and ignores recent improvements in military cultural capabilities,” (Connable, 2009). The approach developed by HTS is not consistent with current military doctrine and culture; the critics claim that the military should develop an organic capability rather than create a “quick fix” solution to learning the cultural knowledge that is necessary for a counterinsurgency strategy (Connable, 2009). This debate is still current but other branches of the military have started their own programs for gathering socio-cultural knowledge that are more organic to the military.

The leadership of the HTS has been outspoken in countering the military arguments. Former Program Director Steve Fondacaro argued, “Military units are terrific, but they’re trained to do a specific thing—force their way into the theater and kill whatever is in front of them. It’s nothing to be ashamed of. That was my job for 30 years,”” (Kimberlin, 2010b). The Social Science Advisor and cultural anthropologist Montgomery McFate wrote:

Although a number of institutions within the military community design and run programs with a cultural knowledge component, the programs are dispersed, underfunded, or not easily accessible to military commanders and policy makers from all agencies and services. The result is a widespread confusion about how to gain access to needed information and resources and a subsequent reliance on informal means of gaining
information, such as discussions with taxi drivers about public opinion in their country of origin. (McFate & Jackson, 2005)

Currently, the HTS is housed in the G2 department of the U.S. Army, their intelligence department. Some within the Army are perplexed as to why gathering human terrain data is housed under TRADOC rather than one of the Unified Combatant Commands (COCOMS) that already provide this type of information. The intelligence agencies, such as the Defense Intelligence Agency (DIA), the Central Intelligence Agency (CIA), and the National Geospatial-Intelligence Agency (NGA), claim that they too are gathering and analyzing data on the human terrain (although it may be called ‘human geography’ or similar). Military leaders argue that the problem with the intelligence community obtaining this knowledge is that it remains classified and does not get pushed down to the military leadership on the ground at the operational level.

A Defense Intelligence Agency working group set up to include representatives from different intelligence agencies was assigned to determine the role of the intelligence community in using social science information in support of Defense Department operations, he [Former Program Director Steve Fondacaro] said. But the intelligence community spent a great deal of time arguing about the meaning of words and trying to gain consensus, Fondacaro recalled. ‘They’re struggling with that…And this is what has really frustrated us, because we’ve got teams in the field,’ he said. ‘We’ve got a joint urgent operational needs statement that drives us [and] that has us putting teams in the field with every brigade combat team and every division in theater in Afghanistan and Iraq by the end of September,’ he added. ‘We can’t wait for this kind of typical, slow-moving, bureaucratic sparring to go on.’ Government and military intelligence agencies have been grappling with the question of whether human terrain teams are involved in classical intelligence or not, he said. But, he added, this concern is based on wanting to know whether intelligence dollars are being tapped,” (IPEN, 2008).

Government contractors, such as BAE Systems and Glevum Associates, are also obtaining human terrain information for the U.S. military. These organizations are
important because they are somewhat interlinked with the HTS (they often employ former members and assist with recruiting for HTS).\(^\text{10}\)

Despite the controversy, the HTS is working towards gathering socio-cultural knowledge for U.S. military commanders. Now that the HTS is established, how well does it work?

**Performance of the HTS**

There are varying opinions of how well the HTS works. Those ‘with a dog in the fight’ preformed many of the previous evaluations. The opinions tend to vary depending on whether the author(s) benefit from the continuation of HTS, whether or not the author(s) are in the U.S. military, and whether or not the author(s) had adequate access to data in order to form an opinion.

“When asked how HTS measures success, both McFate and Phillips [HTS leadership] said brigade commander satisfaction was key and that the program had received positive feedback in that regard. But the most important metric going forward, they said, is whether the lives of the indigenous people of Iraq and Afghanistan have been improved by HTS team members assisting the military,” (IARMY, 2010). The Congressionally mandated research done by the Center for Naval Analysis (CNA) produced a report on the effectiveness of the HTS, including it’s products and opinions of its ‘customers’, the U.S. military commanders (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010). The CNA Report gave a ‘big-picture’ view of the performance of the HTS.

\(^\text{10}\) Analyzing that relationship and government contractors’ role in national security is beyond the scope of this thesis.
In the summer of 2010, Wikileaks\textsuperscript{11} leaked insider documents from the U.S. military onto the Internet. HTS was mentioned dozens of times in these documents, “According to the entries, HTS has helped uniforms understand clans and disputes, assess loyalties, and figure out that construction supervisors were siphoning off money and police were stealing from households,” (Kimberlin, 2010a). Additionally, a Marine commander who works with the HTS in Afghanistan told a journalist, “’They [HTS] start from a vantage point that’s strictly about the people and what they think…That’s invaluable. Anybody who can help us get a piece in the puzzle is an add,’” (Kimberlin, 2010a). The critics offer a counter viewpoint: “Despite HTS supporters’ frequent claims that the program has drastically reduced U.S. ‘kinetic operations’ (military attacks) in Afghanistan, Pentagon officials have not responded to a request for data to back up such claims, and there has been no independent confirmation of these assertions,” (Gonzalez, 2008, p. 21).

Previous scholarly research on the HTS and HTTs focused on how to gain socio-cultural knowledge, why culture matters, and how the HTS is involved in gaining cultural knowledge. Five graduate theses from the Naval Post Graduate School and one monograph from the School of Advanced Military Studies at the U.S. Army Command and General Staff College\textsuperscript{12} discussed the HTS and HTTs (Burke, 2007; Bumbarner, 2009; Chandler, 2005; Eldridge & Neboshynsky, 2008; Fawcett, 2009; Schaner, 2008). This scholarly research added to the literature on the HTS and HTTs but did not include

\textsuperscript{11}“WikiLeak\textregistered is an international non-profit organization that publishes submissions of private, secret, and classified media from anonymous news sources, news leaks, and whistleblowers,” (http://en.wikipedia.org/wiki/WikiLeak\textregistered, June 2011).

\textsuperscript{12}Both of these institutions are Professional Military Education institutions (PMEs). These education institutions offer military education for military officers (http://www.dsca.osd.mil/home/professional_military_education.htm, 2007).
how the organizational structure affected the HTTs performance. The CNA Report names additional papers and reports on the HTS and all—with the exception of one from a West Point faculty member—were authored by those within the military or the HTS. These papers did not specifically discuss the effectiveness of the HTTs or analyze how the HTTs work within HTS as an organization.

By late 2005, the amount of funding allocated to the HTS and the debate surrounding the HTS caught the eye of Congress. In 2009, the House Armed Services Committee (HASC) directed the Secretary of Defense to conduct an independent assessment of the HTS and submit that assessment by March 1, 2010. The assessment was to include the following elements:

1. An overview of all of the components of HTS, including related technology development efforts;
2. The adequacy of the management structure of HTS;
3. The metrics used to evaluate each of the components of HTS;
4. The adequacy of human resourcing and recruiting efforts, including the implications of converting some contractor positions to government positions;
5. An identification of skills that are not resident in government or military positions, and how the Army can leverage academic networks or contracting opportunities to fill those gaps;
6. An identification of policy or regulatory issues hindering program execution; and
7. The potential to integrate HTS capabilities into existing exercises. (House Armed Services Committee, 2009).

This assessment was delayed during the process of lining up the contracting organization to work on the report and was not completed by the goal date of Summer 2010 (IPEN, 2010). Without the assessment in hand, in May 2010 the HASC limited the HTS’s funding by 50% until the Secretary of the Army submitted the following:

1. The independent assessment of the HTS called for in the report of the Committee on Armed Services of the House of Representatives

2. A validation of all HTS requirements, including any prior joint urgent operations needs statements.

3. A certification that policies, procedures, and guidance are in place to protect the integrity of social science researchers participating in HTS, including ethical guidelines and human studies research procedures. (House of Representatives, 2010)

The Office of the Under Secretary of Defense for Intelligence (OUSDI) commissioned CNA to conduct an independent assessment of the HTS to satisfy the Congressionally Direct Action (CDA). The Congressionally Directed Assessment of the Human Terrain System (2010) is a part of a broader assessment examining socio-cultural research and analysis activities across the DoD.

The CNA Report was rumored\textsuperscript{13} to be presented to HASC July 2010 but that date was pushed back until September 2010. During the winter of 2010 a Freedom of Information Act (FOIA) was requested for the study. After contacting my former Congressman in December 2010, the Military Legislative Assistant of the Office of Congressman Walter Jones, a current member of the HASC, first told me he would help me get a copy of the report, then he told me to wait until the FOIA request was approved for a releasable copy and that the assessment had not been presented to the HASC. Contradictorily, it was reported that the report was presented to the HASC in September 2010, but the same article noted that there is was no publicly available version at that time (Bertuca 2010). On February 17\textsuperscript{th}, 2011, I received a LinkedIn.com response from Julia Voelker McQuaid, a research analyst with CNA and co-author of the HTS report. I

\textsuperscript{13} On July 8, 2010 John Stanton posted on his website that according to a House Armed Services staffer, the report would be available July 19, 2010 (http://cryptome.org/0001/hts-poolside.htm). Additionally, I spoke with the same staffer of the House Armed Services Committee and they told me that they did not know where Stanton got his information, but the report would not be available.
contacted Ms. McQuaid on November 10th 2010 inquiring on the release date for the report. In February 2011, Ms. McQuaid sent me a link to the report, stating it was cleared for public release. Before I could download the report I received a second message from Ms. McQuaid, stating that the version of the report she sent me was not authorized and should not have been released. She also asked that if I had downloaded the report to not use it (cite, discuss with the media, etc.) or disseminate it in any way. The link was immediately disabled. Within the same 24 hour time period John Stanton accessed the report and reposted a copy on his blog (Stanton 2011). The report is now publicly available on the Internet and all details cited here come from the version posted by John Stanton; I have not accessed it through classified channels and it is included in the secondary data set.

CNA’s research for their report was limited in a host of ways.14 The CNA Report is dated for approved distribution as of November 2010. The report states that the “intent of the assessment is to provide Congress with accurate and objective information on specific aspects of the HTS Program and insight into HTS’s operations and effectiveness,” (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010). CNA was given 90 days to complete the report and they were not allowed to travel to Iraq or Afghanistan to meet with members of the HTS. CNA was allowed access to internal documents relevant to their assessment as well as external documents and sources. The authors conducted meetings with leadership and staff across the HTS as well as semi-structured interviews with the HTS’s customers and 18 commanders who interacted with the HTS (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010). The authors also

---

14 As in this thesis, the CNA Report authors mention blogger John Staunton, but chose not to use his information as data.
noted that TRADOC did not always respond to their requests for information (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010). The lack of access to the HTS is noted by CNA as limiting the accuracy of their report.

Prior research on the HTS is rife with conflicted interests and limitations. The CNA Report lists 55 documents and products that in some way assess or evaluate various aspects of HTS since 2007. Of those 55 reports, 1) none specifically evaluate the organizational performance of the HTTs and 2) only 10 are not internal HTS reports, and all of these 10 were written by government contractors or West Point staff. The report notes that assessments done prior to 2010 evaluate the effectiveness of deployed HTTs and their success in supporting commanders (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010). This terminology is misleading, given that ‘effectiveness’ was never clearly defined in any of these reports and the internal reports were often written in an effort to seek additional funding. The CNA Report specifically mentions HTTs briefly, but the report is more of a ‘big picture’ overview. For example, the data are quite narrow. The assessments and reports on HTTs told stories of single instances of action by a team, not a collection of their impact based on the HTT as an organizational unit. Therefore, a clear look at what affect HTTs’ effectiveness has not been completed.

Human Terrain Teams

The most important pillar of the HTS are the Human Terrain Teams (HTTs). HTTs are comprised of active duty military members and civilian academics, which were designed to work together to provide local knowledge that was previously lacking in the field. HTTs do this by directly passing information to the current area commander by remaining in the areas of military operations over time and transferring from commander
to commander (Kipp, Grau, Prinslow, & Smith, 2006). “The HTTs’ mission is to diagram Iraq’s cultural landscape—its ‘human terrain’—in the same way intelligence analysts map out Iraq’s cities, roads, and rivers…To accomplish its mission, the team draws on two pools of knowledge: information that has already been collected and information the teams members collect themselves. They then analyze the information and present their conclusions and advice to the brigade commander,” (Pryor, 2008, p. 8).

The data collected by HTTs are designed to be unclassified; therefore, it can be used across agencies and at the operational level throughout the National Security System (Kipp, Grau, Prinslow, & Smith, 2006). “Overall, promoters of the HTS claim that HTT members are able to identify local needs and perceptions, engage local leaders to cultivate legit governing institutions, identify formal and informal centers of gravity and external influences on the local population through social network analysis,” (Finney N. K., 2009). Chapters 4 and 5 will further detail how all those involved do not always similarly perceive the role of HTTs.

Funding & the Current Situation

As in most military and National Security System programs, funding is always an important issue. In October 2007, $49.5 million from the Iraq Freedom Fund was allocated for the HTS (IARMY, 2007). “The funding will provide for deployment of 11 or more Human Terrain Teams to Iraq. The move is a response to a September 12 joint urgent operational needs statement,” (IARMY, 2007). Additionally, “the new funding provides for nine HTTs at $2 million each, two Human Terrain Analysis Teams (HTATs) at $3 million each, plus a $2 million training package covering all 11 teams, according to

---

15 The HTS declares the data collected by HTTs is not intelligence. Determining whether or not the HTTs collect intelligence is beyond the scope of this thesis.
the reprogramming action. In addition, $10.1 million will go toward ‘social science support efforts’ and $4.9 toward laptops and logistics support,” (IARMY, 2007). These high numbers bring attention and high expectations for positive results.

From May 2008 to September 2008, the HTS was projected to triple in size (IPEN, 2008). This is “despite growing pains…according to the [former] program manager Steve Fondacaro,” (IPEN, 2008). TRADOC reported in 2009 that from fiscal year 2006 to fiscal year 2008, the funding for the HTS jumped from $11.4 million to $131 million (IARMY, 2009). “Recruitment for HTS is done under a firm fixed price contract by BAE Systems (BAE). The current contract was renewed in September 2009 for a 5-year effort at $380 million,” (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010).

In addition to the funding for recruitment, the HTS requires funding for its training and operations. As of the first half of 2010, the HTS started ten training cycles a year with between 30-40 potential team members in each cycle. As of June 2010, the director of TRADOC reported that there were 12 operational HTTs in Afghanistan and 14 operational HTTs in Iraq (IARMY, 2010). The increasing demand of the HTS led to organizational changes.

The current Program Director Colonel Sharon Hamilton16, said in December 2010 that U.S. Central Command requested 31 HTTs in Afghanistan—an increase of nine teams—by summer 2011 (Bertuca, 2010). Other organizational changes have taken place

---

16 A spokesman for TRADOC confirmed that the then program director of the HTS Steve Fondacaro, left his position on June 11th 2010. “Fondacaro said in a phone interview that, although not technically fired, he had been pushed out of the position. He said that there had been ‘a lot of tension’ between himself and senior army leaders, exacerbated by congressional pressure, ‘this is just a culmination of that,’ he said,” (Weinberger, S. 2010, p. 993).
including: 1) the replacement of co-founder and Senior Social Scientist Montgomery McFate by Dr. Christopher King, a former team member and new chief social scientist, 2) hired a senior civilian to oversee the administration and logistics to support HTTs, 3) hired an information technology director, and 4) hired a civilian training director (Bertuca, 2010). Each of these changes may alter the behavior and results of the HTTs, making a study of HTTs a moving target.

**Missing Analysis**

The previous research on the HTS and HTTs primarily addresses the debates surrounding the HTS; they do not address what is affecting the performance of HTTs. The previous debates are not relevant to determining what affects the performance of HTTs. This thesis seeks to move from the ethics and intelligence debates to what will improve HTTs’ performance. For example, the previous research on HTTs debates whether or not experts from a certain field should work for the military—the research is missing whether or not the HTS is hiring the right experts.

**Review of Literature on Cross-Functional Teams**

This thesis utilizes previously identified theoretical attributes of crossfunctional teams based on some twenty years of research on organizational teams. This research is important to the study of teams in the National Security System because they provide a

---

framework to build upon when determining how to create an effective team. Orton & Lamb (2011) composed a review of the literature on teams and that review is used to explore what role these characteristics played in the performance of HTTs. The literature also assists in distinguishing between teams and cross-functional teams.

“Research is accumulating in support of the proposition that cross-functional teams are powerful organizational mechanisms able to solve complex problems, especially in turbulent, ambiguous, and unpredictable environments such as the ones faced by the U.S. National Security System,” (Orton & Lamb, 2010, p. 1). Teams have been the most fundamental unit of organization in the military throughout history (Committee on Opportunities in Basic Research in the Behavioral and Social Sciences for the U.S. Military, 2008). “Wars are fought and won or lost by people working together in small groups located at every level of the command hierarchy: the infantry squad in the field, the aircraft mechanics in the hanger, the technicians in the engine room of a nuclear submarine, and the Joint Chiefs of Staff in the boardroom. Team effectiveness has always been and continues to be essential to the success of military missions,” (Committee on Opportunities in Basic Research in the Behavioral and Social Sciences for the U.S. Military, 2008, p. 29). The importance of cross-functional teams in the military illustrates the positive effect they can have throughout the National Security System.

Two recent literature reviews of the research on organizational teams published between 1983 and 2008 provide long lists of characteristics of effective teams (Kozlowski & Ilgen, 2006; Mathieu, Maynard, Rapp, & Gilson, 2008). In these reviews the number of specific variables presumed to have an impact on team effectiveness continued to grow, and now has become spiraling, unstructured and difficult to
summarize, test, and/or implement. The review conducted by Dr. Orton and myself in 2010 attempted to categorize this literature in a way that could be utilized by the National Security System.

During the summer of 2010, while working with scholars at the National Defense University (NDU), I contributed to the final stages of a review of the literature on team effectiveness, which will eventually be published as a book chapter in Effective Interagency National Security Teams: Theory and Practice. A preview of the research was published as a journal article (Orton & Lamb, 2011). This review relies on twelve prior comprehensive literature reviews and attempts “to help narrow the gap between the organizational science and national security practitioner communities by extracting practical observations from a comprehensive review of the literature on the effectiveness of teams,” (Orton & Lamb, 2011). To avoid exacerbating the confusion and to focus our research efforts, Orton and Lamb decided to concentrate on the ten best-supported characteristics that affect the effectiveness of cross-functional teams: team purpose, team empowerment, organizational context, team structure, team decision-making, team culture, team learning, team composition, team rewards, and team leadership (for a detailed explanation with sub-variables, see Appendix 2). The ten characteristics that affect the performance of crossfunctional teams are divided into three sub categories: 1) the organizational-level, 2) the team-level, and 3) the subteam-level. The four characteristics used in this thesis represent each of these levels (two are from the subteam-level).
<table>
<thead>
<tr>
<th>Characteristic</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Team Purpose</td>
<td>Teams must be given a clear, meaningful purpose and initial direction in the form of an authorizing mandate. Coordination and communication of the common purpose and objectives in a crossfunctional team allow for the creation of an external memory that members can pull from to know what others on the team know.</td>
</tr>
<tr>
<td>Team Empowerment</td>
<td>The team must be given people, confidence, resources, authority, and the time needed to accomplish their tasks. The leader and the team receive their authority directly from a geographic office or the president. They have presumptive authority over all their mandate resources and departments and agencies supplying them.</td>
</tr>
<tr>
<td>Team Support</td>
<td>The team’s common purpose and objectives must be supported by the overall organization with the ambivalent non-interference by the rest of the organization. There must be the ability to connect the team with other teams at multiple levels within the organization.</td>
</tr>
<tr>
<td>Team Structure &amp; Process</td>
<td>Teams are small, collocated, work full-time, and sustained over a significant period of time. The team leader identifies required expertise for the team and receives personnel candidates who apply to the team or who are asked by the team leader to join.</td>
</tr>
<tr>
<td>Team Decision-making</td>
<td>To solve complex problems the team requires diverse points of view, the capability of the team to generate conflict between divergent viewpoints, and the ability of the team to rebuild adequate strategic consensus to implement decisions.</td>
</tr>
<tr>
<td>Team Culture</td>
<td>The team culture encourages a focus on mission success and teamwork, collaboration but not capitulation. The team must have a strong sense of trust, interdependence, full participation, decision-making by consensus, free flow of information, and open to express feelings. The culture must provide the environment to integrate information and diverse perspectives so the team is greater than the sum of its parts.</td>
</tr>
<tr>
<td>Team Learning</td>
<td>The interdependent sets of individuals that make up the team acquire knowledge, skills, and performance capabilities through interaction and experience.</td>
</tr>
<tr>
<td>Team Composition</td>
<td>Team leaders must make strategic choices that lead to certain people being on a team at a specific point in time and certain people not being on a team at a specific point in time. Recruitment must focus on the ideal team member having necessary personality characteristics, goal orientations to commit to the team and recruiting team members that provide attitudinal, demographic, and functional diversity.</td>
</tr>
<tr>
<td>Team Reward Systems</td>
<td>Rewards must be team-based to create a mechanism for filtering out people who will not thrive in team environment and attract those that do, to attract members, reinforce purpose, and focus on the commitment to the mission.</td>
</tr>
<tr>
<td>Team Leadership</td>
<td>The team must have effective leadership and extraordinary leaders. Self-managed teams are not effective in crossfunctional teams, rather distributed or shared leadership allows experts to take control when necessary.</td>
</tr>
</tbody>
</table>
The theory used to frame the forthcoming analysis is based on over twenty years of research on organizational teams. Before we can determine how team characteristics affect the performance of HTTs it is necessary to know what a team is, why HTTs are teams, and how HTTs are classified as teams.

During my research experience with the National Defense University, I reviewed extensive literature in an effort to distinguish and define the nature of groups, teams, and cross-functional teams. The distinctions and definitions agreed upon by the researchers at the National Defense University relied on Thompson’s (2003) concept of task interdependence. Groups, teams, and cross-functional teams can be distinguished based on pooled, sequential, or reciprocal interdependence. “Pooled interdependence is the minimal level of task interdependence within an organizational group’s task environment…Sequential interdependence is a moderate level of task interdependence within an organizational team’s task environment…Reciprocal interdependence is the highest level of task interdependence and distinguishes a cross-functional team’s task environment”, (Orton & Lamb, 2011). These distinctions separate cross-functional teams, such as a surgical staff (with nurses, surgeons, anesthesiologists, etc.), from teams such as a basketball team (a point guard is able to play center, possibly not as ideal at the NBA level, but the members are interchangeable and the team can function without one of the players). The National Security System requires cross-functional teams due to the various locations of information, skill sets of members across organizations, and the complicity of the task environment.
Cross-functional teams have a high level of task interdependence because their activities “require rapid coordination of diverse functional expertise [and] require ‘mutual adjustment’ among the functional specialties on an ongoing basis,” (Orton & Lamb, 2011). HTTs are cross-functional teams because of their design—usually composed of an ex-military team leader, senior social scientist with PhD (ages 50-60), junior social scientist with master’s degree (ages 30-40), active duty research manager, social-network expert or “human terrain analyst”—and the routine and rapid mutual adjustment between specialties on the team. Because HTTs are cross-functional teams, the characteristics that affect the effectiveness of cross-functional teams provide an appropriate framework for this narrative.

**Chapter Overview**

Reviewing the current reviews of literature on the HTS clearly demonstrates a need for further scholarship on these defense tools that are increasingly crucial to military actions. Additionally, the research on crossfunctional teams provides a solid foundation on which to base an analysis of HTTs within the HTS. The current literature on the HTS critically misses a team analysis component, which is a specific evaluation of those factors affecting the performance of HTTs. The chapters that follow utilize social science methodologies and research on crossfunctional teams in an attempt to fill this gap. This thesis will move from the previous analysis and debates surrounding the HTS

---

18 Orton and Lamb (2011) go further in their taxonomy of teams by addressing the problem of distinguishing between cross-functional teams. This is important because best practices of one cross-functional team may not be the best for a different cross-functional team. This taxonomy is based on managerial scope and temporal duration. These distinctions are important for studying cross-functional team performance but go beyond the scope of this study.
to specifically examine those factors affecting the performance of HTTs. A comment by former HTS member Zenia Helbig implicitly calls for this missing analysis:

“Organizational disarray, not ethics, is the real story,” (Glenn, 2007). The next chapter details the methodologies used to advance the analysis of HTTs based on cross-functional team performance.
Chapter 3: Methodology

Introduction

Gathering data on HTTs proved to be no easy feat. This chapter tells the story of the data collection, the constraints to the research, the methodologies used, and the explanation of the necessity of each method. Additionally, this chapter includes a description of the four characteristics that influence the performance of crossfunctional teams that the narrative is built upon and concludes with a description of the method of analysis.

Access to HTT Members’ Experiences

Original Research Design

Originally, this study was designed to gather data using interviews with current members of the HTTs but this changed as the research progressed. In the Virginia Tech IRB submission, the following methodological procedures were explained: (1) my participation in a National Defense University Research project; (2) the concept of interviewing current members of the HTTs; (3) the fact that the interviews would be conducted as a partnership between National Defense University (NDU) members (Dr. Christopher Lamb and Dr. James D. Orton), and myself as a Virginia Tech graduate student; and (4) the fact that the data from the research would be used in two different studies – a masters thesis at Virginia Tech and a research study at the National Defense University.\(^{19}\) The Virginia Tech IRB was approved on July 22, 2010.

\(^{19}\) It was noted on the IRB Research Protocol that the National Defense University did not have an IRB.
Negotiation of Access to Current HTT Members

On July 7, 2010, I sent a Request For Information to the HTS program via their website listing myself as the primary researcher and Dr. Lamb as my advisor at NDU.20 On Monday July 12, 2010, the Deputy Program Director of the HTS contacted Dr. Lamb. Our research team and HTS leadership corresponded over fifteen emails and a conference call during a six-week period. Following our correspondences we were allowed to schedule an in-person conference with the Deputy Program Director and the Program Director of HTS, Colonel Sharon Hamilton. Until this conference was completed, current HTT members were barred from speaking with me regarding the study.21 It was clear (after the emails and conference calls) that permission to interview current HTT members was only available under the reputation of Dr. Lamb.22

The “Adverse Event”

Our team was approved to schedule a conference on September 1, 2010 with Program Director Colonel Sharon Hamilton, the Deputy Program Director and nine

---

20 In November 2010, the HTS website was updated to include a Telecom Discussion Page. See Appendix 7 for a full description. I requested to be a part of this program but was never contacted.
21 I contacted members that had their contact information publicly available but when they sought permission from their Public Affairs Officers it was referred to Jennifer Clark, and again I was not given approval.
22 “Dr. Christopher J. Lamb serves as the Director, Center for Strategic Research, Institute for National Strategic Studies (INSS) at National Defense University, and is a Distinguished Research Fellow…Prior to joining INSS in 2004, Dr. Lamb served as the Deputy Assistant Secretary of Defense for Resources and Plans…Previously he served as Deputy Director for Military Development on the State Department’s Interagency Task Force for Military Stabilization in the Balkans; as Director of Policy Planning in the Office of the Assistant Secretary of Defense for Special Operations and Low-Intensity Conflict; and from 1985 to 1992 as a Foreign Service Officer in Haiti and Ivory Coast…Dr. Lamb has received the Chairman, Joint Chiefs of Staff Joint Distinguished Civilian Service Award, the Presidential Rank Award for Meritorious Senior Executive Service, the Superior Honor award from the Department of State, and Meritorious Civilian Service awards from the Department of Defense,” (INSS, 2010).
current HTT members at Fort Monroe in Hampton, Virginia (TRADOC Headquarters). The interviews were scheduled by the Deputy Program Director to be held at TRADOC Headquarters.\textsuperscript{23} During the scheduling, one of the HTS employees solicited to participate in the interviews asked the Deputy Program Director for specific information about the research study. In response we, again, sent my Virginia Tech IRB approved Informed Consent Form and the list of interview questions.\textsuperscript{24} This potential interviewee contacted the Chair of the Virginia Tech IRB, Dr. David Moore, and said that he or she felt coerced to do the interview by his or her managers, which led to a request from Dr. Moore for me to “voluntarily postpone” the interviews scheduled for the following day. Upon further conversations, Dr. Lamb and Dr. Orton at National Defense University felt that the Virginia Tech IRB procedures are incompatible with the National Defense University research norms.\textsuperscript{25} At this point, our research team was forced to split into two components – one for my Master’s Thesis (governed by Virginia Tech IRB procedures) and one for the National Defense University researchers (governed by National Defense University research norms).

\textbf{Modification of the Original Research Design}

The ‘adverse event’ walled off my access to interview current HTT members, which led me to rely primary on the following sources of data: secondary data analyses of publicly available literature, interviews with outsiders who are familiar with the HTTs,

\textsuperscript{23} Myself, Dr. Lamb nor Dr. Orton were allowed to directly contact current HTT members.

\textsuperscript{24} This information had been provided to the Deputy Program Director from the first contact date as I had received Virginia Tech IRB approval on July 22, 2010.

\textsuperscript{25} National Defense University policy does not require all interviews with subject matter experts to be IRB approved; therefore, they were not asked to “voluntarily postpone” their research.
and interviews with former HTTs members. In many ways, this was an opportune occurrence. I was allowed to build up a high degree of knowledge about the program from outside the HTS that subsequent researchers, including my former research team at National Defense University, will be able to build on at a future date. The data and analysis in this thesis may be presented to the HTS and current members of HTTs in order to solicit further information and data for future studies.

**Gathering HTT Member Experiences**

**Research Methods**

This thesis utilizes qualitative methods to uncover how the previously identified characteristics have affected the performance of HTTs. “The main strength of qualitative research is its ability to study phenomena which are simply unavailable elsewhere,” (Silverman, 2006, p. 43). This is important for the study of HTTs, because there is not enough quantitative data to establish correlations between variables. Rather, qualitative methods allow a description of experiences and may provide insights based on how HTT members construe team performance.

To build internal validity, two qualitative methods are used—semi-structured interviews and interview data from published secondary sources. These sources combined tell a more in-depth story of the HTTs and provide a high level of internal validity to the narrative.

External validity is naturally weaker in this study. The small sample size, interpersonal interviews, contextual descriptive analysis, and the moving target that is the HTS make the findings of this thesis less generalizable. The findings may be generalized within the HTS, but not necessarily to other populations—such as other crossfunctional
teams in the National Security System. Additionally, reproducibility would be difficult due to the dynamic, changing conditions of HTTs, and limited access to the HTS.

There are limitations with this methodology. First, there are risks and potential downfalls of using former team members. Former team members have a higher probability of being disgruntled and have more negative viewpoints concerning the performance of HTTs. These negative viewpoints can create biases that may affect the findings of this thesis on HTT performance. Second, I chose not to include publications and reports written by HTT members regarding socio-cultural knowledge (reports written for commanders) and responses and/or criticisms of those publications. Finding and using publicly available reports and information from the HTS were not always possible or easy. Reports on what the HTTs were supposed to be doing may be helpful in determining their level of performance but I do not have the expertise to assess that. Additionally, I talked with four additional members but they never followed up with the IRB consent form. At the time I was gathering data, the wagons were circled around the leadership of the HTS and those directly involved. The additional former members I spoke with did not give me permission to interview them for fear of retribution from the HTS.

Semi-structured Interviews

To gather descriptive data on the experiences of HTT members I conducted semi-structured interviews with former team members. Semi-structured interviews “have an overarching topic, general themes, targeting issues, and specific questions, with a predetermined sequence for their occurrence,” (Lee, 1999, p. 62).
In a semi-structured interview, the interviewee should feel open to describe their experiences and allow the interviewer to gain a “qualitative knowledge of the interviewees world,” (Lee, 1999, p. 63). “‘Authenticity’ rather than sample size, is often the issue in qualitative research. The aim is to gather an ‘authentic’ understanding of people’s experiences and it is believed ‘open-ended’ questions are the most effective route to this end,” (Silverman, 2006, p. 20). Open-ended interviews allow interviewees the freedom to respond and “ascribe meanings while bearing in mind the broader aims of the project,” (Silverman, 2006, p. 109). Semi-structured interviews are the best method to gather first-source data for this thesis.

The first-source data is the pool of former members of HTTs (including those who attended training and did not deploy, those who deployed to Iraq, and those who deployed to Afghanistan). To gain access to the pool of former members of HTTs, I asked those formerly involved with HTTs whether they would mind sharing general information about their experience with HTTs. The individuals contacted were identified by open source information (names in public documents and social networks) and referrals. Initial contact was made with possible interviewees via email.26 Due to the interviewees’ travel requirements, deployments, and hectic schedules, email was the primary correspondence used to answer the interview questions. I conducted three interviews via email, one face-to-face interview at the National Defense University, and one phone interview. I found no difference in the interviewees responses whether they responded via email, phone, or face-to-face. All interviewees provided candid, detailed responses to the questions. Table 2 lists the brief backgrounds of the five interviewees,

---

26 See Table 2 for description for how I found interviewees’ emails for this thesis.
their role in the HTTs, how they were recruited for this thesis, and how they are identified in this thesis (see Appendix Four for copy of interview questions). I keep each interviewees’ identities confidential due to the controversy surrounding the HTS, their candor about their experiences, and to limit the possibility of damaging their future careers.

I conducted five semi-structured interviews. Utilizing qualitative methods, this small sample size is sufficient because each interviewee provided in-depth information that would not be available using larger scale methods, such as a survey.

Interviewees for Semi-Structured Interviews (Table 2)

<table>
<thead>
<tr>
<th>Confidential Name &amp; Date of Interview</th>
<th>Role in the HTS</th>
<th>How Recruited for this Thesis</th>
<th>Professional Background</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Interviewee #1</strong></td>
<td>Former Iraq HTT Member</td>
<td>Interviewee #1’s contact information was given to me by a colleague at NDU.</td>
<td>Several years of experience analyzing COIN, stability operations and security issues in the Middle East at private organizations and the DoD. At the time of hire for the HTS, Interviewee #1 had a Masters degree.</td>
</tr>
<tr>
<td>Face to face interview August 20, 2010</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Interviewee #2</strong></td>
<td>Former Afghanistan HTAT Research Manager</td>
<td>A LinkedIn connection suggested Interviewee #2 contact me about my research on HTTs</td>
<td>Bachelors in Sociology from University of Texas at El Paso, 20 years of service in U.S. Army (enlisted and officer), former Apache Helicopter Pilot, and previous deployments to Korea, Germany, Saudi Arabia, Iraq, Kuwait, Afghanistan, and Okinawa.</td>
</tr>
<tr>
<td>Email interview July 26, 2010</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Interviewee #3</strong></td>
<td>Former Trainee</td>
<td>LinkedIn connection suggested I contact Interviewee #3 via email</td>
<td>Bachelors of Science in History, Bachelor of Arts in Political Science, Masters of Arts in History, Juris Doctor in Law with law practice, and doctoral candidate in History at a Midwestern University at the time of hire at the HTS.</td>
</tr>
<tr>
<td>Email Interview August 9, 2010</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Interviewee #4</strong></td>
<td>Former Iraq HTT Team Leader</td>
<td>Contact information given to me from former colleague and I contacted via email</td>
<td>Former Marine Corp Infantry Officer with three deployments to Iraq, taught Marines cultural knowledge pre-deployment to Iraq, an Arabic and Spanish language student, and Bachelors of Science in Aerospace Engineering.</td>
</tr>
<tr>
<td>Email Interview October 22, 2010</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Interviewee #5</strong></td>
<td>Former Iraq HTRAC Team Leader</td>
<td>Contact information given to me and I contacted via email</td>
<td>Retired Commander with 37 years of active and reserve component service</td>
</tr>
<tr>
<td>Phone Interview September 24, 2010</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Secondary Source Interview Data

Secondary-source interview data includes the extracted experiences, as described by HTT members and journalists working with HTTs, in secondary sources such as journalistic articles, hearings, and reports. “Texts provide rich, naturally occurring, accessible data which have real effects in the world,” (Silverman, 2006, p. 195). Secondary source interview data includes quotations extracted from the mass interview information in journalistic interviews, hearings, reports and the more limited written accounts by HTT members available in the public domain in the form of traditional outlets such as newspaper articles, journal articles, magazine articles, reports, and documentaries.

The limited amount of access to the current members of the HTS requires this secondary source of data for increased validity and to create a stronger, more accurate narrative. The secondary source interview data was extracted from documentation of HTT members’ experiences in publications recorded without the intervention of the author of this thesis.

The characteristics that affect cross-functional team performance that are used in the descriptive narrative of HTTs are Team Purpose, Team Support, Team Culture, and Team Composition. Out of the total ten identified, these four characteristics were addressed when collecting data for this thesis and, based on my opinion, are the four most

---

27 The original research design included a third data source: semi-structured interviews with individuals that oversee the HTTs (advisers, commanders, leadership at the Pentagon), individuals involved in the conception of HTTs, individuals involved in the training of HTTs, and a variety of other people familiar with the HTTs (journalists, contractors, and consultants). This population is not represented because I was unable to secure interviews with them because many were/are still involved with the HTS and/or the data within that population is not publicly available.
important characteristics that affect the performance of HTTs. I felt these characteristics provide the greatest amount of data for the narrative and create a big picture to tell the best story of HTT performance. Out of the total ten identified, these four characteristics were discussed often when collecting data for this thesis and, based on my opinion, are the four most salient characteristics that affected the performance of HTTs.

Characteristics affecting cross-functional team performance that this thesis will employ in its analyses include: Team Purpose, Team Support, Team Culture, and Team Composition. These four characteristics are important characteristics that appear to have affected HTTs performance significantly and they provide the greatest amount of data for the narrative.

Analysis

The data gathered were organized to create a narrative based on the characteristics that affect crossfunctional team performance. This section describes the analysis method used to create the narrative.

Narrative Analysis

The mode of qualitative data analysis in this thesis is narrative structuring. Narrative structuring “seeks to indentify and reconstruct the interview text into longer stories,” (Lee, 1999, p. 92). A continuing narrative may be detected from the open-ended and sequential interview questions, along with sequential interview data that was extracted from the secondary sources (Lee, 1999). “Through the extraction and rearrangement of relevant text, a more continuous, coherent, integrative, and engaging single story can be recovered. Such a recovered narrative can often stimulate insight into
the explanations for an organizational phenomena of interest,” (Lee, 1999, p. 92).

Narrative structuring allows a story of what affects the effectiveness of HTTs to be told.

Narrative restructuring involves three steps: 1) researcher reads the interview data as a whole, 2) researcher undertakes subsequent readings to identify temporal sequences recurring social dimensions, and any overall plot in the text, and 3) researcher goes through an interactive (trial and error) process of physically arranging and rearranging the text itself (Lee, 1999, p. 92). Narrative restructuring is complete with a “beginning, a story or plot, and an ending,” (Lee, 1999, p. 93). This restructuring can be subjective but by using the characteristics as a framework, I attempted to limit the biases.

Narrative restructuring occurs in Chapters Four and Five as HTT members’ experiences are compiled into the story of HTTs along with the secondary sources. My familiarity with HTTs from my research as well as informal discussions with those involved with HTS since 2010, enhances my ability to assemble and explain the narrative of HTT performance.

**Chapter Overview**

Although all ten characteristics that affect team performance could be applied to HTTs, this thesis focuses on Team Purpose, Team Purpose, Team Culture, and Team Composition. The characteristics that provide the greatest amount of data for the narrative create a big picture to tell the best story of HTT performance. The descriptive narratives of the experiences of HTT members and the data found in secondary interview sources are organized by these four characteristics. Additional structure is provided to
the narrative by comparing the data gathered for this thesis to the guidelines in the HTT Handbook, when available.\textsuperscript{28}

The relevancy of the results from these data sources and methodologies do have their weaknesses. The results and analysis are subject to biases from case selection, interviewers biases, biases of former members, and my own biases.

It must also be noted that while creating a narrative based on the previously identified variables and characteristics, much of the data can provide insights on more than one variable. This thesis has attempted to best classify the data under the most appropriate variable to create an insightful narrative.

The next chapter focuses on two of the variables, Team Purpose and Team Support. The narrative of Chapter Five is based on Team Culture and Team Composition.

\textsuperscript{28} I am not able to explicitly use the \textit{Commanders Guide on How to Use HTTs} because it is classified For Official Use Only (FOUO) except where quotations have been published in the publicly available resources, such as theses and monographs from PMEs. This source, when able, is used along with the unclassified HTT Handbook.
Chapter 4: Data-Team Purpose & Team Support

Introduction

The evolution of the HTS told in Chapter Two foreshadows the apparent crossfunctional team issues that could affect the performance of HTTs. This chapter focuses on how the performance of HTTs was hindered at the organizational level. The ten variables that affect team performance are divided into three categories: organizational, team, and subteam. The organizational level includes three of the variables that affect the effectiveness of crossfunctional teams: team purpose, team empowerment, and team support. This chapter uses the data collected to create a narrative using two of these three variables: team purpose and team support.

The first part of this chapter defines team purpose using the literature and tells the story of how team purpose affected the HTTs. The narrative is created based on the three defining characteristics of team purpose: strategic consensus, team founding and strategic content. The second part of this chapter follows similar format focusing on team support. The narrative for the second half of this chapter is created based on the three defining characteristics of team support: external communication activities, supportive organizational context, and team-based organizations. This chapter concludes with an interpretation of the data and how the performance characteristics affected the performance of HTTs.

Team Purpose

Using the literature detailed in Chapter Two, team purpose is defined as “the broad, long-term mandate given to the team by it’s management, the alignment of short
term objectives with its strategic vision, and [the] agreement on common approaches within the team,” (Orton & Lamb, 2011). This section is organized by the defining characteristics of team purpose: team founding, strategic consensus, and strategic concept.

**Team Founding**

Team founding is the “initiating charter, mandate or mission underlying the creation of the team (Orton & Lamb, 2010). In the 2008 unclassified HTT Handbook, the management of the HTS mandates three objectives for HTT’s mission: 1) social science research, 2) making the gathered data operationally relevant, and 3) creating an analytic cultural framework for operational planning, decision-making, and assessment (Finney N., 2008).

The objectives were cast to the HTTs, but they were not universally understood or defined. Interviewee #1 stated, “The mission of the HTT is three-fold: 1) embed a social science capability for the supported unit, 2) storage of human terrain data-social, cultural and 3) create a corporate memory as brigades go in and out.” Although these objectives are very similar to those in the handbook, Interviewee #1 added, “these [objectives] had no meat and each team did them differently…everyone had a different concept of what we were doing there.” Interviewee #5 confirmed this statement, “HTS senior leadership initially failed to develop and articulate a clear vision regarding the program mission and goals…[such as] whom the team worked for and what its products were supposed to be.”

According to the second objective defined by the HTS, the HTTs would ideally provide operationally relevant cultural information to the mission’s commander. In order to achieve this objective, the team must have a clear definition of what the missions’
commanders want in the field (Finney N., 2008). In other words, what is relevant? For the commanders to clearly define what the HTTs could provide that would be culturally relevant they first needed to understand the HTTs’ capabilities. A journalist in Khost explains the confusion, “When the team first arrived at [Forward Operating Base (FOB)] Salerno, no one understood what an HTT was, much less what it did. They were hastily installed in the brigade’s intelligence section, where their talents were wasted in ‘the myopic role of an intel analyst,’ Colonel Martin Schweitzer, the brigade’s commanding officer, admitted later. Eventually they got their own office near the PSYOP [psychological operations] desk,” (Featherstone, 2008). HTT members were also unclear on their mission. A journalist that spoke with former HTT members noted, “Even as the teams deployed, questions remained about what exactly the civilian academics would be doing in the field. Would they carry guns, or wear uniforms? Would they be conducting ‘field work,’ or just doing research at their desks?” (Shachtman, 2007). Clearly their mission was broken down to three objectives, but these objectives not being clearly defined created confusion during the founding of the team.

Interviewee #4 described the difficulty working with brigade commanders without clearly defined objectives:

It [HTS] is a new capability. If the brigade commander is given unmanned drones or linguists or a tank platoon, he immediately knows their capabilities and how he wants to integrate them into his overall plan. If the capability is new, as HTT is, and if the capability varies from team to team and from time to time, as it does with HTT, then he might not know how best to use them. Second, he loses nothing by not using the HTT since he doesn't pay for them. If it were to come out of the brigade's own budget, then they would demand something for it or just fire the team and save the money. But since it comes out of the Department of the Army's budget, I believe, the commander doesn't have that incentive. He loses nothing, since he doesn't know the capability [sic], of just pushing them to the side. They are out of the Army's way and it doesn't cost the army anything other
than some office space. They can send non-sense [sic] updates on the actions back to Leavenworth, who can advertise what HTTs are accomplishing. The contracting companies get paid because their employees are in Iraq. It's perverse and irresponsible.

If their commanders do not understand the HTTs, the commanders are unable to clearly define what they want from HTTs; therefore, the team’s mission could not be achieved.

The HTT’s third objective in their mission statement is to create a cultural framework for use by other commanders and teams in the future. This was to be done by creating a database of social and cultural knowledge called a Reachback center.

On July 28 at [FOB] Salerno, I [Journalist Anne Marlowe] was told that the HTT is not producing a database because the units they worked with did not want one; instead ‘they wanted an angel on their soldier.’ Major Kohn says he was not aware of any database available for commanders. Yet the Times has “Tracy” [HTT Social Scientist] claiming the contrary. ‘Along with offering advice to commanders, she said, the five-member team creates a database of local leaders and tribes, as well as social problems, economic issues and political disputes (Marlowe, 2007).

It seems unclear based on this contradiction whether the database was ever started or if the idea of it was being advocated because of the team’s stated mission.

Interviewee #1 summed up how team founding affected the overall performance of the team: “I personally think that all the problems in the program stem from a lack of understanding of the mission at the higher level.” It is necessary for the team members to be founded on a solid, clearly articulated mission in order for its customers, in this case, the commanders, to fully understand the team’s capabilities. This would ensure the HTT is better able to achieve its mission.

**Strategic Consensus**

Strategic consensus is the basic agreement among team members on the charter, mission, and goals of the team (Orton & Lamb, 2010). “Successful cross-functional
teams are able to create an initial strategic consensus, and then build on that kernel to create a more elaborate strategic concept of how work is done in the team,” (Orton & Lamb, 2011). The difficulty creating a strategic consensus is foreseen based on the difficulty of the HTTs’ founding and the lack of understanding of the mission at the highest level.

The data revealed a weak strategic consensus within HTTs. Interviewee #5 stated, “The lack of clear mission focus also resulted in lack of product standardization in theatre, as it appeared that each team leader defined the team’s mission in accordance with their individual understanding of the HTS mission.” Interviewee #4 corroborated that there was no standardization; he claimed there was a consensus on the ends, providing cultural analysis to the brigade commander, but there was no consensus on the means in which that was to be done Conflictingly, Interviewee #2 claimed that his team’s “sense of purpose was to make themselves look good for future career opportunities [and] that influenced all of their actions.” Clearly, agreeing on the wrong purpose does not enhance the HTTs’ performance.

**Strategic Concept**

Strategic concept is a set of complicated, detailed, interconnected causal maps of the methodology that the team members employ to accomplish the team’s objectives, such as agreement on how to do particular jobs, how schedules will be set, [and] how make team decisions (Orton & Lamb, 2010). The unclassified HTT Handbook (2008) states:

Though tasking should normally be communicated through the Research Manager of the Team Leader (for the sake of order and simplicity, and to avoid any confusion) the HTA [Human Terrain Analyst] will often receive requests from individuals, units, or offices. When taking a request, the
HTA should relay the tasking directly to the Research Manager for normal processing and clarification. Upon receipt of the request, the Research Manager will assign it to the HTA with the greatest aptitude to fulfill the requirements of the task. The Team Leader, Social Scientist, Research Manager, and appointed HTA will collaborate on a Research/Data Collection Plan. They will discuss the context of the request, the needs of the requestor, and clarify any ambiguities or logical gaps in the request (Finney C. N. 2008, 20).

Interviewee #2 describes his experience with tasking on an HTT in Afghanistan:

We were supposed to be going off the base and into the tribal areas to interview the Afghan civilians. That was the whole reason I joined was to make a difference directly with the Afghans. The Team Leader and Social Scientist made it clear they weren’t going to go outside the wire and wanted to remain autonomous from the General and his staff. This is exactly the opposite of what we were supposed to do. The other Research Manager and I instead ended up being “lackeys” and “gophers” for the two females on the team. I told this to the Team Leader after being there only 5 days. The projects they had, had absolutely no relevance to the mission of counterinsurgency and none of it came from a directive to the NATO General or his staff. The Team Leader and Social Scientist spent all of their time “glad-handing” with high-ranking officials trying to make themselves seem relevant. The truth of the matter is they never produced anything at all. The only thing that was produced on that team while I was there was a map detailing over [a number of structures] in [a particular city]. This was a project by the other Research Manager and me. We didn’t get any help from the others whatsoever. We didn’t go down into the city to get the information. The other Research Manager and I would get information from other sources such as PsyOps, KIFC or S-2 Intelligence. We took it upon ourselves to do this but were not allowed to get any information ourselves outside the wire. The Social Scientist would even take a product from another team and change the point of contact [POC] information to make it appear she did the work herself. She would also lie to high-ranking officials when giving them a spiel on what we do. I was not going to be given a chance to go to another team, so I quit because I didn’t want to be a part of a team that was acting unethically and wasting taxpayers’ dollars.

The negative issues within Team Founding, Strategic Consensus and the Strategic Concept compile to create the picture of problems with Team Purpose for the HTTs.

Mainly, the failure of clearly defined objectives and capabilities for the HTT members
and their customers and the lack of an understanding of the mission at the highest level created performance barriers for the HTTs.

**Team Support**

Team Support is the set of relations that connect a team to other levels of the organization. It matters a great deal whether teams are constructed with the cooperation of the rest of the organization, with the ambivalent noninterference by the rest of the organization, or in the face of opposition from the rest of the organization (Orton & Lamb, 2011). Team support is characterized by external communication activities, supportive organization context, and team-based organizations. This section describes how Team Support affected the performance of HTTs.

**External Communication Activities**

External communication activities are a wide range of activities undertaken by team members to secure support from outside the team through ambassadorial (upward) communications, lateral (horizontal) communications, and probing/scouting (downward) communications (Orton & Lamb, 2010).

HTTs are fully integrated into their military units. The controversy surrounding HTTs led to many issues with the HTTs working with their military units. Former Program Director Steve Fondacaro admitted to a journalist, “that one of the biggest obstacles to injecting social science into the military will be the military itself. ‘We are like a virus infecting the host,’ he told me. ‘Either the army will be inculcated and be stronger, or they will expel us in a torrent of puke,’” (Pelton, 2009).

---

29 The controversy involved the use of academics within the military and the military’s argument that there was no need for HTTs, as described in Chapter 2.
The lateral relationships HTTs had with those outside the unit varied from team to team. Interviewee #2 describes these relationships: “Generally the teams get along with the military units they work with but not always. There are units that see HTS as nothing more than a command directed “pain in the ass.” Interviewee #4 describes his experience working within the military unit:

My relationship was good [between the team and the departments it works with], at least better than my predecessor. As long as the Team Leader is working hard to be relevant and do what the military thinks is important, versus what they want to do for personal/professional reasons, then the relationship will be fine. The HTTs also need to be willing to "get their hands dirty," i.e. no privileged contractor attitude.

Interviewee #4 added that there were problems with lower level members [of the team] getting along with the brigade because senior leaders [outside the HTT] felt threatened. Many members of the HTTs were ranked higher than senior military leaders, without the military training and experience.

Beneficial lateral relationships could have been established with other crossfunctional teams within the National Security System at the operational level. Interviewee #1 describes his lost opportunity: “As my short time as team lead, I wish I could have built a better relationship with the PRT [Provincial Reconstruction Team]—they have three movements a day—I wish I could have tagged along more with them. To be successful you had to work with everyone: RRBC [Red River Basin Commission], operations, DCO [unknown], Fires Coordination, PSYOP, PRT, CA [Civil Affairs].” Interviewee #4 added, “We [the HTT] had good relationships within the brigade, and that was all that mattered.”
The downward communications from the commanders were the most direct communications the HTTs had from above in the organization. The HTT handbook states:

As a member of the special staff, the HTT has the most direct access and closest working relationship with the Commander. They receive command and staff direction in the same manner as other special staff elements, from the Commander himself, or the Deputy Commander in his stead. The Commander will determine the extent of the HTT’s interaction and relationships with the rest of the staff and subordinate units…The Human Terrain Team is attached to the unit and belongs to the Commander, who employs the team as he needs them, just as he does any other asset. The HTT fits within the staff in several ways; as a member of the special staff that reports directly to the commander; from within the Effects/Fusion Cell, reporting to the commander through the Effects Coordinator. In both cases the team leader acts as the human terrain advisor to the commander and staff and the social scientists providing a unique advisory capability to the commander and staff (Finney C. N. 2008, 28-29).

Beyond the commanders there was little if no direct communication or direction from above. Interviewee #4 described his experience with direct communication: “The connections with the HTAT (see Appendix 5 for definitions and description) and above were sufficient in that we had communication, but irrelevant in that we did not work for them, and they rarely had anything of value for us.” Out of 18 customers interviewed by the CNA for their Congressionally mandated report, there were 14 different answers regarding Staff Structure (who the team worked with in the unit), who decided the structure, who managed the HTT within the structure, and how the HTT was managed operationally (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010). A journalist describes an HTT in Iraq:

There can be occasional tensions between the teams and the brigades they serve, as well. When Verdon [HTT Social Scientist] and Lghzaoui [HTT Cultural Analyst] meet their boss, Col. Ricky Gibbs, the brigade commander, for the first time, the encounter is a bit uncomfortable. Gibbs
has just returned from his two-week home leave, and though he personally requested one of the HTS teams after hearing about them from a friend, he expresses concerns about how they will operate within the chain of command. After the team ticks off a few planned projects, for example, Gibbs has a question: ‘Who told you to study those things?’ What he most wants to know, he says, is the following: ‘How do I make (Iraqis) realize that I’m thinking what they’re thinking?’ The questions keep coming. ‘How do I approach them in a way that helps? How do I get into the clique? How can I win the information campaign using the way they think?’ Gibbs ends the exchange with a final query; ‘Are you all going to help?’ ‘We will try,’ answers Lghzaoui. ‘Inshallah (God willing).’ Verdon winces. Gibbs looks at his team. “There is no trying,” he says. “We’re going to do an American inshallah on this one.” That means, he says, “We’re going to do it.” Later, Verdon digests the encounter, noting the teams have to be sensitive to the can-do American military culture too. (Mulrine, 2007)

At the highest levels, HTT members viewed organizational leadership support at the highest level as ineffective. Organizational leadership exists at HTS headquarters in Fort Leavenworth, Kansas and at TRADOC in Virginia. The CNA Report found that, “TRADOC is a “roadblock” to most important decisions that must be approved by them for HTS.” (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010). This “roadblock” to support trickles down from the leadership of the HTS in Fort Leavenworth and creates tension with the HTT members. Interviewee #4 had similar remarks about the leadership of the HTS: “The leadership at Ft. Leavenworth…were fully unresponsive and irresponsible…Management [was] disastrous. I have nothing good to say about the leadership, or lack thereof in Leavenworth. They were unresponsive and uncaring. None of my requests for support/information were answered satisfactorily in the seven months I served as Team Leader in Iraq. None.” Interviewee #5 added parallel comments on the HTS leadership: “Program leadership seemed somewhat ‘aloof’ and failed to develop direct communication with participants which was conceived as a lack of genuine concern for program participants,” A journalist spoke with a HTT Researcher that “has
worked with bosses who, after months still couldn’t remember the names of team members,” (Kimberlin, 2010d).

**Supportive Organization Context**

Supportive organization context is the effort by the larger organization to design, implement, and constantly improve mechanisms that reduce the amount of energy a team can spend on mission accomplishment (Orton & Lamb, 2010). Ideally, the HTS meets all the organizational needs of the team so the HTT can focus on its mission. In reality, these needs often were not met.

There are many examples of problems in organizational support in the data from interviews and secondary sources. From the beginning of the HTS, there were problems in human resources and program administration. After TRADOC took over the administration of HTS additional problems arose. Interviewee #1 stated, “After HR was moved to TRADOC [no longer within BAE, the government contractor formally managing the administration of HTS], the members were paid wrong, they were overpaid $10k-$30k…Administration was the main reason people quit.” Interviewee #2 communicated the lack of support: “The leadership of HTS is ineffective in handling team member’s issues. They hire Reservists [to work in human resources] that may have no experience in human resources. There are chronic pay problems. If a team member has problems and cannot get it resolved with the Team Leader, they will try and go through the Program Manager or Operations at Leavenworth. In my experience and hearing from others, you won’t even get a reply from them.” Even when leaders arose within HTS they did not have the authority to make the necessary changes for the HTTs. Interviewee #5 reiterated this frustration: “Program leadership did not delegate the
necessary authority to any deployed individual to address the numerous serious personnel
issues or operational issues that developed.” The lack of support started during training
and continued through deployment. The CNA Report cites one example of the difficulty
working with HTS:

One of the largest administrative challenges of the HTS program has been
providing guidance to deployed HTS team members on how to fill out
federal government time cards. According to several HTS staff members
and TRADOC G2 OPS, time cards were frequently rejected and returned
to team members with questions regarding the accuracy of their recorded
work hours. Managers questioned how team members could work the
multiple days with 16 plus hours of work recorded. While it was clear to
those authorizing the time cards that a standard 40-hour work week was
unrealistic in a war zone, managers needed to verify what the work tempo
was to validate the time recorded. The work schedule was defined by the
Battalion Commanders the teams were attached to, not by HTS or
TRADOC managers. But due to their oversight responsibilities, CONUS-
based managers needed to regularly review the timecards to make sure the
hours recorded were consistent with the work schedule. Over time, this
relationship created tensions as many HTS team members did not
appreciate the challenges they encountered and the need to validate their
work days. (Clinton, Foran-Cain, McQuaid, Norman, & Sims 2010, 142)

The lack of organizational support is attributed to leadership that appeared to ignore the
severity of the problems it would cause within the HTTs. Interviewee #5 stated:

Leadership practices demonstrated by program management created a
negative organizational environment that impeded mission
accomplishment…It became obvious early in my tour that this program
lacked strong leadership at all program levels. This lack of leadership was
reflected in all program phases to include planning, training, logistics and
operation...[and] generated a climate of mistrust of senior program
management. Uncertainty, lack of product standardization, quality of
product, disenchantment, frustration and overall lack of mission
accomplishment resulted.

It is not possible for the HTTs to accomplish their mission without the organizational
support and direction from the top-down within HTS.
Team-based Organizations

Team-based organizations are characterized by the freedom for teams to manage themselves, by the recognition that different types of teams require different degrees of leadership intrusiveness, and the reliance on analytical tools to determine the structure of the network of teams within the organization (Orton & Lamb, 2010). The structure of the network of HTTs seems to vary in the unclassified documents available. There are HTTs, Human Terrain Research and Analysis Corps (HTRACs), and Human Terrain Analysis Teams (HTATs).\(^\text{30}\) In a normal military organization these teams would be organized in a hierarchical network. Rather, these teams do not communicate or share any information and are very loosely connected.

It is not clear if the network of HTTs within the HTS exists. Coordination between HTTs, HTATs and HTRACs was even less apparent; according to Interviewee #1, “the teams don’t talk much.” Interviewee #5’s remarks confirmed the lack of coordination: “Teams generally worked in isolation of each other and at times were territorial to the detriment of the larger mission. In addition, the quality of HTT products was uneven and at times, some team’s production was substandard.” Interviewee #2’s statement confirms the vagueness of the teams’ network: “Teams communicate with each other and are supposed to communicate their work to the HTAT then up to the TCE (Theater Coordination Elements).\(^\text{31}\) However, it doesn’t always work that way. Teams are generally supposed to just concentrate on producing for the commander they are working with.”

\(^{30}\) See Appendix Five.
\(^{31}\) See Appendix Five.
HTATs are located at a higher organizational level than HTTs. In normal military practice the HTT would report to the HTAT and the knowledge would move up and support would come down. “HTATs have had limited ability to review HTTs activities and analysis. HTATs have no operational or managerial control over HTTs,” (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010). Interviewee #1 described a missed organizational opportunity: “The relationship with HTAT is not a command and control relationship. It could be but it’s not, it’s too bad. If information were pushed up to HTAT there would be trends you could start noticing.”

The negative issues within External Communication Activities, Supportive Organization Context and Team-based Organizations compile to create the picture of problems with Team Support for the HTTs. Mainly, the failure of communications between the HTTs and their military units, poor administrative support, and the lack of a network among the HTS teams.

**Chapter Overview**

The failure of the HTS to provide Purpose and Support at the organizational level to the deployed HTTs hindered the performance ability of the HTTs. It is not possible for a crossfunctional team to perform its stated objectives if the mission is not clearly defined and the team members are not supported in their efforts.
Chapter 5: Data-- Team Culture & Team Composition

Introduction

The ten characteristics that affect crossfunctional team performance are divided into three categories. The previous chapter focused on two variables at the organizational level. This chapter focuses on other two categories: the team level and the subteam level. The team level consists of team structure, team decision-making, team culture, and team learning. The subteam level includes the variables team composition, team rewards, and team leadership. Chapter Five creates a narrative using a variable from each of these levels: team culture at the team level and team composition at the subteam level.

The first part of this chapter defines team culture and tells the story of how it affects the performance of HTTs. The narrative is created based on the three defining characteristics of team culture: climate, cohesion, and trust. The second half of this chapter defines team composition and the narrative is based on its three defining characteristics: diversity, competencies, and personality. This chapter concludes with an interpretation of the data and how it affected the performance of HTTs.

Team Culture

“Team culture is the combination of norms, values, and beliefs shared by team members. Effective cross-functional teams require team cultures that are cohesive, foster a climate of shared values, and are based on high degrees of trust,” (Orton & Lamb, 2011, p. 54). Team culture includes team climate, team cohesion, and team trust. This section defines these and describes the HTTs’ experience based on these characteristics.
Team Climate

Team climate is the set of norms, attitudes, and expectations that individuals perceive to operate in a specific social context (Orton & Lamb, 2010). The clash of norms, attitudes, and expectations affected the performance of HTTs. These three clashes are apparent in the interview data. Norms and attitudes may be the biggest issues affecting performance.

Two competing norms affect HTTs: (1) the relationships between military members, and (2) the relationships between the military members and the civilian members. Former Team Leader Holbert recalls, “the civilian HTTs actually face a double challenge. ‘The hardest culture to integrate with is the military…you need to project confidence and humility in order to be able to work well with your unit. So you get to know them. If your team is invited to a social activity, you go. If there’s marksmanship training, you go. And on patrol you pull security. You are not a consumer of resources or producer of drama,’” (Anderson, 2010). This clash was very salient in the interview and secondary data.

Naming the failures of HTS, Interviewee #2 describes “putting people in the program that have no military experience or has never been deployed before…basically the social scientist are the major impediments…not all but most that I knew and heard of.” A journalist visiting a HTT in Afghanistan illustrates the clash between the military and civilian cultures:

Amy Bursell [HTT Social Scientist] climbs out of a bulletproof car in front of an Afghan police station. Strapped to the back of her flack vest: the Mission Monkey, a stuffed animal she brings along for nearly every meeting with the locals. Patrick Flanagan [HTT Member] rolls his eyes: “I hate that stupid monkey. I mean hate.” Bursell and Flanagan work for the Human Terrain System on a five-member team embedded at Camp Marmal, a sprawling, spick-and-span coalition base run by the Germans in northern Afghanistan. Bursell, 38, is a talkative social scientist from Alexandria. Flanagan, 43, is a conservative Army reserve colonel from Manassas. The Mission Monkey represents just how hard it can be for such polar opposites to get along on an HTS team. “The monkey helps break the ice,” Bursell says firmly. “It lets people know I’m not a
soldier.” “The monkey is an embarrassment,” Flanagan mumbles with disgust. (Kimberlin, 2010c)

This clash at times was avoided by hiring civilian social scientists with a military background. A journalist visited a HTT in Iraq and gave an example:

On the surface, he (Rick, a former Green Beret and the team’s leader) and Tracy [HTT Social Scientist] appeared to be polar opposites. Barrel-chested and white-haired, Rick spoke in clipped bursts of fact. Tracy had black hair, and her uniform hung from her slight shoulders as if it were on a coat hanger. She paused often to formulate metaphors. The two were aware of their differences, and they played them up in a routine worthy of a TV sitcom—brass-tacks Green Beret meets head-in-the-clouds academic. But as the meeting wore on, the differences between Rick and Tracy blurred. Tracy was no ivory-tower egghead: she had once served as a combat aviator, and did not even have a Ph.D. Tracy had more experience with military culture than she had with Afghan culture. Fondacaro couldn’t have chosen a more suitable anthropologist to lead his first HTT. He knew that credibility—within the military, at least—was going to be the team’s biggest hurdle. (Featherstone, 2008)

The civilian versus military attitudes caused problems on some HTTs. Interviewee #5 experienced these attitudes on the HTRAC:

Philosophical camps in the program worked against team formation. Camps disagreed on research, on how the team operates, kinetic vs. non-kinetic, and military vs. civilian. These disagreements were never worked out before the team was in-country. The stress of being in country escalated disagreements. The military members were better team players than the civilians.

A Battalion Commander told the authors of the CNA Report that the “HTT went through same training then were pulled apart…problem with personality problems experienced in theater—have civilians who say they are done and quit. Another down side to using civilians—they can say I’m done and then we have to back fill,” (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010, p. 201). Interviewee #3 had a similar experience with problems between the civilian and military members:

The Team Leaders and Social Scientists generally don’t get along. The Social Scientists have been ranked as GS15 Federal Employees and have this ill-conceived notion they are the same as an Army Colonel. The Team Leaders are
former military leaders and the Social Scientists usually have no experience with the military and in my opinion are more of a hindrance than an asset. The Research Managers are mostly former military members. They don’t always get along with the Social Scientists either. The Social Scientists are now ranked as GS14 Step 7 to try and keep the Team Leader as a higher ranking individual.

The differences in expectations varies between the ‘save the world’ academics and those familiar working within the military establishment. Interviewee #1 learned this lesson: “I went in there ready to change the world and the military guys said, ‘Hey—slow down guy, you’re a civilian.’”

“For all their differences, the eggheads and muscleheads do manage to find some common ground. Romances have bloomed between them, including six marriages,” (Kimberlin, 2010c). For example:

When she arrived at Fort Leavenworth, Ms. Helbig [Former Team Member] was vaguely worried about cultural conflicts between the military and civilian members of the human-terrain teams. But she says she found, in general, the two groups got along well. (She is now engaged to Capt. Matthew V. Tompkins, a reservist who leads a human-terrain team in Iraq. Capt. Tompkins is on leave from studying political science at the University of Georgia). (Glenn, 2007)

Interviewee #1 opposes the discussion of the severity of the cultural clash between the military and civilians: “People talk about social scientists and military not getting along. I’d like to see what would happen if there were a clearer mission.”

**Team Cohesion**

Team cohesion is measured by the commitment of team members to the teams’ task, mission, and purpose; to the team itself; and to one another,” (Orton & Lamb, 2010). Two salient impediments to the commitment to HTTs were (1) financial and (2) how the team members were deployed.

Financial considerations quickly arose within HTTs. HTT members were paid very high salaries compared to other positions their qualifications may be suited for in civilian positions in the U.S. Interviewee #1 tells how salaries affected the HTT: “The
commitment to the mission was very low. Members were there for the paycheck.”

Interviewee #4 restated this problem: “Some were committed, others were just collecting a pay check, and would more or less say so. These were usually the ‘career contractors’…There was “no accountability for team members who are only there to collect a pay check—everyone has a story of a team member who would not show up or who would go off on their own to do their own work, and who would not be reprimanded by Leavenworth.”

The process of the teams’ deployment is the second impediment to team cohesion. HTS fails to build team cohesion during training. Instead, it sends members off to address this in the field. “HTT members don’t all train and deploy together, individual team members rotate to field on varied schedules to maintain relationships and knowledge of human terrain over time…In Afghanistan sometimes partial teams deployed and then augmented as additional personnel complete their training (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010).

Low team cohesion creates problems with member commitment to the HTT. Interviewee #2 described the problem on the HTT: “The level of commitment to the mission of the commander [by team members] was zero except by the two Research Managers. However, we [the Research Managers] weren’t in any position to do anything about it except bring it to the attention of the Team Leader which did no good, so we quit.”

**Team Trust**

Team trust is the shared perception by the majority of team members that individuals in the team will perform particular actions important to its members and that
the individuals will recognize and protect the rights and interests of all the team member engaged in their joint endeavor (Orton & Lamb, 2010). “Research on cross-functional teams shows that teams with a high level of trust are more innovative, learn more quickly, have higher degrees of cooperation, and experience less damaging conflict,” (Orton & Lamb, 2010).

The level of trust varied by HTTs. Interviewee #1 claimed that although he did not respect some of the other members professionally, he felt like they “had his back.” Conversely, other former members felt differently. Interviewee #5 stated, “There was a lack of trust throughout the teams in country.” Interviewee #2 agreed, “I had no trust in my team at all. If we had gone outside the wire, there is no way I would have gone close to the Team Leader, Social Scientist or Analyst if they had weapons. I think the Social Scientist was psychologically unfit for this kind of duty.” Interviewee #3 had a similar opinion from his experience during training: “The team leaders and other individuals seemed qualified and highly competent, but the social scientists were, frankly, very uneven in quality, and I would not have wished to have worked with some of them in a community college department, let alone a life threatening situation. Similarly, I would not have worked with most of my instructors under any circumstances.”

The clash of civilian versus military norms and attitudes and the expectations of team members—those hoping to ‘change the world’ and those familiar with the military machine—created massive barriers to performance. The stories of nuptials between members never appeared to improve the HTTs’ performance.

The lack of trust and commitment within the HTTs were also barriers to performance. Commitment to the team was not built during training since the teams do
not deploy together. High financial benefits brought people to the teams that were not committed to the mission, but the paycheck. Trust was not built during training and the team members did not deploy together. Inadequate training (beyond the scope of this research) and the failure to clearly define the team’s mission also inhibited the ability for the team to build trust.

**Team Composition**

“Team composition refers to the characteristics of individuals chosen for the team, presence of subcultures or factions within the team, and amount of diversity in attitudes, demographic characteristics, and functional boundaries,” (Orton & Lamb, 2011). Team composition is characterized by diversity, competencies, and personality.

**Diversity**

Diversity covers a range of member characteristics that are presumed to affect team performance, including attitudinal, demographic, and functional diversity,” (Orton & Lamb, 2010). This characteristic is one of the most important in distinguishing HTTs as crossfunctional teams. In the case of HTTs, diversity may be a large contributor to the poor performance of HTTs.

The HTT Handbook states, “The optimum composition of the team would include at least one member of the team will speak the language of the area of operation, one member will be a subject-matter expert of the area, and one team member will be a female (to allow the team access to 50% of the population frequently overlooked in the military operations) (Finney N., 2008, p. 11).

Based on the data available, the ‘ideal’ team seems to be few and far between. A journalist notes, “Of 19 Human Terrain members operating in five teams in Iraq, fewer
than a handful can be described loosely as Middle East experts, and only three speak Arabic. The rest are social scientists or former GIs who…are transposing research skills from their unrelated fields at home,” (Ephron & Spring, 2008).

Originally, each team was supposed to include at least one academic with expertise in the region. But Afghanistan has been closed to outsiders for so long, specialists proved to be in short supply. So HTS turned to the ranks of the social sciences—anthropology, sociology, political science—prompting criticism that its scholars aren’t qualified to give local insight. ‘They’ve got Ph. D.s,’ Fondacaro [Former Program Director] says. ‘They’re smart people. They can learn.’ Other slots on the teams are usually filled by reserve or former military member.” (Kimberlin, 2010b)

This recruitment problem stems from the difficulty in recruiting qualified anthropologists due to the ethical debates (as discussed in Chapter Two). Many journalistic accounts describe the specific individual backgrounds of HTT members.32

Most recently, a Brigade Commander told the authors of the CNA Report that he “thought the makeup of the team was right—need both cultural advisors and analysts,” (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010, p. 177). The commander does not elaborate on where these analysts or advisors should come from, the military or academia.

**Competencies**

Competencies are the templates for team members that use team selection, team socialization, and team strategy processes to ensure that each team member has the necessary personality characteristics, goal orientations, or other subteam-level attributes to contribute as a member of the team,” (Orton & Lamb, 2010). “The large literature on team training is focused on creating properly qualified personnel for teams,” (Orton &

32 See Appendix 7.
This section focuses on the recruitment process for HTTs and how it affected Team Competencies.

The recruitment process for HTT members has been highly criticized. “Potential recruits contact BAE or one of their subcontractors or are solicited based on resumes posted at online job sites. Job descriptions [on these sites] are similar but not identical to HTS descriptions,” (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010). “Formal position descriptions are lengthy and not very useful in targeting specific individuals for recruiting. TRADOC has prepared summaries of the job duties and qualifications that capture the essentials in a form that can be used by recruiters,” (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010, p. 77). “It is a common view among HTS personnel we have interviewed that the quality of the personnel supplied under the BAE contract is substandard and is at the heart of most of the problems in the program. Our data shows that there may be truth in this argument,” (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010, p. 106). Interviewee #5 was similarly unconvinced with the HTS recruitment techniques: “There were no standards or accountability for recruitment.”

Despite the discontent with recruitment, the BAE contract was renegotiated in September 2009. There are no penalties for providing substandard recruits or incentives for providing good recruits; according to the CNA Report, the government takes what the contractor provides (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010).

Interviewee #4 verifies this process: the HTT members were “recruited by companies that are paid the same whether the person has the requisite skills [or not], and hired by HTS
who was desperate for personnel. The joke was, if you could fog a mirror you could get hired."³³

After the initial recruitment of a potential team member, the screening process is short and simple. Candidates are interviewed via the phone or Internet and those picked are offered jobs and sent to training at Fort Leavenworth. (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010). “Several team members say they were accepted after brief phone interviews and that their language skills were never tested,” (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010). “Many candidates for HTS teams sent for training at Fort Leavenworth simply had not been screened properly or misunderstood the nature of the job they were hired to do,” (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010, p. 137). “Recruits are trained in a team environment and when deployed they work in a team environment. In this setting, factors such as interpersonal relations and ability to work as a team may become as important as formal education and experience qualifications. These and other qualities such as character are inherently difficult to appraise in the phone interviews that are routinely conducted by BAE,” (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010, p. 90). A journalist describes the hiring process for Zenia Helbig, a former HTT member:

In March she [Zenia Helbig] got a call from Steve Fondacaro, a retired colonel who directs the human-terrain program. ‘He literally offered me a job within 10, 15 minutes,’ she says. ‘He kind of felt out my height/weight ratio to make sure I could pass off as military in uniform, and that was about the end of the it. In retrospect, Ms. Helbig says, the extreme eagerness to hire her—a student several years from a Ph.D. with no direct experience in Afghanistan or Iraq—might have been taken as a warning about the program’s disarray. In any case, she was no less eager

³³ See Appendix 9 for an example of the HTS recruitment email. This email was sent to my Thesis Committee Chair Dr. Craig Brians during my research; the email was unsolicited by Dr. Brians or myself.
than Mr. Fondacaro, and she accepted the position more or less on the spot. (One attraction was the $100,000 salary, which, combined with various kinds of Iraq hardship pay, could balloon close to $300,000.) Two days later, she signed a contract, and by April 2, she had taken a leave from her graduate program (at the University of Virginia) and had arrived in Kansas for training. (Glenn, 2007)

As a result of the recruitment process, instead of top regional experts, the anthropologists sent to Iraq included a Latin America specialist and an authority on Native Americans. One anthropologist was writing his Ph.D. dissertation on America’s Goth, punk and rave subcultures,” (Ephron & Spring, 2008). There are many examples similar to this one. The interviewees for this thesis briefly describe their recruitment experience:

• Interviewee #4 was recruited via a colleague
• Interviewee #5 was recruited by a friend and former colleague at the Pentagon
• Interviewee #3 learned of the position by two university classmates, one a former HTT member and one a current member (at the time)
• Interviewee #1 heard of HTS from a professor in his graduate program
• Interviewee #2 Googled ‘sociology’ and found openings with BAE and applied for the position.

The recruitment process directly affects team socialization and the subteam-level attributes of team members. The CNA Report examined qualifications of individual team members on educational level, academic area of specialization, and language ability.

Throughout HTS, managers comment on what they consider to be the poor quality of many of the recruits. Regrettably it is very difficult to objectively judge the quality of the recruits based on their stated qualifications. This is because no analysis has been performed to

---

34 See Appendix 6.
35 See Table 2 for additional background information on the interviewees.
determine which qualities predict who will be a successful HTS team member…Certainly additional variables would more accurately describe the qualifications of the team members, but these three were all that HTS could make available in the time frame of our review.” (Clinton, Foran-Cain, McQuaid, Norman, & Sims 2010, 94)

The CNA Report found that many deployed HTS personnel are under qualified for their jobs (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010).

Once a team member is recruited and signed on, the next obstacle is keeping the recruit in the HTS. Based on data collected, the CNA estimates HTS faces resignations of estimated 80 deployed team members each year out of current deployed base of 193 persons (41%); this isn’t tracked by HTS so this is CNA’s best estimate. (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010). The CNA report learned from the Division staff that “There was a lot of turbulence on the team—talented people had to be sent home—[he] felt HTS threw people together. The HTT had a wide range of very smart people but some not suited for the position—recruitment process is difficult—there is high demand and HTS did not think early on of telling people ‘no thanks’.[He] thinks HTS needs to do more with kicking people out of program that won’t cut it in Iraq—they should get them out before they deploy,” (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010, pp. 198-199). Interviewee #2’s statement corroborates the CNA Report:

The Social Scientist was on another team for a short time and went outside the wire and couldn’t even handle wearing the body armor. She is too frail. The analyst we had…is far too overweight to carry any significant weight. The Team Leader had no experience as a field commander. His experience was as a nurse and a little experience in Civil Affairs. He was also overweight. The other Research Manager had been outside the wire with another team. I talked to his former Team Leader and was told he did well. I myself never got a chance to go outside the wire on a team but can say I am a combat veteran in good physical condition and have proven myself in previous areas of the world…I must say though, there were a lot of folks with some pretty impressive credentials.
Interviewee #3 tells a similar tale from his experience during training:

I was also dealing with [in training] six or seven other individuals who were going to be social scientists. Of these, leaving whatever abilities I might have had aside, one appeared to be effective, one possibly so if put into the right situation analyzing large amounts of information for patterns. Two might have been adequate (one of these dropped out, after collecting every possible bit of pay.) One was a whacked out anthropologist PhD who went off of her medications three days before completions of the training, and went somewhat psychotic in front of everyone, one was a pacifist and leftist married to a Cuban, who’s father-in-law was a personal friend of Fidel Castro (yet somehow expecting to get a security clearance), and one made rather spectacular headlines in the New York Times in an embezzlement and drug purchase case. Of these, only the leftist had any experience in Afghanistan, and that in the final days of the monarchy. Only one of the others had any experience in Arabic cultures. The rest of us were there more of less on the theory that ANY social scientist will do.

Additionally, Interviewee #4’s statement supports the previous accounts:

Some of the members had none of the required skills, i.e. an Iraqi who could barely read in English and would use Google Translator to translate documents into English and then submit them without revisions, or a Research Manager who didn't know how to use the cut and paste function on Microsoft Excel…People were hired without qualifications. The best in the program tended to be the younger people, e.g. recent MA graduates, with or without military experience. They were motivated, energetic, willing to get their hands dirty, interested in integrating, and excited about the sense of adventure. The worst were a handful of the Iraqi HTAs [Human Terrain Analysts] whose only qualification was their ethnicity. (Imagine hiring a hillbilly from deep woods Alabama as an analyst of American culture.) A few were very valuable, but most caused more problems than they solved. Also troubling were the "career contractors," whose qualifications are that they had worked on other contracts in Iraq. There are many stereotypes of contractors in Iraq, and HTTs proved many of those true.

A journalist describes her experience and knowledge of the qualifications of a HTT member:

At Khost, the so-called cultural expert was an Iranian-born female officer who I will call “Sharifa.” Sending an Iranian Farsi speaker to a Pashtun region of Afghanistan didn’t seem like a great idea to me. The two languages are written in the same alphabet and share some vocabulary, particularly the more abstract words of Arabic derivation, but they split apart more than 2,000 years ago and are grammatically distinct. I was able to understand maybe 10 percent of the Pashto I heard in meetings and interviews, and could tell if people were discussing, say, security or weapons, but not what they were saying about them. Sharifa insisted, “there are a lot of Farsi (Farsi speakers) here in Khost,” but a bit of online research corroborated what locals told me: The province is 99.9 percent Pashto-speaking. The more educated people will understand Farsi, or more accurately Dari, the Afghan dialect, the language of Afghanistan’s court, government, and universities, but it is not what they speak at home. As the country’s biggest single ethnic group, compromising 40 percent of the population, Pashtuns feel linguistically sidelined by the dominance of Dari and don’t particularly enjoy speaking it. Nor do Afghans necessarily like Iranians. They tend to view them as Midwesterners circa 1930 might have regarded Englishmen: more sophisticated, yes, but also suspiciously smooth, possibly effeminate, likely laughing at them behind their backs. Sending a non-Pashto-speaking Iranian speaker to interview a Pashtun village, then is not just a daft, like sending a non-English speaking Spaniard to cozy up to an Iowa farmer. It’s apt to be resented. And if the HTT needs interpreters, it’s hard to see how they are getting closer to the people or learning more than a smart American officer who’s done some homework (Marlowe, 2007).

**Personality**

Personality is the propensities of team members to contribute to team performance,” (Orton & Lamb, 2010). “Team personality uses selection, socialization, and strategy processes to ensure that each member has the necessary personality characteristics, goal orientations, or other subteam-level attributes to contribute,” (Orton & Lamb, 2011). The soap opera-like drama surrounding HTTs, described in Chapter Two, may stem from the problems with the personalities of HTT members. Interviewee #4 gave an example of a personality issue on the HTT:

The Social Scientist tried to make everyone on the team submit to her will. She had a dictator type leadership style. She thought she was the only one that knew anything. In my opinion, [redacted] is very good at marketing
and bullshitting people into believing whatever she says. However, I feel this is fueled by a lack of self-esteem and has to be fed by constantly reminding everyone everyday of her accomplishments, which weren’t all that impressive to me.

“‘People can look great on paper or in training,’ he [Former Program Director Steve Fondacaro] says, “but they fail in the field. They can’t get along on a team or they can’t handle the living conditions or they have personal issues. Their performance deteriorates and we have to get rid of them’,” (Kimberlin, 2010d).

Interviewee #2 stated, “The team definitely knew who brought something to the table and who didn’t. There are a huge amount of personality conflicts within teams and it is a huge stumbling block to working cohesively as a team.” Interviewee #5 had to dismiss three members because of personalities. He said there were lots of “ugly emails” and members that were not team players; these were “infectious to the team.”

Besides a lack of an understanding of the HTTs’ mission, the next biggest impediment to performance of HTTs is recruiting the wrong team members. The inability to find the right people to make up the ‘ideal’ team because of a lack of local experts and the unwillingness of many academics to participate created a barrier to HTTs performance at the teams’ inception. Recruitment is made more difficult by not knowing what a quality team member looks like.

There are two performance barriers in addition to recruitment: retaining high performing team members and personality conflicts. Because the right people are not being recruited, the inability of retaining good HTT members is a performance barrier. The recruits that may meet the current standards are likely unwilling to work in an environment that is hostile, without purpose, and without administrative support.
Personality conflicts are not foreseen and when they arise, they are not handled in an effective manner.

**Chapter Overview**

The lack of quality HTT members in the HTS creates a performance barrier by preventing a complete, qualified, crossfunctional team. The recruitment process is inadequate and leads to the wrong team members, which leads to cultural clashes, commitment issues, and personality conflicts. In order to improve performance, the recruitment process needs to be improved substantially and those within the HTS that are not qualified should be released.
Chapter 6: Conclusion & Implications

Summary of Problem

I argue in this thesis that to gain the cultural knowledge required for a successful counterinsurgency (COIN) strategy, effective crossfunctional teams are needed. In order to build effective crossfunctional teams, the National Security System must utilize research on crossfunctional teams to learn best practices and identify characteristics that affect the performance of crossfunctional teams. Corporate America relies heavily on previous research on teams and the U.S. Government has not. The National Security System may have overlooked the basic tenets of the research literature on the characteristics that affect the performance of crossfunctional teams.

The focus on crossfunctional teams is important because they are the foundation of building a successful National Security System. By building effective crossfunctional teams, the government is working from the ground up to prevent oversights, allow information to flow, and improve the overall safety of our military personnel, the American public, and the international community.

In the past seven years there has been a great deal of discussion, excitement, and uncertainty regarding the Human Terrain System (HTS) and its Human Terrain Teams (HTTs), but it all lacked analysis of the HTTs based on the research on crossfunctional teams. There were many criticisms of the HTTs based on the practice of academics working with the U.S. military, but the discussion must move beyond that in order to create teams that can gather socio-cultural knowledge at the operational level for the military.
Summary of New Research

This thesis provides insight on the characteristics that affected the performance of HTTs using previously conducted research on crossfunctional teams. The organizational lessons extracted in this thesis from HTT members helped explained how research on crossfunctional teams might be applied in the future to the HTTs and other crossfunctional National Security System teams.

The CNA report claimed that, “In order to recruit quality personnel, HTS must have a clear understanding of what makes up a successful team,” (Clinton, Foran-Cain, McQuaid, Norman, & Sims, 2010, p. 6). This thesis begins the process of identifying what affects the performance of the HTTs in order to determine in the future what will make up a successful HTT. I have provided a foundation on which to base the application of social science methodologies and the research on crossfunctional teams to discover the attributes of what makes an effective HTT for future researchers.

This thesis is an example of how the National Security System can use social science methodologies to create effective tools to gain socio-cultural knowledge in the U.S. military. It can potentially benefit the academic and military communities by using further research that will continue the use of crossfunctional teams in the National Security System. Most importantly, members of academia (especially social science) will see a benefit in providing the U.S. military with their expertise, and the U.S. military will see the benefits in accepting it. This expertise is not limited to working in a war zone, but also in training, research skills, and publishing scholarly articles on military-related topics.
Limitations

There are three major constraints to this research: 1) the challenges faced in accessing those currently involved in HTS, 2) the limited publicly available material that could be used as data, and 3) the ever-changing HTS. Gathering data on moving target in the U.S. Army proved to be a large constraint.

In March 2011, the leadership and those involved with the HTS held a conference on Human Terrain at the National Defense University. I attended this conference but the information obtained were not allowed to be published in any form (Chatham House Rules).

The state of the HTS and HTTs is ever changing. At the Human Terrain Conference in March 2011 I learned many changes the HTS had made since its change in leadership. Unfortunately, I could not include the changes I learned and cannot include the changes that are not publicly available. Some of the characteristics that are discussed in this thesis may currently being addressed at the HTS. Since finalizing my research the HTS has become more open to accessing their current and future situation in the U.S. Army, but it is not yet where it needs to be for a graduate student to gain enough access to provide a definitive explanation as to the performance of the HTTs.

Future Research

The need for socio-cultural knowledge in the U.S. military and conflict are not going away, but they have changed in the past 25 years. The way we conduct warfare may change over time, i.e. drone attacks and increased counterterrorism, and the warfare strategy may no longer be called COIN, but cultural knowledge will always be required. The National Security System must continue to seek out best practices of how to gather
socio-cultural knowledge. Academics are researching this topic more. During the fall of 2011, a graduate student from the War Studies Department of a university in Europe who is researching cultural awareness as a developing capability with the armed forces contacted me to learn more about the pros and cons of HTTs as a socio-cultural capability. Extensive scholarly research on socio-cultural knowledge will assist the National Security System in improving this as a capability.

The U.S. Army is continuing to develop teams to learn about cultures during conflict (Bowman, 2012). Learning how to create effective teams is of continued importance.

In order for the military and the rest of the National Security System to gain the capabilities to implement an effective counterinsurgency strategy, crossfunctional teams are required. Since finalizing this thesis, the work at the National Defense University has continued. Their organizational team has grown in number and more in-depth research on the HTS is on-going. The leadership of the HTS is working with Dr. James Orton and his team in hopes of improving the HTTs organizational performance at the team-level. Most importantly, the correct crossfunctional team characteristics need to implemented to ensure the members of the U.S. military and the National Security System will be effective users of cultural knowledge.
Works Cited


Appendix 1: Background: Operational Need
From the Human Terrain System Website (U.S. Army, 2010b)

Background: Operational Need
The operational need for socio-cultural support to military operations and Human Terrain Teams was established in 2006 & 2007 through a series of related events and actions that documented and validated the operational need for HTS capabilities.

- **Operational Needs Statements**: The first requirement was a 2005 Operational Needs Statement (ONS) from 10th Mountain Division in Afghanistan. In 2006 and early 2007, multiple Army and Marine commanders, representing units in or preparing to support the surge in Iraq, submitted a series of ONS and JUONS requests.

- **JIEDDO Approval & Funding**: In 2006, JIEDDO validated the operational need and funded an HTS Proof of Concept. JIEDDO provided funding as a counter-IED initiative. Research indicated that many IED attacks were generated as a result of actions that violated socio-cultural mores and required violent retribution. Socio-cultural understanding was believed to provide a tool to help shape military operations and avoid cultural conflict that spurred violent reaction.

- **CENTCOM JUONS**: Joint Urgent Operational Needs Statements (JUONS) were signed by Multi-National Corps – Iraq (MNC-I) and Combined Joint Task Force 82 (Afghanistan). The Afghanistan and Iraq JUONS were subsequently consolidated by CENTCOM. The CENTCOM JUONS established the requirement for a Human Terrain Team (HTT) at all brigade combat teams (BCTs) / regimental combat teams (RCT) and a Human Terrain Analysis Team (HTAT) at Division / MEF level in both Iraq and Afghanistan. The JUONS also authorized the development of supporting project elements, such as the MAP-HT Toolkit and reach-back capability. The JRAF validated and funded the JUONS.

- **Operational Gaps**: The socio-cultural operational gaps driving the urgent operational need were documented, and identified as:
  1. Insufficient understanding of the target area culture and its impact on operational decisions; and insufficient or ineffective transfer of knowledge to follow-on units via Relief in Place / Transition of Authority (RIP/TOA) process.
  2. Limited Joint, Service, or Interagency capability (organization, methods, and tools) to conduct research, visualize, understand, and explain the human terrain (i.e. population in which the unit operates).
  3. BCTs, RCTs, and Division-level HQs engaged in counterinsurgency operations in OIF and OEF lacked the operationally relevant human terrain knowledge base and social science staff experts necessary to optimize their military decision-making process.
  4. Commanders were limited by the lack of a Joint, Service, and Interagency integrated capability (people, organization, methods, tools) to effectively gather/consolidate, analyze, visualize, understand, database, and share socio-cultural information. The battalions, companies, platoons, and squads, experienced first hand the knowledge and capability gap.
### Appendix 2: Characteristics of Effective Crossfunctional Teams

#### Characteristics of Effective Crossfunctional Teams (Table 3)

<table>
<thead>
<tr>
<th>Organizational-level Variables</th>
<th>Strategic Consensus</th>
<th>Team Mental Models</th>
<th>Transitive Memory</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Team Purpose:</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Team purpose is defined by</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>the broad, long-term mandate</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>given to the team by its</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>management as well as the</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>alignment of short-term</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>objectives with the strategic</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>vision and agreement on</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>common approaches within the</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>team. <strong>Team-level strategic</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>consensus is defined as basic</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>agreement among team members</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>on the charter, mission, and</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>goals of the team (e.g. “secure</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>and protect Private Ryan so</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>that he can be safely returned</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>to his mother”). <strong>Team Mental</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Models are defined as</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>complicated, detailed,</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>interconnected causal maps of</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>the methodology that the</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>team members employ to</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>accomplish the team’s</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>objectives, such as agreement</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>on how to do particular jobs,</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>how schedules will be set,</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>what skills need further</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>development, how the group</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>will make team decisions,</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>and how continuing membership</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>is earned. <strong>Transitive memory</strong>is defined as a complex map of the network of specialized knowledge assets, in the form of people within the team, within the organization, and outside the organization.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Team Empowerment:</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Team resource empowerment is</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>defined as the budgeting of</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>adequate resources for</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>accomplishment of the team</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>mission – personnel, funds,</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>equipment, and other</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>tangible resources. **Team</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>structural team empowerment</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>is defined as the delegation</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>of authority, responsibility,</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>decision-making, task</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>autonomy, power, control,</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>and management to the team. **</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Team psychological empowerment**is defined when team members share a conviction that the team is capable of accomplishing its mission.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Organizational Context:</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Organizational Context is</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>defined as the set of</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>organizational processes that</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>connect a team to other teams</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>at multiple levels within the</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>organization, other</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>organizations, and a wide</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>variety of resources that the</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>team needs to accomplish its</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>mission. **Team-based</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Organizations (TBOs) are</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>defined as organizations</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>characterized by freedom for</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>teams to manage themselves,</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>by recognition that different</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>types of teams require</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>different degrees of leadership</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>intrusiveness, and a reliance</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>on analytical tools to</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>determine the structure of</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>the network of teams within</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>the organization. <strong>Organizational Support Systems</strong> are defined as efforts by the larger organization to design, implement, and constantly improve mechanisms that reduce the amount of energy a team must expend in conflict with the larger organization, and maximize the amount of time that a team can spend on mission accomplishment. <strong>Team Communication Activities</strong> are defined as a wide range of activities undertaken by team members to secure support from outside the team through ambassadorial (upward) communications, lateral (horizontal) communications, and probing/scouting (downward) communications.</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
### Team-Level Variables

<table>
<thead>
<tr>
<th>Team Structure</th>
<th>Team Design</th>
<th>Team Collocation</th>
<th>Team Network</th>
</tr>
</thead>
</table>

**Team Structure**: Team structure refers to the “mechanics” of teams – design, co-location, and networks. **Team design** is defined as the specific number of team members (i.e. team size), the tenure of the team, and the design of the task that the team will perform. **Team co-location** is defined as the placement, co-location, geographic concentration, or geographic dispersion of team members, in addition to the information systems and communications systems that are used to compensate for geographic dispersion. **Team networks** are “the patterns of informal connections (ties) among individuals” that are important “because they have the potential to facilitate and constrain the flow of resources between and within teams.”

<table>
<thead>
<tr>
<th>Team Decision-making:</th>
<th>Heterogeneous Worldviews</th>
<th>Team Conflict</th>
<th>Decision Implementation</th>
</tr>
</thead>
</table>

**Team Decision-making Processes** are defined as the mechanisms that are employed to make sense of and solve a variety of complex problems faced by a cross-functional team. **Heterogeneous worldviews** refers to the presence of diverse, coherent, belief systems on the team. **Team conflict** is defined as the capability of the team to generate helpful conflict between divergent viewpoints. **Decision implementation** requires a suppression of conflicting views in favor of sufficient strategic consensus to implement team decisions.

<table>
<thead>
<tr>
<th>Team Culture:</th>
<th>Team Cohesion</th>
<th>Team Climate</th>
<th>Team Trust</th>
</tr>
</thead>
</table>

**Team culture** can be defined as the behavioral expectations and level of commitment and trust among team members. Teamwork methodologies conducted by team members. **Team cohesion** is measured by the commitment of team members to the team’s task, mission, and purpose; to the team itself; and to one another. **Team climate** is “the set of norms, attitudes, and expectations that individuals perceive to operate in a specific social context.” **Team trust** “The shared perception by the majority of team members that individuals in the team will perform particular actions important to its members and that the individuals will recognize and protect the rights and interests of all the team members engaged in their joint endeavor.”

<table>
<thead>
<tr>
<th>Team Learning:</th>
<th>Exploitation Team Learning</th>
<th>Experimentation Team Learning</th>
<th>Exploitation Team Learning</th>
</tr>
</thead>
</table>

**Team Learning** is an ongoing process of reflection and action, through which teams acquire, share, combine, and apply knowledge. **Exploitation team learning** is defined as team practices that facilitate the transfer of knowledge from outside the organization to inside the team, the deliberate transfer of best practices between teams, team training activities, lessons learned programs, and knowledge capture and storage programs. **Experimentation team learning** is a different approach to team learning that envisions the cross-functional team as a laboratory in which multiple competing views are juxtaposed against each other in a sequence of novel experiments that require improvisation, flexibility, and reflection. **Exploration team learning** expands knowledge to be used later in complex problem-solving – e.g. investment in wide knowledge networks, willingness to take risks, cross-organizational alliances, and buying knowledge through the acquisition of additional knowledge sources.
**Subteam-level Variables**

<table>
<thead>
<tr>
<th>Team Composition:</th>
<th>Team Personality</th>
<th>Team Demography</th>
<th>Team Diversity</th>
</tr>
</thead>
</table>

**Team Composition** is the sequence of strategic choices that leads to certain people being on a team at a specific point in time. **Team personality** is template for team members that uses team selection, team socialization, and team strategy processes to ensure that each team member has the necessary personality characteristics, goal orientations, or other subteam-level attributes to contribute as a member of the team. **Team demography** examines the extent to which diversity may impact team performance by creating competing groups inside the team. **Team diversity** covers a range of team member characteristics that are presumed to affect team performance, including attitudinal, demographic, and functional diversity.

<table>
<thead>
<tr>
<th>Team Reward Systems:</th>
<th>Attractive Motivations</th>
<th>Line-of-Sight Measurement</th>
<th>Team Emotions</th>
</tr>
</thead>
</table>

**Team Rewards** are Team rewards are reward systems that combine material incentives and psychological rewards to direct team members towards the accomplishment of the team’s mission. **Attractive motivations** are incentives that are sufficient to encourage qualified people to move from comfortable and often safer organizational positions into riskier cross-functional teams, and sometimes to filter out people with high needs for individual achievement, and to “filter in” people with high collectivism personality characteristics. **Line-of-sight measurements** are mission-based performance evaluation systems that focus team members’ attention on key effectiveness criteria and create the additional motivation, energy, and persistence necessary to accomplish team objectives. **Team Emotions** are the feelings created by the convergence of individual emotions into a distinct affective state associated with members of the team at a specific time.

<table>
<thead>
<tr>
<th>Team Leadership:</th>
<th>Traditional Leadership</th>
<th>Coaching Leadership</th>
<th>Shared Leadership</th>
</tr>
</thead>
</table>

**Team Leadership** is defined as the collection of strategic actions that are taken to accomplish team objectives, to ensure a reasonable level of efficiency, and to avoid team catastrophes. **Traditional team leadership** is defined as primarily top-down, command-and-control authority applied from either outside the team or inside the team in order to overrule differences of opinion within the team, accomplish objectives set for the team, and ensure efficiency. **Coaching team leadership** is defined as “direct interaction with a team intended to help members make coordinated and task-appropriate use of their collective resources in accomplishing the team’s work.” **Shared team leadership** is defined as primarily “bottom-up,” collaborative, shared sense-making from many people and everybody inside the team in order to accomplish the team objectives, develop new capabilities, and avoid team catastrophes.

Source: (Orton & Lamb, Characteristics of Effective Cross-functional Teams: An Index to the Literature, 2010)
Appendix 3: Developmental History
From the Human Terrain System Website (U.S. Army, 2010a)

A. **Proof of Concept:** In early 2006 TRADOC G2, supported by JIEDDO, responded to this operational need by developing an initial concept to provide social science support to military operations. Human Terrain Teams (HTTs), composed of individuals with social science and operational backgrounds, would be deployed with tactical units to assist in bringing knowledge about the local population into a coherent analytic framework, in order to provide advice to Commanders and staffs in the field. This initial concept was approved and funded by JIEDDO for implementation as a Proof of Concept in June 2006.

The Proof of Concept was funded to provide two HTTs to Afghanistan and three HTTs to Iraq between 2007 and 2008, supported directly by a CONUS Reach-back Research Center (RRC) and a Subject Matter Expert network (SME Net) of contacts within the government and academic community (e.g. Naval Postgraduate School, war colleges, service academies, and various civilian institutions). The first Afghan HTT deployed in Feb 07 with 4th BCT, 82d Airborne Div.

B. **Transition to full support of Two Combat Theaters:** As the first team was deploying into Afghanistan, OSD and Army G2 were planning how Human Terrain capabilities could support the surge in Iraq. Meanwhile, the commands in both Iraq and Afghanistan developed JUONS requesting Human Terrain Teams (a total of 26 teams in the two theaters). The April 07 JUONS were validated by CENTCOM & the Joint Staff, then funded by the Joint Rapid Acquisition Council (JRAC) for FY07/08.

HTS spent FY07 ramping up recruiting, training, deployments, and sustainment to meet this expanded operational requirement. During FY07, HTS deployed new and sustained existing teams in theater; the 28th team deployed in Nov 08. Also in 2008, both theaters refined and adjusted their requirements (for team types and echelons) which re-validated a 26 team total. Two additional new requirements increased the team total for 28 teams. Iraq declared HTS capabilities an enduring requirement.

C. **Drawdown in Iraq, Surge in Afghanistan:** In FY09, Iraq adjusted its requirement based on the drawdown, and in FY10 Afghanistan increased its requirement based on the directed surge. In FY 11, the projected HTT aggregate demand is 42 teams (31 teams in Afghanistan, 11 in Iraq). HTS funding for FY 11 was based on a planning figure of 39 total teams.

As of 1 OCT 2010, 35 teams are deployed.

- Afghanistan HTS support increased from five (5) teams in FY08 to 24 by end of FY10. Support to Afghanistan is expected to continue to FY11 and beyond.

D. **HTS Support to NATO in Afghanistan:** Based on a prioritized support list from ISAF CJ2, HTS supports NATO regional HQs, NATO BCT’s, and coalition Provisional Reconstruction Teams.
Appendix 4: Interview Questions for HTT Members

Establish dates and primary colleagues:
- When did you start working on the HTT?
- Which HTT were you on?
- How were you recruited?
- Who did you work most closely with on the HTT?
- Who were your other team members and their roles?
- When did you stop working the HTT team?

Background on HTT’s
- What do you consider the core team?
- What are the relations between team members?
- What are the relations between the team and the departments it works with?
- What authority does the Team Leader have over personnel, resources, etc?
- What authority does the Brigadier Commander have over the team (military members and social scientists)?

Did you consider HTT’s effective, and if so, to what extent and why?
- What do you consider to be the successes of your HTT?
- What do you consider to be the failures of your HTT?

First, we’d like you to tell us the story of HTT’s, from your point of view. Later on we can explore what were the facilitators of effectiveness and impediments to effectiveness. For now, though, we’d like to hear the story the way you would tell it to your colleagues in the U.S. National Security System.

Team Purpose
- What was the stated mission of the team…and was there a consensus on it?
- To what extent did the team’s sense of purpose influence its approach to doing business?
  - What tasks are required for mission success?
  - What degree of specialization did the tasks require and was there agreement on how to accomplish tasks?
- Did you think team members understood the value each member brought to the team and his/her relevance to the team’s purpose?

Team Leadership
- Who was the Brigade Commander? Who was the formal HTT TL? Who else played roles as informal team leaders?
- Was the Team Leader’s style best characterized as:
  1. Singular/top-down/directive? OR
  2. As a servant leader, coaching/explaining/convincing? OR
  3. Multiple/distributed/shared/trusting/interactive/bottom-up?

Team Empowerment
- Did you have sufficient resources to accomplish the team objectives (personnel, funds, materials) and how were they obtained?
- Would team authorities best be characterized as:
  1. Acting under control of higher authority?
  2. Acting under the control of the team leader?
  3. Acting as an empowered team?
- Was the team confident it could achieve its goals and control events, and if so, how did this confidence develop?

Team Structure
  Team Design
  - How many members did the team have throughout the time you were with the team?
How was the team’s task divided up among team members?
How long was the team expected to persist, and what was the tenure of its members?
Were team members located together geographically?
Did team members divide up to perform different roles in different places and times?
How did the team members stay in touch if they were separated from each other?
What external contacts did the team develop and use and which were most productive?

**Team Culture**

What do you think was each team member’s level of commitment to the team, to the team’s mission, and to other team members?
Was there anything distinctive about the team you can identify (climate/culture)? What were the prevailing norms on the team that made it work well (or not)?
Did you feel that there was a high, medium, or low level of trust (or “psychological safety”) in your team?

**Team-based Reward Systems**

What attracted you to the team? What do you think attracted the other team members to your team?
Did you receive specific rewards for performance (individually or collectively), and what difference did it make to you?
What, if any, team emotions reduced or reinforced your commitment to the team?

**Team Learning**

Describe the training you received before, at the beginning or during your time as a team member? Describe the formation and development of your team. Was there a specific point at which you felt the team became a team?
Did the team ever experiment with different courses of action to see if new best practices could be developed? How did the team’s way of operating change over time?
Did the team create completely new approaches (“out-of-the-box” or “frame-breaking”) to accomplishing its mission?

**Team Decision Making**

How divergent were team members’ views?
To the extent divergent views were present, how did the team reconcile them and did you consider this process effective? Were there conflicts in the team? Were they destructive or productive?
When final decisions are made do all team members work to implement the decision irrespective of their personal views?

**Member Composition**

Were members’ recruited based on universal characteristics (e.g. commitment to team purpose; intelligence/skill sets; collaborative personality; reliability; etc.)?
Were team members recruited based on some combination of similarities and differences (e.g. same goals, different skill sets)?
Were members recruited for diversity (attitudinal, demographic and/or functional)?

**Organizational Context**

What other teams did your team work with in theater?
Did the broader organization provide support (HR, human capital, budgets) to the team?
What important external relationships did the team manage/maintain (above, level to and below the team)?
Appendix 5: HTS Team Components
(U.S. Army, 2011)

**Deployed Teams**: Operational need and combatant command (COCOM) requirements determine quantity and type of deployable teams. The number of teams can be increased or decreased based on the operational demands from the COCOMs; they are formed and deployed as needed (i.e., they are not permanent structure). COCOM demands must be validated and funded each year.

**Human Terrain Teams (HTT)**

Human Terrain Teams (HTT). HTTs are located at the brigade/regimental-level (BCT/RCT). Fully integrated into unit staffs, HTTs conduct field research among the local population and represent the “human terrain” in planning, preparation, execution, and assessment of operations. Consists of five to six military and civilian personnel. A team includes one team leader, one-two social scientists, one research manager, and one-two human terrain analysts with specific local knowledge. When possible, teams are deployed with at least one female to facilitate access to the often inaccessible female element of the population.

**Human Terrain Analysis Teams (HTAT)**

HTAT are deployed to support echelons above BCT/RCT (i.e., Division, Marine Expeditionary Force (MEF), & Regional Command levels). The HTAT integrates into the commander’s staff, conducts unclassified open source and field research, synthesizes the information from HTTs deployed with subordinate units, and analyzes human terrain information in support of the commander’s military decision making process (MDMP). HTATs consist of five to seven military and civilian personnel. A team includes a team leader, one to two social scientists, one-two research managers, and one-two human terrain analysts.

**Theater Coordination Elements (TCE)**

The TCE, found at the theater level in Afghanistan (and previously in Iraq); consists of six to eight military and civilian personnel. The TCE includes one team leader, three social scientists, one to two research managers, and one-two human terrain analysts. The TCE provides socio-cultural support to the theater staff and decision makers and coordinates and manages the social science research and analysis (SSRA) capability.

**Theater Support Office (TSO)**

Used at theater level in Iraq and Afghanistan, provides administrative and logistics support to HTS teams in theater. It includes a theater support officer and a support team of variable size.

**Social Science Research & Analysis (SSRA)**

Social Science Research & Analysis (SSRA): HTS contracts for SSRA support in theater. Based on supported unit information needs, the TCE tasks the SSRA to develop a research plan. SSRA uses trained, indigenous polling organizations and SMEs to gather data through polls, surveys, semi-structured interviews, and focus group discussion. SSRA provides reports to the TCE for dissemination throughout theater.
Appendix 6: Backgrounds of HTT Members found in Journalistic Articles

“Marcus Griffin had never been to the Middle East before he arrived in Iraq last fall… An anthropologist from Christopher Newport University in Virginia, Griffin knew much more about the Philippines, having accompanied his social-scientist father on a two-year research project there as a teen. In Virginia he’d been studying Freegans, those superenvironmentalists who forage for food in restaurant and supermarket Dumpsters,” (Ephron & Spring, 2008).

“[A HTT member] is a former Afghan army general named Farouq Zarif. He escaped the country with his family during the Russian occupation, then spent 20 years in the banking business in Northern Virginia…Zarif’s heritage, family ties and old contacts have made him an asset to HTS. He knows whom to call to ask questions or get things done. Still, he’s a rarity in a program that could use more like him. Afghan nationals who’d like to sign up can’t get the required security clearance, and most Afghan American aren’t eager to live in a war zone,” (Kimberlin, 2010b).

“(Chris) Fritz (former Air Force member), 28, is the team’s research manager…He doesn’t have college degrees…or a heritage that would offer some natural expertise. His foreign language specialty is Mandarin Chinese. Instead, Fritz offers field experience and guts. He did two military tours in Afghanistan and is on his second one with HTS. He’s been pinned down in a firefight and barely missed an ambush that killed a handful of coalition soldiers,” (Kimberlin, 2010c).

“To locals, he (Patrick Carnahan) introduces himself as a malin—a teacher—here to enlighten troops about Afghan culture. In truth, he’s not a regional expert, but he does hold a master’s degree in international relations, with a focus on water resources. His niche turned out to be handy in Helmand’s canal-laced agricultural district,” (Kimberlin, 2010d).

“In 2002, Britt Damon was an Army reservist assigned to guard detainees at the Guantanamo Bay Naval Station. At the time, he had eight years of experience as military police officer, and he was slowly piling up credits toward a bachelor’s degree in criminology…Four years later, Mr. Damon was working as a bar bouncer and taking courses at the University of Kansas when he saw an online notice: The military wanted reservists with social-science backgrounds to join a new program known as the Human Terrain System,” (Glenn, 2007a).

“They [HTT Trainees] included a retired chemist with past Special Forces deployments in Vietnam and Panama; a former reporter with a couple of decades in the intelligence community under his belt; an ex-Marine intelligence officer who studied Arabic and international relations in college and deployed briefly to Iraq; a former environmental consultant who grew up in Asia and is multilingual; and a Special Forces vet who served three tours in Afghanistan and one in Iraq. One, an Afghan-American, told me he fled the Soviet occupation before finishing school but couldn’t find work in Pakistan, so pressed on to the United States. He got jobs in fast food and supermarkets in Virginia and
eventually drove a delivery van. After 9/11 he felt a strong desire to help Afghanistan. He managed to land a job with the U.S. military as a “role player” in one of the simulated villages used for training and worked his way up to interpreter. Now in his late 30s—and married, with an infant son—he is returning to his native land for the first time as a member of an HTT,” (Anderson, 2010).

“Lou Morano [HTT Member] got a Ph.D. in anthropology more than 30 years before. For most of the intervening years, the former Marine worked in journalism at The Washington Times, The Washington Post and United Press International,” (Shachtman, 2007).

“IZ6 [HTT Team] comprises six members all of whom have significant experience in various domains. The Field Social Scientist (SS), who is senior social scientist responsible for HTT research, has earned a joint PhD in political science and criminology, a master’s degree in comparative religion, a master’s degree in international security, and a bachelor’s degree in Middle Eastern Studies. He is well published in areas such as religious identity terrorism, political violence, politics, comparative security, and security administration. He has also consulted with many organizations on terrorism, counter-terrorism, and security administration. Working with the Field Social Scientist are two Research Managers, both Army retirees. One Research Manager is a 22 year old veteran of the Special Forces with extensive experience in counterinsurgency, and the other is a 24 year Chief Warrant Officer with criminal investigative experience. The military Team Leader is an Army Reserve Captain with an undergraduate degree in Anthropology. One of the Research Analysts served in the Army during Vietnam as a medic and specializes in social/psychological counseling. He has an additional background in business management and education. Finally, the last Research Analyst has a master’s degree in security administration and bachelor’s degree in political science and criminology,” (Schaner, 2008, p. 51).

“One of the social scientist on the team was an Iraqi-American medical doctor, who grew up in Baghdad and left Iraq for the U.S. in the late 1980s after the Iran-Iraq war. He was cultural and linguistic expert on the area of operations, and proved to be a tremendous asset to the brigade,” (Fawcett, 2009, pp. 29-30).
Appendix 7: Telecom Discussion Session
From the Human Terrain System Website (U.S. Army, 2011)

Telecom Discussion Session

We greatly appreciate the widespread scholar and student interest in researching the Human Terrain System. We receive many requests from scholars and students for HTS support to research projects, class discussions, interviews, surveys, and questionnaires. Our HTS support staff is very small and is engaged daily in support of the deployed HTS personnel. Therefore, in order to support your research efforts we are initiating a monthly HTS subject matter expert teleconference discussion.

Each month we will assemble a team of HTS subject matter experts to answer your questions on our mission, organization, training, deployed team composition, socio-cultural products developed by HTS, or other topics related to your research or projects. For the protection of our deployed personnel, we will not discuss specifics of ongoing operations. We ask that you identify the educational organization you are associated with.

To ensure we assemble the most knowledgeable personnel, you will be required to provide a list of the questions you wish to discuss with our panel prior to the teleconference. These discussions are limited to unclassified topics. An HTS facilitator will guide the discussions and ensure all participants have an equal opportunity to ask their questions.

This is not a forum for media interviews or background information. All media representatives must request interviews through the TRADOC Public Affairs Office.

If you would like to participate in the next Telecom Discussion Session please fill in the fields below and press the "Send to HTS" button.
Appendix 8: Glossary of Acronyms

AAA – American Anthropological Association
BAE – British Aerospace Electronic Systems
CA – Civil Affairs
CDA – Congressionally Directed Action
CIA – Central Intelligence Agency
COCOM – Combatant Command
CONUS – Continental United States
CNA – Center for Naval Analysis
DIA – Defense Intelligence Agency
DoD – Department of Defense
FMSO – Foreign Military Studies Office
FOB – Forwarding Operating Base
FOIA – Freedom of Information Act
FOUO – For Official Use Only
HASC – House Armed Services Committee
HTA – Human Terrain Analyst (member of HTT)
HTAT – Human Terrain Analysis Teams—supports division and higher level commands
HTRAC -- Human Terrain Research and Analysis-Corps
HTS – U.S. Army Human Terrain System
HTT – Human Terrain Team—supports brigade-level commands
JIEDDO – Joint Improvised Explosion Device Defeat Organization
NDU – National Defense University
NGA – National Geospatial Agency
OUSDI – Office of the Under Secretary of Defense for Intelligence
POC – Point of Contact
PME – Professional Military Educational institutions
PRT – Provincial Reconstruction Team
PSYOP – Psychological Operations
RRBC – Red River Basin Commission
SOFA – Status of Forces Agreement
TCE – Theater Coordination Elements
TRADOC – U.S. Army Training Doctrine and Command
Appendix 9: HTS Recruitment Email

Original-recipient: rfc822;cbrians@vt.edu
From: Human Terrain Teams <info@htsrecruiting.com>
To: "cbrians@vt.edu" <cbrians@vt.edu>
Reply-to: info@htsrecruiting.com
Date: Thu, 17 Mar 2011 01:16:42 +1100
Subject: International Employment for Social Scientists

Trouble viewing this email? <http://powelltate.cmail4.com/t/y/e/fuykly/pkkhyjjtj/>View it in your browser.

Dear Dr. Brians,
* Share this email with a friend
* Subscribe to news, updates and developments regarding Human Terrain Teams

For more than five years, social scientists have been integral members of Human Terrain Teams (HTT) in Afghanistan providing socio-cultural research and analysis to U.S. military commanders and staffs in order to improve the understanding of the local population, and directly contribute to the mission of bringing peace, security and stability to the region.

We ask you to share this information about the HTT program with talented social scientists in your network who may be interested in applying to the program.

Now, and throughout the year, we are seeking up to 100 qualified candidates for this opportunity.

In their role, HTT social scientists provide current, accurate, and reliable insights generated by their on-the-ground research to help U.S. military commanders and staffs understand and work with local communities.

As a member of an HTT, select social scientists engage in a worthwhile international experience allowing individuals to:
* Enhance their professional credentials through field research
* Make a real-world difference in the lives of people
* Receive a rewarding salary

HTT candidates are chosen from experienced social scientists and related professional applicants with:
* AÂ° graduate degree in a social science discipline
* Strong communications, analysis and research skills
* 52 weeks of socio-cultural field research experience (exclusive of research performed in support of an academic degree)
* U.S. Citizenship
* The ability to qualify for security clearance

While field experience in Southern Asia or the Middle East, as well as Arabic language skills are highly desirable, they are not required.

Interested parties are encouraged to visit http://htscareers.com which provides information on the Human Terrain Teams program and the application process. If you have questions please send an email to <mailto:sheila.hegwood@baesystems.comemachine@sheila.hegwood@baesystems.com> or call 757-865-5657.

Sincerely,

Sheila Hegwood
Human Terrain Team Recruiter
BAE Systems
Appendix 10: IRB Permission Letters

MEMORANDUM

DATE: July 21, 2010

TO: Craig L. Brians, Julia Page, James Douglas Orton

FROM: Virginia Tech Institutional Review Board (FWA00000572, expires June 13, 2011)

PROTOCOL TITLE: Effectiveness of Human Terrain Teams

IRB NUMBER: 10-607

Effective July 21, 2010, the Virginia Tech IRB Chair, Dr. David M. Moore, approved the new protocol for the above-mentioned research protocol.

This approval provides permission to begin the human subject activities outlined in the IRB-approved protocol and supporting documents.

Plans to deviate from the approved protocol and/or supporting documents must be submitted to the IRB as an amendment request and approved by the IRB prior to the implementation of any changes, regardless of how minor, except where necessary to eliminate apparent immediate hazards to the subjects. Report promptly to the IRB any injuries or other unanticipated or adverse events involving risks or harms to human research subjects or others.

All investigators (listed above) are required to comply with the researcher requirements outlined at http://www.irb.vt.edu/pages/responsibilities.htm (please review before the commencement of your research).

PROTOCOL INFORMATION:
Approved as: Expedited, under 45 CFR 46.110 category(ies) 7
Protocol Approval Date: 7/21/2010
Protocol Expiration Date: 7/20/2011
Continuing Review Due Date*: 7/6/2011

*Date a Continuing Review application is due to the IRB office if human subject activities covered under this protocol, including data analysis, are to continue beyond the Protocol Expiration Date.

FEDERALLY FUNDED RESEARCH REQUIREMENTS:
Per federally regulations, 45 CFR 46.103(f), the IRB is required to compare all federally funded grant proposals / work statements to the IRB protocol(s) which cover the human research activities included in the proposal / work statement before funds are released. Note that this requirement does not apply to Exempt and Interim IRB protocols, or grants for which VT is not the primary awardee.

The table on the following page indicates whether grant proposals are related to this IRB protocol, and which of the listed proposals, if any, have been compared to this IRB protocol, if required.
MEMORANDUM

DATE: June 29, 2011

TO: Craig L. Brians, Julia Page, James Douglas Orton

FROM: Virginia Tech Institutional Review Board (FWA00000572, expires May 31, 2014)

PROTOCOL TITLE: Effectiveness of Human Terrain Teams

IRB NUMBER: 10-607

Effective July 21, 2011, the Virginia Tech IRB Chair, Dr. David M. Moore, approved the continuation request for the above-mentioned research protocol.

This approval provides permission to begin the human subject activities outlined in the IRB-approved protocol and supporting documents.

Plans to deviate from the approved protocol and/or supporting documents must be submitted to the IRB as an amendment request and approved by the IRB prior to the implementation of any changes, regardless of how minor, except where necessary to eliminate apparent immediate hazards to the subjects. Report promptly to the IRB any injuries or other unanticipated or adverse events involving risks or harms to human research subjects or others.

All investigators (listed above) are required to comply with the researcher requirements outlined at http://www.irb.vt.edu/pages/responsibilities.htm (please review before the commencement of your research).

PROTOCOL INFORMATION:
Approved as: Expedited, under 45 CFR 46.110 category(ies) 7
Protocol Approval Date: 7/21/2011 (protocol's initial approval date: 7/21/2010)
Protocol Expiration Date: 7/20/2012
Continuing Review Due Date*: 7/6/2012

*Date a Continuing Review application is due to the IRB office if human subject activities covered under this protocol, including data analysis, are to continue beyond the Protocol Expiration Date.

FEDERALLY FUNDED RESEARCH REQUIREMENTS:
Per federally regulations, 45 CFR 46.103(f), the IRB is required to compare all federally funded grant proposals / work statements to the IRB protocol(s) which cover the human research activities included in the proposal / work statement before funds are released. Note that this requirement does not apply to Exempt and Interim IRB protocols, or grants for which VT is not the primary awardee.

The table on the following page indicates whether grant proposals are related to this IRB protocol, and which of the listed proposals, if any, have been compared to this IRB protocol, if required.
MEMORANDUM

DATE: September 10, 2010

TO: Craig L. Brians, Julia Page, James Douglas Orton

FROM: Virginia Tech Institutional Review Board (FWA00000572, expires June 13, 2011)

PROTOCOL TITLE: Effectiveness of Human Terrain Teams

IRB NUMBER: 10-607

Effective September 10, 2010, the Virginia Tech IRB Chair, Dr. David M. Moore, approved the amendment request for the above-mentioned research protocol.

This approval provides permission to begin the human subject activities outlined in the IRB-approved protocol and supporting documents.

Plans to deviate from the approved protocol and/or supporting documents must be submitted to the IRB as an amendment request and approved by the IRB prior to the implementation of any changes, regardless of how minor, except where necessary to eliminate apparent immediate hazards to the subjects. Report promptly to the IRB any injuries or other unanticipated or adverse events involving risks or harms to human research subjects or others.

All investigators (listed above) are required to comply with the researcher requirements outlined at http://www.irb.vt.edu/pages/responsibilities.htm (please review before the commencement of your research).

PROTOCOL INFORMATION:
Approved as: Expedited, under 45 CFR 46.110 category(ies) 7
Protocol Approval Date: 7/21/2010
Protocol Expiration Date: 7/20/2011
Continuing Review Due Date*: 7/6/2011

*Date a Continuing Review application is due to the IRB office if human subject activities covered under this protocol, including data analysis, are to continue beyond the Protocol Expiration Date.

FEDERALLY FUNDED RESEARCH REQUIREMENTS:
Per federally regulations, 45 CFR 46.103(f), the IRB is required to compare all federally funded grant proposals / work statements to the IRB protocol(s) which cover the human research activities included in the proposal / work statement before funds are released. Note that this requirement does not apply to Exempt and Interim IRB protocols, or grants for which VT is not the primary awardee.

The table on the following page indicates whether grant proposals are related to this IRB protocol, and which of the listed proposals, if any, have been compared to this IRB protocol, if required.