OPERATIONALIZING A PEOPLE-FIRST STRATEGY:

KANT, *MISSION COMMAND,* AND WHAT IT MEANS TO TAKE

RESPONSIBILITY IN A 21ST CENTURY MILITARY

A Thesis

by

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ABSTRACT

The purpose of this thesis is to argue for the adoption of *Mission Command* because it stands to promote the kind of functioning proper to the aims and conditions of the increasingly tech-enabled military. It does this because there are no mission, battle, or war conditions where *good judgment* and *responsible action* are not critical to the success of the military's endeavors. In this, there is a *moral basis* to the proper functioning of a good military – *trust* and *responsibility taking*. While some argue that implementing *Mission Command* is infeasible, I argue that Kant, in fact, provides a model of moral education that suits *Mission Command's* integration quite well. I turn to Kant because he is the thinker for whom responsibility is the key concept, so his thoughts on how to cultivate it are relevant to the successful integration of *Mission Command*.

In order to support my argument for *Mission Command*, I first focus the thesis on the ethical debates of autonomous weapons systems (AWS), specifically, drones. In finding the literature too narrow, I argue the ethical discussion must be recast in terms of *judgment, autonomy*, and *responsibility* in order to locate a balanced path forward for the ethical research and development of technology that privileges the centrality of the human agent.

Next, I turn from the machine to the human operators responsible for employing them. I argue that in the military's quest to maintain an asymmetric advantage by potentially pursuing AWS which would offload many decisions from the operator, we

have simultaneously placed too much trust in a machine that lacks any true ability to self-govern and exercise judgment, while removing conditions that support the operators being able to take responsibility for their own actions.

In doing so, I utilize drones as a limit case to demonstrate that when we undermine operator's autonomy and capacity to be responsible at some minimal level, we essentially treat them as mere means to an end and risk enacting even further harms on the individual. All of this, I argue, recommends a robust adoption of *Mission Command*.

DEDICATION

They shall grow not old, as we that are left grow old:
Age shall not weary them, nor the years condemn.
At the going down of the sun and in the morning
We Remember Them.

-Laurence Binyon

CW2 Stephen T. Cantrell
(1985 – 2017)

PFC Michael A. Zuercher
(1984 – 2016)

PFC Mitchell E. Charles
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Perhaps most important to this work, without the stalwart example of LTG James Mingus, the 50th Commanding General of the famed 82nd Airborne Division, I would not have been so inspired and convinced that *Mission Command*, as a practical philosophy, is the most proper orientation with which one can approach leadership and the cultivation of superior military organizations. It is his example of leadership that I will strive to emulate for the remainder of my military career.

Finally, I would be remiss if I did not simply thank the numerous friends and colleagues as well as the department faculty and staff for making my time at Texas A&M an amazing experience that I shall not soon forget.

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NOMENCLATURE

AI/ML   Artificial Intelligence/Machine Learning

AIT   Advanced Individual Training

AMC   Air Mission Commander

AWS   Autonomous Weapons System

BCT   Basic Combat Training

BOLC   Basic Officer Leader Course

CP   Command Post

DoD   Department of Defense

GWoT   Global War on Terror

IADS   Integrated Air Defense Systems

IED   Improvised Explosive Device

IHL   International Humanitarian Law

JAIC   Joint Artificial Intelligence Center

LOAC   Law of Armed Conflict

ROE   Rules of Engagement

ROTC   Reserve Officer Training Corps

TOC   Tactical Operations Center

TTPs   Tactics, Techniques, and Procedures

UCMJ   Uniform Code of Military Justice

USMA   United States Military Academy

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CHAPTER I

INTRODUCTION

Drone warfare has received immense scholarly attention over the past decade, and rightly so. Arguably, no modern-day technological advancement has changed the way war is paradigmatically waged than the drone. Able to fly, surveil, and prosecute enemy targets, all the while virtually unnoticed, it has been a force multiplier in the fight against terrorism. Despite its discriminatory and risk-mitigating advantages, the push for more efficient and effective technology drives on as the military continues to move from the industrial to the information age.

This push is derived from the palpable tension that the next war will not be one of such asymmetric advantage. Decisions will need to be made in seconds, or possibly faster, to avoid potentially catastrophic losses against a peer competitor, and many scholars and industry experts argue the way to overcome the human limitations in perception, thinking, and action is by incorporating technology into the decision-making process in varying degrees.

Concerning the drone, one question that has arisen appears to stretch the ethical limits of the role technology truly can play in war: should drones be developed and implemented as *fully autonomous weapon systems* (AWS)? In other words, *should it be acceptable for a drone to take a human life on the battlefield with zero human interaction in the decision-making process?* As one can imagine, this issue has received considerable attention from all directions. Many individuals would probably surmise

that such a potentiality is merely a sci-fi supposition. The sobering fact is that, as of this

year, fully autonomous drones not only exist but are already being tested in war games

outside the United States.[1] This new development poses a dilemma to military

leadership: *if the technology exists and is militarily advantageous, should the U.S. adopt

it as well?*

In all fairness, many scholars and industry experts have felt this was a *future*

problem that needed to be addressed. Indeed, when I began the groundwork for this

thesis less than a year ago, there was virtually no unclassified discussion of such drone

technology coming to fruition, yet here we find ourselves. This points to a particular

aspect of technology that seems to go unappreciated, the pace at which it can advance.[2]

Given technology's tendency to rapidly advance, I believe there is a critical necessity to

maintain a disciplined focus on the context in which these systems are deployed in

relation to their operators. In doing so, the military can ensure the operational

parameters for new weaponry still privilege and maintain the dignity and respect of their

human agent.

My aim, then, in this thesis will be to defend a complete integration of the

Mission Command philosophy into modern military *garrison* and *combat* operations.

The purpose of *Mission Command* is to empower the initiative of individuals to exercise

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[1] See Kris Osborn's (2020) article in *National Interest* for an unclassified look at what China and Russia were most recently linked to this past summer: https://nationalinterest.org/blog/buzz/pentagon-worried-china-and-russias-drones-can-attack-without-human-approval-165459.
[2] In 1965, Gordon Moore developed a rule-of-thumb dubbed "Moore's Law" that has proven correct for just over 50 years regarding the rapid advancement of technology. See the following *Computer History Museum* summation for additional context: https://www.computerhistory.org/siliconengine/moores-law-predicts-the-future-of-integrated-circuits/

their will and judgment, when necessary and within the commander's intent, serving to enact a structure of robust responsibility-taking that aligns perfectly with the proper aims and functions of a "People-First" Army that trusts and values the judgment of its servicemembers. *Mission Command* as a modern military doctrine is, thus, the proper counter to the super-centralization and micromanaging practices that have been enabled by modern techno-centric platforms which preclude the individual operators from having a proper face and voice to fully exercise their judgment. *Mission Command* is founded on several principles which seek to enable a military structure that is more greatly decentralized and is focused around creating climates and cultures of excellence guided by its six principles: create shared understanding, provide a clear commander's intent, exercise disciplined initiative, utilize mission-type orders, accept prudent risk, and most importantly, build cohesive teams through mutual trust. The issue of drones, their operators, and autonomous weapons' systems will serve as a limit case for exacting a proper moral orientation towards responsibility-taking, and thus, will be examined as a way to highlight the very issues that *Mission Command* is meant to address.

  This thesis will also be circumscribed by some practical scopes and limits. First, for our service members' safety and in respect of ongoing operations around the world, I wish to flatly avoid any speculative conjecture or philosophical discourse that could involve sensitive or classified tactics, techniques, or procedures (TTPs) concerning drones. Furthermore, as a military officer, my thesis's breadth is limited to the Department of Defense's (DoD) approach to drone warfare, so I will ensure I operate within that sphere solely. Finally, because I will cite several inter-service unmanned

flying vehicles, all of which appear to insist on utilizing a unique acronym (UAV, RPV,

etc.), I find it most appropriate to refer to them merely as *drones* throughout my thesis.

In Chapter II, I argue that the current debate centering on the advancement of

lethal autonomous drones is too narrow to address the full scope of concerns the military

has. In order for military leaders to define the no-pass moral line for the development of

AI/ML technology, the debate cannot be framed only by a utilitarian calculus. The

central question addressed in this chapter is: *what role, if any, should fully autonomous*

drones play in making lethal decisions free of human control? Within the chapter, I will

first explore the history of drones, followed by the perceived advantages and

disadvantages of making the leap to *lethal autonomous* technology through the lens of

various normative approaches. Ultimately, my argument will demonstrate that there is

zero space in which autonomous weaponry should be allowed to target individuals free

of human governability and control. Rather, I believe the discussion of such technology

should be recast as a question of the autonomy of the human agent employing them. I

will construct this argument by situating *autonomy* and *responsibility* appropriately with

a human agent in light of Immanuel Kant's *Practical Philosophy* regarding human

freedom, conscience, will, and accountability.[3] By autonomy, I mean that they are

treated as ends in themselves, and that this is effected through removing the barriers to

the realization of their inner freedom as rational agents that are fully-capable of making

judgment calls in relation to their duties. This is to say, placing the responsibility for

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[3] I will utilize Mary J. Gregor's translation and edition of Immanuel Kant's *Practical Philosophy* (2008), published by Cambridge University Press, for any direct reference to Kant's work unless otherwise noted.

their own decisions with the drone operators, rather than the technology, is what grants the operators moral autonomy, and, in turn, is how they are treated by the military as ends in themselves. I will then further claim that though the DoD's recently adopted principles on the ethical use and development of artificially intelligent technology do indeed follow a Kantian-type model, there is undoubtedly more work to be done. Though the principles address the issue of *who* is fighting wars, they fall short in addressing the *how*. This is the purpose of the next two chapters.

In Chapter III, with the centrality of the human agent now cemented, I then argue for the necessity of a military structure that encourages and promotes responsibility-taking. This is necessary, I argue, if we consider Hannah Arendt's thesis in *Eichmann in Jerusalem* that the danger of modern bureaucratic life is the undermining of human conscience. Opening the chapter, I again turn to Kant in a pursuit to critically examine *whether or not the existing structures surrounding the employment of drones allow for the operators themselves truly to take responsibility for their actions?* More pointedly, do those structures respect the autonomy of the person behind the machine? How are we potentially collapsing and conflating the human into the tool? Are we as leaders telling these soldiers, sailors, and airmen that we trust their judgment? I will argue that we are doing these service members several injustices, most of which, though unintentional, are particularly problematic for them being able to take moral responsibility for their actions. The second half of the chapter then analyzes the construct for thinking about the *dangers of not taking responsibility* and *who is susceptible* in light of Arendt's work.

In Chapter IV, with the problematic structures that undermine human autonomy in sharper focus, I then argue that *Mission Command* articulates a robust structure for treating individuals in the military as ends and fostering responsibility-taking. Moreover, I claim that appropriating Kant's orientation towards moral education, as exhibited in his Doctrine of Method in the second Critique, stands to orient the military in such a way to inform a practical application of *Mission Command* that transcends previous criticisms of its feasibility of adoption. The first half of the chapter thus aims to establish this framework through an examination and adoption of the principles of *Mission Command*.[4] This doctrine exists to pave the way for leaders to assume risk in empowering their subordinates to make decisions from a foundation of mutual trust and shared understanding executed from mission-type orders, clear commander's intent, via disciplined initiative. In building my original framework, I claim that for *Mission Command* to function at its best in the age of information warfare where junior enlisted service members, such as drone operators, are increasingly equipped with much greater responsibility and accountability, they must obtain a correlative level of trust and authority relative to their role. In making this claim, I argue that *subordinate* in the doctrine of *Mission Command* requires revision to ensure that all soldiers are empowered to exercise disciplined initiative regardless of rank.

With this revised framework in mind, the second half of Chapter IV will lay out the actualization of these principles utilizing a comprehensive training structure that

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[4] Department of the Army (2019). (*ADP 6-0) Mission Command: Command and Control of Army Forces.*

incorporates moral education and character development for both leaders and soldiers from initial entry training (IET) through pre-deployment operations. As stated, I find Kant's nuanced approach to the duty of cultivating character development particularly applicable to breaking down the barriers of trust issues between leaders and soldiers that currently exist.[5]

At the conclusion of Chapter IV, my hope is to achieve the aim of providing a framework that is both people-centered and mission-oriented; one that can drive a way of encountering technology ethically and responsibly whether one is thinking about it from a strategic (macro) perspective or at the tactical-level (micro) executing training with emerging technology for the first time. There is always a present tension between balancing the mission and the welfare of the troops. For the last several years, the scales have been tipped towards the ever-growing mission, with service members taking a backseat. My hope is that this thesis provides one avenue for our military leaders to take charge of the solemn responsibility we have towards those we are entrusted to lead.[6]

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[5] Kristi Sweet's (2015) *Kant on Practical Life: From Duty to History* sincerely assisted me in recognizing the holistic application that Kant brings to bear not only in response to current moral issues, but in building frameworks to minimize future ones.
[6] See Department of the Army (2019). *(ADP 6-0) Army Leader and the Profession*, para. 5-7, 67.

CHAPTER II

DRONES AND LETHALITY: SITUATING RESPONSIBILITY

> ***War is a human endeavor*** *– a clash of wills characterized by the threat or application of force and violence, often fought among populations. It is **not** a mechanical process that can be precisely controlled by machines, calculations, or processes. Nor is it conducted in carefully controlled and predictable environments.[7]*

To begin, in this chapter I will argue that, despite the call to develop *fully autonomous weapons systems* (AWS) given the rapidity of advancing technology, there should be clear limits to replacing human judgment with machine calculations. In brief, I argue this limit applies to lethal decisions in war, which are undoubtedly moral decisions; moral *judgments* that machines cannot rightly discern, nor be held responsible for. The judgment to take another human life should never be outsourced to technology. In the course of this argument, I will also introduce and define the core themes of this thesis: autonomy, responsibility, and trust.

In order to support this position, I analyze the ethical literature surrounding a piece of 21st century technology that many are now calling to truly become unmanned, the drone, and argue that it is far too narrow. Put more pointedly, many ethicists wish to claim that technology is now, or very soon will be, at a point where it could operate

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[7] See Department of the Army (2019). (*ADP 6-0) Mission Command: Command and Control of Army Forces*, 1-1.

more effectively and efficiently without a human at the controls. To many, drones represent *potential*, and *autonomous* drones represent the future.

Providing such a demand its due course in analysis, I begin by reviewing the history and integration of drone technology into the current military construct and the problems it was meant to solve (*Section 2.1*) before turning to the ethical responses for and against its further advancement as a lethal autonomous weapons system (*Section 2.2*). The strongest of these arguments seeks to suggest that machines will be able to operate, morally, as independently as humans. I argue that this line of thinking fails to adequately situate what it means to operate autonomously and responsibly, and thus a re-casting of the debates needs to occur in those terms.

After laying out the various dimensions of machine autonomy, I introduce Immanuel Kant's basic precepts of human autonomy in order to demonstrate how even the most advanced machine cannot instantiate what it means to operate freely, and why it is critically important to maintain the centrality of the human agent in lethal decisions (*Section 2.3*). By taking this crucial step, it will serve to support the over-arching project of this thesis by arguing that it is the drone operators (in this limit case representing soldiers who fill techno-centric roles) who deserve to be empowered with greater autonomy (*Chapter III)* given their unique internal governance and judgment as rational agents, and that *Mission Command* is the proper ethical framework to pursue enacting such ends *(Chapter IV)*.

Finally, in this chapter, I consider the U.S. Department of Defense's very recent ethical framework for consideration of adopting artificially intelligent technologies, in

light of Kant's thoughts on human judgment, and argue that their intention appears to align well with a responsible Kantian perspective regarding autonomy. With this chapter serving as a door to aligning the proper situatedness of responsibility and autonomy in the human agent, we can next turn to Chapter III for a deeper examination of these interrelated aspects from the perspective of the drone operator themselves.

2.1 History of the Drone: From Technology Pull to Technology Push

The drone concept is readily recognizable in today's society. From the idea that Amazon could soon be flying packages to one's door to its rampant use in video and film production, I would confidently argue that it is near impossible to find an adult unfamiliar with such technology. For most, though, drones first became recognizable in the Global War on Terror (GWoT), but what many do not realize is that their past extends much further than the previous two decades.

As Singer (2009) notes, the first known unmanned plane to hit the market was affectionately referred to as the "Dennymite". Named after Reginald Denny, who owned a model plane store between the World Wars, the "Dennymite" was pitched to the military for its potential utilization as a target drone for anti-aircraft gunners ramping up for WWII. Seen to have a minimal need at the time, the Army inked a corresponding contract for just 53 drones. A year later, the attack on Pearl Harbor occurred. What was once seen as a nicety very suddenly became a perceived necessity, and throughout the

remainder of the Second World War, the U.S. Army purchased an additional 15,000 "Dennymites".[8]

Following WWII, the next significant role a drone would fill did not surface until 1979 with the Aquila. It was here that private-sector corporations first widely sought to introduce a drone's ability to be utilized for intelligence gathering. Throughout the acquisition process, however, the Army added several requirements such as increased survivability of the equipment, more secure communications, and greater image quality; consequently, all of which appeared reasonable, yet came at the cost of speed and vulnerability on the battlefield. After nearly a billion-dollar investment, ten years, and with only a handful of prototypes to show for it, the Army scratched the concept.[9]

A major issue plaguing the private sector was that it was unable to incentivize government investment in their forward-looking technologies. They needed a method for making their products more attractive to the DoD in order to spark greater demand. However, in the post-Gulf-War era, the DoD saw a correlative need to curb their spending and demanded that the services think outside-the-box in exercising their fiscal responsibilities. It did not take long to identify that the Department's biggest spenders were its aviators. With that in mind, drones quickly regained some appeal.[10] By early 2000, Senator John Warren, then serving as the Chair for the Senate Armed Services Committee, cemented the demand industry was desperately awaiting when he mandated

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[8] See Singer (2009), 49.
[9] Ibid., 55.
[10] Ibid., 58.

that by 2010 "one-third of all the aircraft designed to attack behind enemy lines be

unmanned."[11] With an exponential cost decrease that drone technology now offered at

the turn of the century conjoined with a budget increase, military contracting firms were

given the green-light to move forward with R&D. Less than two years later, 9/11

happened.

Amid a two-front war in Afghanistan and Iraq, the military quickly found itself

hammered by multiple dilemmas. Every week the faces of America's sons and

daughters scrolled across the screen as the news anchors held a moment of silence for

those killed in action. Many of the military's casualties were a direct result of suicide

bombers and improvised explosive devices (IEDs). As such, the DoD required an

interdictory solution that could identify the areas insurgents were planting IEDs in order

to provide early warning to those on foot or in vehicular convoys. The practical answer

to such problems lay with drone technology, and thus, a tremendous effort to scale

production ensued.[12]

It was not long before the Predator drone began to make a name for itself.

Coming in at just under $4.5 million, the Air Force could purchase 85 Predators before

reaching the price of one F-22. Without a human pilot, it could also be produced much

smaller and lighter, enabling it to burn less fuel and remain in the air for nearly 24 hours,

a feat that no manned aircraft could practically carry out. As Singer calculates, "About a

quarter of the cost… actually goes into the 'Ball'." The rotating ball carries two variable-

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[11] Ibid., 59.
[12] Ibid., 60.

aperture TV cameras, one for seeing during the day and an infrared one for night, as well as synthetic-aperture radar that allows the Predator to peer through clouds, smoke, or dust."[13] Furthermore, capable of flying at heights of up to 26,000 feet, they could operate virtually unnoticed.

Very quickly, the practical advantages of such drones became apparent to the military as well as general public. Videos began to surface of terrorists planting IEDs getting caught in the middle of the act. As the presence of drones in the air became tied not only to surveillance but missile engagement as well, the Taliban and Al-Qaeda began openly surrendering to the mere sound of their presence. Drones seemed to inject life back into the American public's tolerance for the participation in the GWoT by reducing the risk to service members significantly.[14] Not only did this technology seem to improve the chances of survival for the soldier on the battlefield, but it had several benefits to senior-level leaders and staff managing the missions from their command posts.[15] The drones' video feeds could be securely delivered to the commander's screen, whereby they could assess and determine several factors related to the mission, any of which could further save lives on the battlefield. There is no doubt that such eyes in the

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[13] Ibid., 32.

[14] It is difficult to recall for many Americans, but during the early years of the GWoT, our service members were deploying with unarmored HMMWVs that gave very little protection from the improvised explosive devices (IEDs) that were causing a majority of the casualties. Soldiers are resourceful, but the best many units could do was tie sheet metal to the sides and put sandbags in the floorboards. This offered some psychological protection, but very little by way of physical protection. As the casualty list began to climb, tolerance for the war declined. Drones' capabilities assisted in reducing the safe haven for terrorists planting IEDs. This reduced the casualties and thereby increased the tolerance for the GWoT by giving Americans hope that the DoD could provide greater protection for its service members.

[15] Dige (2017), 880.

sky provided timely information leading to quick-reaction forces (QRF) and MEDEVAC

teams launching substantially faster as the situation on the ground deteriorated.

In fact, several years into the war, one of President Bush's advisors, Eliot

Cohen, stated, "The military is deciding that in the long run, we can do more with

machines than it can do without them."[16] Indeed, the proof-of-concept drones exhibited

to the military opened the door for several robotics solutions to be implemented across

the battlefield to maintain an asymmetric advantage over the enemy.   While drones and

other technology saved countless lives, they also very clearly filled the gaps for many

human limitations; however, as the war continued, there came a corresponding increase

in mission requirements, and with private industry able to produce a technology that, by

the DoD's lights enhanced our war-fighting capabilities, our policymakers, senior

military leaders, and strategists sought ways to increase efficiencies by teaming service

members with technology. As these technologies continued to be introduced into the

military construct, and used with great efficiency, *military units became ever more

reliant on them to function*[17].

To this end, the gap between a human's capabilities and a machine's possibilities

grew aggressively since the first drone emerged in WWII. Seated firmly in the

Information Age where smarter, faster, better, and cheaper reign supreme, technology, in

the form of artificial intelligence (AI), had begun to surpass ambition, which led many to

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[16] Ibid., 65.

[17] Looking forward to Chapter III, I will argue that the rapidity with which drone technology, specifically, was adopted early on led to poor structures that have conflated them with the tool they manage in ways that do not respect them as ends in themselves.

seek ways of granting it additional autonomy. In other words, if the AI could perform

the task "better", why not reduce or eliminate the role the human had? In the military,

this line of questioning led to the proposal of *fully autonomous weaponry*, to include

autonomous drones that could make lethal decisions on the battlefield free of human

intervention. In the next section, I examine the moral and ethical dimensions of

producing and implementing such weaponry.

2.2 AI and the Ethical Responses to Fully Autonomous Weapons Systems

There are varied ethical approaches to the use of AWS in the military. The forces

of private industry interest and military strategy may not be enough to justify its use, and

ethicists—both academic and military—have sought to bring into focus its relevant

ethical stakes. As such, the purpose of this section is to draw out these positions in order

to assess their strength in bringing clarity to whether or not AWS should be adopted.

Much of the current literature outlined below, though not all, focuses on the

utilitarian advantages of adopting AWS (*Section 2.2.1*), but I will argue, also primarily

from a utilitarian perspective, that the strategic benefits these scholars cite are not always

so straight forward (*Section 2.2.2*). It is also important to note, that in the paragraphs

that follow, I employ the term *utilitarian* in a dual sense. From an ethical theory

perspective, much of what I analyze centers on the perceived outcomes and effects of

adopting AWS. On the other hand, when referencing the term from a more colloquial

standpoint, I am generally pointing towards its practical functionality. This dual-use, I

believe, mirrors the literature, which is not only taken up by ethicists but the engineers developing these systems as well.

In drawing out the ethical limitations to AWS's adoption, I will consider the effects from an inward-facing lens, focusing on the subject of the soldier that employs them, as well as an outward-facing lens, in consideration of the civilian populace and common society. The positions I analyze will also briefly address problematic epistemic and legal concerns as well. Though I find many of them quite convincing, I will conclude that given the rapid nature of technological advancement, many of these shortcomings will be resolved (*Section 2.2.3*). In addition, the current discourse mostly focuses its analysis – even ethical analysis – on the *how*, not the *who* of making lethal decisions. As such, looking forwarding to Section 2.3, I will argue that a greater explication of the term *autonomy* is required if we are to target a clear line for responsible development of autonomous systems.

2.2.1 Advantages – Cheaper, Faster, Better

Many would rightly contemplate why any military force would wish to pursue fully autonomous weapons systems. Most forcefully, from a strategic perspective, is considering the reality that war is speeding up, not slowing down. For instance, the sophistication of our peer-competitors' integrated air defense systems (IADS) can detect radar signatures from one location, deploy missiles from an entirely different one, and target anything living within a 1-kilometer radius in the span of a few short minutes. One method of providing intelligence of a military forces' location, to enable such a

timely and effective attack, could be via an autonomous drone. The idea is that those who harness technology's advantages the most may get to maintain their country's sovereignty in a peer-competitive war.

In addition to the idea that a computer can sense, act, and respond faster than humans are the perceived physical and psychological advantages at play on the soldier-level. A machine is not afraid and, therefore, less likely to act out of self-interest. A machine also does not grow tired or weary. In other words, if one takes this position, they claim some of what makes us human makes us the weak component in the equation of war.[18] For example, suppose I have a remotely piloted drone or a manned aircraft, such as an AH-64D Apache Helicopter. In that case, I must consider an aspect called "Fighter-Management" which generally limits pilots to somewhere between 6-8 hours of flying per day contingent upon various factors. If I burn out the pilots, and they can no longer fly, then a senior commander could be limited from executing a vital operation. The fewer humans there are to manage, and the more autonomous drones there are present to act as roving aerial security for ground-vehicle convoy movements, the fewer restrictions operations can be met with.[19]

Building upon the aspects of speed and endurance in light of a peer-competitor is the idea that autonomous drones could *lower the human cost of war*. In Afghanistan and Iraq, coalition forces have held an asymmetric air dominance over the terrorists they are fighting; however, as stated previously, this may not be the case in a peer-competitive

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[18] I intend to explore this thought in greater detail in the next section.
[19] Johansson (2018), 149.

military conflict with sophisticated IADS.[20] From a utility standpoint, unmanned AWS could be flown deep across enemy lines to provide timely and accurate intelligence before being summarily destroyed by an IADS platform. Morally speaking, no humans would be lost, and the cost to replace the drone, both fiscally and in manufacturing time, would be negligible at best compared to conducting the same mission via Blackhawk helicopters inserting a forward-recon team where a dozen soldiers or more could be shot down enroute to the landing zone (LZ). Moreover, if the soldiers survive the crash and are captured, this will require significant additional resources to ensure their safe return. If a drone is lost, it is just a piece of machinery.[21]

Continuing along the utilitarian line is the idea that lowering the perceived human cost to war works to capture public approval more easily if it can be viewed as virtually costless for our side.[22] Going even further, Cernea (2018, 80-81) highlights Ronald Arkin's consequentialist claims that not only does it lessen the risk to our service members, but as technology continues to become more sophisticated, the targeting precision will become more discriminate. As the engineering behind such technology improves, he argues that programming drones to operate in compliance with International Humanitarian Law (IHL) will make them more rational and, therefore, more ethical participants in war than humans.

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[20] Dige (2017), 876-877.
[21] Indeed, in the conclusion of this chapter, I point to the fact that I believe developing advanced AI/ML drones that can conduct limited recon missions for intel gathering, *not human targeting*, is congruent with responsible technological advancement.
[22] Johansson (2011), 283.

Furthermore, if one accepts all or even most of the advantages, they may assume that the next conflict could be fought swifter and with fewer casualties overall. Johansson (2011, 289) claims many people would freely adopt a utilitarian approach under these considerations. Still, if one looks a bit deeper, they may begin to unravel some of AWS's stated advantages.

2.2.2 Complications – Trust, Responsibility, and Assessing the Future

Yet, the positive consequences of AWS are less straightforward than this. As Singer (2009, 315) clarifies, the idea that such technology could make war costless is an "illusion" at best. Lowering the cost should not be an assumed advantage, and as strategy changes to implement more AWS, the fiscal demand alone could undoubtedly increase to an unsustainable point.[23] Such lines of thinking merely serve to disconnect society further from military operations. If war is seen as merely mechanistic, then its brutality also may appear less present to the general public. Undeniably, one of the primary factors precluding countries from entering war is the calculative human cost. If this is removed, who is to say they will not be tempted to enter war more readily?

I would also add one further complication to the idea that the AWS calculus is clear. There is a drawback to potentially lowering the threshold for war when one examines how AWS could be employed. It cannot be assumed that the U.S. would be the only country/actor taking advantage of these systems. Consider a situation where

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[23] Cernea (2018), 80-81.

country A enters the airspace of country B, who they are not formally at war, aims to take out a high-value target, and unfortunately kills some non-combatants in the process. Let us further assume that country B possesses the same autonomous drones and intends to retaliate. This certainly begs the question that if one chooses to proliferate and implement AWS, are they then putting their citizens at greater risk, especially with countries that may not be so morally restricted? Right now, war is "over there". AWS could fundamentally change that.

In addition to putting citizens at greater risk to other countries, AWS could also inadvertently open the door for non-state actors to appropriate this technology for terroristic uses within one's borders, that at this point, would be very difficult to mitigate the risk for. The DoD holds a fiduciary responsibility to protect the citizens within its borders. The second and third-order effects of adopting AWS could make this much more difficult.[24]

Furthermore, Johansson (2018, 149) reports that as AI programs have increased in complexity and efficiency, they have had a correlative increase in vulnerability to being hacked. This suggestion alludes to what could be a significant cyber-warfare security risk at home and abroad. If a drone's threat library could be replaced with one that identifies uniformed service members as "enemy combatants", that would create a

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[24] See the following short video by the Future of Life Institute as a worst-case, yet not infeasible potentiality that could actualize from the proliferation of Small UAS (sUAS) platforms, https://youtu.be/HipTO_7mUOw

very grave situation. How does one explain to someone's child that a hacked flying computer is why they do not have a mother or father anymore?

Now, the above considerations are oriented towards an inward-facing ethical lens of one's relation to technology. In other words, how they affect those they are intended to help, the service member. All of these, save the monetary component, are also outward-facing concerns with respect to adversaries and, particularly, non-combatants.[25] Will the machine engage the wrong target? Where does the level of responsibility fall if it does? Psychologically, how will autonomous drones flying over and within neighborhoods searching out enemy affect the inhabitants of the areas they operate in? As Cernea (2018, 74) reminds us, "it is not the robots that decide to go to war or that must act justly in the aftermath of war."

Additionally, issues of *trust* and *reliability* must be taken into account when considering the use of AWS. While the moral discourses of both academic ethicists and military professionals are dominated by a utilitarian calculus of effectiveness, they are too narrow in their concerns. While I will return later in Chapter IV (*Sections 4.2 - 4.4*) to a broader discussion of trust and reliability in my argument for the adoption of *Mission Command*, one can first see how these concepts relate to the considerations already outlined. Namely, trust is not solely or exclusively moral. Rather, it has its own role in the functioning and effectiveness of military units and its hierarchy.

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[25] Roff & Danks (2018), 2.

Moreover, trust and reliability are also tied into accountability. When mistakes or moral failures occur, a human is held responsible. Today, if a soldier is questioned in a post-op investigation regarding a particular judgment call, they can verbally articulate this, a machine cannot. This is important because it has been suggested that smaller drones could be paired with fire-team or squad-sized elements. The concept of *collective trust* in a team-like scenario takes months, if not years, of dedicated training time to establish between humans in even the most elite units our military possesses. *Collective trust* often requires that one can hold several mental-models of their fellow squad members' potential actions near-simultaneously in the complex environment of war. This trust is gained through consistent proof of reliability. It will be even more difficult for a small-AWS to integrate as a team-member when humans are unable to accurately capture its mental-model in training environments, much less combat. This particular issue is known as the "black-box" problem.[26] In short, greater technological complexity leads to less understanding, which leads to less trust, which leads to a less-efficient military by attempting to place the *personal* aspects of trust in a machine that cannot articulate its decisions or be held accountable for its actions.

There is not only an epistemic gap at the tactical level; but also, one at the strategic level to consider. *Those charged with the responsibility to make decisions about which new weapons are adopted are often those with the least understanding of*

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[26] Ibid., 9.

their inner workings.[27]   It is merely a fact that most of the general officers serving today

spent a majority of their tactical years in the analog world of the 80s and 90s, where it

was an exciting time to own a personal computer, much less hold one in the palm of

one's hand today that has access to more information than President Bush Sr. had in the

White House.[28]

Furthermore, it is not only the soldiers and generals who lack an understanding

of how these machines operate; it is also the engineers. There are numerous epistemic

difficulties related to AWS' operation in novel and complex scenarios. This knowledge

gap stems directly from the fact that, as a human race, we do not fully understand how

neural networks work. A neuroscientist cannot look at a brain scan and recount what the

individual was cognizing, yet engineers are attempting to re-create similar neural

structures artificially. I argue, this is a morally problematic position to start from. It

presumes human beings are just higher-order machines. As I will argue shortly, one can

never get a fully determinate account for how human beings make judgment calls, for

humans do not operate as machines do from mere sets of rules. Humans possess

rationality and judgment that is simply unavailable to even the most sophisticated

machines. Indeed, I argue in the subsequent chapters that privileging human rationality

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[27] See Singer (2009), 256; Also, Department of Defense (2017). *Department of Defense Directive 3000.09: Autonomy in Weapon Systems*: for reference to the most senior leaders at the Pentagon, such as the Chairman of the Joint Chiefs of Staff, being required to approve any autonomous weaponry acquisitions.

[28] They are undoubtedly much better soldiers because of it. Their lack of reliance on sophisticated technology created a soldier that was more confident in their own abilities than that of the machine. They also are able to embrace technology while maintaining the reality that computers fail, and when they do, you need to be able to take over.

and judgment, in light of Kant's perspectives on autonomy and responsibility, via an aggressive implementation of the *Mission Command* framework is the true path to a well-functioning military. Accounting for the less ambitious attempt to advance statistical learning algorithms, there is still a lack of general understanding for what causes machines with that particular engineering to make decisions, and that is unacceptable from the perspectives of trust, reliability, and ultimately, accountability.[29]

Moreover, the aforementioned epistemic and consequentialist concerns are only further compounded by equally valid legal concerns. One must indeed be careful not to equate legality with morality; however, in war, one's rules of engagement (ROE), the international humanitarian law (IHL), and the over-arching Laws of Armed Conflict (LOAC) serve as the markers of judgment for those in the military. Put plainly, in addition to the mere inadequacies of engineering, the international community struggles to ensure the ethical language adopted in LOAC is free of ambiguity. This is an issue of proper framing of boundary conditions for war behavior and is a persistent challenge.[30] *If governing bodies cannot determine precise ethical language for holding human beings accountable under LOAC, then how can it be programmed into a machine?*

For all the arguments of ambiguity in LOAC's language, Lucas (2011, 279) reminds us that some of it is reasonably clear:

> No nation or its militaries may purposively and knowingly develop a weapon over whose potentially indiscriminate or disproportionate destructive capacities they would *ultimately have no control*, and for which *no accountability for mistakes or accidents arising from their use can plausibly be assigned*.

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[29] Cernea (2018) 78-79.
[30] Lucas (2011), 282.

As long as these limitations are not overcome, the level of control, reliability, and accountability will certainly remain in question.[31] To this point, the arguments have solely been a matter of *how* war is fought, I believe achieving a greater understanding in the clarification of *who* should be fighting is what must be determined.

2.2.3 Unresolved

In summation, I have submitted several ethical considerations in favor of autonomous drones and pertinent moral considerations that reveal limitations. Lucas (2011), along with others, takes the position that ethical concerns like those noted above would need to be ameliorated before taking steps towards manufacturing, distribution, and deployment of such systems to the field. Interestingly enough, he is also cautiously confident that in time they can be.[32] Additionally, Johansson (2018, 146) notes that the Human Rights Watch group also believes that robots' ability to discern who and who not to kill is within a decade's reach. Let us further assume that engineers develop a method by which autonomous drones could communicate their actions, that they indeed prove less costly overall, and that something such as the international humanitarian laws (IHL) or Rules of Engagement (ROE) could be effectively programmed into them. I believe this is where the real ethical dialogue can begin to take shape. One cannot count on the idea that this is simply a non-issue given the unlikely nature all of these problems are overcome. If history tells us anything, it is that technology eventually catches up to

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[31] As for the issue of accountability, there is still more to come in this chapter.
[32] Lucas (2011), 274-275.

ambition, or is at least *believed to be*. The question that now remains, *is there substantial moral justification for autonomous weaponry to make lethal decisions free of human intervention based upon the aforementioned advantages?* One philosopher's opinion we have not yet considered is that of Immanuel Kant. It is to his normative works that we now turn for additional insight.

2.3 Kant: The *Prima Facie* Case for the Human

The most concerning moral issue surrounding the integration of AWS is the problem of accountability and proper responsibility-taking. Building on this dilemma from the previous section, I thus wish to explore how *autonomy* is understood from an engineering perspective (*Section 2.3.1)* as well as a philosophical one *(Section 2.3.2)*. In doing so, I believe a sharper contrast can be made between the current literature and the depth required for clearer delineations in the role technology, and those such as drone operators who manage them, should play in future warfare (*Section 2.3.3*). The arguments in the literature attempt to defend what *kind* of autonomy AWS can have; however, I will argue that even at the most technologically advanced levels, *this is just not the same as human autonomy*, which involves freedom, responsibility, and judgment. Before we delve into Kant's logic for why humans are categorically *not* the weakest link in the equation, let us examine some of the varying definitions and dimensions of autonomy as related to artificially intelligent machines.

2.3.1 Machine Autonomy

First, for engineers, there is a distinction between the concepts of autonomy and automatic. An automated system carries out missions that are pre-programmed.[33] It does not choose how to execute the mission; the human operator does. This distinction between self-governance from within and ordered governance from outside will be key to recall with Kant (*Sections 2.3.2 & 3.1*). One example of automation in aviation would be the use of a flight director. If a pilot requires an aircraft to fly from point A to point B, they simply load a pre-planned route and engage it upon takeoff. From there, they utilize the flight director to define the airspeed, altitude, and a myriad of other settings for the aircraft to maintain without the necessity of touching the flight controls. The aircraft will make the inputs required to maintain the set parameters. What it cannot do, though, is adjust very well to seek an altitude that has less headwind in order to obtain greater fuel efficiency. This would require judgment, which the machine does not possess. In short, if one allows the aircraft to continue its pre-programmed mission, it will proceed to fly even if it would run out of fuel 20 miles before reaching the destination. If the system carried some level of autonomy, it could at least *adapt* to the original parameters input by the operator and alert them to the necessity for a route adaptation.[34]

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[33] Cernea (2018), 70.

[34] For clarity's sake, there indeed are certain flight directors that possess capabilities more along the lines of autonomy. The example above is not one of those. It requires significant human monitoring, input, and adjustment to execute one's mission safely.

Within machine autonomy, for drones, varying levels coincide with the amount of human interaction required to complete a given command. The two highest autonomy levels are worth mentioning because they least mirror what we may consider fairly automated. For instance, *supervised autonomy* holds that drones could initiate tasks based on sensory inputs. This type of system is *reactive* by nature and seeks to carry out human-designated commands within precise parameters. *Full autonomy* is the highest level possible. As understood today, humans would input very general commands such as, "Monitor this area for enemy combatants. Send reports on size, compositions, and location. If the size of the enemy force is less than 'x' and there are less than 'x' number of non-combatants greater than 'x' meters away from the target, engage and destroy the enemy combatants."[35] Once the drone takes flight, it then carries out its route prosecuting targets as it sees fit based upon the general commands it received.

Within *full autonomy,* there are yet further distinctions. Roff & Danks (2018, 4-5) point to two individual capacities the drone could possess. The first is *planning-autonomy,* which is simply the ability to independently develop and actualize plans in order to realize the human-given commands. Regarding the previous example, this could equate to determining its own route for navigation. The second distinction is *learning-autonomy,* which provides the drone the capacity to correlate relationships across several contexts and learn in very nuanced ways from past experiences. One such example could be recognizing enemy soldiers have changed their clothing type. This

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[35] Cernea (2018), 70.

would cause the machine to reprogram its target identification library without human intervention.

Even though it is quite remarkable that a machine could accomplish such tasks on its own, one should bear in mind, even with significant ability to accommodate novel environments, these drones are not exhibiting full human-like capacities in planning *or* learning. Roff & Danks (2018, 5) emphasize the fact that they are "unable to understand or invoke broader strategic or tactical factors that might render that same plan irrelevant, harmful, or unethical." This again points to the common worry of reliability and predictability and to the "extent that AWS is unreliable, its use is presumed to be unethical."[36] Returning to the black-box issues of the previous section, even if the drone appears predictable to the developers, there is little reason to believe the service members charged with employing them would develop sufficient *trust*. The level of vulnerability required would go beyond what could reasonably be asked of a soldier.

Assuming the drones in question are capable of engineers' highest learning levels, the most crucial distinction of autonomy remains, *personal-autonomy* or *task-autonomy*.[37] For an artifact to achieve personal-autonomy, it must be a conscious organism capable of freely aiming towards its own *self-imposed* interests. However, to exhibit appropriate task-level autonomy, the drone simply needs to be able to carry out its pre-programmed mission free from human intervention.

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[36] Roff & Danks (2018), 6.
[37] See Cernea (2018), 70-71 for his extended argument in favor of task-autonomy.

Cernea claims the important distinction lies in the performance of the tasks, not the demonstration of having a self.[38] If the relative autonomy granted to the machine is similar to the restricted autonomy of a soldier operating a remotely piloted drone and the outcome is the same, what is the difference? I argue, the difference categorically lies in what makes rational agents wholly distinct from machines, the capacity to freely exercise judgment given their internal positive freedom for enacting their intentionality in the world. The categorical mistake Cernea makes is conflating a human's capacities with that of a mere machine. Machines require external governance by a human for their responsible operation. Humans, on the other hand, are hardwired with the necessary faculties for acting responsibly. For a philosophical insight into *human autonomy*, we thus turn to Immanuel Kant.

2.3.2 Human Autonomy

A foundational component of Kant's philosophy is that autonomy is directly related to human freedom; *to exercise freedom is to act morally, and to act morally is to exercise freedom*.[39] These concepts are intimately interwoven for Kant, and I argue morality and freedom simply do not apply to machines. Kant would seem to agree:

> Freedom, on the other hand, is the capacity which confers unlimited usefulness on all the others. It is the highest degree of life. It is the property that is a necessary condition underlying all perfections. All animals have the capacity to use their powers according to choice. Yet this choice is not free but necessitated

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[38] Ibid., 71.
[39] Rohlf's (2020) *Stanford Encyclopedia* piece on Kant was very helpful in coalescing these concepts of morality and freedom for Kant. See section 5 specifically for more discussion: https://plato.stanford.edu/entries/kant/

by incentives and stimuli. Their actions contain *bruta necessitas*. If all creatures had such a choice, tied to sensory drives, the world would have no value. But the inner worth of the world, the *summum bonum* is freedom according to a choice that is not necessitated to act. Freedom is thus the inner worth of the world. (VE: 27:344)

Sweet (2015, 42) notes that this capacity marks humans off from animals and machines. In other words, rational beings have a unique ability to exercise their *will*. In exercising their will, they also always maintain some sense of self-governance, an ability to exercise their will rationally rather than allowing base desires to guide their actions. Kant states further:

> *Autonomy* of the will is the sole principle of all moral laws and of duties in keeping with them…. That is to say, the sole principle of morality consists in independence from all matter of the law (namely from a desired object) and at the same time in the determination of choice through the mere form of giving universal law that a maxim must be capable of. That *independence*, however, is freedom in the *negative* sense, whereas this *lawgiving of its own* on the part of pure and, as such, practical reason is freedom in the positive sense. (5:33)[40]

Indeed, this *positive freedom* humans possess allows humans to align their will in accordance with the moral law towards informed decisions based on reason and derived from their capacity for reflective judgment. Machines, on the other hand, do not align their will. They do not have a will. It is humans that align a machine's "intent".[41]

This is certainly problematic if one takes the position of a consequentialist focused on outcomes. Outcomes may begin military investigations, but one's capacity

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[40] An expanded discussion of the moral law, duties, and autonomy will occur in Section 3.1
[41] For an expanded discussion of how rational being align their wills in various manners see Kant's *Groundwork of the Metaphysics of Morals*, specifically Section II: "Transition from popular moral philosophy to metaphysics of morals" in the Gregor translation (2008), 61-93.

for judgment is the most heavily scrutinized criterion. It is one's will and intention that are put on trial.[42] As such, to reinforce the notion that personal responsibility is an irrelevant consideration in war is a dangerous precedent; however, this is exactly what is occurring when current literature suggests granting a machine correspondent responsibility and "autonomy" to that of humans. Can one rightly hold a machine *personally* responsible for any actions it commits in war? I would argue we cannot. It is not a person. It is not accountable. A machine is merely performing actions in response to programmed rules that are externally governed. It is humans who are *acting freely* towards self-determined ends.

Lucas's (2014) suggestion is that the issues of responsibility and accountability can be overcome by agreeing to hold those who developed the systems accountable:

> R&D, design, or manufacture of systems undertaken through culpable ignorance, or in deliberate or willful disregard of these precepts (to include failure to perform or attempts to falsify the results of tests regarding safety, reliability of operation, and compliance with applicable law and ROEs, especially in the aftermath of malfunctions…), shall be subject to designation as 'war crimes.'[43]

I am absolutely *for* holding negligent engineers accountable[44]; however, one could certainly imagine scenarios where an unforeseen accident could occur with horrifying effects and strategic implications that the engineer could not have foreseen given the

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[42] This point will be explicated in the famous example of Adolf Eichmann in Section 3.3.
[43] Lucas (2014), 337.
[44] Looking forward to Section 2.4 and the ethical principles that the DoD chose to adopt most recently, the reader will see that the DoD is amenable to Lucas' proposal; however, they offer a an expounded distinction of the various levels of responsibility that must be taken into account, none of which place accountability on a machine.

innumerable novel factors suddenly presented to drones in live combat.[45] Who is held

accountable in those cases?

Another unique aspect of being a rational agent for Kant is recognizing one's

conscience and the relation to its demands. Conscience for Kant is manifested as an

"undeniable", "*a priori*", and "unavoidable" aspect of a human's moral consciousness.[46]

As Rohlf (2020) reminds us, we may not agree on its source. We can even hold different

thoughts about what morality demands; however, we all seem to have an unyielding

grasp that morality applies to us as rational agents. Kant believes that such ground-level

facts about morality are exactly what philosophy should be charged with defending. In

describing rational agents' conscious awareness to this unavoidable demand, Kant states:

> The consciousness of a *free* submission of the will to the law, yet as combined
> with an unavoidable constraint put on all inclinations though only by one's own
> reason, is respect for the law. The law that demands this respect and also inspires
> it is, as one sees, none other than the moral law… An action that is objectively
> practical in accordance with this law… is called *duty*, which… contains in its
> concept practical *necessitation*, that is, determination to actions however
> *reluctantly* they may be done. (5:80)

This built-in accountability serves to remind rational agents of their duties,

responsibilities, and obligations to themselves and others.

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[45] Singer (2009), 196-197. One recent example of such tragedy occurred in 2007 in South Africa when a robotic anti-aircraft gun had a software glitch causing a "runaway gun" incident that the humans were unable to override. By time the anti-aircraft system expended its 500 35-mm HE rounds and ceased its carnage, 9 soldiers were dead, including the commanding officer who originally attempted to shut down the system, and another 14 were seriously wounded.

[46] See Kant, I., & Gregor, M. J. (2008), 5: 32, 47, and 55. Also, Rohlf (2020), Section 5.3 on the Fact of Reason.

2.3.3 Contrast

In re-imagining personal-autonomy as human-autonomy in light of Kant's work,

we see that comparing a machine's capacities to a human's is not much of a comparison

at all. In fact, some engineers have recognized what consequentialists view as

weaknesses may indeed be strengths. To this end, they have pursued research into moral

competence and integration algorithms in order to "focus on the context-sensitive

character of morality and situational judgment."[47] This virtue-based approach would

seek to develop systems that could self-modify their behavioral patterns and habitual

actions in response to specific experiences. The drawback of such advanced technology

at this point is that, as previously noted, such algorithms in use are unable to be audited.

Once the defined rules are set in motion, there is minimal control or transparency that

can be affected on the machine from "outside the box".

Moreover, even if their programmatical shortcomings are overcome, the

machines would still not be *acting* morally in any meaningful sense. Again, machines

lack a conscience, intentionality, self-respect, and, most importantly, *judgment*.

As Schönecker notes:

> There can be meta-rules how and when to apply rules; but on pain of a vicious
> circle or an infinite number of rules, ***there must be a point at which the power of
> judgment takes action without applying a rule***.[48] Computers, however, have
> nothing but rules to work with, that is, nothing but algorithms (and data, of
> course, in regard to which they are applied). If the power of judgment is a
> faculty that does not follow rules, then this faculty cannot be something a
> computer could have. (2018, 80)

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[47] Schmiljun (2019), 102.
[48] My emphasis.

Yet, as already noted, the proper exercise of *judgment* is where the proverbial rubber meets the road for service members in combat. The unique role one fills in military service to their country holds stringent moral demands from the society at-large. These demands entail particular obligations and responsibilities on the service member, which further entail accountability when those actions go intentionally awry. It is not a stretch to assume that it matters *how* the military goes about conducting war. Thus far, my argument is that, for a number of reasons, it also matters *who* is conducting the war. The bottom line is, rational beings have intentionality, judgment, and an "I". Computers do not. *Things that intentionally will another being's death should have an "I".*

Skepticists may counter-argue that demanding a human be, at minimal, "in the loop" unnecessarily hamstrings the military. I unequivocally offer that it does not. What having such a position does is acknowledge there is a moral line. There is a limit to the free-range "autonomy" that a weaponized drone which cannot take responsibility for its actions should be granted. I reiterate that moving in the direction of bestowing machines a correlative level of autonomy as soldiers are in combat, who are subject to the punitive measures of UCMJ and IHL, is the precise wrong direction. Faster and cheaper are not automatic trump cards in the utility calculus and, at the end of the day, every human still has an intentional choice as to whether or not they pull the trigger. There is ample space for pursuing the cutting-edge of technology while holding on to the *centrality of the human-agent* in war and responsibly preparing for adversaries.

Indeed, over the last three years, much has transpired regarding the Department of Defense's research in ensuring the way forward for responsibly adopting AI/ML

technology while still privileging the autonomy of the human agent. It is to an examination of these ethical precepts that we now turn.

2.4 DoD's AI Ethical Framework

Though less than a year since its adoption, the ethical framework the DoD has adopted is significant because it (a) serves as the DoD's formal response to the call for advancing AI/AWS, (b) confirms that the military construct, forged over centuries, should still privilege the centrality of the human agent, and (c) demonstrates that responsibility and accountability are a must in military operations. In the limit case of the drone and drone operator, a combination that collectively acts as a focal point in AI/AWS literature and this thesis, this section serves the purpose of rightly cementing responsibility and accountability in the human agent. In doing so, I argue more explicit lines of demarcation can be made between the human and machine regarding the future development of AI/ML-enabled technology. I will also argue, however, that the DoD's current response addresses one-half of the equation, the machine. Looking forward to the next chapter's work, we can then begin to explore the rapidly adopted structures surrounding the human and their autonomy, through the lens of the drone operator.

2.4.1 Background

Cognizant of the resounding call to establish a firm ethical grounding from which to approach these rapidly advancing technologies responsibly, in 2018, the DoD

established the Joint Artificial Intelligence Center (JAIC).[49] The JAIC was charged with

serving the Joint Force's growing AI/ML needs, but in order to do so, it had to take stock

of the framework that doctrine and regulation demanded the organization operate from.

Reviewing the current literature, *DoDD 3000.09: Autonomy in Weapons Systems*, the

DoD expected a human remain central to the targeting and engagement process, but now

that technology was being called upon by other countries to perform the entire

engagement without a human's intervention, *the JAIC needed to determine whether the

U.S. should follow suit.[50]* As already established, many philosophers, ethicists, and

industry researchers felt it a moral requirement to do so given (a) the relative position of

peer adversaries in this domain, (b) the need for simplified lethal decision-processes to

execute operations more expediently in a peer-adversary environment, and (c) to reduce

the overall cost of war in both monetarily and in human lives.

In pursuit of greater clarity, the SECDEF ordered an independent study by the

Defense Innovation Board (DIB). Charged with leaving no ethical aspect unexamined,

the robust study included:

> …collecting public commentary both online and in person; holding two public
> listening sessions at major universities; and facilitating three expert roundtable
> discussions with dozens of subject matter experts in academia, industry, civil
> society, and the Department. Roundtable participants included Turing Award-

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[49] See https://www.ai.mil for more information on the myriad of AI domains (healthcare, disaster
response, etc.) that JAIC is charged with leading.
[50] Ibid., 3. Furthermore, human-supervised autonomous systems were strictly prohibited from engaging
human targets. From a defensive posture they were to be used for defense of manned installations. From
an offensive approach, only non-lethal force, such as electronic attack could be used against *materiel*
targets.

winning AI researchers, retired four-star generals, human rights attorneys, political theorists, arms control activists, tech entrepreneurs, and others.[51]

Additionally, to address any potential questioning of the resulting principles' ability to be practically applied in both policy and operation, the Department held a table-top exercise (TTX) to rigorously examine how their proposals held-up against malicious uses of AI in warfare.

Ultimately, the study concluded that existing ethics frameworks, value systems, and approaches to AI produced more questions than answers failing to establish an appropriate bar for international norms of responsible use of combat and non-combat AI systems.[52] Given the US's stated and long standing commitments to developing nations, allies, and humanity as a world power largely charged with defending those who are unable to adequately protect themselves, the board determined that the following principles should apply to the development of combat and non-combat AI-enabled systems. They must be *responsible*, *equitable*, *traceable*, *reliable*, and *governable*.[53]

2.4.2 Principles

To the board, *responsible* was tantamount to *human-centered*. In their eyes, humans should retain accountability for the R&D, use, and outcomes of these systems. Specifically, they outlined that the base layer of responsibility occurs in two forms with

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[51] See Defense Innovation Board (2019), "AI Principles: Recommendations on the Ethical Use of Artificial Intelligence by the Department of Defense. Primary Document", 4.
[52] Ibid., 3-4.
[53] Ibid., 8.

respect to "remediation mechanisms for actions" in war, *personal responsibility* and *state responsibility*.[54] Regarding personal responsibility, warfighters and their leaders shall indeed continue to be held *individually accountable* for all violations of the LOAC or the UCMJ while employing artificially intelligent/autonomous systems. Outside the DoD, the U.S. further maintains responsibility to uphold international obligations and rights and, as such, is accountable for any systemic wrongdoing exacted on other states in its use of such systems. Finally, though it is industry-standard to withhold liability of harms against defense contractors developing such products, the board recognized this habit stands to encourage some developers to accept unnecessary risk. They too should be held to a higher standard of responsibility.[55]

In their second proposed principle, to be *equitable* was another way of calling on the DoD to balance privacy and fairness. Many of the predictive and autonomous systems involving AI operate via enduring data collection and refinement. As such, the architectures programmed into the systems should strive to eliminate security breaches while protecting personally identifiable information (PII). "Specifically, DoD should have AI systems that are appropriately biased to target certain combatants more successfully and minimize any pernicious impact on civilians, non-combatants, or other individuals who should not be targeted."[56]

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[54] See Defense Innovation Board (2019). "AI Principles: Recommendations on the Ethical Use of Artificial Intelligence by the Department of Defense. Supporting Document", 28-29.
[55] Recall Section 2.3.1 (Machine Autonomy) and Lucas' suggestion for holding engineers accountable. As we now see, there is a space for this, but it is merely one aspect of accountability to consider.
[56] Ibid., 33.

Moreover, this also requires the systems to be *traceable*. They must address the epistemic gaps that exist in the most advanced forms of AI. The DoD does not wish to adopt technology lacking transparency in operation. If its design, data sources, and outputs are unable to be audited, it is simply unusable in a military context.[57] I argue, this serves to further dissuade industry's abdication of its role in responsibly advancing AI/ML systems.

Given the uniqueness of AI, the DoD also expects the new technology to be rigorously tested for *reliability* in novel test and evaluation (T&E) environments.[58] As systems incorporate greater autonomy and AI, specific respect must be given to understanding the types of emergent properties that could present themselves in adversarial contexts. Likewise, because wireless technology permits extensive layering of weaponized and non-weaponized platforms, possessing a thorough validation and understanding of potential outcomes from several disparate systems interacting with one another towards a common goal is absolutely critical. I believe tremendous potential for risk exists in this domain.

Finally, in cementing the human-centered approach, all of these technologies must be *governable*. This is especially important in consideration of the risks that even the most tested systems could pose. While everyone from defense contractors to generals to ethicists may agree on a system's reliability, re-producing combat-like scenarios will always encounter limitations in testing. I would argue there is no more

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[57] Ibid., 33-34.
[58] Ibid., 35.

unpredictable environment than that of war. As such, there should exist appropriate

safeguards against any non-intentional harm or escalation of force whereby the system

could be immediately disengaged and, later, modified to prevent such future behavior.

Part of combatting such issues on the human side will be establishing and training for an

anticipated *ontology of failures*; consequently, the technology may still fail in

unanticipated and astonishing ways, but at least there will be a proactive mindset

established in the eyes of the operator.[59]

In summation, following 15 months of robust critical study, in February of 2020,

former SECDEF Dr. Mark T. Esper officially announced the formulation of an ethical

framework for AI, one whose implementation at all levels would be human-centered and

overseen by the JAIC while being executed through its various service-specific

components.[60] In adopting such principles, I believe the SECDEF set a clear standard

for the international community: utility will not be the driving factor in pursuing new

technologies. Innovative weaponry, ultimately, should *enhance* and *extend* a

warfighter's capabilities, much like the bow and arrow, rifle, and precision-guided

missiles have done; not categorically change *who* is doing the fighting. Keeping the

agency of conducting warfare central to humans respects the unique faculties we

possess, such as human autonomy and judgment, as strengths not weaknesses. As

Secretary Esper stated this past September in his keynote address at the 2020 DoD AI

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[59] Ibid., 39.
[60] See
https://www.defense.gov/Newsroom/Releases/Release/Article/2091996/dod%E2%80%90adopts%E2%80%90ethical%E2%80%90principles%E2%80%90for%E2%80%90artificial%E2%80%90intelligence/ for
corresponding press release.

Symposium, "Technology may constantly change, but our commitment to our core values does not."[61]

2.4.3 Outlook

The JAIC's newly confirmed ethical framework addresses the internal motivation from which future advanced AI/ML technology should be researched, developed, and implemented quite well. It is a promising start to harnessing this technology in ways that acknowledge a machine's limitation in judgment, responsibility-taking, and accountability. In doing so, I believe the DoD has a proper eye towards the future and is primed to address the perspective of how such machines as drones can advance responsibly.

However, these principles primarily work to inform machine development. I believe there is still significant room for understanding how autonomy, judgment, and responsibility-taking are viewed from the perspective of the human operators. Indeed, where there is no shortage of perspectives on the future of the machines themselves, there is a critical gap examining the human operators who employ them. The next chapter thus aims towards filling that gap by examining the rapidly adopted structures surrounding drone operators, and how well they privilege respecting autonomy and responsible action, and the dangers that can arise in not doing so.

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[61] See https://www.defense.gov/Newsroom/Speeches/Speech/Article/2341130/secretary-of-defense-remarks-for-dod-artificial-intelligence-symposium-and-expo/ for the complete address.

2.5 Challenges & Conclusions

  The critical review of this past decade's research into autonomous weaponry, advances in AI/ML, and what it could mean for the future of warfare both ethically and operationally have revealed several concerns for the warfighter, the government, and civilian non-combatants. I have argued that mere utility does not instantiate a moral requirement to adopt autonomous weaponized drones that can make lethal decisions free of human control. While the strongest case from a consequentialist position would seem to be that it speaks to the duty to limit human suffering in war, as a world superpower, the U.S. possesses an entrenched responsibility to ensure that (1) this is actually the case, (2) that insuperable disadvantages are not being reinforced to civilian non-combatants, and (3) that such a paradigmatic shift in warfare aligns with the ethical values the military represents. The standard the DoD sets will likely be the standard that its allies adopt.

  I hope that in re-casting the currently narrow debates surrounding AWS and drone operators from a perspective of autonomy and responsibility-taking, the reader was convinced there are indeed two sides to every coin. For instance, while it appears that autonomous lethal drones *could* limit human suffering on the battlefield, they also stand to potentially lower the bar for entering war in the first place by creating the façade of a "costless conflict". A crucial safeguard from entering war is calculating the human cost. What happens when we begin to remove that? These machines would not replace humans altogether, and more conflicts certainly entail broader suffering.

How is this suffering realized? That is another essential question to understand. With autonomous drones battling it out in the skies or surveilling urban cities for potential enemy combatants, it is not just warfighters that stand to be adversely affected by their presence; it is potentially even more so, the civilian populace. There could be severe enduring consequences of a generation of peoples growing up in a world where drones make the call for who lives and who dies. The mental suffering and feelings of helplessness could reach a height not seen since the first atomic bomb.

Moreover, I argued that despite controlling for current epistemic technological shortcomings, the potential for hacking, and monetary considerations, the greatest danger AWS poses is that it stands to paradigmatically change *who* is waging war. In contrasting Kant's understanding of autonomy with varying industry degrees and definitions, one is quickly reminded that a machine's inability to judge, self-govern (possess a will), and *take responsibility* for the "choices" it makes removes it from any proper consideration as a moral agent. Kant thus exposes current ethical literature for superficially seeking to understand the complexity and nature of autonomy. The U.S. DoD most recently recognized this superficiality by being the first nation *in the world* to adopt AI ethical principles that seal the human agent's centrality, despite China and Russia's open attempts to develop and employ full-AWS with minimal moral consideration. In their primary document, the DoD explicitly stated that it is humans who must remain in control, accountable, and responsible when it comes to employing weapons on the battlefield. Furthermore, in September, at the 2020 DoD AI Symposium, the JAIC responded to industry's technological push by committing to

taking greater responsibility and ownership of *pulling* technology in a clearer direction. Thus, through greater transparency and understanding of the DoD's requirements, they can ensure the human agent maintains its centrality.

The upshots of these more recent developments in the ethical deliberation regarding autonomous technology are numerous. First, they remove any conflation of moral status between humans and machines, properly situating responsibility, trust, and accountability where it should lie, with the human agent. Second, they only limit technology's advancement by ensuring a human retains ultimate governability over the weapon system. If anything, the defined ethical principles serve to *focus* research and development in a manner that could lead to faster adoption of critical technologies. Within the scope of potential uses for drones, I still foresee substantial deliberation surrounding how they could work positively in a team environment by being allowed to operate *defensively* against materiel targets or as early warning and threat prioritization assets. Also, in the opening stages of a peer-adversary conflict, AI/ML enabled drones could substantially reduce the threat to aircrews and ground elements by gathering critical intelligence leading to more informed decision-making by senior military commanders. This intelligence gathering capability and rapid consolidation of data alone could greatly assist the military where it typically witnesses some of its most astonishing casualties.

Finally, although this chapter's purpose has been to argue for the unique moral worth that humans possess in virtue of their rational judgment capabilities over machines, there remains the fact that human judgment is not perfect. Any human is

susceptible to the dangers of making a grave moral error. While war is not and never will be a zero-defect environment, if the military is to commit to the centrality of the human agent, then this indeed entails a *collective responsibility* among military leaders to ensure drone operators are afforded the greatest possibility for exercising their autonomy in a way that ensures they can retain their dignity. The goal must be to live with one's actions in war and to have executed one's duties with tremendous ethical scrutiny. With that in mind, we can now shift the focus from the machine to the human by taking stock of how the current structures surrounding the operation of drones in the GWoT may limit the ability for those operators to truly take responsibility and what the dangers of such a construct may be.

CHAPTER III

PRINCIPLE AND STRUCTURES: THE DANGERS OF NOT TAKING

RESPONSIBILITY

Those few who were still able to tell right from wrong went really only by their own judgments, and they did so freely.[62]

Realigning the perspective from the machine to the human, this chapter examines the function of drone operators and argues the issues at play in such roles should also be understood in the context of autonomy and responsibility. The U.S. military, like those throughout history, has recognized that the autonomy and responsibility of individual soldiers is essential to the success of its endeavors. It is essential because first and foremost, war is chaotic, and many times requires significant moral decisions and *human judgment*; decisions that are irreducible to zeros and ones.[63]

Before turning to the specific situation of the drone operator, I will lay out, first, the ethical insights of Immanuel Kant (*Section 3.1*), perhaps foremost amongst philosophers as a thinker of autonomy and responsibility. This section will bring to light the structures of autonomy and responsibility that will then be used to assess drone operators (*Section 3.2*). Such assessment, I will argue, reveals that in the quest for outsourcing greater autonomy to machines (*as exhibited in Chapter II)*, there has been a

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[62] See Arendt, H. (2006). *Eichmann in Jerusalem: A Report on the Banality of Evil*, 330.
[63] See previous chapter regarding my argument for the centrality of the human agent over that of computers when making lethal decisions. It is here that I first introduce Kant's thoughts regarding conscience, autonomy, and judgment.

simultaneous diminishing of the operators' autonomy. Additionally, it will be my argument that the bureaucratic structures inherent to the existing drone operations system, in fact, conflate the human operator with the tool, rendering them faceless and, thus, severely instrumentalized.

Furthermore, this instrumentalization stands to treat the operators as mere means to an end. However unintentional this may be, it is quite dangerous, and leaves the operator unable to adequately take responsibility for their actions. The final portion of this chapter (*Section 3.3*) then examines the dangers of not being responsible in a historical account of Adolf Eichmann, one of the senior leaders of the Nazi Party during World War II. It is here I will demonstrate how poor structures that support being treated as means can also tempt those within its confines to treat themselves as such. In doing so, I argue that one begins to abdicate their responsibilities, operate as a mere functionary for those above them, as well as cease to hear the call of their conscience, which results in several potential harms to themselves and others. By the same token, I argue that such a reality is boundless in its reach.

By establishing the inextricable link between autonomy and responsibility (*Section 3.1*), the current limiting structures to drone operators' autonomy (*Section 3.2*), and historically, the dangers of how these structures can prevent one from taking responsibility (*Section 3.3*), I hope the reader will be compelled to see that, much like the effort put into the ethical framework of responsibly adopting AI/ML technologies (*Section 2.4*), there is a concurrent requirement from the human perspective as well.

Military leaders must provide a more robust framework if they are to respect and empower the autonomy of soldiers while balancing the challenges of integrating advanced technologies responsibly. This is the work of the final chapter. For now, we return to Kant.

3.1 Kant: Autonomy and Responsibility

For Kant, in order to live a good life, one must be capable of taking responsibility for their actions. The implication of this statement is that they are *free,* or autonomous, to do so. Thus, in this section, I intend to explicate the philosophical components that make Kant's perspective on autonomy and responsibility so compelling in light of the fact that his notions are intimately embedded in his moral philosophy.

In order to gain a thorough grounding for Kant's notion of autonomy, we will first introduce his thoughts on the moral law, the *Categorical Imperative*, and the duties that our human reason places on us in living accordance with our own precepts[64] (*Section 3.1.1)*. Next, I will expand on the duties one has to their self and others, and what this means for living responsibly by giving an account of Kant's second formulation of the *Categorical Imperative* (*Section 3.1.2*). Following this account of practical living for Kant, I will then tie the previous two subsections together by clarifying the limitations and horizons that autonomy provides in living one's life

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[64] Read as: responsibilities

responsibly *(Section 3.1.3)*. Finally, I will reinforce generally how one's autonomy,

dignity, and responsible manner of living can be diminished (*Section 3.1.4*) in

preparation for a more specific account (*Section 3.2*) as applied to the structures

surrounding the drone operator.

3.1.1 Giving the Law to One's Self

In Kantian ethics, it is said that there is no greater good than a good will.[65] One's

inner motives, or intentions, for action are what hold moral weight, not the outcome tied

to the action. The emphasis on one's moral actions is the source from which they flow,

the individual. It is important to understand that Kant believed our capacity for living

life morally need not arise from any external source, but already resides inside of each

one of us. The unique capacity he was referring to, is reason.

Endowed with this capability, Kant saw that we could utilize reason in such a

way as to recognize the *moral law* residing within us. The moral law, which guides our

conscience, functions by setting the duties necessary to enact a good will. Duties, for

Kant, are seen as "the objective necessitation of action."[66] They are a command. In

essence, one *must* act in accordance with one's precepts by their intention alone, free

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[65] See Kant, I., & Gregor, M. J. (2008), 4:393.
[66] Ibid., 4:439. See also, 5:88 in Kant's *Critique of Practical Reason* where he states, "The majesty of duty has nothing to do with the enjoyment of life." Here he means to further draw out that his position is not a utilitarian's focused on maximal happiness. It is not that one's happiness lacks importance in life, but in living in accordance with one's moral duties, we must understand that the moral action will often not lead to pleasant or desirable outcomes. Despite this, our duty remains.

from desires and basal inclinations if they are to act morally. Kant submitted that

humans often did not act in accordance with reason, however, stating:

> …Being a creature and thus always dependent with regard to what he requires for complete satisfaction with his condition, he can never be altogether free from desires and inclinations which, because they rest on physical causes, do not of themselves accord with the moral law… (5:84)

Thus, given our propensity to act out of self-love or other motives than good will, Kant

needed to provide a concept from which to measure our accordance with the moral law.

This concept is known as the *categorical imperative* and is central to his moral works.

The categorical imperative equates directly to a command and is proposed in

several formulations. The first formulation provides the most basic standard for

measuring one's accordance with the moral law, "act as if the maxim of your action

were to become by your will a **universal law of nature**."[67] In other words, take the

action you intend, determine the guiding principle for such action, and finally question

whether it would be contradictory to adopt such action as a universal law. If the

application is reasonable, then it holds up morally; if not, then it is immoral. Put plainly,

one must not provide exception to themselves in recognizing the standards that the moral

life demands. For example, a college student intends to cheat on a difficult final exam

(action) in order to avoid failing a class and disappointing their parents (motivating

principle). If this student were to ask whether or not such an action could be applied

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[67] Ibid., 4:421. Also referred to as *the universal imperative of duty*.

universally, they would very easily see its contradictory nature. If it was acceptable for everyone to cheat, then the integrity of the academic structure would not be sustained.

Moreover, the example provided above is helpful in understanding the basis of autonomy for Kant. Kant believes that to act autonomously is to *give the moral law to one's self* by determining the maxims by which one will live.[68] These maxims or principles should be in accordance with the moral law. In the example above, if the student uses their rationality to properly determine that cheating on an exam is objectively immoral, and thus chooses to act according to their moral duty regardless of the consequences, then they are acting autonomously. On the other hand, if the student chooses to cheat, then they have given in to self-love as a motivating factor and are thus acting heteronomously. In expanding upon autonomy in relation to heteronomy, Kant says:

> *Autonomy* of the will is the sole principle of all moral laws and of duties in keeping with them; *heteronomy* of choice, on the other hand, not only does not ground any obligation at all but is instead opposed to the principle of obligation and to the morality of the will.[69]

In other words – when we act in accordance with heteronomy, which we often do, we are not living responsibly.

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[68] Ibid., 4:447.
[69] Ibid., 5:33.

Finally, in the first section of his *Groundwork*, Kant states that adhering to the demands of the *moral law* is simply a matter of what it is to be a good person and he submits:

> …It would be easy to show how common human reason, with this compass in hand, knows very well how to distinguish in every case that comes up what is good and what is evil, what is in conformity with duty or contrary to duty, if, without in the least teaching it anything new, we only, as did Socrates, *make it attentive to its own principle*; and that there is, accordingly, *no need of science and philosophy to know what one has to do in order to be honest and good*…(4:404)[70]

For Kant, then, one must recognize that they always are in possession of this moral compass and need merely turn inwardly to discover the maxims for living. Living according to such laws, motivated by the intention of a good will, is just what it means to live responsibly and *autonomously*.

3.1.2 Means, Ends, and Living Responsibly

In the first formulation of the categorical imperative, one begins to see that the moral law sets duties not only to ourselves, but to others as well. Kant builds upon this innate notion by focusing on our specific duties to ourselves and fellow humans in the

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[70] Italicization is my emphasis. In reference to '*make it attentive to its own principle*' and looking forward to Chapter IV, Kant expands on this notion in his Doctrine of Method in the second Critique which outlines his process for approaching moral education. It is this guiding principle which will form the foundation from which I will argue for the practicality and feasibility of implementing the *Mission Command* framework.

second formulation by clarifying it as a responsibility to see after the welfare of others.[71]

The formulation is as follows:

> So act that you use humanity, whether in your own person or in the person of any other, always at the same time as an end, *never merely as a means.* (4:429)

By way of clarification, Kant means to draw out the importance of *respect* in our relation to others and ourselves. To see someone as an end in themselves is to regard them, inasmuch as we do ourselves, as lawgiving individuals.[72] In other words, we are cautioned from elevating our own worth above others in our actions. In Kantian ethics, morality and humanity, are that alone which have *dignity* in the world:

> But the lawgiving itself, which determines all worth, must for that very reason have a dignity, that is, an unconditional, incomparable worth; and the word *respect* alone provides a becoming expression for the estimate of it that a rational being must give. *Autonomy* is therefore the ground of the dignity of human nature…(4:436)

As one can surmise, humans, thus, have unrivaled *intrinsic* moral worth for Kant and should be treated with great care and respect, never merely as a faceless tool for one's instrumental use. More pointedly, Kant says, to treat someone or one's self as a mere means, is to strip them of their inherent dignity, and undermine their capacity to enact their responsibility. This points to the interrelatedness of the moral life. One's moral

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[71] Ibid., 4:416; Kant also refers to the second formulation as *pragmatic* and takes care to note the sense in which he means by referring to how we prudently compose history. History is told in such a way that it is not mere facts, but *instructive*, so as to ensure the current world looks after itself better than it did in previous times.
[72] Ibid., 4:434.

decisions do not occur in a silo and one's lack of taking responsibility for the demands set by the moral law can certainly impinge on other's autonomy.

Generally, this occurs when we violate what Kant calls *perfect duties* to the moral law.[73] A *perfect duty* puts a specific requirement on the human agent to discern a maxim by which to always or never perform a particular action. In relation to others, Kant's famous example for how one can undermine another's autonomy and violate a perfect duty is with a *lying promise.* For instance, if you come to me and ask for 50 dollars to cover your electric bill promising to repay me in full, but already know that you are not actually going to be able to pay me back, and I decide to loan you the money, then you have undermined my autonomy and merely used me as a means for avoiding a poor consequence. However, if you had told me ahead of time, "Look, I am not going to be able to pay you back. I'm just not," then maybe I would have made a different decision. As it stands, by withholding such information, and undermining my autonomy, you were both not respecting my dignity as a fellow human being as well as keeping me from being responsible.

Additionally, we have *perfect duties* to ourselves, of which in violating them, we also choose to not act responsibly. Kant provides the following example:

> Someone feels sick of life… but is still so far in possession of his reason that he can ask himself whether it would not be contrary to his duty to himself to take his own life. Now he inquires whether the maxim of his action could indeed become a universal law of nature. His maxim, however, is: from self-love I make it my principle to shorten my life when its longer duration threatens more troubles than

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[73] Ibid., 4:422-423.

it promises agreeableness… It is then seen at once that a nature whose law it
would be to destroy life itself by means of the same feeling whose destination is
to impel toward the furtherance of life would contradict itself… and thus that
maxim… altogether opposes the supreme principle of all duty. (4:422)

Kant wants to make clear that responsible living and autonomy are not inseparable

concepts. To enact a more moral world, we must respect ourselves and others always as

ends through the *autonomy* of our will. Making a lying promise or committing suicide,

as examples, are always in direct contradiction to that aim.

3.1.3 Autonomy and Freedom

Again, *autonomy* itself is the "ground of the dignity of human nature" for Kant,

and if one is to understand it fully, he says one must perceive its inextricable link to

freedom.[74] Kant submits there are two manners in which to understand freedom of the

will. The first he understands as "that property of such causality that it can be efficient

independently of alien causes *determining* it."[75] This is merely freedom in the negative

sense. In other words, freedom *from* external constraints.

While Kant certainly recognized the importance of being free from external

coercion, he saw it as less fruitful unless cognized through the sense of the *positive*

freedom that flowed out of the original definition given above. This is positive freedom

to give the law to one's self. Kant goes on saying:

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[74] Ibid., 4:436.
[75] Ibid., 4:436.

Natural necessity was a heteronomy of efficient causes, since every effect was possible only in accordance with the law that something else determines the efficient cause to causality; *what, then, can freedom of the will be other than autonomy, that is, the will's property of being a law to itself?* (4:447)[76]

In enacting this characterization of autonomy, Kant is then able to solidify the appropriate chain by which to conceive of autonomy, responsibility, dignity, and freedom. Kant states:

With the idea of *freedom*, the concept of *autonomy* is inseparably combined, and with the concept of autonomy the universal principle of morality[77] which in idea is the ground of all actions of rational beings, just as the law of nature is the ground of all appearances. (4:452-453)

As one can see, to be autonomous is fairly nuanced and layered, yet it mirrors the intricacies of just what it is to be human.

However, for many in the military, there is a certain strangeness of discussing autonomy in its application. I believe this hesitancy is bore from the term's colloquial use in which it is often conflated with liberty. Liberty is very similar to the negative sense of freedom Kant refers to, from external constraints, but is quite liberal in its account of promoting one to live and act as they please according to their wishes and desires. Kant's version of autonomy rejects this notion. Certainly, if this is the position one understands autonomy from, it would not seem to fit the disciplined life of a soldier. In tying together Kant's account of the autonomy of the will via adherence to the moral

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[76] My emphasis.
[77] Referring to the categorical imperative from which we understand the link to our duties and responsibilities to ourselves and others.

law that one gives themselves in order to promote the inherent dignity and value of humanity through one's moral duty, we can now understand that it is not the freedom to simply do as one wishes but is necessarily bound to guide one's moral acts away from mere self-love.

Additionally, another sticking point I believe some inaccurately attribute to Kant, and that I just alluded to, is this confusion that autonomy is solely individualistic, but as demonstrated in the previous subsection, it is clearly not. Much like in the military, it is a move away from the self and *towards others*. It is about the community, and the content of being autonomous, is just what it is to be a good person; a good person that is fully realizing their human capacities by exercising their judgment *when necessary*. Indeed, if one's autonomy is permitted to fully develop, and we are very moral in our daily lives, then we are someone who treats other human beings as ends, not mere means. One simply cannot separate the concepts. Autonomous people treat others as ends. That is the law you give.

Decisively, Sweet (2015, 54) drives the point home that autonomy and living the practical life for Kant are not without bounds. She states:

> There is a profound *phenomenological aspect* to Kant's account of practical life, one that discloses to us the idea that our participation in the natural order *both limits our freedom and provides its horizon.*[78]

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[78] My emphasis.

For those in the military then, exercising one's internal freedom does not mean that the military must have no rules or that rank holds no weight in the conduct of one's daily life. What it means is that rules should be adopted responsibly to enable a more moral world. The military, and those within it, need to have a clear understanding of the motivation for the principles from which they operate. Military organizations must discuss appropriate external limits and constraints for good military order and discipline while respecting the dignity of every soldier and leader as well as remaining vigilant in the avoidance of undermining other's autonomy, thereby preventing them from carrying out their lives responsibly.

3.1.4 Autonomy Diminished

Finally, I believe it is important to discuss the harms associated with treating someone as a means and how this could come about in the military construct. As stated before, in undermining another's autonomy, we strip them of their basic human dignity and their ability to live life responsibly. In the military, I believe this is most apt to occur in structures that provide little opportunity for one to exercise their judgment despite the very real responsibility they have in carrying out their military duties.[79]

In Chapter II, I argued that the appropriation of the term autonomy with reference to machines was a dangerous precedent to set as it stood to reduce the

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[79] This will be demonstrated in the limit case of Drone Operators in the following section.

perception of human autonomy with that of computer algorithms. In the section that follows, now armed with a fuller account of Kant's thoughts of autonomy as well as the previous discussion of human judgment (*Section 2.3*) I ask the reader to consider whether or not the drone operator's autonomy is in fact being diminished.

In brief, *do the structures conflate the rational agent with the tool they operate? In the advent of 21ˢᵗ century technology, do the bureaucratic structures present treat the operators as assembly line workers, cogs in a machine, and mere means to an end?* My argument will be they do and, that in undermining their autonomy, they are thus precluded from being responsible for their actions. More directly, I will argue that their external environment is limited in such a way as to inadvertently restrict the outward expression of their internal autonomy by rendering them faceless in their day-to-day operations. Also, I ask the reader to consider whether the account given in the following section demonstrates the harm of reinforcing to an individual that their autonomy and judgment is not worthy of respect. I argue that this point is significantly over-determined, and that it has already led to soldiers abdicating their responsibility for their actions, at times resulting in an unraveling of character that has recently been coined, *moral injury*.

In conclusion, I would be remiss if I did not acknowledge that certain structures and climates in some units today have led to the silencing of many soldiers' concerns who have been marginalized, forgotten, and swept under the rug. These conditions have prompted the Secretary of the Army and Chief of Staff to re-prioritize the Army's efforts

and adopt a robust "People-First" campaign. As Kant notes, violating another's human dignity does not always have to occur *in extremis*; it can happen in the mundane daily routines and standard operating procedures that are adopted.[80] Much like Kantian ethics, the "People-First" campaign means to draw all leaders and soldiers back to their duties and obligations to themselves and others. As Kant makes clear, our duties to others as ends in themselves should result in a conscious effort and attitude to exercise due care towards the welfare of those around us.[81] We must be vigilant in seeking out where our actions do not align with such demands.

Finally, it unfortunately should come as no surprise that after two decades of perpetual deployments and high operational tempo, there have been issues of prioritizing people when the mission has been unceasing. In an effort to keep up with the rapid pace of technological change and new conflicts, many procedures were adopted out of utility to ensure the mission was accomplished. However, as the missions wind down, I see no more perfect time to take stock of whether or not the status quo is one that should be perpetuated. With drone operators' missions and personal responsibility only likely to expand in the future, it is even more critical we pause to understand how their integration across the force has fared with respecting their judgment, dignity, and autonomy.

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[80] See Kant, I., & Gregor, M. J. (2008), 4: 430, for an example of how lying and using another to achieve one's end violates the dignity of the other.
[81] Ibid., 4: 431.

3.2 Critically Evaluating the Structure of a Drone Operator's Existence

The purpose of this section is to bring sharper contrast to the life of a drone operator, in light of a more expanded understanding of *human autonomy*. While, at face value, many in the military may judge a job that allows one to tap into war remotely as preferable, I will demonstrate that for several reasons it is limiting in terms of respecting the dignity, judgment, and rationality of the individual. In this demonstration, I will explore many ethical considerations *(Section 3.2.1)* such as the reciprocity of risk, honor, target validity and vulnerabilities, as well as the psychological toll these structures can manifest by limiting the operators' responsibility-taking capacity, and thus, essentially treating them as mere means to an end. By bringing the structural limitations of this techno-centric career field to the surface, I will also draw out its barriers to trust, open communication, and personal responsibility which are critical to well-functioning militaries *(Section 3.2.3)*. Furthermore, the totality of these structures has led to *retention issues* for the DoD *(Section 3.2.3)* and some operators' abdication of personal responsibility when the promise of improvement is not realized. Finally, this section serves as a segue to a more protracted explication of the dangers of undermining one's autonomy *(Section 3.3)*.

3.2.1 Moral Considerations

By way of context, I wish to offer a brief personal perspective as a military officer who spent nearly a year in Afghanistan working alongside and managing drone operations. To be candid, most days while deployed, I did not spend a single second wondering about the operator behind the drone. When we talked of drones, it was about the instrument itself, not the person. We recognized their support personnel from the launch and recovery teams and would even thank them when seeing them around the small outpost for their outstanding work in keeping their aircraft flying, but it just so rarely entered my stream of consciousness that there are actual people somewhere flying these things. I clearly knew that was the case, but they were out of sight and out of mind.

As it turns out, being out of sight and out of mind has led to multiple issues for our drone operators through the years. To begin with, though they may digitally be only inches away from the battlefield when looking at their screens, a solid majority of the operators are back in the United States and elsewhere conducting war remotely. Most of their days mirror something like waking up in their bed, having breakfast with the family, stopping for a coffee on the way to work, waging war for an 8–12-hour shift inside a small room with their flight controls and computer screens, then going to pick up groceries on post before driving to their kid's soccer game. On its face, that does not sound half bad, but *how do the operators judge these structures*?

As Gregory explains, for many of the drone operators, there is first a struggle in identifying as "warriors" in the usual spirit of the term.[82] After all, their maintenance and support personnel are required to deploy, even the civilian contractors that are non-military, but the operators themselves are not, necessarily. Part of "going to war" and serving honorably has generally required just that, *physically relocating to the warzone*. In the recent past, combat could be waged in no other way than being present in the air above the battlefield or on the ground itself to carry out one's military duties. This base fact ensured for thousands of years there was some *reciprocation of risk* involved in fighting. For the drone operator, the extent of physical risk level is now virtually non-existent.[83]

Furthermore, this overall lack of risk and violation of previously understood standards for honorably serving in wartime has led some to label the practice of drone warfare as *unfair*. They point out that the operators' physical distance from the zone of conflict could have significant second and third-order effects on anti-American sentiment for years to come.[84] Such sentiments bring up another question related to carrying out war from home. *Should drone pilots, on American soil, engaging targets in a warzone be considered legitimate combatants?* According to Walzer, for a military

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[82] Ibid., 206.
[83] This will hold true so long as their status as *legitimate combatants* within U.S. borders is not leveraged to justify a retaliatory strike. I, unfortunately, do not have the adequate space with which to address this problematic point in a more expanded form, but I do briefly address it below and it is certainly critical to not overlook.
[84] Johansson (2018), 147.

member to be considered a combatant, they merely need to be engaged in the war/conflict.[85] Drone pilots certainly meet this criterion when they are physically employing their equipment. As a distinction, when any other soldier is deployed, it is clear they are a combatant; however, parsing out when this applies to drone operators is a bit trickier. Are they only combatants when they log on to their control stations? What about when their spouse is driving them to their place of duty? After all, some of the highest-level strikes carried out on terrorists often occurred when they were traveling from one place to another, not actively oppressing civilians. Could the same reasoning not be levied against the military with similar technology? By conducting war from inside the borders of the U.S., especially as the primary locations of drone operations have become more transparent to the public eye, it would seem it is more than the troops' risk that should be considered.

Moreover, the principal concern raised by these issues is that classically understood definitions of war and combat are being re-written. For decades, war has been "over there." Whether one is a service member or civilian, war is always "over there", and tomes have been written about the psychological difficulties service members face when returning from war. Generally, it can be described as a transplant from one world to another. It is akin to a culture shock, but more jarring. Often, in those first few months back, it requires reminding one's self they are no longer "over there."

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[85] Walzer (2015), 146.

It is figuring out how to sleep comfortably again. It is learning how to compartmentalize the past in a healthy way in order to carry on with the day. The interesting thing is, despite this adjustment period, there are still clear lines assisting in the psychological transition. Drone operators have a much different setup psychologically, though. Within the same 24-hour period, they must stumble between engaging the enemy and handling their duties at home. Also, if they have a "bad day" or a mission goes awry, due to the classification of their operations, they cannot simply talk through it with their fellow soldiers after work. For the most part, they just return home.

There is a further underlying issue to returning home and that is understanding what "home" is. Though drone operators in the USN and USAF are primarily officers that are a bit older and more than likely have established families or spouses to support them, those in the Army could be 18-year-old junior enlisted soldiers that live in a barracks room and have little to nothing to go back to at the end of the day. Who is ensuring these soldiers are taken care of?

To be clear, what this structural setup entails has recently been found, in many cases, more emotionally affective than being a soldier on the ground.**[86]** For aviators in manned aircraft, one only briefly lingers over a site following an engagement.[87]

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[86] Johansson (2011), 285. This aspect took some considerable humility on my part in order to accept it, as I can imagine most servicemembers would when initially reading that sentence; however, it is something that needs to be considered if we are to recognize the difficult circumstances their job demands.
[87] This is not a universal claim, but it is the norm. Several pilots have experienced lingering over the site to confirm BDA, especially AH-64 pilots. However, the scopic regime associated with the life of a drone operator demands their extended focus post-engagement.

However, drone operators often spend days following their intended targets to learn their

patterns of life. On heavy engagement days, they spend significant time loitering over

the target areas witnessing and taking part in killing dozens of enemy combatants. The

claim may be well-grounded that it is easier to kill from a distance, but to those

operators, it is much less like a video game than many outside ethicists wish to ascribe it

to. Every day they are on mission, hours are spent viewing high-resolution imagery

while taking inventory of maimed humans, some of them not always the enemy.[88] They

understand this is real life, and they know that if they get it wrong, there is no bringing

that person back.

3.2.2 Barriers to Trust, Communication, and Responsibility

As Gregory claims, understanding the impacts of the various *scopic regimes*

drone operators are surrounded by is key to examining the unique nature of their chosen

career fields, and I agree.[89] I would further argue understanding these structures from

the perspective that *proper military function rests on a moral foundation, trust,* is

critical. Also, for trust to function accordingly, all parties must be able to exercise their

judgment responsibly, free from undue pressure.[90]   Again, I find it pertinent to contrast

manned-aircraft pilots to those who operate drones. For example, Blackhawk Air

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[88] Gregory (2011), 198.
[89] Ibid., 191.
[90] For reference, recall Kant's perspective (*Section 3.1.3*) on the interplay between negative and positive
autonomy and the link it has with respect, dignity, and being able to take responsibility.

Mission Commanders (AMC) own the mission once they are airborne. The Task Force

Commander and the Ground Force Commander *trust* them to carry out the mission, as

briefed, and exercise their judgment *where necessary* to call pertinent audibles. Of

course, they are required to report back any critical events, but if the mission takes an

unexpected turn, they are trusted to make the judgment call.

The situation is quite different for the drone pilot. Though most people who

work with them could not point their faces out in a picture, their world is *hyper-visible,*

filled with layers of those watching their every move.[91] For starters, they have their

commanders who might be over their shoulders giving their opinion during a mission.

Next, because almost any senior-level leader with an appropriate clearance can enter the

secure chat and video feeds, anyone remotely involved with the mission can personally

chime in their thoughts for whether a target should be engaged. This lack of control and

unhindered access to pilots during missions is dangerous on many levels. As a former

drone pilot recalls in P.W. Singer's *Wired for War* (2009, 336):

> 'Ninety percent of the time you don't know who you are talking to… The beauty
> of it is anyone can sign in and ask for information or mission help. But the
> danger is that anyone can sign in and ask for information or mission help.' This
> can create a free – for – all, which sometimes throws military hierarchy into a
> tailspin.

Moreover, this inability to communicate clearly and *establish trust* in a chatroom

from multiple locations worldwide obviously poses persistent dilemmas to the operator

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[91] Ibid., 194.

when attempting to make sound decisions from reason. Another operator recounts that

waging war via chat was overwhelming because he regularly lacked a proper

understanding of the *identities* of who he was addressing. Often, he did not know

whether he was talking to a Private or a Colonel, and the anonymity provided a safe

haven where everyone believed they had a vote. With many hands in the pot trying to

influence the decision to engage, rotate their camera view to "this azimuth," break away

and help someone else's mission, the confusion and frustration mounts rapidly.[92] Going

further, the operator calculated that, "Textual communications accounts for 30 percent of

what [he] needs…" while a Special Forces Officer familiar with coordinating drone

support complained, 'You fly by the target and I type for you to turn around. You may

not want to or want to know why… If we could just talk face-to-face, where body stance

and seriousness are so clear, it would take a few seconds."[93]

The bottom line is that such confusing chain-of-command/support relationships

where multiple senior-level leaders want to take charge of an operation only works to

diminish the autonomy of the operator themselves by not allowing them to take

responsibility for their actions and exercise their judgment. By this account, the decision

to kill or not kill is sometimes elevated to hierarchical levels that would not have

occurred before such technology was present. General officers very likely would have

never fathomed reaching down to these individual decisions. In fact, they would not

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[92] Singer (2009), 336.
[93] Ibid., 336-337.

have been able to. They would have had to *trust the operator's judgment*.[94] With the

technology existing, the temptation appears too much to resist though. In a world of

ever-present media exposure, commanders have also felt the pressure that war has to be

executed perfectly, as if that could ever be the case. In such an environment, many

leaders have sought to take control for fear of a lower-ranking commander or soldier

getting it wrong. This is especially pertinent with drones, as many times the terrorists

they are pursuing are near the top of the high-value target list. If they get it wrong, there

could be strategic implications.[95] Nevertheless, it is the leaders who chose to imbue

these drone operators with such significant responsibility, and by summarily over-

controlling their tactical duties, this only leads them to believe that their vote does not

matter.

3.2.3 Retention Issues & Abdication of Responsibility

Tying it all together, these burdens lead to every imaginable fatigue. When on

mission, they operate seven days a week, 8-12 hours a day in an environment where they

frequently cannot determine who the boss is, struggle to identify with the warrior image,

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[94] Looking forward to Chapter IV, which argues for a greater commitment to the *Mission Command* philosophy founded on trust and communication in order to enable an environment that empowers and respects the responsible initiative and judgment of all soldiers, the reader will gain a greater historical context for why military leaders (19th & 20th century era) simply had no other choice but to *trust* the judgment of their fellow man.

[95] To be clear, there are many individuals at the top of high-value target lists where it is wholly appropriate for a senior-level leader to retain decision authority for the strike. What is worrisome is when the norm for ALL strikes requires convincing several levels of authority that it is the correct choice.

have to make confusing lethal decisions all the while possessing minimal latitude over

their actions, and are expected to return to the spouse and kids or their barracks room at

the end of the day where many then struggle to reconcile the totality of the scenario they

are in.

Consequently, the military has faced significant issues of retaining drone

operators with the most oft-cited reason for separating being mental and physical

burnout.[96] Indeed, so much so that the Air Force sought to incentivize drone operators

by considering similar retention bonuses to fighter pilots who can receive in excess of

$225,000 for multi-year contract extensions.[97] Unfortunately, one Colonel noted, "I

don't think the Air Force can throw enough money at them to stay in."[98]

Disappointingly, when the DoD researched the Army's strategy for addressing

some of the systemic shortfalls in their training and retention, it found they "did not even

take into account the drone pilot's input."[99] I would argue this is simply indicative of the

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[96] Schogol (2015); https://www.militarytimes.com/2015/01/08/air-force-considers-larger-retention-bonuses-for-drone-pilots/.   Also, referring back to my introductory chapter, there are simply some figures or statistics that cannot be published outside of official DoD channels for national security reasons. The articles referenced in the above paragraph do well to point to the issue at hand. Also, it has been part of my *original work* in this thesis to demonstrate the diminished autonomy that is produced by the structures surrounding drone operators. As such, the limited first-hand accounts I have been able to reference in this section are meant to support this claim. The reader must understand that discussing soldier function in terms of autonomy is not common language in the military construct, and an aim of mine is to draw autonomy into the sharper focus it deserves.
[97] Ibid.
[98] Ibid.
[99] Maucione (2017). https://federalnewsnetwork.com/defense/2017/01/air-force-army-strategy-flies-low-drone-pilot-shortage/.

wider lack of recognition for the drone operator's judgment and a failure to be interested in the root problems facing their community.

For those choosing to remain in the military, whether they stayed in the unmanned aviation field or not, Press notes that the primary complaint was not PTSD, but rather managing "the inner conflicts weighing on the conscience."[100] Due to their limited autonomy and the confusing bureaucratic structure for approving target engagements, many of these pilots have had to watch helplessly as scenes played out where their comrades were killed in action before they received approval to engage. Even in instances where they felt they were doing the right thing, such as in response to a fast-moving vehicle barreling towards a military convoy, they may have discovered in the aftermath it was not the enemy, but a family fleeing from a Taliban warlord.

The psychological anguish felt in the aftermath mirrors the two distinctions of a term that has begun to gain greater legitimacy in mental health circles today, that of *moral injury*. Originally coined by Psychiatrist Jonathan Shay in his book *Achilles in Vietnam*, Shay aimed to account for a particular moral unraveling of character in instances where either (a) authority figures fail in high stakes situations to do what is right by those they are charged to lead or (b) the service member themselves fail to make moral decisions consistent with their character.[101] In his reference to the *Iliad* and the *Odyssey*, he makes note that "the Iliadic troops are almost always the *laos*, for which the

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[100] Press (2018), 174.
[101] Shay (2014), 182.

leaders Agamemnon, Achilles, Odysseus, and Hector have a shepherd's fiduciary responsibility, and all four fail catastrophically."[102]

Whether In the leader's failure or their own, when the service member believes the circumstances are unlikely to change and is facing the reality that they have several months or possibly years remaining on their military contracts, something psychologically has to protect them from those harms. One fear would be that in this transformation of character, what could occur is a gradual silencing of their conscience. In this silencing of conscience, they may also begin to abdicate any responsibility for the actions that occur moving forward; and setting service members up to walk down that road is perhaps most dangerous of all.

3.3 Arendt: The Danger of Not Being Responsible

The previous section solidified the detrimental effects of undermining the autonomy and sense of responsibility for our military personnel. Building upon these sensibilities, Hannah Arendt, in her *Eichmann in Jerusalem*, sounds a warning bell for what becomes of societies and institutions where responsibility-taking is undermined or even discouraged. In this text, she outlines the dangers that bureaucratic thinking and the divestment of individual responsibility they either demand or promote. I will argue, that though bureaucracy in the military construct is generally understood as dispersed

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[102] Ibid., 183.

authority and responsibility, if not properly managed, as witnessed in the example of

Adolf Eichmann (*Section 3.3.1*), it stands to obliterate one's call to conscience (*Section*

3.3.2). Furthermore, I will conclude that the susceptibility to such a reality knows no

bounds by contrasting *merely* carrying out one's duties and its effects on one's ability to

act responsibly (*Section 3.3.3*).

3.3.1 Introducing Eichmann

In Arendt's landmark journalistic series for *The New Yorker*, eventually

published as *Eichmann in Jerusalem: A Report on the Banality of Evil*, she was tasked to

detail and reflect on the 1962 trial of Adolf Eichmann, one of the Nazi Party's most

senior leaders during the Holocaust. Arendt, a Jew, who had narrowly escaped Germany

herself during the Nazi Party's reign, found the task she was given was going to be

supremely difficult. As a Jew, and writing for such a large audience, she understood that

the people wanted to hear how Eichmann *intentionally* master-minded the demise of

several million Jewish people across multiple countries during the war. What she

discovered, however, is that although the Nazis were, and are still considered today, one

of the most purely evil organizations to exist, the man she saw in front of her was no evil

mastermind at all; to the contrary, the lack of conscious thought he gave to the orders he

was charged to oversee was astounding. *But, how could that be? How could one not see*

such blatantly atrocious acts taking place? When Eichmann did realize it, what did he

do? Was he compelled to act? I believe understanding the morally dangerous

environments the Nazi regime reinforced is critically important if current military leaders are to have the best chance for identifying and remediating similar harmful constructs that can arise in highly complex bureaucratic organizations.

To begin, the conditions and persons from which banal evil can arise are not always so obvious. They do not necessarily manifest from towering, powerfully looking figures that strike fear into others. For example, Arendt notes that in the case of Adolf Eichmann, his appearance was anything but menacing. Hunched over in his bullet-proof glass booth in the courtroom, he appeared "slender, middle-aged, with receding hair, ill-fitting teeth, and nearsighted eyes."[103] As she recounted how he viewed his role of sending Jews off to concentration camps to be worked to death, starved, shot by firing squad, burned alive, or killed in gas chambers, he saw his role as 'merely transportation.' His job had always been to ensure the swift and efficient transfer of Jewish peoples to other lands or areas outside of the Reich, whether that had been to neighboring countries or, once those options were exhausted, work camps.[104] As far as he could judge, being intimately familiar with the law of the land, there was no reason to question such orders. If it was deemed legal to do so, then it must be ok.[105] *What need was there to consult his conscience?*

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[103] Arendt (2006), 31.
[104] Ibid., 23, 120.
[105] Ibid., 328.

Another interesting aspect of Eichmann's speech was he often used catchphrases that were common to the Nazi language system. Arendt recounts:

> The net effect of this language system was not to keep these people ignorant of what they were doing, but to prevent them from equating it with their old, 'normal' knowledge of murders and lies. Eichmann's great susceptibility to catch-words and stock phrases, combined with his incapacity for ordinary speech made him, of course, an ideal subject for 'language rules.'[106]

One example of how powerfully language is tied to cognition is that Nazi Party Doctors would refer to gassing as a "medical matter."[107] This implementation of distorting language throughout the party's operations worked effectively to mask and make routine otherwise very violent acts. It dehumanized its subjects. Himmler was perhaps most adept at solving "problems of conscience," as he called them, with language and clichés. He insisted that when one participated in or witnessed an act that was difficult to reconcile internally, they must simply direct the feeling inwardly. For example, if you were one of the executioners, instead of saying, "What horrible things I did," you would do better to say, "What horrible things I had to watch in the pursuit of my duties, how heavily the task weighed upon my shoulders!"[108]

As one can imagine, with such constructs in place where towing the party line was what was expected as well as adopting language that ensured one was not overly critical of their personal actions, it became effortless to blur reality and enact a type of

[106] Ibid., 115.
[107] Ibid., 282.
[108] Ibid., 135. Himmler also coined phrases such as, "My Honor is my Loyalty" that were adopted by the likes of the S.S. as early as 1931.

moral gymnastics to avoid engaging with any cognitive dissonance. Over many years

the blurred reality becomes one's actual reality, and as Arendt compels us to see:

> [This] evil comes from a failure to think. It defies thought for as soon as thought
> tries to engage itself with evil and *examine* the premises and principles from
> which it originates, it is frustrated because it finds nothing there. *That is the
> banality of evil*.[109]

In speaking on how blinding such toxic cultures can be, even when they are

unintentional, such as within the U.S. military, they can undoubtedly *damage and

destroy one's will* to question anything, especially an impressionable young person who

wants nothing more than not to disappoint their boss. It is interesting to note that

Eichmann actually harbored no ill-will towards Jews. There was no bloodlust for war

and destruction in his mind. Eichmann was just trying to carry out his duties. He would

have killed his father if duty, as he understood it, demanded it. He was striving to be a

good soldier, a good officer, one of "honor," when what honor required was an

unquestioning loyalty in the Nazi Party.[110] No points were awarded for exercising

initiative. In the Nazi culture, there was no call for initiative. As alluded to previously,

his original duties prior to the "Final Solution" were to ensure a smooth emigration of

the Jews. Indeed, Eichmann even had Jews in his own family.[111] For the most part,

Eichmann just wanted to show his superiors he was doing his job well. The reality that

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[109] Ibid., 15. Italics are my emphasis
[110] Ibid., 107-108. As Eichmann recalled, the last time he remembered trying something all on his own
was Sep. 1941.
[111] Ibid., 53.

the Jews, at some point, needed to be located to other areas where they might meet more

unfortunate ends since countries were reaching their capacity to receive them was

merely a regrettable next step that, he believed, arose not out of any intentionality on the

Party's doing, but out of necessity. It was simply the cards that everyone was dealt and

more a result of slow-moving bureaucracy. There was nothing he believed he could

do.[112]

3.3.2 Bureaucratic Centralization of Responsibility

In general, authority and responsibility are understood as dispersed in the

military construct; however, in the case of Eichmann, one can recognize that this

dispersion operates on a continuum. The more centralized authority and responsibility

are, the more discouraged one is from taking initiative and exercising their judgment.[113]

The reverse holds as well. The bureaucratic structures of the Nazi party sought to

centralize as much authority as possible while discouraging others from exercising their

judgment in meaningful ways. In perpetuating these structures, I believe one's will to

exercise their autonomy and initiative is dramatically undermined, turning them into

mere functionaries that seek every opportunity to abdicate themselves of personal

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[112] Ibid., 105.
[113] Looking forward to Chapter IV, for this very reason, I will argue for the efficacy of a more decentralized model in *Mission Command* that unequivocally promotes and empowers the initiative of subordinates.

responsibility. In doing so, the call to their conscience is obliterated leaving them ripe to treats themselves and others as mere means.

In fact, such *unbound complicity to power* and *inability to recognize how evil acts were manifesting themselves* was shown to run rank and file throughout the Nazi Party as witness after witness appeared on the stand during the trial. When Eichmann's judgment was put to question regarding how he was able to reconcile his own feelings with the violent turn the Nazi Party took, he replied:

> 'Nothing's as hot when you eat it as when it's being cooked' – a proverb that was then on the lips of many Jews as well. They lived in a fool's paradise…It took the organized pogroms of November, 1938, the so-called *Kristillnacht* or Night of Broken Glass, when seventy-five hundred Jewish shop windows were broken, all synagogues went up in flames, and twenty-thousand Jewish men were taken off to concentration camps, to expel them from it. [114]

Recalling one instance where he considered questioning the ideology of the "Final Solution" at a Nazi leadership conference, he distinctly remembered that there was "…no one, no one at all, who was actually against [it]."[115] He described this moment as the most "soothing" for his conscience and the time at which he felt "free of all guilt."[116]

In my estimation, this is also the point where he was able to relinquish any *personal* responsibility for his actions. After all, the leadership was on board. They

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[114] Ibid., 66.
[115] Ibid., 146.
[116] Ibid., 144, 165. In fact, he goes on to recount it was a kind of Pontius Pilate feeling of relief that came over him.

made the rules. Following the rules was his duty and carrying out his duty was certainly legal. If literally no one else seems unhinged by a situation, they may simply believe it is they who view the subject matter all wrong, *albeit Eichmann's case was quite extreme*.

Moreover, outside of being blinded by efficiency in carrying out his duties was the unfortunate circumstance of *Eichmann's moral starting point*. To Arendt, he appeared to be an individual who lacked almost any capability of considering a situation from another's point of view, exhibiting zero sense of the sympathetic principle by which humanity is glued together. Largely, he did not feel for others or consider the harms he brought upon them to begin with. When one adds in structures aimed to stifle initiative and squash critical examination, it is an even further recipe for disaster for someone in a leadership position. Arendt lamented, in reference to his undeveloped character, that:

> The longer one listened to him, the more obvious it became that his inability to speak was closely connected with an inability to think, *namely*, to think from the standpoint of someone else.[117]

In the next chapter, I will argue that though every rational agent may have different starting points, as Kant reminds us, the call of conscience is always within us and we must be prepared to guard against the evils presented daily *(Section 4.3)*. To that end I will also argue, structures such as this, and the one's surrounding drone operators

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[117] Ibid., 75-76.

(Section 3.2) are evidence that an ethical framework such as *Mission Command (Section 4.2)* is necessary for well-functioning militaries that want to avoid treating their soldiers as *mere means*.

Turning back to Eichmann, one person he was able to consider was himself. The Nazi Party, like any bureaucratic organization, had to go through its own transformations to operate effectively. At times those transformations resulted in needing to reduce power and choice positions in one area to afford growth in another. When that occurs, certain avenues of advancement for military officers close. Eichmann, driven mainly by careerist ambitions and unable to adapt well to changing circumstances, wanted to hold on to his dwindling power, given that it was where he derived much of his personal worth.[118]

Though Eichmann wanted the power of authority that comes with senior leadership, he did not want the requisite accountability that came with his position. Not only did he not want it; once again, *he did not even recognize it was his to be had*. Despite being only a few rungs down from Hitler himself, Eichmann felt in his mind that he was always at least one step removed from the leaders who were truly responsible for such deeds being carried out. In his final statement Eichmann claimed:

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[118] Ibid., 104.

'I am not the monster I am made out to be…I am the victim of a fallacy.' He did not use the word 'scapegoat,' but he confirmed what Servatius had said: it was his 'profound conviction that [he] must suffer for the acts of others.'[119]

It is here that I believe Eichmann clearly missed the unique interplay of distance and responsibility in the military construct. Being remote offers one no escape from doing the right thing, from examining the intention of one's will in issuing orders. Indeed, it is the leaders, more than anyone, that should be asking the tough questions. *If this is carried out, how will it affect the troops? How will it affect the civilian populace?* Drawing the point more sharply, questions of efficacy and efficiency are important, but so is examining the effects new technology, for instance, may have morally, psychologically, and emotionally on its end-users. This is precisely one of the functional roles the JAIC should serve as it works to modernize the American military and drive industry experts in the appropriate direction. Obviously, the Nazi Party had no intention of taking up such matters, and Eichmann himself was convinced of his own mental tricks. Arendt reminds us though:

> The extent to which any one of the many criminals was close to or remote from the actual killer or the victim means nothing, as far as the measure of his responsibility is concerned. On the contrary, in general the degree of responsibility increases as we draw further away from the man who uses the fatal instruments with his own hands.[120]

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[119] Ibid., 281. See also, 98.
[120] Ibid., 279.

3.3.3 Eichmann's Fate & Contrast

Most significantly, whether or not Eichmann put any *intentional* thought into what he was allowing and enabling to occur, and despite his renunciation of any responsibility for the outcomes, *the judges still evaluated him as a fully functioning moral subject* and condemned him to death. As Arendt recounts:

> What we demanded in these trials, where the defendants had committed 'legal' crimes, is that human beings be capable of telling right from wrong even when all they have to guide them is their own judgment.[121]

In direct correlation, those serving in the military today are still expected to discern right from wrong, despite the laws. In point of fact, American military service members are to carry out their orders unless either of the following apply: (1) the order is illegal or (2) it is *immoral*. A tension arises when these two distinctions are conflated, however, and one believes, like Eichmann, that if something is legal, it must match up morally. While the two concepts do often converge, they are different. Indeed, Eichmann goes as far to misconstrue Kant's categorical imperative (CI) to read "Act as if the principle of our actions were the same as that of the legislator or the law of the land," or even further, as Arendt states, "Act in such a way that the Führer, if he knew your action, would approve it."[122]

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[121] Ibid., 330.
[122] Ibid., 166. The second example Arendt refers to is Hans Frank's "Categorical Imperative in the Third Reich"

In summation, if soldiers today were to embody Eichmann's position of strict obedience to the will of those above them, the military would be full of non-thinking automatons, and their humanity would be reduced to the reasoning level of machines. That is the banality of evil, sheer thoughtlessness. As one recalls from the previous explication of Kant's thoughts on the interrelated nature of autonomy and responsibility-taking in the intentional exercise of one's will (*Section 3.1*), to treat others as ends, and take up one's responsibility to enable a more moral world by acting from duty to the moral law, is the appropriate orientation one should strive for. Reason demands one hear the call of conscience in enacting their judgment wisely, not turn away from it. As such, I will argue in the following chapter that this suggests the military should robustly adopt the decentralized *Mission Command* philosophy in order to properly balance authority and responsibility to enact a military that takes seriously the humanity of its soldiers by refusing to use them as mere cogs in a machine.

3.4 Conclusions

While the DoD certainly seems to have made significant strides in its commitment to people and the ethical pursuit of future advanced technology, one can see that the limiting structures surrounding the operators charged with employing the unmanned drones *currently in use* pose substantial barriers to respecting their moral worth and status as humans volunteering to serve their country. Though innovative technology like drones have solved many military casualty issues, their rapid adoption

also subsequently led to processes that form a confusing micromanaged hierarchy of power that leaves drone operators both faceless and limited in terms of their autonomy.

In this limited autonomic state where multiple senior leaders provide conflicting guidance on whether or not to take an individual's life, their voice is lost. Waging war over significant distance via chat, on a strategic level, reduces the degree of context necessary for these operators to make lethal decisions. Regardless of how many weigh in on the call to strike, it is the operator, that no one sees, who must live with the results of the decision. Such scenarios cultivate a ripe environment for moral injury to occur when leaders become overly distracted with the mission.

As drone operations have become increasingly valued in the military community, the demand for operators has only risen; consequently, not only in the sheer number of operations but also in their bureaucratic complexity. Unfortunately, however, due to many of the poor structures outlined, several operators have chosen to leave in favor of the civilian sector where a more balanced level of simplicity and autonomy are granted. For the few mid-grade operators who decide to stay and train the next generation, the level of trust and faith they have in those who command them wanes evermore.

Furthermore, though I surmise many of their aims are to execute their job at a high level both legally and morally, when their ability to affect their reality sees little progress, a certain level of cynicism and abdication of responsibility begins to creep in, just as witnessed in the structures present with Adolf Eichmann (*Section 3.3*). Over time, the call from their conscience grows increasingly more silent as a defense

mechanism in such environments. As demonstrated in the case of Eichmann, one can also recognize that the sheer thoughtlessness in carrying out orders and one's perceived duties has limitless bounds in bureaucratic climates where initiative is stifled and blind commitment to authority is encouraged. In other words, such an orientation can apply to soldiers and leaders alike.

Finally, if one is to demand it is humans that must remain central to the decision loop, then I believe it is time for leaders to take charge of the fiduciary responsibility to those they command. They must be trained and developed in ways that transcend the tactics, techniques, and procedures for operating their drones and adopt a framework that provides greater moral autonomy and ability for exercising their individual judgment. In this final chapter, I wish to argue that the *Mission Command* framework accomplishes these goals while not abrogating non-commissioned officers and commanders of their unique responsibilities as well.

CHAPTER IV

FROM PRINCIPLE TO PRACTICE: *MISSION COMMAND* AND BEING

RESPONSIBLE

The fundamental basis of mission command is tactically and technically competent commanders and subordinates with a shared understanding of purpose who can be trusted to make ethical and effective decisions in the absence of further guidance.[123]

Given the concerns raised by the concrete example of drone operators in today's military, coupled with Arendt's observations of the tendencies of bureaucracies to undermine individual's autonomy and responsibility, I argue here that the Armed Services would do well to fully and robustly adopt *Mission Command*. This is because, I argue, *Mission Command* recognizes the moral basis, *trust*, for a fully integrated and highly functioning military that places a premium on enacting a "people-first" strategy that values the judgment and input of all its members.

In this Chapter, I will argue that embracing the Chief of Staff of the Army's (CSA) People-First Strategy as embodied in *Mission Command (Section 4.1)* is the most comprehensive course of actions our military leadership can take in addressing the issues outlined so far. I further argue that Kant's vision of moral education *(Section 4.2)* is conducive to establishing *Mission Command* and its principles of autonomy and

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[123] See Department of the Army (2019). (*ADP 6-0) Mission Command: Command and Control of Army Forces*, 1-20.

responsibility. Mission Command is steeped in taking ownership of one's responsibilities by focusing on a handful of central tenets that establish climates and cultures of trust via clear lines of communication, which cultivate respect and dignity for applying individual judgment to undoubtedly complex scenarios.

In Section 4.1, I will establish *Mission Command*'s principle aim of insuring a highly functioning military by reviewing its history and principles. By drawing out *Mission Command*'s principles, I will also demonstrate that this doctrine is built on a moral foundation of *trust* (*Section 4.1*). In cementing this foundation, I can then argue for the expanded role of moral education and character development if the military is to foster a herd-like immunity from which a banal disrespect for others' dignity and autonomy can arise (*Section 4.2*). Here I will rely primarily on Kant and his thoughts on developing one's self and others morally. Again, I turn to Kant because he is the most relevant thinker for whom responsibility is the key concept. As such, his Doctrine of Method in the second Critique suits *Mission Command* quite well. Finally, I will draft a novel perspective for how slight modifications in training, inculcated at multiple stages of a soldier's military tenure, can *cultivate an enduring climate* founded upon *trust*, *respect*, and *responsible ownership* for one's duties and judgment which both Kant and *Mission Command* seek to advance (*Section 4.3*).

Additionally, I will briefly argue for a revised and expanded framework of *Mission Command* to truly maximize its resilience in application (*Section 4.3.4).* I hope that in demonstrating the vast potential of *Mission Command* to address achieving a

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balance of ethically adopting advanced technologies while respecting the autonomy of the human operators charged with managing them, that I can further argue for the doctrine's endorsement across the Joint Forces. There are numerous potentialities for our military culture to improve, not just in the Army but in all military branches. I humbly submit that the path laid out below is one way to begin to respect better the judgment of all who join the military and foster organizations of excellence that not only survive but thrive because of the climate we choose to lead our service members in.

4.1 The Framework: Mission Command

To begin, in laying the foundation of the *Mission Command* framework, I argue the specific case can be made for the correlative relationship between high military function and morally driven organizations. *Mission Command* provides a moral foundation, *trust*, in order to cultivate respectful open communication, that is directly meant to address how best to structure the human relations at issue in the military. No matter how technological warfare eventually becomes, it will be humans that are responsible for carrying it out. I argue, *Mission Command* secures the appropriate ethical investment for the future of human agents' autonomy as military careers become increasingly more techno centric. In order to orient the reader appropriately to the *Mission Command* philosophy I will proceed, first, by outlining its current definition and utilization *(Section 4.1.1)*. Next, I will detail the historical basis it was bore from *(Section 4.1.2)*, and finally, the principles that guide its operation *(4.1.3)*.

4.1.1 Historical Basis and Current Use

Mission Command, as defined in U.S. Army doctrine today, is simply:

> …The Army's approach to command and control that *empowers subordinate decision making* and *decentralized execution* appropriate to the situation.[124]

Aspects of *Mission Command* have been a part of the Army culture for decades; however, leaders' implementation during operations in the GWoT have been inconsistent at best.[125] At its foundation, *Mission Command* seeks to empower subordinates based on the recognition that even the most intricately planned missions have emergent variables that were not factored into the "battlefield calculus" and require on-the-spot judgments to be rendered.

Indeed, the earliest version of *Mission Command* is believed to have risen from the 19th-century German concept, *Auftragstaktik*, which translates to "mission-type tactics." Following the Prussian Army's defeat by Napoleon in 1809, several senior military leaders sought to reform how they led their vast armies. What the Prussian military needed was a way to simplify the process for making decisions in battle:

> At the heart of the debate was a realization that subordinate commanders in the field often had a better understanding of what was happening during a battle than the general staff, and they were more likely to respond effectively to threats and fleeting opportunities if they were allowed to make decisions based on this knowledge.[126]

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[124] See Department of the Army (2019), *ADP 6-0: Mission Command*, 1-4.
[125] I will treat this particular point more fully *below (4.1.3)*.
[126] Ibid., vii.

What is vital to recall in 19th-century warfare is that once the Commanding Officer issued the order to begin a mission, it could be days, or even weeks, before the subordinate commander was able to communicate the result of the operation. Issuing overly complicated and constrained guidance to a small unit in the field could prove detrimental in execution. The Prussians realized that if they issued orders with clear limits, timeframes, and goals, then it (a) unburdened the General Staff from needing to be constantly consulted, (b) respected the judgment of the leader in the field who, despite potentially not having the breadth of knowledge that the senior commanders had, possessed a much greater depth regarding the particular operation, and (c) could be made straight-forward enough that a junior leader could take charge if the situation presented itself.

Consequently, with the eventual intervention of the U.S. military in World War II, they also sought to adopt the driving tenets of *Auftragstaktik,* which the Nazi military was employing with great effect through Western Europe in their assault towards Great Britain. As D-Day fast approached in the summer of 1944, commanders briefed troops repeatedly on their mission, the drop zone location, and key objectives upon landing. When D-Day finally arrived, approximately 13,000 paratroopers from the famed 101st and 82nd Airborne Divisions, as well as other units, boarded their C-47s and took to the skies. As history discloses, a large percentage of those paratroopers never saw their objectives that fateful night, but for the few whose parachutes took them safely to the ground, they grouped up with nearby paratroopers, recalled the key tasks of their

mission, and took the fight to the enemy. In the absence of further orders, amidst

significant chaos, and for many, miles from their intended drop zones, they exercised

disciplined initiative and turned the tide of the war.[127]

However, the implementation of *Mission Command* has been eroded in our

current age. As discussed in the previous chapter, today's modern command posts and

highly integrated global communication structures allow for nearly any leader,

anywhere, at any level, to tap into a live drone mission. The temptation to intervene and

micromanage from miles away is too much for some leaders to resist. Of course, there

are several advantages for overwatching a mission, such as being able to call upon

quick-reaction forces or MEDEVAC units for response when it goes awry, but these are

not the interventions I have in mind. The seven principles of *Mission Command* outlined

below require much by way of humility if the military is to embrace this doctrine as a

cultural philosophy. In brief, *Mission Command* demands *mutual trust*, *competence*,

shared understanding, *commander's intent*, *mission orders*, *disciplined initiative*, and

risk acceptance if it is to operate in its intended form.

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[127] Ibid., 1-13. See this section of ADP 6-0 for an account of the 1943 Sicily Operation which also serves as an excellent historical example of the disciplined initiative that paratroopers are famed for. Today, this concept is affectionately referred to as LGOP theory (Little Groups of Paratroopers). It was yet another precursor to today's *Mission Command* doctrine.

4.1.2 Principles

The bedrock principle of *Mission Command* is *mutual trust*. Mutual trust is a call

for everyone in the Army, but it starts with the leader. If today's soldiers are to be as

willing as Normandy's paratroopers to exercise initiative and judgment appropriately,

they need to believe that their leaders trust them to do so. Additionally, the leaders

themselves must be staunch examples of committed, competent, commanders and NCOs

of character if their soldiers are also to extend trust. This is the proper moral orientation

that the highest functioning military organizations take. As the ADP makes clear,

"*Soldiers must see values in action* before such actions become a basis for trust."[128]

Consequently, for this two-way avenue of trust to be laid properly, both soldiers

and their leaders must demonstrate *competence*. Officers, NCOs, and soldiers alike are

all responsible for achieving high standards of competence in the execution of their

assigned duties. This competence is derived in training and educational settings as well

as over time with real-world experience in one's craft. Commanders are charged with

assessing their NCOs and soldiers' demonstrated competence levels as a factor in

determining the degree of trust that is extended in operations.[129] The reverse assessment

should, and does, occur as well.

Trust is also built through practices that cultivate *shared understanding*. Shared

understanding is about maintaining a climate of continuous, open communication from

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[128] Ibid., 1-7 – 1-8.
[129] Ibid., 1-7.

the leaders to the led and vice-a-versa. Leaders who choose to be open and transparent in their communication methods assist in cultivating environments of respect where upcoming missions, dilemmas, and potential resolutions can be freely discussed. Also, shared understanding is not easily maintained. It requires continuous effort in our ever-changing operational environment if one desires to lead an informed organization.[130]

Additionally, trust is cemented through clear *commander's intent.* Commanders may share superfluous information regularly, but if they do not deliver a clear, concise *commander's intent* prior to a mission, then they are ultimately failing to provide necessary left and right limits to their subordinates. That single paragraph, delivered in written form or orally, gives subordinates insight into the mission's desired end state and the key tasks by which to achieve it. It is the only place in an order where a commander truly adds their personal thoughts regarding the mission. To that end, it is a task that should never be delegated to a staff member. One should always personally prepare, and deliver, their commander's intent.[131]

Furthermore, it should not just be the commander's intent paragraph of the order that is concise; the entire order should take on a *mission-type* format. To do so, the order should lay out *what* is required of the subordinate commander or unit, communicate the available resources to prepare for and execute the mission, but stop short of prescribing *how* they should go about getting the job done. While I will be more specific in its

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[130] Ibid., 1-9.
[131] Ibid., 1-10.

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application in the following section, *Mission Command* doctrine suggests to leaders that implementing "mission orders during training when actual consequences are low, allowing subordinates to develop their own solutions to problems, and intervening only when necessary to avoid a serious problem" is an effective way for reinforcing all of the principles above.[132]

Finally, the high point of trust comes out in the last two principles, *disciplined initiative* and *risk acceptance*. *Disciplined initiative* occurs when an individual realizes a decision needs to be made, yet there is unclear guidance on how to move forward, so they fall back on their own judgment. Often, the choice to exercise disciplined initiative, whether in garrison or combat, comes down to the factor of time. If there is ample time for an *open* dialogue about how to move forward or for the situation to develop more fully, they should consult their commander. If the condition is more urgent, then one should make their best judgment. Also, for the environment necessary for disciplined initiative to thrive, commanders must adopt an appropriate *risk acceptance* level. The appetite for risk should not be one of reckless abandon; however, one also cannot be the *risk-averse* commander that finds themselves concerned by every minuscule threat. These commanders are overly cautious and tend to fail in allowing their subordinates enough freedom to execute their tasks by making various attempts to *over-control* the situation.[133]

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[132] Ibid., 1-11.
[133] Ibid., 1-16.

4.1.3 Characterization of the Framework

All in all, the *Mission Command* philosophy is descriptive, not prescriptive. It is meant to be "*applied with judgment in the context of a particular situation.*"[134] Most of all, due to its decentralized nature, it puts a hefty burden of responsibility on leaders and soldiers alike. It is simple yet demanding. Build trust. Communicate. Exercise initiative. Do not be afraid to make decisions. Yet, as I made note of at the beginning of this section, the tenets of *Mission Command* require people of *strong character* if the framework is to be resilient in its application. Critics say *Mission Command* has not been feasible to implement for many of the same structural issues that I have pointed to in this thesis; primarily, navigating its efficacy in a bureaucratic structure where our current technology feeds a centralized highly visible, minimal tolerance for defect environment that is not conducive to extending trust, or believing that one is trusted. To be clear, this simply means it will be difficult to guide the culture in a better direction. Difficult, I argue, cannot be synonymous with infeasible. On the contrary, I argue that not only is it feasible, but necessary and beneficial to the health and success of our military.

Up to this point, I believe the reinforcement of moral education necessary to help *Mission Command* stand has been lacking. As such, I argue there lies an inherent responsibility for leaders within their fields to make a concerted effort in the realm of

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[134] Ibid., 3-16. My emphasis

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moral education. There are many philosophers that dissect character development methods, but I believe the most complete rationale for a practical approach lies in the work of Immanuel Kant.

4.2 Laying the Foundation: Kant and Moral Education

While above I focused on Kant's formal notion of autonomy, here I will draw out Kant's emphasis of virtue and its centrality in his recommendations for moral pedagogy. Kristi Sweet notes:

> Characterizing Kant *solely* as a 'deontologist' has done a disservice to our interpretation of his thought as it neglects or deflates other aspects of practical life *that are just as integral to his vision of moral goodness*. Kant has a robust account of virtue that is central to practical life and which he understands as the strength of character required to be good.[135]

Even more than this, Kant's account of virtue and moral pedagogy rely on his claim that moral goodness is an inherent possibility for each one of us, equally. That is, each of us has the capacity to be good insofar as our wills are free and the moral law makes itself known to each of us. In a sense, for Kant, nothing really needs to be taught. Instead, Kant believes one primarily needs to become attentive to one's conscience, and guard against humanity's deep and abiding propensity to turn away from moral action. In this section, we will thus explore Kant's thoughts on the duty to cultivate talent and assist others, the importance of the self-knowledge acquired and its link to the larger

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[135] Sweet (2015), 4. Italicization is my emphasis.

community, what it means to develop moral feeling, and the attitude one should take towards the maintenance of character to guard against its unraveling. In emphasizing fitness or readiness, Kant's thoughts in the Doctrine of Method in the second Critique are most relevant to the successful application of *Mission Command*.

4.2.1 The Importance of Moral Development

To begin, Kant's first mention of the importance of the cultivation of moral goodness comes in his *Groundwork*:

> A metaphysics of morals is therefore indispensably necessary, not merely because of a motive to speculation… but also because morals themselves remain subject to all sorts of corruption as long as we are without that clue and supreme norm by which to appraise them correctly.[136]

For Kant, if one does not have a philosophical competence in morality, then he believed such an untrained mind could be easily thrown off course by non-moral desires, such as succumbing to self-conceit. Instead, one should actively propagate a life of morality for themselves and others. To this end, Kant makes himself very clear in two of the four examples he provides of the categorical imperative. One offers that people have a specific duty to cultivate their human capacities; concerning moral decisions, this is our rationality. The other reminds us that people also have a duty to assist others in need. Moreover, recalling the emphasis made in Chapter II of this thesis, Kant goes on to submit that his second formulation of the categorical imperative requires a view towards

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[136] Kant, I., & Gregor, M. J. (2008), 4: 390

humanity as an end itself. To adopt this view requires that one take up the welfare of others. Contextually speaking, this requires one to take care of those they are charged with leading. It is a fiduciary responsibility one cannot abdicate. Consequently, Kant's *Doctrine of Method* in the *Critique of Practical Reason* lays out the thought-process from which one should approach taking up such responsibilities.[137]

4.2.2 The Pedagogy of Moral Development

First, it is imperative when discussing moral actions to remind our soldiers, NCOs, and officers that a mere outward showing of good behavior is insufficient; they must also have the proper mindset.[138] Following the moral law is a matter of having the right inner motivation, acting from duty, not merely conforming to rules. Without this inner, one has not, strictly speaking, taken responsibility.

Kant's approach to moral education is to encourage responsibility-taking and the cultivation of one's own moral judgment. In the Doctrine of Method in the second Critique, he writes,

> …is understood…as the way in which one can provide the laws of pure practical reason with access to the human mind and influence on its maxims, that is, the way in which one can make objectively practical reason subjectively practical as well.[139]

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137 Ibid., 5: 151-163.
138 Ibid., 5:151-152.
139 Ibid., 5:151.

The influence of the laws of reason can be enhanced, he argues, by reminding individuals that the moral law already belongs to us in virtue of our reason. He notes that there is a natural pleasure we take in the "examination of…practical questions" for just this reason. The task, then, is to call us back always and again to our moral vocation and keep its demand persistently present to us.

We achieve this reminding, Kant suggests, by engaging in ethical discussions. He recommends that we attend to biographies of those in the past "in order to have at hand instances for the duties presented," and seek to "activate their pupils' appraisal in marking the lesser or greater moral import of such actions."[140] Kant argues that our attention can be drawn to the moral law and its application through such discussions. They awaken and heighten our cognizance of the moral law and our vocation of dutiful action.

The emphasis in this moral education is on one freely choosing to be a *certain kind of person*. Through these discussions, the individual can fine-tune and adopt an ethical code to live by. Critical to note—especially in the military context—is that ethical principles are not something that can be forced upon an individual. The Army value system is excellent to hand out on a wallet-sized card, but it has to be more than that. For Kant, being a free person who can *intentionally choose* to act on their adopted precepts, absent of coercion or external pressure to do so, is a moral person.[141] The

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[140] Ibid., 5:154.
[141] Ibid., 5:8; 5:15-16.

moral education that Mission Command requires is an education wherein individuals are

led, through their own reasoning, to adopt the deep principles of trust and responsibility

for themselves.

4.2.3 Where We Are Liable to Err

However, Kant does warn that we are liable to err in our instructions in two

potential ways.[142] The first is by providing examples of extraordinary heroism as the

standard for morality. To this end, he implores teachers,

> …spare pupils examples of so-called *noble* (supermeritorious) actions… for
> whatever runs up into empty wishes and longings for inaccessible perfection
> produces mere heroes of romance who, while they pride themselves on their
> feeling for extravagant greatness, release themselves in return from the
> observance of common and everyday obligation, which then seems to them
> insignificant and petty.[143]

I believe the military should be especially on guard in this aspect. It is not that

heroism examples are not worth noting, but they risk making *moral action* unattainable

for the average individual. They also do not help students recognize more mundane

ethical dilemmas. In their minds, these dilemmas become associated with only

extremely *emotionally* charged events. The examples are better off starting in every-day

instances of potential decisions one could encounter. In doing so, one can cement a

[142] Ibid., 5:155-156.
[143] Ibid., 5:155.

more typical habit of employing reason and learn to recognize just how truly often one's daily actions are moral choices.

The second way one can err is by conflating ethical decisions with personally motivated incentives, Kant says:

> …morality must have more power over the human heart the more purely it is presented. From this it follows that if the law of morals and the image of holiness and virtue are to exercise any influence at all on our soul, they can do so only insofar as they are laid to heart in their purity as incentives, *unmixed with any view to one's welfare*, for it is in suffering they show themselves most excellently.[144]

In essence, if one learns that acting morally always equates to positive reward, they will not learn to act from duty. Trust me, as a parent who learned the hard way, reinforcing a system of consistent rewards for children to do the right thing only elicits the appropriate when the reward is present. Such a system is like a house of cards. Take away the reward, and they tend to come falling down. Practically, we must be upfront with our students that there is a reason the phrase exists, "choose the hard wrong, over the easy right." It simply is not always pleasant. Reinforcing *moral courage*, from duty, is what must be emphasized.

4.2.4 The Interoperability of Mission Command and Moral Education

Moreover, developing one's inner character also works to bring about the humble attitude necessary for adopting the *Mission Command* framework and gaining the

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[144] Ibid., 5:156.

confidence to exercise one's rationality.[145] It directs us away from the natural

inclination to base our actions on meeting our desires and re-focuses them outwardly

towards others. The moral law reminds us that we cannot merely do whatever we please.

In this manner, working on the self-knowledge of our inner motivations oriented towards

more ethical living assists our community. As Sweet suggests:

> Far from being individualistic, even solipsistic, the demand that reason places on
> individuals to 'be good' is a command to produce the *universal* exercise of
> reason; this necessitates not only that we pursue ends that take us out beyond
> ourselves but also that we do so in community with others.[146]

Recognizing that we live in a community, the move outwardly shows us that free

will and exercise of one's autonomy are not blank checks; they are inherently

constrained. Kant believes morality and reason operate as an ego check in their demand

for humility. He says they "strike down all *arrogance* as well as vain *self-love*."[147] We

recognize ourselves as 'finite' beings with our freedom both limited and empowered,

which is a critical point for leaders and soldiers alike to recognize.[148] Empowering

someone to exercise their initiative does not equate to blind support of their suggested

courses of action.

Furthermore, as rational agents imbued with morality, we do not question if we

'ought to be good' or 'why should we be good?' These thoughts are misplaced. We

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[145] Ibid., 5: 85-86.
[146] Sweet (2015), 9.
[147] Kant, I., & Gregor, M. J. (2008), 5:86.
[148] Sweet (2015), 54, 74.

must recognize the call to goodness from the start.[149] This is part of cultivating self-knowledge. We need to turn up the volume on our conscience and learn to fine-tune and listen to its guidance.

4.2.5 Cultivating and Maintaining the Moral Self: Virtue as Readiness

Now, a further point that Kant wishes to make clear is that *cultivating the moral self is hard, hard work requiring tremendous self-discipline*: [150]

> Virtue, understood as the *character* of someone who is *devoted* to being good, occupies a central position in Kant's practical philosophy. He names it the *supreme good of human life*, includes it in the highest good, and devotes one-half of his *Metaphysics of Morals*…to the topic.[151]

Similar to Aristotle, Kant does not want us to give in to *akrasia*, weakness of will. To possess virtue is a manner of *readiness*, which again suggestions its aptness for military application.[152] Indeed, as Sweet reminds us, "the word 'virtue' (*Tugend*) itself suggests its primacy in its meaning as *fitness*."[153] Vital to understanding Kant's approach is buying into the idea that such *readiness* or strength does not come from mere habit alone. Good habits might help one develop their character, but they are not adequate to maintain it. If we are to guard against our innate susceptibility to moral error in novel situations, then we must also develop our *strength of will* and adaptability. These

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[149] Ibid., 55.
[150] Ibid., 19.
[151] Ibid., 77.
[152] The term "readiness" in the military is probably the most oft-cited concept of the last five years.
[153] Ibid., 85.

notions are also particularly applicable in the military, where the power of groupthink in novel situations can dominate very quickly. We must be able to hear our conscience over the noise and have the strength and moral courage to challenge ideas that do align with a military whose aim is to prioritize the welfare of people. This moral readiness must be instantiated in military leadership as well. No one is infallible, and most people do not wake up wondering how they can ruin someone's day with a new policy. Good leaders *trust* their subordinate commanders and troops to assist in covering their blind spots.

> However, if one is to achieve the highest state of readiness, Kant states,

> 'Considered in its complete perfection, virtue is therefore represented not as if a human being possesses [it], but rather as if *virtue possesses him*, for in the former case it would look *as if he still had a choice*.'[154]

In other words, it must be so ingrained in one's being that it is the default mechanism from which one's actions emerge, and why is this? Again, primarily because we can be so easily thrown off course. Recall the example of Adolf Eichmann from Chapter III. We must remain ever vigilant. Our innate disposition towards taking the easy road makes us ripe for failure.

Part of this vigilance should manifest itself in the *routine examination of our habits*. Simply because we focus on developing positive habits does not imply that we are clearing out all the bad ones. Bad habits can become just as ingrained as the good

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[154] Ibid., 81, referencing Kant (MS 6:406). Italics are my emphasis.

ones and take on a similarly natural feel. Unfortunately, given our inclinations to perform actions primarily from a maxim of self-love, they also tend to stick more readily.[155] Also, though Kant indeed believes we can never wholly conquer the evil tendencies we are predisposed to, we can do much by way of radically disrupting their efforts to pull us off the right track.

In summary, moral education foundationally rests in the mastery of the self for Kant, hearing the demands that reason places on one's conscience, and learning to respond with appropriate judgment. We must engage our limits on both ends, the mundane and the extreme. We must learn how we react in moments that appear inconsequential if we are to solidify a fully developed conscience fortified for proper judgment in the often-intense scenarios encountered in military operations. We must understand our habits, the good and the bad, and solicit others' feedback in order to fine-tune them. Indeed, if we can master the self by regularly engaging our limits, we stand a much better chance of moving outward to affect the larger community more positively. Yet, we should approach our moral existence as if the job is never done because living a character-driven life is a struggle against our innate dispositions that leave us ever on-guard. It requires unmatched self-discipline and a commitment to excellence, much as the precepts of *Mission Command*. Now appropriately oriented to the depth of character necessary for the *Mission Command* environment to thrive and perpetuate, the following

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[155] Ibid., 91.

section explores some practical methods for *how* to go about integrating the *Mission Command* philosophy and moral education into the culture of unmanned aviation, along with some humble recommendations for how one can hopefully improve its resilience in any organization.

4.3 *Mission Command* in Action

I argue that a deliberate approach towards the implementation of the *Mission Command* philosophy, supported by a persistent moral education system as offered by Kant that is integrated across all phases of the soldier lifecycle, supports the most stable environment the military can provide for its soldiers, NCOs, and officers to (a) develop and strengthen their moral character, (b) properly exercise their judgment, and (c) set the conditions for creating a climate of inclusion, respect, and responsibility that values the autonomy of all its members. In laying out my framework for how to instantiate this environment, I see the approach to training requiring modification across three domains: the *institutional*, *operational*, and *self-developmental*.[156] Additionally, I claim that for *Mission Command* to remain resilient, there also needs to exist a revised orientation in its scope of influence.

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[156] These are the three common domains the Army examines training strategies from. See *FM 7-0, Train to Win in a Complex World*, 2-1.

4.3.1 Institutional

If one takes Kant's methods seriously and applies them to the soldier lifecycle and officer career fields in the aviation community, I believe it must start as early as possible in IMT. Traditionally, Officers have received some form of moral education in this domain, whether that is at ROTC, USMA, or their BOLC. For instance, at Texas A&M University, there is a requirement for all cadets, regardless of military branch association, to complete an engaging semester-long Military Ethics course organized by the Department of Philosophy. Most ROTC programs, as well as the USMA, require the same. However, in the past, Cadet Command has not made this a standardized requirement for all ROTC programs. I argue that it should be.

Additionally, as part of the Military Ethics course, there needs to be some component that addresses the *Mission Command* philosophy. For some reason, this has not been the case, and historically has been left to the Battalion Commanders to teach their young officers. I argue, given that a 22-year-old Second Lieutenant could be assigned a platoon to lead on day one, they should arrive with a familiarization of the *Mission Command* principles and a cognitive link between its philosophy and the moral orientation required to lead ethically.

For the most part, the military invests heavily into the Officer Corps' IMT; however, as an officer who was also a former enlisted soldier, I can attest that the extent of moral education a soldier receives in Army BCT is a one to two-hour block on the Army Values. Following this block of instruction, the soldier is handed a values card

they are required to keep on them at all times. Mission Complete. There must be a way to do better from an enlisted perspective.

Acknowledging that Drill Sergeants in BCT are significantly constrained for time, I recommend integrating moral education into the AIT course where unmanned operators are learning how to manage their airframes. There is much greater latitude for any course length deviations that could be required. Traditionally, in the GWoT, much like any other war, the emphasis is placed on rushing trainees through to get them out to units that are severely undermanned for the mission at hand. When soldiers probe instructors with more detailed questions oriented towards the thought-process behind making the decisions they do with their weaponry, some (not all) are met with, "You'll get that training at your unit." This is the wrong answer. I argue we need to slow down the training pipeline and link an ethical mindset to the operation of such advanced technologies from the start. *Sometimes you have to go slow to go fast.*

Implementing moral education into the program of instruction, I believe, could be accomplished relatively simply. First, take advantage of the instructors' experiences. Set aside small groups with an instructor for an hour each week. During these small group sessions, clarify to the soldiers that the purpose is to take a vignette and evaluate its moral efficacy. The instructor should also emphasize that this is an open environment where anyone can contribute, and that each person's thoughts will be respected. As Kant notes, it is essential to begin with more mundane scenarios; so, have the instructors provide examples from situations a soldier may encounter in garrison on a typical

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workday. As they become more confident in offering their judgments, they move to scenarios related to recognizing counter-productive leadership contrary to the *Mission Command* principles. This is important. Most new soldiers do not have a firm grasp of the type of environment they *should* be working in. This is the Army. All they know is that it is supposed to be tough, so instructors should be prepared to give examples of "what right looks like." Finally, tie it together by having the instructors discuss scenarios related to the training they may encounter at their unit. By this point in the small group sessions, the course should be nearing its end.

Moreover, I would argue that one of the critical facets of soldiers "seeing the values in action," as we discussed in the *Mission Command* section, is linking the same instructor(s) to their small groups for the duration of their time in AIT. In this manner, they are quite literally a part of what a healthy, respectful environment of growth looks like, where their judgment and autonomy matter. They are witness to appropriate dynamics of leader and led and can form those foundational trusting relationships that are critical to effective *Mission Command* cultures. The goal should be for those soldiers to walk away with a proper view of how they fit into the operational Army. This mentorship practice benefits the instructors as well. Given that instructor tours are typically two to three years, the exposure the NCOs will have by interacting with dozens of soldiers in this manner only assists in their leadership growth, internalization of the *Mission Command* principles, and support for moral education before their injection back into the operational force. It is a true win-win scenario.

4.3.2 Operational

The next phase of training comes upon arrival to a soldier's first unit. Before they can participate in real-world operations, they must undergo another stage of deliberate training *progression*. In the aviation community, there already exists a formalized training regimen for unmanned operators and traditional aviators. This training cycle is referred to as readiness-level progression or RL-progression for short. The operator's goal is to attain the status of RL-1, which means they have been designated as fit for operational missions.

Before achieving such distinction, they must successfully navigate two phases of training. First, as an RL-3 drone operator, they are focused on *base tasks*. These base tasks train and assess them on functions such as using radios, essential operation of their drone airframes, etc. Once they have demonstrated proficiency in their base tasks (RL3), they transition to mission tasks (RL2). It is in this phase that scenario-based training is introduced. To reinforce the model from IMT they gained, I argue a basic crawl-walk-run methodology be employed in this phase where the exercise of their judgment is tested.

A key factor here, in order to reinforce the *Mission Command* principles, would be *integrating the commander into the scenarios*. This holds the added benefit of getting the operator more comfortable interacting with officers; consequently, they will have had very little exposure to commissioned or warrant officers before arriving to their first

unit. Physically communicating with an officer is an enormous hurdle for most to overcome. In this practice, the relationship between leader and led begins to form, which allows each to develop mutual trust and confidence in the other's ability. Also, it provides an avenue for senior leaders in the organization to learn more about how their team operates.

Once the soldier achieves RL-1, they are now ready to participate in more extensive training exercises or combat operations. It is here that they can engage their limits even further, as Kant suggests is necessary. One way we accomplish gaining greater self-knowledge of one's actions in the military is to perform similar scenarios at a Combat Training Center (CTC) or "in the field." This is where my next critique comes in, though. Traditionally, concerning drones at CTCs, I believe they are taken out of the fight too early or units fail to bring them altogether. Their presence is merely "simulated". Why is this the case? Commanders of units containing drones have a collective responsibility to provide them with world-class training and familiarize the Infantry, and other commanders and their staffs, on their proper integration. The first time an Infantry Brigade Intelligence Officer or Commander interacts with a drone operator should not be downrange.

Assuming this shortcoming is rectifiable, I believe the Army can capitalize on additional aspects of training that greatly inform the command of how an operator will react in combat when they are stressed, sleep-deprived, and operating on little food. When a human engages their limits in this manner, they truly find out what they are

made of. They can learn their tendencies and become attentive to them. They begin to understand at what point their faculties break down and can train to guard against it. Almost no other environment more greatly informs NCOs and Commanders of the actual status of their organizations.

Additionally, CTCs operate in these training environments with additional personnel known as OC/Ts. These observers and coaches are meant to provide outside feedback on mechanisms such as how effectively commanders are leading, how cohesive their teams operate, and where they could improve in order to be more effective. I argue, that just like aviators, drone operators should be provided experienced OC/Ts to maximize their training experience as well.

By incorporating these operators into the CTC environment, they can build on their self-knowledge gained during AIT and RL-progression and learn how to properly integrate into a Brigade Commander's operational plans. Referring back to the limiting structures discussed in Chapter III, we can recall that most operators perform their duties via chat and how confusing this can be. My recommendation for large operations where a physical order is briefed is to ensure that operators are involved in the briefing process or at least present for the delivery of the order. If they cannot be there in person, then their leadership or themselves should video teleconference (VTC) into the order. This establishes a link between organizations and their key-enablers, such as drone operators.

Furthermore, it gives the operators, and their leadership, a chance to clarify the *commander's intent*. The standard operating procedures drone operators typically work

from are important to learn, but do not cover every possible scenario. As Kant would suggest, incorporating habitual decision-matrices might be necessary, but base procedures are not everything. Understanding the *commander's intent* empowers those operators with the left and right limits to exercise their judgment in instances that policies simply do not cover.

Finally, this approach can also be mapped on to Corps and Division-level Warfighter Exercises (WFXs). Given the classified nature of WFXs, I must limit my analysis in this sphere; however, I will say that of the many I have participated in, drone operations have been a critical component, yet the people "operating" the drones in the training environment are almost always derived from the flight companies, not the drones'. In other words, you might have a warrant officer that flies Apaches crewing a control station for simulated drones. I imagine this is a personnel shortage issue in some cases. In others, I suspect it is a failure to collectively integrate the drone unit's training objectives and calendar with that of their governing organizations. Where it is a training calendar issue, units should work to alleviate the conflict to provide more robust training. It can only help the leaders of those organizations understand the greater picture and role that drone operators have and provide yet another avenue for them to offer the bottom-up feedback that leaders need to integrate them properly into combat operations. Being open to such feedback is critical for *Mission Command's* success and the proper functioning of units.

Thus far, the practical suggestions I have offered rely heavily on creating several integrated relationships within teams to benefit the leadership and the operator in a *Mission Command* environment. I further argue that leaders stand to undermine the tremendous moral education and climates developed in the garrison environment if similar structures in combat are unable to be mirrored. Bottom line - You must *train like you fight*. Referring back to Chapter III, I believe this means the military should reconsider the efficacy of RSO operations.[157] Operators should be co-located in the theater of operations they are supporting, not driving home at the end of each day. Such a move supports the operator psychologically, helping them reclaim their feeling of being a member of a team, and supports the family by providing clear physical separation from combat and normal life.

Also, the Joint Force, in general, should strip-down and streamline the chat room access that operations are discussed in. *Mission Command* is steeped in simplifying processes to enable clearer judgments up and down the chain-of-command; and the persistence of war via chat has been an area in need of improvement for some time. Furthermore, it should go without saying, but within the chat itself, no one should be confused about the ranks or relative positions of the callsigns being used. Finally, voice chat is a must. Too much time and translation are lost in words on a page. If clarity is needed, the situation should be discussed via secure voice chat. That should be the

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[157] As a reminder, these are split operations where the drone operators fight from the states, while the support personnel, and their airframes deploy forward to the theater-of-operations.

primary method, just like manned aircraft. Drone operators hold people's lives in their

hands every day. If that means current airframes need to be modified to make this

happen, then that is what needs to occur. We owe it to the local civilian populace, our

allies, and our operators to do everything we can to get this right. If that means picking

up a secure phone to pause for discussion or gain clarity from the operator or

commander, then do it.

What should be clear to this point is that *Mission Command*, founded upon moral

education, requires *substantial ownership of responsibility for both the leader and the

led*. Achieving, and maintaining, such an end state is not just going to happen. It

requires significant buy-in. For more on that, we now turn to the self-developmental

domain.

4.3.3 Self-Developmental

In this triadic approach, self-development has the most challenging job. A

majority of the section on Kant in this chapter has done the work of driving this point

home, but I would be remiss if I did not at least review its importance briefly. As Kant

reminds us, one can offer all the moral education and world-class training opportunities

available; still, it is the *individual* that must choose the values and principles they operate

from. Adopting any one of *Mission Command's* principles well, as a leader, requires

much more effort, commitment, and character than being a micro-managing individual

that runs their organization as a "my way or the highway" type of environment.

Contrastingly, as a subordinate, it is also much easier to be disgruntled with a poor leader over time and operate from a position where one does not have to exercise their personal judgment regularly, but as witnessed, the implication of working under such limited autonomy is fairly damaging with time and leaves one susceptible to their innate dispositions towards evil.

Kant's philosophy regarding moral education, seen as the foundation for *Mission Command* environment cultivation, is about focused self-development. It is about being surer in our judgments. It is about gaining confidence in trusting our intentions. It is about having the right intentions. It is quite simply self-mastery achieved through discipline, the disciplining of one's inclinations. It is also about fortifying one's self against their innate dispositions. It is – *a choice*.[158] A choice that many in the world reject daily. The most one can do is provide the environment for such philosophies to thrive. For the most part, I believe this can be accomplished by starting with the recommendations I have outlined, but there is still one critique I have of *Mission Command* that requires addressing if it is to be fortified as a people-first strategy.

4.3.4 Mission Command Critique and Potential

My sole critique of *Mission Command* is its *lack of depth*. As it functions first as a command and control (C2) philosophy, its doctrinal focus is primarily oriented towards

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[158] Ibid., 96-98.

commanders and their staffs. In principle, this makes perfect sense, but in practice most

leaders who speak of creating an organization based on *Mission Command* understand

that its principles cannot cease at the staff-level. They tend to talk of the need in their

organizations to empower initiative, bottom-up refinement, and trust down to the lowest

level, the soldier. My simple recommendation is to *add a section to ADP 6-0 that spells*

this distinction out clearly to emphasize its importance. The bottom line is, if the Army

and the Joint Force are to create a culture of trust and empowerment, the approach must

include everyone.[159]

Moreover, if we can address the issue of depth and create buy-in with the revised

training structure, I believe we can begin overcoming the issues plaguing *Mission*

Command's widespread adoption. If the Army can do that, and prove the doctrine's

efficacy, then I argue the breadth of its adoption is limitless. All of the service branches

find themselves adopting 21st-century technologies and, at times, struggle to find the

right way for handling their implementation. The JAIC, as discussed in Chapter II, is

moving in an excellent direction ethically with the technology itself. The *Mission*

Command principles*, supported by an integrative moral education structure, provide a

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[159] Lt. Gen. James Mingus, then a two-star serving as the 50th Commanding General of the famed 82nd Airborne Division, was the stalwart example of what it means to ensure your subordinates understand the importance of cultivating a *Mission Command* environment. He made sure he did not just communicate his vision of such a culture to officers alone. As often as he could, he would meet with the hundreds of newly arriving Paratroopers each week to outline the key tasks he saw for the Division and reinforce that none of it can be accomplished *well* unless we have cultures of excellence founded upon *mutual trust*.

malleable framework for approaching the human-side of each of these new technologies as the military continues to adapt to future threats.

I also believe, much as the doctrine already suggests, that it is not limited to the type of unit it can assist. As evidenced with Eichmann, and clearly articulated by Kant, all are susceptible to misusing others, treating them as mere ends, whether intentionally or not. This must be guarded against. As such, I argue that this combined approach should be widely adopted not just across the Army, but all of the Joint Forces. If this section has caused one Army leader to re-examine the importance of taking on a more complete approach to moral education, the *Mission Command* principles, and its incorporation into the lifecycle of the soldier and officer, then we are moving in the right direction.

4.4 Challenges & Conclusions

The largest challenge I see to cultivating a *Mission Command* environment whose principles are reinforced by a deliberate moral education framework is *navigating the unique aspects of command authority in the military*. *Mission Command* operates from a decentralized execution model, and "while commanders can delegate their authority, they cannot delegate responsibility."[160] It is said in the Army that as a

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[160] Department of the Army (2019). (*ADP 6-0) Mission Command: Command and Control of Army Forces*, 1-5.

commander one is responsible for everything their unit does and fails to do. The bottom line is, commanders are still accountable for the actions of those they lead. Some leaders can handle the weight of leadership in this manner and choose to actively develop themselves and their subordinates, publish mission-type orders, and reinforce a trusting and empowered culture. Others have struggled to not over-control their organizations for the majority of their careers. This behavior is further reinforced when they witness a peer held accountable for the action of a single soldier, possibly even when the soldier was off duty. For *Mission Command* to work, it requires having leaders that embrace its principles; leaders that value *personal accountability*. Commanders are certainly responsible for accomplishing the mission and the welfare of their troops, but to hold them accountable to an individual's poor judgment, especially in the commander's absence, I believe is, at times, unsupportable.

Additionally, given the unique positioning of drones and their operators as *key enablers* that are typically not organic to the units they support, without taking a concerted effort to modify how we integrate them into the training model, as outlined in the previous section, commanders will struggle to empower and trust their individual judgment. The changes above must occur if the military is to separate the operator from the machine and give them a face as well as a name to the organizations they support.

Finally, I cannot overemphasize the importance of the moral education investment for all soldiers and officers. For those that serve, we *know* that it matters not just that we accomplish the mission, but *how*. We, as leaders, must have a healthy

respect for the fact that not everyone has had a chance to fortify their will and develop their character. If we want them to model behavior consistent with the *Mission Command* principles, we need to provide both a more appropriate environment (e.g. proposed structural changes) and the right tools (Kant's character development model).

In conclusion, as Kant reminds us, one's endeavors to respond to the demands that reason places on them, to act more morally, and embody an existence that values the worth of every individual, are a never-ending struggle that requires persistent focused effort if one is to grow in self-knowledge and impact the larger community in a positive manner. The *Mission Command* principles and focused character development stand to not only improve the way we interact with and treat each other inside the military, but also the various others that co-exist with in our daily lives.

CHAPTER V

CONCLUSIONS

Over the last several months, in what began as an inquiry into the future of

AI/ML enabled technology in the military, I encountered the reality that in its focused

advancement, the aperture in the ethical literature surrounding its responsible path

forward was quite narrow. Indeed, so narrow, that it failed to adequately account for the

human subject charged with employing current weapons systems, such as drones, much

less those that are AI-enabled.

As such, the purpose of this thesis was three-fold. First, cement the criticality of

the human agent in making lethal decisions. Second, more precisely identify the gap in

the ethical literature regarding the moral status of the human agent behind the machine

by drawing out the *presence* and *dangers* of the current bureaucratic structures that limit

their capacity for exercising rational judgment and proper responsibility-taking. Third,

advocate for a complete and robust integration of the *Mission Command* framework,

which seeks to empower all soldiers to take advantage of the positive freedom they

possess to responsibly make judgment calls in the chaotic environment we call *war*.

In this approach, I completed the project by advocating for a vigorous, and

original, adaptation to current training models steeped in a Kantian approach to moral

education that I believe serves the proper function of empowering *Mission Command*'s

feasibility in practice by developing soldiers and units that are more adequately aligned

to the proper aims of a 21ˢᵗ century military that seeks to privilege trust and open communication by embodying a "people-first" mentality.

In review of Chapter II, I began to build my case for the centrality of the human agent by demonstrating, via Immanuel Kant, that in the name of efficiency, engineers and ethicists have wrongly reduced the moral status of humans to that of machines in the current ethical literature. By recasting the moral discussion in terms of human autonomy, judgment, and responsibility, I believe one's proper orientation towards technology *and* the humans who operate them can be achieved. Thankfully, concurrent with my own project, the DoD completed its 15-month study aimed towards defining an ethical AI framework for research, development, and integration, that assisted in re-capturing the moral status and centrality of the human agent. To this end, I argued the DoD could now take a more precise path forward with highly advanced AI/ML technology that respected the importance of keeping a human "in the loop" for lethal decisions. By drawing this proverbial moral line in the sand, I argue researchers and engineers are now significantly more empowered to focus their efforts on maintaining an asymmetric advantage in peer-conflicts while not losing sight of the fact that an instrument should enhance and extend a human agent, not replace them.

With the DoD's ethical groundwork, and a firm position on the technology itself, I then sought to more deeply explicate the half of the equation that is oft ignored, the rational agent, in Chapter III. Recruiting the drone and drone operator as a limit case, along with a more protracted understanding of the intricate link between autonomy and responsibility in Kant's *Practical Philosophy*, I began by exploring the bureaucratic

structures that restrict drone operator's capacity to exercise their rational judgment in lethal decision-making. Taking these rapidly adopted structures in their totality, I argued they functioned in such a way as to conflate the operator with the tool, rendering them unseen and unheard by using them as a mere means to achieving an end. Further, I argued that these structures, thus, disengage soldiers from taking responsibility for their moral decisions. Moreover, as drawn out in my analysis of Arendt's work, *Eichmann in Jerusalem*, I demonstrated the dangerous precedent that bureaucracies can set when they over-centralize notions of responsibility-taking encouraging their subordinates to sooth their consciences by artificially elevating the weight of their actions to higher levels of authority. In this abdication of responsibility, I demonstrated, via an appeal to Shay's thoughts on moral injury, that a certain unraveling of conscience can occur, which can have lasting negative psychological effects on the individual.

Finally, in Chapter IV, I argued that a ready doctrinal solution exists to orienting a mindset, culture, and training structure that promotes responsibility-taking and the exercise of one's judgment, *Mission Command*. This is paramount because there are no mission, battle, or war conditions where good judgment and responsible action are not critical to the success of the military's endeavors.   In order to overcome previous criticisms of *Mission Command's* infeasibility as a cultural philosophy outside the warzone, I argued for two modifications in its implementation. The first, was that it needed to be integrated into the training model starting from IMT. I went further in providing a Kantian-model as an approach to moral education which seeks to focus the individual on their conscience and rational judgment capabilities. By this method, I

argued the level of moral attentiveness should result in elevating the moral considerability of actions, whether in garrison or combat, serving to reinforce trust and open communication that is so integral to *Mission Command*'s success and which respects the autonomy of the individual. Second, I called for a revision to the scope of the doctrine as it stands. The primary lynchpin in reinforcing a *Mission Command* culture is that the manner in which it is written is not truly constitutive of *all soldiers*. The focus, in the doctrine, is limited to commanders and their staffs. The resounding consensus, in the operational realm, is that all soldiers' judgments should be respected and cultivated in order to form the bedrock of trust necessary for promoting the proper functions and aims of a 21st century military poised to compete in a peer-environment. The military needs to resolve this disparity in order to speak truth to power.

Finally, the motivation behind this work has always been the soldier. There is no greater asset to the military than its people and the families that support them. In the quest to re-establish trust between military leadership, civil society, and the soldiers that voluntarily sacrifice so much of their time, energy, and purpose for maintaining the sovereignty of this nation, leaders must be willing to critically encounter persistent ethical blind spots. On the cutting edge of a new wave of ground-breaking technology, the military finds itself at a critical time in history. Its leaders can passively choose to let technology drives the use of its people, or they can actively and responsibly drive technology's direction in a respectable orientation towards the empowerment and extension of the individual soldier's influence on the battlefield. Either way – *it is a choice.*

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