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Towards validating a Mission Command Team Training Model in GIFT for Military Populations

Jeanine A. DeFalco¹, Robert Davis², Michael Boyce³, Erik Kober², Ben Goldberg³ ¹Oak Ridge Associates University/Army Research Laboratory, West Point, NY/Orlando, FL ² United States Military Academy, West Point, NY ³ Army Research Laboratory, Orlando, FL

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OVERVIEW

- Discuss the qualitative observations of team formation observed within the MS200 course in the Department of Military Instruction
- Military Command Abdication Narcissistic (MCAN) model of team formation that can be used to inform team training modeling in GIFT
- Contextualizing the face validity of this model within the broader instructional aims of the cadets as future members of the US Army
- Revised Team Role Theory (RTR) components that can serve as a framework for implementing the MCAN team training model
- Propose a methodology to validate this framework through a mixed methods research agenda

POPULATION

- Emerging and established military populations seeking to obtain, or who have already obtained full membership within the US Army.
- The first population: cadet learners at USMA working in teams to accomplish learning objectives in preparation for serving in the role as Platoon Leader in the US Army upon graduation -- focus of this discussion
- The second population: team-sized elements conducting operations at the tactical-level of the US Army.

TEAM PERFORMANCE \rightarrow TEAM FORMATION

- Using an existing team model based on the Mission Command paradigm of the US Army, we seek to examine the structural elements that are necessary for effective team formation modeled after this paradigm.
- While our approach is domain specific, it is our expectation that our analysis on team formation will have broader industry applications.

USMA INSTRUCTORS/CONTRIBUTORS

- CPT Robert Davis has been a professor of Military Science over the past year at the United States Military Academy at West Point. He recently graduated from Fordham University, receiving a Master's of Science in Education. He is an Armor Officer who has had various military assignments, including positions within the 82nd Airborne Division and 101st Airborne Division (Air Assault). He has served on three combat deployments, once in Iraq, two times in Afghanistan.
- LTC Erik Kober has been the Chief of Military Science at the United States Military Academy since 2016. He graduated from the United States Military Academy in 1997. He is a Senior Army Aviator who has had a variety of military assignments to include principle duty assignments to Fort Bragg, and Fort Hood, multiple and varied, deployments to include Bosnia-Herzegovina, Afghanistan, and Iraq (x3), and command experiences including Troop (C/1-6 CAV) and Battalion (HHBn(P), XVIII ABC) Command. Erik holds a Military Masters of Arts and Science from the Advanced Military Studies Program (AMSP) at the Army's School of Advanced Military Studies (SAMS), Command and General Staff College at Fort Leavenworth, KS, as well as a Masters of Business Administration from Webster University.

- USMA preparing cadet learners for their future roles as Platoon Leaders in the Army's Operational Force.
- 47-month USMA experience exposure to military development and mentorship that spans the moment they arrive on Reception Day as a freshman until they depart to rapidly integrate into the Army Operational Force.

- Military Science 200 classroom within DMI can be categorized as a team unit.
 - Military Program seeks to instill in Cadets the foundational military competencies necessary to win in the US Army, inspiring them to professional excellence and service to the Nation.
 - Provides a framework for military education, training, and leader development focused on the roles and principles of being a future tactical Army small unit leader (Platoon Leader.
 - Nested in this higher purpose of the Military Program, the Military Science Program synchronizes across two of the four domains: Military and Academic. Specifically, the Military Science Program looks to develop the small unit leaders' abilities to efficiently and effectively plan, prepare, execute and assess complex tactical missions by way of Troop Leading Procedures and Mission-type orders.

- Immersed in a military environment through the span of their first summer period prior to officially entering into the Corps of Cadets and beginning academic studies.
- Trained on the most basic military tasks such as rifle marksmanship, combat lifesaver training, and land navigation. Cadets navigate through these experiences individually and collectively, enduring shared hardships alongside one another and rapidly developing their military experiential knowledge base.
- The initial summer venue serves as a lab comparable to executing a "hard science" academic degree lab to conduct experiments or test hypotheses.

- From there, the entire population, segregated into two cohorts of approximately 600 cadets, executes the MS100 curriculum, transferring their initial military experiential knowledge and applying it to fundamental components such as understanding the basic land navigation techniques such as "handrailing."
- Once complete with both the initial lab and classroom experience, the next summer lab experiment, known as Cadet Field Training (CFT) becomes increasingly more difficult where they have to execute military training events both as members of squad and team leaders, navigating various experiences that includes a multi-day field training exercise (FTX) where the cadets remain exposed to the elements and have to conduct multiple small-unit operations such as an ambush or platoon attack.
- After the lab concludes, the collective population reconvenes to execute the MS200 curriculum.

- Unique to the MS200 curriculum versus the MS100 curriculum is that the pedagogical structure completely changes.
- Cadet learners are forced to learn and retain procedural knowledge consisting of varying conceptual frameworks such as the model to approach Enemy Analysis.
- The Enemy Analysis framework consists of understanding Composition, Disposition, Strength, and Capabilities. Simultaneous to understanding and anchoring themselves to this framework, they are learning how to craft the narrative to communicate this generated analysis as well as learning where to input the information into the Operations Order, a standardized written medium the Operational Force utilizes to communicate mission-type military orders, essential to the true essence of Mission Command.
- The facet of shared hardships is an example of one element of their assumed roles as emerging military member.

- Other salient elements that emerge from this dynamic include:
 - heuristic evaluations of their peers' competencies both inside and outside of the classroom,
 - shared beliefs in their goal orientation in accomplishing assignments,
 - discourse negotiations in problem solving,
 - adaptability in shifting or adapting to new role assignments within a team when a deficiency is noted or occurs.

 Taking a closer look at the dynamics of team formation as it relates to completing classroom assignments within MS200 becomes starting point for developing a Mission Command team model that can be employed in GIFT, and can further guide the construction of interventions to correct two commonly occurring dysfunctional team models: the abdication and narcissistic models.

MISSION COMMAND MODEL

- Analyzing the dynamics of teams in second population: teams in operational forces conduct operations at a tactical level functionally under the umbrella of Mission Command as defined by the US Army.
- Within Mission Command, it is understood that the unit will fight to achieve a small number of key tasks until the point of either being destroyed or heavily attrited.
- Specifically, that dictates junior leaders will assume responsibilities in the next role in the event a superior becomes incapacitated.
- In order for this process to work effectively, not only do all members of the team need to have previously demonstrated sufficient competencies in their assigned roles, but a level of trust has to be developed across the entire organization where a tactical unit will still continue "to follow" if a subordinate leader assumes control and essentially must seamlessly adopt a new role within the team.

FUNCTIONING TEAM FORMATIONS

- As open dialogue and group: implicit and explicit continual assessments of peer competency.
- Heuristic competency assessments: how cadets self-select and form teams within the classroom.
 - A balance of competency and trust present among self-selected team members, the rudimentary elements of a Mission Command type team are in place.
 - This leads to a successful result in team assessment outcomes, and arguably provides a tangible model of how teams should effectively function in their post-USMA placements.

DYSFUNCTIONAL MODELS

• The **abdication** and **narcissistic** models are two team models that have been identified as dysfunctional and ineffective within MS200, yet adopted by cadets upon being assigned a team assessment task.

ABDICATION

- An *abdication* team: a self-selected team of underperforming cadets come together to minimally accomplish an assessment team task.
 - May or may not be a balance of competencies, but intent of the team is to accomplish only what is minimally required to pass the assessment with the least amount of effort.
 - In this model, team members might trust each other to do their assigned work, but they abdicate responsibility to put forth effort to essentially fight, or more appropriately, struggle, to succeed in their assessment task.

NARCISSISTIC

- In the *narcissistic* team construct, this dysfunctional configuration occurs when there is an imbalance of competencies and an absence of trust amongst the cadets.
 - Overachieving cadet believes their competency is superior to their peers, seeks out groups with substandard partners to insure he or she can produce all the required work independently.
 - While the key tasks might be successfully accomplished, the team itself fails to work as a cohesive unit and in this way fails as a team assessment.

MCAN

- MCAN model: a viable starting place to devise a team training model in GIFT
 - patterns of behavior that are exhibited in the classroom at USMA may very well carryover -- if not intervened upon – into the US Army more generally.
 - model devised on the initial observable dynamics and data that emerge within this course is a valid approach.

MCAN MARKERS

- Now identifying behavioral, cognitive, and attitudinal markers that inform the MCAN
- Provide possible points of adaptive interventions that can be devised for team training in GIFT.

BUILDING FROM BELBIN'S TEAM ROLE THEORY

- Belbin's theory of Team Roles (1981, 1992) maintained that a team's performance could be predicted depending upon the knowledge of each team member's team role.
- Identifying the role profiles of each team members assigned to specific role types, and assuming there was the requisite balance of types in a team, Belbin maintained you could predict that a team would be high performing.

ADAPTING BELBIN'S THEORY OF TEAM ROLES

- Belbin's theory of team roles: the notion of balance of team roles is expanded to incorporate the effects of power/knowledge discourse (Foucault) and adaptive capacity.
- Approach based:
 - on qualitative observations conducted at the United States Military Academy (USMA)
 - review of the literature on research related to team performance
 - team role theory
 - team learning beliefs and behaviors

DIVERGING FROM BELBIN

- For RTR, this first element of role adoption is akin to Belbin's theory:
 - Teams emerge as individuals either are placed in, or self-selected to, roles on a team in order to problem solve and execute activities.
 - The roles assigned and subsequently assumed by the individual starts from a place of competencies.
 - If the individual has the competency to fill a specific role, they assume that role as part of the team.
- However, at this point, the RTR diverges from the Belbin's model.

REVISED TEAM ROLE THEORY

- Developing a team training model within GIFT oriented towards military instruction within a cadet population need to operationalize and assess:
 - Role adoption
 - Role execution
 - Role adaption

REVISED TEAM ROLE THEORY: ROLE ADOPTION

- The basic premise of RTR is that the notion that successful team outcomes is dependent upon a cumulative hierarchy of role adoption, role execution, and role adaption.
- Within institutions, teams with specific roles are designed to solve a particular problem or task.
- The ideal role adoption occurs when an individual's competencies align with the parameters of the specific defined role within the team.

REVISED TEAM ROLE THEORY: ROLE ADOPTION

- For this alignment to happen, competencies and traits must also be taken into consideration in the initial team formation, as these elements will influence the process of team performance.
- The vetting of competencies and traits happens at two levels:
 - 1. In initial team formation when an individual's competency meets the required role to be filled.
 - 2. When other team members vet each other heuristically to individually assess the competencies and traits of team members, and determine the locus of power within a group.

PERCEPTION OF COMPETENCIES: TRUST

- Individual heuristic and more formal evaluations of traits and competencies is an ongoing process.
- Perceptions of competencies of is the cornerstone to establishing trust.
 - If you do not believe that your team member is competent to succeed in their assigned task, you will not trust them.

PERCEPTION OF COMPETENCIES: TRUST

- However, if team members demonstrate competency in spite of prior belief, then trust can be established.
- Through assessment of individual competencies within a team, collective cohesion can be established.

PERCEPTION OF COMPETENCIES: TRUST

- This first phase is critical to effect team performance: if the team cannot function because there are failures of competencies or a lack of trust, task will not be effectively or efficiently executed, and communication will be compromised.
- In short, the next phase, role execution, will be flawed.

RELATING BACK TO MCAN

- Referring back to the MCAN model, one can see how the narcissistic and abdication models of teams emerges based on this first phase of role adoption and competency evaluation.
 - If one member of the team determines that the other members are not competent, they will not trust their team mates to successfully perform their tasks, and accordingly will work and make decisions independently.
 - If, however, collectively the team assesses that there is a lack of competency all around, then the team will readily perform at the lowest acceptable level, compromising an effective and successful team outcome in performance.

REVISED TEAM ROLE THEORY: ROLE EXECUTION

 In the second phase of RTR -- role execution -- the objective is to solve a problem that requires the competency of more than one individual, otherwise a team would be unnecessary.

REVISED TEAM ROLE THEORY: ROLE EXECUTION

- If there are failures of competency or trust, the execution of the roles to address the assigned tasks may occur, but not at a level of optimal effectiveness or efficiency.
- If, however, competencies are vetted and trust is established, the execution of tasks may still be compromised if communication is compromised when the power dynamics that shape discourse within a team takes the shape of power as *domination* rather than power to *shape ideas and solutions* (Karlburgh, 2005).

POWER DYNAMICS VS. OCB

- Power dynamics are distinct from organizational citizenship behavior (OCB), performance that supports the social and psychological environment in which task performance takes place (Organ, 1997.
- For this discussion, we are accepting Foucault's premise that power is "everywhere" and that power is not inherently good or bad.
- Rather, power is a strategy that limits words and actions, but can also open up new ways of acting and thinking (Foucault, 1980).

POWER DYNAMICS IN DISCOURSE

 For example, if an individual in a team engages in a strategy of discourse that seeks to dominate and dictate the shape of ideas and decisions, this erodes trust within the team, dismantles collective efficacy, and impedes a team's ability to use discourse to open up new ways of acting, thinking, and problem solving.

POWER DYNAMICS IN DISCOURSE

- Using power to dominate can originate either from an explicit or implicit role hierarchy within a team:
 - some roles are more equal and awarded superior rights than others.
- Need to identify power discourse as markers on constructive or destructive communication patterns.
 - Sheds light on issues of conflict management, and is instrumental in team cohesion and performance.

MCAN AND ROLE EXECUTION

- Going back to our MCAN model, then, a functional representation of role execution can be operationalized when discourse is equitably engaged upon by team members with a predominance of news ways of acting and thinking in comparison to unproductive words and actions.
 - Our narcissistic model would deviate from the MCAN model in that discourse is not equitably engaged upon by all members.
 - Whereas the abdication model would have equitable engagement of discourse, but the discourse would be unproductive in words and actions.

MCAN AND ROLE EXECUTION

- In sum, power dynamics are realized through discourse that emerges during role execution, through resisting or complying with power strategies, and mediated by individual traits, such as personality.
 - Roles adopted by individuals is as important as understanding how traits interact with strategic power negotiations.
 - If roles are rigid, and power dynamics are non-negotiable, then communication and conflict management will be constrained – even if trust and collective cohesion have previously been established.
REVISED TEAM ROLE THEORY: ROLE ADAPTION

• The last element to consider in defining the MCAN model is the notion of role adaption, or adaptive capacity.

REVISED TEAM ROLE THEORY: ROLE ADAPTION

• Seen mostly in the literature of ecology of human societies, adaptive capacity refers to the conditions that enable people to anticipate and respond to change, and recover from and minimize the consequences of change (Adger and Vincent, 2005).

ADAPTIVE CAPACITY

- Adaptive capacity includes the notion of reflexivity:
 - a group level construct on the ability for teams to reflect, communicate, and adapt objectives, decision-making and processes, (Widmer, Schippers, & West, 2009), as well as an individual's ability to shift, change, and adopt roles as needed.

ADAPTIVE CAPACITY

- Includes traits such as
 - resilience
 - self-efficacy
 - innovative thinking
 - selective retention
- Allows for individuals to move in concert beyond their initial adopted role and shift into new ones.

MCAN AND ADAPTIVE CAPACITY

- In short, *adaptive capacity is a key element in the Mission Command model*, and including it a team training model is instrumentally important.
- Key markers for adaptive capacity:
 - cumulative effect of successful role adoption
 - includes trust and collective efficacy,
 - successful *role execution* including constructive discourse,
 - adding adaptive capacity traits (resilience, self-efficacy, innovative thinking, selective retention) that allow for new ways of thinking and acting independently so to reconfigure team roles.

RTR: HIERARCHICAL, CUMULATIVE, ITERATIVE

 RTR proposes that team training is an ongoing, hierarchical, cumulative and iterative process – and the necessary components to configure in a MCAN model for GIFT.

PROPOSED METHODOLOGY TO VALIDATE IN GIFT

- As part of the ongoing work with the Department of Military Instruction at USMA, the authors of this paper propose a mixed method approach to validating the cumulative, hierarchical MCAN model of team training.
- Qualitative observations on team dynamics will be conducted in the classroom, coding affect and behavior using the BROMP method while cadets are engaged in team assignments.
- Further, while cadets are engaged in using GIFT to complete team assignments, log files of interactions and communications will be captured and analyzed.

PROPOSED METHODOLOGY TO VALIDATE IN GIFT

- Depending upon the actions/interactions and consequences of observed behavior, the next phase of validating the MCAN model would include a quasiexperimental study that would integrate self-survey instruments, such as selfefficacy, HEXACO personality test, with periodic surveys to evaluate the heuristic beliefs of cadets over the course of a semester.
- Structural equation modeling will be used to test our cumulative hierarchical MCAN model using data from team assignments completed both via face-toface and through GIFT.

CONCLUSION

• Proposal to model effective team tutoring for both emerging and established military populations.

CONCLUSION

 Authors identified a target team model, MCAN, proposing a cumulative, hierarchical framework (RTR) to identify behavioral, cognitive, and attitudinal markers that can be used to build the MCAN model in GIFT.

CONCLUSION

 While this MCAN model and RTR framework is devised from qualitative observations and a review of the relevant literature, future work in this area includes executing a mixed method approach to empirically validate this model to obtain evidence towards adopting this comprehensive design architecture for military team training in GIFT.

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