

Winter 3-22-2019

Team Characteristics as Predictors of Collaboration on Sexual Assault Response Teams (SARTs)

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Team Characteristics as Predictors of Collaboration on
Sexual Assault Response Teams (SARTs)

A Master's Thesis
Presented in
Partial Fulfillment of the
Requirements for the Degree of
Doctor of Philosophy

By
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January 14, 2019

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Acknowledgments

I would like to express my sincere gratitude to my thesis chair, advisor, and mentor Dr. Megan Greeson for her guidance, thoughtful feedback, and patience throughout this entire project. I am also grateful to Dr. Megan Greeson for providing access to these data on SARTs, which has allowed me to explore this topic in the first place. I am also thankful for Dr. Goran Kuljanin's and Dr. Suzanne Bell's ongoing consultation, insights, and support, both in the content and methodology of the project. The backing of my entire committee has been invaluable in bringing to fruition this master's thesis.

Biography

The author was born in Palos Heights, Illinois, on December 10th, 1993. She graduated from Lincoln-Way West High School in 2012. She received her Bachelor of Arts degree in Psychology from North Central College in 2016.

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Abstract

Sexual Assault Response Teams (SARTs) are collaborative multidisciplinary groups designed to coordinate the response to sexual assault. SARTs were created through efforts to address issues related to sexual assault response, such as negative treatment of survivors by responders, low prosecution rates, and disorganized relationships among responders. The goal of SARTs is to improve cross-system collaboration in the response to sexual assault in communities. Although SARTs tend to have similar goals and foci, teams vary in the formal structures and the collaborative activities they adopt. Therefore, it is important to examine the characteristics of SARTs and how they relate to collaboration on these teams. Guided by community coalition action theory (CCAT), the purpose of this study was to examine how SARTs' membership breadth, formal structures, and leaders/coordinators predicted teams' engagement in collaborative activities. The researcher analyzed secondary data from a large-scale study conducted by Campbell, Greeson, Bybee, and Neal (2013) and funded by the National Institute of Justice. Phone interviews were conducted with a national random sample of $n = 172$ SARTs. Ordinal logistic regression analysis examined the effects of SART membership breadth on SARTs' engagement in collaborative activities. Additionally, the presence of a leader or coordinator and the number of formal structures used by the team were also examined as moderators of the relationship between membership breadth and collaborative activities. Findings from this study suggest ways of enhancing collaboration and future research for SARTs.

Introduction

Sexual assault is a serious social concern in the United States that results in harmful outcomes for survivors¹. Approximately 1 in 5 women (18.3%) have been raped in their lifetimes and almost 1 in 2 women (44.6%) have experienced some sexual victimization other than rape in their lifetimes (Black et. al, 2011). However, numerous issues exist in the response of community systems (e.g., criminal justice, medical, advocates) to sexual assault such as negative treatment of survivors, low reporting rates, and poor collaboration among sexual assault responders. For this reason, Sexual Assault Response Teams (SARTs) were developed to create collaboration among sexual assault responders and thereby improve the coordinated response to sexual assault (Cole, 2016; Greeson & Campbell, 2013; Greeson & Campbell, 2015; Zajac, 2006; Zajac, 2009). Research has suggested SARTs are associated with high levels of cross-system collaboration among legal, advocacy, and medical stakeholders. However, there is little research on factors that are associated with collaboration within SARTs. This is an important omission because theory and research suggests that certain team characteristics may predict multidisciplinary coalitions' engagement in collaborative activities (Butterfoss & Kegler, 2009), yet it is unknown whether these conclusions extrapolate to SARTs in particular. Thus, there is a current need to better understand how factors on SARTs may be related to their collaboration. The current study used community coalition action theory to understand how team characteristics relate to their collaborative activities.

¹ This paper will use the term "survivor" to refer to a woman who has been sexually assaulted. Often, "victim" and "survivor" are used interchangeably; "survivor" has a strengths-based connotation that acknowledges the ability of the individual to overcome their sexual assault.

Response to Survivors

There are many different stakeholders involved in the response to sexual assault. Some of the main stakeholder groups involved in the response to sexual assault include prosecutors, law enforcement, medical professionals, and rape crisis victim advocates (Martin, 2005). While these different stakeholders each have distinct roles and responsibilities in responding to sexual assault, their work is highly interrelated; thus, their collaboration and coordination is often key in providing an effective response.

Advocacy is a central part of the response to survivors. Advocates provide emotional support and access to services for survivors as they navigate the criminal justice and medical systems. Advocates may accompany survivors at the hospital and if allowed, attend forensic exams or interviews with law enforcement to provide support for survivors (Maier, 2008; Martin, 2005). They may also provide follow-up care through offering referrals and resources for post-assault services such as counseling, childcare, safety planning, housing assistance, transportation services, and in some cases, financial assistance (Martin, 2005; Wasco et al., 2004; Zajac, 2006). Advocacy plays an important role in helping mitigate poor treatment from law enforcement and medical personnel (Campbell, 2006).

Within the legal context, law enforcement and prosecutors strive to hold perpetrators accountable through obtaining a criminal conviction (Martin, 2005; Maier, 2008). One of law enforcement's responsibilities is to build a case to be sent to prosecutors through conducting interviews, assisting in evidence collection, and investigating the crime. Once a case has been built, prosecutors review the evidence and decide whether to file charges (Martin, 2005). They present the evidence and seek convictions of the perpetrator (Martin, 2005).

Medical staff gather evidence and provide medical care to survivors. Medical staff conduct forensic exams to collect evidence from the survivor's body such as semen, blood, saliva, skin under fingernails, head/pubic hairs, and clothing. These procedures may be conducted by physicians, nurses, or Sexual Assault Nurse Examiners (SANEs; nurse examiners that are specifically trained to conduct forensic exams; Martin, 2005; Zajac, 2006, 2009). Other forms of medical treatment include providing emergency contraception, STI testing, and treating physical injuries as a result of the assault (Campbell, 2005; Campbell, 2006; Martin, 2005; Zajac, 2006).

Shortcomings of response. Research has revealed significant shortcomings across numerous domains in the response to sexual assault (Logan, Evans, Stevenson, & Jordan, 2005; Ahrens, Cabral, & Abeling, 2009). One shortcoming is the failure of law enforcement and medical staff to respond in ways that are emotionally supportive to survivors. Responders often display cold attitudes towards survivors or may blame survivors for the assault due to factors such as what they were wearing, their relationship with the perpetrator, or whether they had consumed alcohol (Ahrens et al., 2009; Campbell, 2005, 2006; Maier, 2008; Spohn & Tellis, 2012). Additionally, reporting rates of sexual assault and post-assault service utilization are often notoriously low because survivors may lack access to resources, anticipate poor treatment from responders, or fear retaliation for speaking out against their attacker (Campbell, 1998, 2008; Logan et. al, 2005; Patterson, Greeson, & Campbell, 2009; Postmus, Severson, Berry, & Ah Yoo, 2009; Spohn & Tellis, 2012). Lastly, responders often fail to achieve successful outcomes in sexual assault cases. This includes low rates of prosecution, conviction, and incarceration of perpetrators, as well as improperly conducted medical forensic exams or long delays in treating survivors (Lonsway & Archambault, 2012; Martin, 2005; Maier, 2008).

Other inadequacies in systems response includes disorganized and otherwise problematic relationships among responders. Issues among responders may include confusion and conflict around roles and role boundaries, particularly between responders like advocates and sexual assault nurse examiners (SANEs; Cole & Logan, 2008; Ledray, Faugno, & Speck, 2001; Pennefather & Patterson, 2015). Law enforcement also endorse misunderstandings or negative perceptions towards advocates (Lonsway & Archambault, 2008; Rich & Seffrin, 2013), leading them to be reluctant or even outright in opposition to involving advocates in criminal justice processes (Lonsway & Archambault, 2008). Moreover, power differentials and status hierarchies among disciplines may divide responders in the legal, medical, and advocacy fields, which may lead them to coordinate less (Martin, 2005; Spohn & Tellis, 2012). The lack of coordination between responders also complicates the process for survivors because they are often forced to retell the details of their assault multiple times to different responders (Campbell, 2008; Martin, 2005; Spohn & Tellis, 2012). The many inadequacies in the response to sexual assault prompted the establishment of coordinated Sexual Assault Response Teams (SARTs), which first began in the 1970s and continue to evolve today (Greeson & Campbell, 2013; Moylan, Lindhorst, & Tajima, 2015; Spohn & Tellis, 2012; Zajac, 2006).

Overview of SARTs

SARTs are multidisciplinary collaborative entities designed to provide a coordinated response to sexual assault (Cole, 2016; Greeson & Campbell, 2013, 2015; Zajac, 2006, 2009). Most SARTs consist of rape crisis advocates, law enforcement, forensic examiners or sexual assault nurse examiners (SANEs), and prosecutors. Members may also include other relevant stakeholders such as domestic violence advocates, higher education administrators, and public health agencies (Greeson & Campbell, 2015; Zajac, 2006, 2009). The goal of SARTs is to

coordinate the response to sexual assault; in this way, responding agencies can accomplish more as a multidisciplinary network than they would on their own, thus, better assisting survivors.

By bringing together relevant stakeholders, SARTs aim to improve a variety of factors regarding the community response to sexual assault and rape. This includes improving victim experiences with community systems, for example, by encouraging victims to seek help, decreasing victim blaming from responders, and fostering survivors' safety and healing. Another focus of SARTs is to enhance outcomes in the legal arena, for example, through increasing prosecution rates and holding rapists accountable for their crimes. A third purpose of SARTs is to engage in community education and prevention, such as training other community responders about sexual assault as well as working with school administrators, community leaders, and other stakeholders to educate community members about sexual assault and rape. Lastly, another purpose of SARTs is to improve relationships among sexual assault responders for better cross-system collaboration (Cole, 2016; Greeson & Campbell, 2015; Martin, 2005; Zajac, 2006, 2009). Research suggests SARTs lead to perceived improved effectiveness in the response and improved levels of collaboration among responders (Campbell et al., 2013; Greeson & Campbell, 2015; Zajac, 2009). Examining team characteristics of SARTs may illuminate factors that lead to this increased effectiveness and collaboration.

Formal structures of SARTs. While many SARTs have similar goals and foci, there is variability in structure among teams (Campbell et al., 2013; Greeson et al., 2016; Zajac, 2006, 2009). This may occur because there is no standardized model of SART functioning. SARTs might also adapt their structure to meet the unique needs of their communities and to obtain the buy-in, or support, of community stakeholders. Some commonly used formal structures include mission statements, which identify the collective goals of SARTs, and the presence of a leader or

staff members, who help provide organization to SARTs (Campbell et al., 2013). Other formal structures help in guiding behavior in group functions for SART members, such as bylaws and formal processes for decision making and conflict resolution. While most teams report having formal structures like leaders, meeting attendance, meeting agendas, and mission statements, fewer teams report having other structures such as bylaws and formal processes for decision making and conflict resolution (Greeson & Campbell, 2015). Given this variability in structure, it is important for research to explore the nuances in SARTs to help teams adopt models or components of models that may increase the likelihood of successful collaboration.

Collaborative activities of SARTs. As previously mentioned, SARTs also vary in the collaborative activities they undertake to improve the response to sexual assault. National studies of SARTs by Campbell et al. (2013) and Zajac (2006; 2009) as well as SART guidelines (NSVRC, 2011) identified numerous activities that SARTs may utilize. One activity SARTs may use is case review, where SART members come together to review their response to individual cases. Another activity is formal evaluation to systematically review their collaborative response across many cases (NSVRC, 2011; Campbell et al., 2013; Greeson & Campbell, 2015; Zajac 2006, 2009). Other activities include cross-disciplinary trainings between responders so that they can learn about other discipline's roles (NSVRC, 2011; Greeson & Campbell, 2015). SARTs may develop materials to help educate responders about how to prevent and respond to sexual assault (Zajac, 2006; 2009). SARTs also develop protocol or policies for responding to sexual assault by documenting disciplines' responsibilities in sexual assault response and integrating the individual roles and priorities of each discipline on the team. This helps hold disciplines accountable to work as a collective unit with a consistent response (NSVRC, 2011). Protocol and policies may be examined and updated by SARTs as needed (NSVRC, 2011). These studies and

practitioner resources illustrate that there are many activities that SARTs may use and teams vary in the activities they adopt. By engaging in these activities, SART members and responders work with one another to improve their response to sexual assault. However, the extent to which SARTs engage in these activities is unclear, and it is unknown why some SARTs may engage in more of these activities than others.

Overview of Coalitions and Collaboration

The extent to which SARTs engage in collaboration can also be understood in the broader context of coalition research. Coalitions provide an innovative and multidisciplinary approach to addressing complex social issues (Chavis, 2001). Similar to SARTs, coalitions are entities that consist of a network of individuals and organizations that work together to achieve a common goal or purpose (Chavis, 2001; Himmelman, 2001; Butterfoss, Goodman, & Wandersman, 1996). The purpose of a coalition is to bring together individuals and organizations that have a stake in a common issue to combine resources, establish relationships among stakeholders, and have a more coordinated response to social problems; in doing so, coalitions aim to generate sustainable community- and systems- level change, empowerment of grassroots movements, prevention, and policy advocacy (Roussos & Fawcett, 2000; Kegler & Swan, 2012).

According to Himmelman (2001), there are four major processes that occur within coalitions: networking, coordinating, cooperating, and collaborating. Networking refers to when stakeholders in a coalition share information to help each other. Coordinating includes networking as well as adapting activities for a collective purpose. Cooperating builds upon both networking and coordinating by including sharing information, adapting activities, and sharing resources among members for “mutual benefit and common purpose” (Himmelman, 2001, 277). Lastly, collaborating encompasses all of the other processes of networking, coordinating, and

cooperating and also includes stakeholders' willingness to work together to benefit everyone involved. Collaboration is a key feature of coalitions and can result in a number of benefits for coalition and the communities in which they function (Himmelman, 2001).

Collaboration. Collaboration is a process through which different individuals and organizations work together to address issues and explore solutions that transcend their own individual perspective (Gray, 1989; Himmelman, 2001; Lasker, Weiss, & Miller, 2001). Collaboration requires all parties involved to have high levels of trust, time, dedication, and willingness to share (Himmelman, 2001). There are various facets of collaboration identified by research. According to Bronstein's (2002; 2003) index of interdisciplinary collaboration, collaboration consists of five major components: interdependence of coalition members on one another to accomplish goals; the development of new activities that maximize the knowledge and expertise of everyone involved; flexibility, or the "deliberate occurrence of role blurring;" collective ownership of goals; and reflection on the process of collaboration and collaborative relationships.

Activities that utilize the knowledge and experience of each professional is one component that constitutes collaboration; participation in these activities often lead to a greater effectiveness that team members may not achieve on their own (Bronstein, 2002, 2003). Specific to SARTs, activities such as case review, development of resources, development of protocol and policy, evaluation, and cross-disciplinary trainings are all collaborative activities that utilize the expertise and knowledge of all professionals involved, which ultimately increases ownership and accountability to one another.

Advantages of collaboration. A unique advantage coalitions have is known as collaborative synergy (Butterfoss & Kegler, 2009; Lasker et al., 2001). Collaborative synergy is

the process through which a group combines the diverse perspectives, resources, and expertise of stakeholders involved in order to produce “something new and valuable together—a whole that is greater than the sum of its individual parts” (Lasker et al., 2001, 184). Achieving collaborative synergy is crucial to coalitions and other collaborative groups like SARTs because synergy can result in greater changes that could not be achieved if each individual group worked on their own (Lasker et al., 2001; Himmelman, 2001; Butterfoss & Kegler, 2009). Collaboration fosters creative, comprehensive, practical, and transformative ways of thinking, which can lead to systems change. By bringing together diverse stakeholders, coalitions have access to a breadth of knowledge and perspectives, allowing them to better conceptualize and solve issues in new and unique ways (Chavis, 2001; Lasker et al., 2001).

This advantage provided by collaboration is also applicable to SARTs, which intend to create sustainable change that is more effective than if individual disciplines worked alone. Behind the development of SARTs lies the assumption that through collaboration, stakeholders are not only better able to coordinate the response to sexual assault, but also achieve systems level change, build relationships among responders, and increase awareness of sexual assault within communities (Cole & Logan, 2010). While research suggests that SART formation is related to perceived improvements in the response to sexual assault, there is less research focused on factors that promote collaboration within SARTs (Cole, 2016; Moylan et al., 2015).

Issues regarding collaboration. Although collaboration can lead to better outcomes in community response, it does not effortlessly occur within collaborative entities. In fact, there are inherent issues that research has identified regarding collaboration within coalitions. According to Himmelman, while coalitions can accomplish higher order changes, many are still “deeply embedded within and reinforce existing societal power relations which constrain such change”

(2001, 278). Himmelman's assertion is further substantiated by research that has found that coalitions may reinforce power imbalances among different stakeholders and marginalized communities (Chavis, 2001). Literature also suggests that power disparities can interrupt the "unbiased, egalitarian, and accepting consideration" of all perspectives within a collaborative group (Klein & Harrison, 2007).

Particularly for SARTs, power hierarchies may exist among disciplines like advocacy, law enforcement, and medical staff (Cole, 2016; Moylan & Lindhorst, 2015; Moylan, Lindhorst, & Tajima, 2017). SART members may perceive power disparities within teams, with advocacy having the least amount of power. In research conducted by Cole (2016), participants that reported the existence of a power hierarchy on their teams also generally reported less collaboration on their team. This research highlights how power differentials among disciplines can impede collaboration on SARTs.

Interpersonal and interdisciplinary conflict is another barrier to collaboration on SARTs. Some conflicts are related to role misunderstanding and boundary issues. These issues can turn into "territorial battles" in which responders grapple over control of the response process (Moylan et al., 2017, 11). Conflicting goals can also lead to issues with collaboration on SARTs (Cole & Logan, 2010; Greeson & Campbell, 2013). Because SART members have such diverse approaches and priorities in sexual assault response, it can be difficult for members to collaborate successfully with one another. Additionally, when SART members have strong professional alliances to their own disciplines, they are more likely to prioritize their disciplines over the SART collaboration (Cole, 2016). Lastly, interpersonal conflict and a lack of participation from a broad range of stakeholders have also been found as barriers to multidisciplinary collaboration on SARTs (Cole, 2016; Cole & Logan, 2010; Greeson &

Campbell, 2013; Moylan et al., 2015). Given these challenges, it is important to explore the characteristics of coalitions that ameliorate the threat of these power imbalances and facilitate collaboration among SART members and stakeholders.

Theoretical Framework

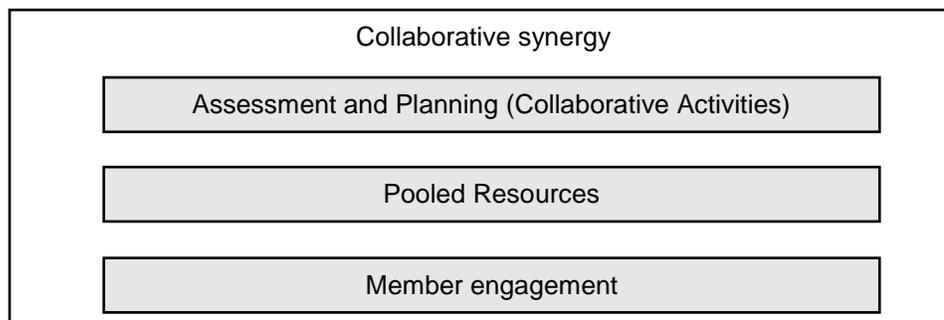
It is important to understand the factors that influence collaboration on coalitions and more specifically, SARTs. This study will be informed by Community Coalition Action Theory (CCAT; Butterfoss & Kegler 2009). This multifaceted theory aids in understanding how coalitions are developed, maintained, and can achieve positive outcomes for promoting community health (Butterfoss & Kegler, 2009; Kegler & Swan, 2011). This theory was developed with practice and empirical evidence through multiple areas of study, including community development, political science, group processes, and citizen participation (Butterfoss and Kegler, 2009). This proposed study will apply CCAT to examine factors that lead to higher levels of collaboration within SARTs.

CCAT consists of 15 constructs that contribute to the understanding of how coalitions are formed, maintained, and institutionalized (Butterfoss & Kegler, 2009). The development of a coalition is not a linear, but rather cyclical process, as coalitions may go through the same phases multiple times when undergoing change as a group (Butterfoss and Kegler, 2009). An important consideration in the development of coalitions is the community context, specifically, the facilitators or barriers that a particular community presents to the coalition. This can include past experiences with collaboration, social capital, and established trust networks between stakeholders and organizations. This is salient for SARTs, because as previously mentioned, SARTs vary in structure due in part to the community context in which they respond (Greeson et

al., 2016; Zajac, 2006, 2009; Campbell et al., 2013). This study will explore several key constructs within CCAT in order to understand factors that predict collaboration on SARTs.

Collaborative synergy. A key construct within CCAT that will be examined in this study is collaborative synergy. As previously defined in this paper, collaborative synergy is the advantage obtained by coalitions when members combine their perspectives, resources, and skills in order to accomplish more as a group than as individuals (Lasker et al., 2001; Butterfoss & Kegler, 2009). Collaborative synergy consists of three components: pooling resources, member engagement, and assessing and planning activities within the coalition. Figure 1 illustrates these components of collaborative synergy below. The pooling of resources occurs when coalitions have greater access to diverse perspectives, knowledge, and financial resources that can facilitate the coalition's ability to collaborate (Butterfoss & Kegler, 2009). Member engagement characterizes the participation and satisfaction of team members. Lastly, assessing and planning activities are activities that allow coalition members to plan how the coalition will respond together. These planning and assessment activities will be referred to as 'collaborative activities,' and are the focus of the current study. Collaborative activities will be explained in the next section.

Figure 1: Components of Collaborative Synergy



Collaborative activities. One facet of collaborative synergy is the assessment and planning of strategies, which will be referred to as ‘collaborative activities.’ Collaborative activities are important prerequisite steps to a coalition’s response in a community. While engaging in collaborative activities, coalition members plan and assess their work to ensure that their response is effective. Participation in collaborative activities can also promote a sense of accountability and ownership among coalition team members (Butterfoss & Kegler, 2009; Butterfoss, Goodman & Wandersman, 1993; Hays, Hays, DeVille, Mulhall, 2000; Roussos & Fawcett, 2000). Since collaborative activities are one component of collaborative synergy, the number of collaborative activities utilized by a coalition represents the level of collaborative synergy in that coalition; in other words, coalitions that engage in more collaborative activities may have higher levels of collaborative synergy. According to CCAT, coalitions tend to be more successful when they have the capacity to thoroughly plan and assess their activities (Butterfoss and Kegler, 2009). Therefore, it is important to examine how certain formal structures affect SARTs’ ability to plan and assess their work through the use of collaborative activities.

Membership. Membership is essential in the formation and development of coalitions. According to CCAT, membership begins with the core group of members and broadens to include a diverse group of stakeholders to represent the varied members of a community. The lead agency or convening group serves as a catalyst for the creation of a coalition by responding to a need or opportunity within their community (Butterfoss & Kegler, 2009). The convening group is generally responsible for enlisting key stakeholders to become involved in the coalition as well as providing support, training, and assistance to prospective members. According to CCAT, coalitions benefit when they consist of a diverse group of stakeholders to represent the varied members of a community (Butterfoss and Kegler, 2009). Membership diversity allows a

coalition to “engage a broad spectrum of the community” through increasing the ability to mobilize resources, expertise, perspectives, and knowledge (Butterfoss & Kegler, 2009, 255).

The access to diverse perspectives, knowledge, and resources increases the collaborative synergy among partners, which in turn increases the potential for coalitions to engage in a wider array of activities that individual organizations may not be able to take on individually (Hays et al., 2000; Butterfoss et al., 1993; Butterfoss & Kegler, 2009; Kegler & Swan, 2012; Lasker et al., 2001).

Broader organizations that represent diverse perspectives and stakeholders are better equipped at bringing about second-order change, or a transformational change that occurs on a broader social level (Hays et al., 2000).

Other literature using different frameworks have also found support for the impact of membership diversity on collaboration (Foster-Fishman et al., 2001). The industrial organizational literature has also explored diversity within collaborative units. Diversity itself is a construct with varied meanings. One way it is conceptualized by Harrison and Klein is as *variety*, or “differences in kind or category, primarily of information, knowledge, or experience among unit members” (2007, 1200). Variety can be related to a team’s membership diversity, or the breadth of the disciplines represented on a team. When there is membership variety within a group, members bring unique perspectives and resources to a group (Klein & Harrison, 2007). These perspectives and resources can then affect the way a group thinks, plans, and responds (Foster-Fishman et al., 2001; Klein & Harrison, 2007; Lasker et al., 2001; Hays et al., 2000). While there are multiple ways to define membership diversity, within the context of this study, it was conceptualized as membership breadth, or the representation of more diverse stakeholder groups on SART teams. Specific to research on the response to violence against women, it has been found that membership diversity in the form of a wide breadth of stakeholders predicts

increased perceived effectiveness in the response to sexual assault and intimate partner violence (Allen 2005, 2006; Greeson et al., 2016). It is also important to examine how membership breadth predicts collaboration on these teams.

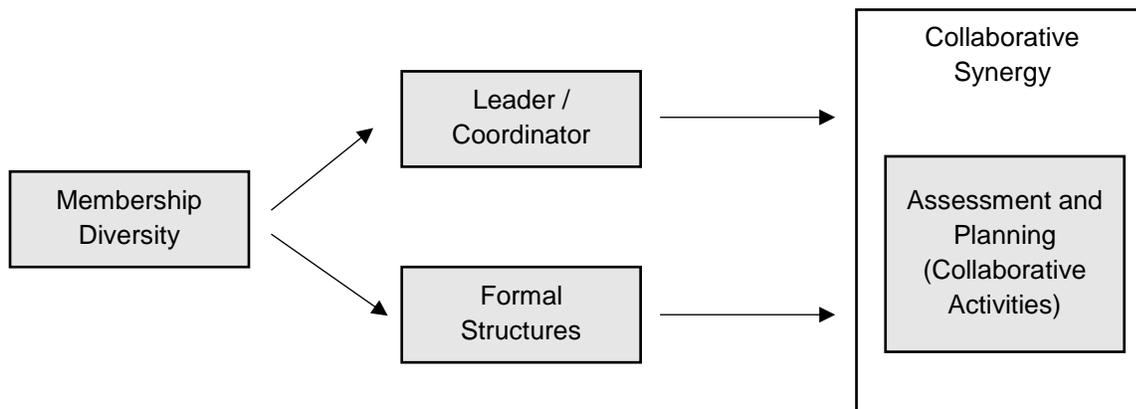
Formal structures. In addition to membership, formal structures provide ways of engaging members in collaboration. This can include the defined roles, bylaws, mission statements, and procedures that organize the resources and diverse membership of coalitions. According to CCAT, coalitions with formal structures are better able to engage members and assess and plan their work better (Butterfoss & Kegler, 2009). CCAT and other research suggest that formal structures make collaboration and a task focused climate more likely; additionally, having structures in place encourages more consistent response to social issues such as sexual assault (Butterfoss & Kegler, 2009; Jasuja, Chou, Bernstein, Wang, McClure, & Pentz, 2005).

CCAT's assertions regarding the importance of formal structures are also supported in literature on collaboration in coalitions. Formal structures on coalitions are oftentimes viewed as the "glue" that holds the team together, or the team's characteristics that support collaboration (Lasker et al., 2001, 194). These structures help organize, document, and analyze coalition members' response as well as structures that guide decision making and conflict resolution. Within the literature on domestic violence and sexual assault response, research has found that teams that adopt formalized structures such as a shared mission are more likely to have a higher perceived effectiveness in their response (Greeson et al., 2016; Allen 2006). Formal structures can also include roles and boundaries, and action planning, all of which have also been found to contribute to increased collaboration and effectiveness (Allen, 2005, 2006; Bronstein, 2002, 2003; Foster-Fishman et al., 2001; Roussos & Fawcett, 2000). Being able to formalize structures and develop organizational support for one another within teams makes coalitions' work more

sustainable over time and more able to withstand membership turnover (Lasker et al., 2001; Jasuja et al., 2005; Bronstein, 2002; 2003).

Leadership and coordination. Related to formal structures is the beneficial presence of a leader or coordinator on coalitions. CCAT posits that the presence of leadership or coordinator helps organize and influence the structures of the coalition (Butterfoss & Kegler, 2009). Leaders or coordinators can encourage the development and maintenance of coalitions by providing organizational skills, mobilizing resources, and facilitating team activities (Butterfoss & Kegler, 2009). Additional coordination through having hired staff members can also play an important organizational role by supporting the leader, as staff members can manage tasks such as setting agendas, facilitating meetings, and engaging coalition members (Butterfoss & Kegler, 2009). Research by Allen (2005, 2006) supports the notion that effective leadership is significantly related to perceived effectiveness in accomplishing goals. Leaders and coordinators also play an important role in encouraging collaboration; they can help in fostering working relationships with members as well as combining the different perspectives, resources, and expertise of members (Lasker et al., 2001).

Figure 2: Predictors of Collaborative Synergy within CCAT.



Overall, CCAT and other collaboration literature strongly suggest that factors such as membership diversity, formal structures, and leadership/coordinators facilitate collaboration on coalitions (Allen, 2005; Bronstein, 2002, 2003; Butterfoss & Kegler, 2009; Foster-Fishman et al., 2001; Hays et al., 2000; Lasker et al., 2001; Roussos & Fawcett, 2000). However, neither collaboration on SARTs nor its precursors have been thoroughly explored through research (Cole, 2016). Therefore, it is important to see if these findings regarding coalition collaboration can be extrapolated to SART collaboration.

Rationale

Research reveals that collaboration is a key advantage of coalitions and that certain characteristics about these groups predict success in these groups. Specifically, factors such as membership breadth, formal structures, and the presence of a leader or coordinator have been examined as predictors of changes in outcomes on collaborative groups such as SARTs. However, these characteristics have not been explored in depth as predictors of collaborative synergy on SARTs. The purpose of this study was to examine how SARTs' membership breadth, formal structures, and presence of a leader or coordinator predicted teams' engagement in collaborative activities. This study was guided by community coalition action theory (CCAT; Butterfoss & Kegler, 2009). Findings from this study may have implications for the development and maintenance of SARTs. This study can help provide recommendations about what team characteristics SARTs could adopt to facilitate more engagement in collaborative activities. By examining membership breadth, formal structures, and leaders/coordinators on SARTs, this proposed study aimed to reveal facilitators of high levels of collaboration.

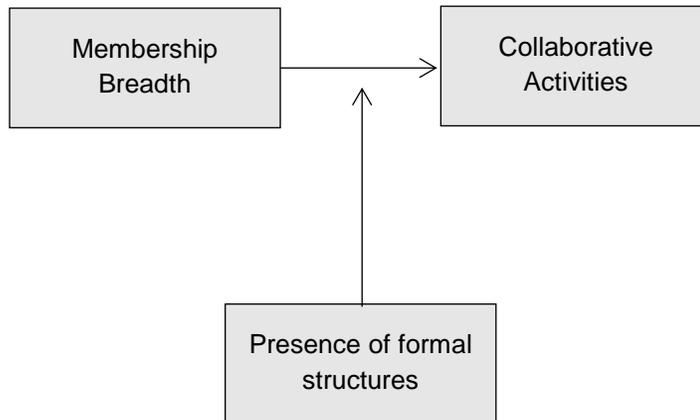
The proposed study examined the ways in which SART characteristics predict engagement in collaborative activities. Collaborative activities were examined as the dependent

variable because these activities represent one facet of collaborative synergy; therefore, the greater the number of collaborative activities utilized on a team, the greater the levels of collaboration. Literature on SARTs reveal that a multitude of collaborative activities may be employed on the teams to both strategize and evaluate the SART's coordinated response to sexual assault. Activities such as case review; development of resources for responders, stakeholders, or survivors; developing and adapting protocol and policy; cross-disciplinary trainings; and other forms of training have been adopted by SARTs throughout the country to plan and evaluate the effectiveness of sexual assault response (Greeson & Campbell, 2015; Greeson et al., 2016; Zajac, 2009). By examining factors that can facilitate or hinder participation in collaborative activities, this proposed study may have implications for ways to develop SARTs in order to increase their abilities to collaborate, and ultimately respond to sexual assault more effectively.

This study examined SART membership diversity in regard to breadth of active stakeholder membership, or the number of stakeholders that are both represented and participate on the team. Research reveals that membership breadth significantly relates to the effectiveness in aspects of the response to sexual assault and domestic violence (Allen 2005; 2006; Greeson et al., 2016). Given that research has found that membership breadth is related to perceived effectiveness in the implementation of sexual assault response, this study sought to explore whether membership breadth is related to the collaborative activities that plan and assess response strategies. Membership breadth was operationalized by the number of stakeholder groups that regularly participate on the team. Regular participation was operationalized as attending SART functions all the time or almost all of the time.

The presence of formal structures was another predictor that was explored as a moderator in this proposed study. Within the realm of SARTs, formal structures may play an important role in the functioning of the team. Previous research has examined the presence of formal structures as a predictor of collaboration, but this study aimed to take a unique approach by examining how formal structures may moderate the relationship between membership breadth and collaboration on SARTs. While membership breadth has been found to be an important predictor of effectiveness in SARTs (Greeson et al., 2016), a wide membership breadth also brings a variety of goals and objectives that may at times conflict with one another. Therefore, having structures in place can help mitigate this potential conflict by providing defined, clear roles and expectations for members on a team (Cole, 2016; Cole & Logan, 2010; Moylan et al., 2017). Formal structures can improve the relationship between membership breadth and collaborative activities because they organize the diverse perspectives, knowledge, and resources associated with diverse membership that are beneficial to collaboration. Furthermore, having formalized structures in place may help provide organization to SARTs with broad membership, thus increasing their ability to engage in collaborative activities. Formal structures were operationalized as either the presence or absence of certain structures such as having a mission statement, having subcommittees, and having bylaws.

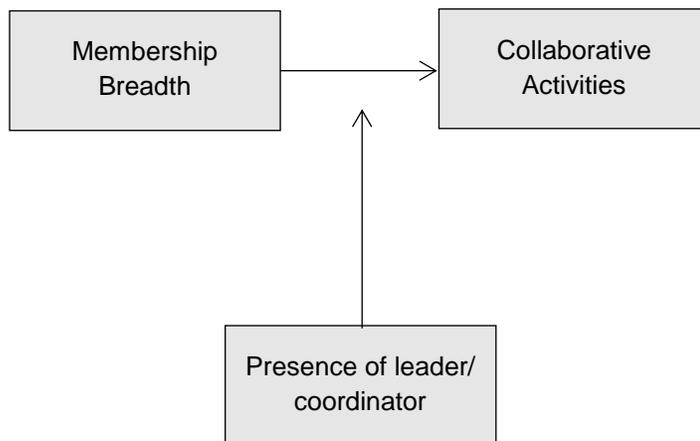
Figure 3: Formal Structures as a Moderator of the Relationship between Membership Breadth and Collaborative Activities.



The presence of a leader/coordinator is the final predictor that was also examined as a moderator in this proposed study. The presence of a leader or coordinator has been examined as a predictor of collaboration, but had yet to be explored as a moderator of membership and collaboration. Leaders and coordinators may play an important role in ensuring an organized, task focus within coalitions. Given some of the challenges of having a wide membership breadth, leaders/coordinators may play a similar role as formal structures by attenuating the threat of conflict that often occurs within a more diverse group. According to Lasker et al. (2001), a leader or coordinator can serve as the “glue” that brings together diverse members in order to work together as a collaborative group (194). Therefore, this study explored the presence of a leader or coordinator as a moderator to the relationship between membership breadth and collaborative activities. The presence of a leader/coordinator was operationalized by whether SARTs indicate having a team leader or full-time staff member. This study did not explore the interaction between the presence of a leader or coordinator and formal structures. While it was anticipated that both the presence of a leader/coordinator and the number of formal structures would each individually strengthen the relationship between membership breadth and number of

collaborative activities, it was not expected that there would be an additional interaction between these two variables. In other words, it was not expected that the presence of a leader/coordinator would moderate the relationship between the number of formal structures and the number of collaborative activities.

Figure 4: Leadership and Staffing as a Moderator of the Relationship between Membership Breadth and Collaborative Activities



Research Questions and Hypotheses

1. Do SART membership breadth, formal structures, and leaders/coordinators predict the team's engagement in a variety of collaborative activities?

Hypothesis I: Higher membership breadth, a greater number of formal structures, and the presence of a leader/coordinator are related to a higher number of collaborative activities.

2. Does the presence of formal structures moderate the relationship between SART membership breadth and the amount of collaborative planning and assessment activities in which a SART engages?

Hypothesis II: A higher number of formal structures will strengthen the relationship between higher SART membership breadth and a higher number of collaborative activities.

3. Does the presence of a leader or coordinator moderate the relationship between SART membership breadth and the amount of collaborative planning and assessment activities?

Hypothesis III: Having a leader/coordinator will strengthen the relationship between higher SART membership breadth and higher engagement in collaborative activities.

Method

Participants

This study involved secondary data analysis of data collected from a large-scale study conducted by Campbell et al. (2013). Given that there was no developed national registry of SARTs in the United States, Campbell et al. (2013) designed a sampling frame utilizing five different strategies to identify SARTs across the country. First, researchers contacted professionals through two national registries of organizations likely to participate on SARTs: The International Association of Forensic Nurses' (IAFN) registry of Sexual Assault Nurse Examiner programs and SANE-SART.com's registry of SANE-SART member organizations. Second, researchers contacted individuals subscribed to the National Sexual Violence Resource Center's list-serv. Third, researchers contacted state sexual assault coalitions to determine whether coalitions had lists available of SARTs in their states. Fourth, researchers reviewed literature and practitioner materials on existing SARTs. Fifth, researchers conducted an additional Google search to find information about more SARTs online. Through these strategies, researchers identified 864 SARTs across the country and randomly sampled 268 teams from that sampling frame. In order to be eligible to participate in the study, SARTs had to participate in a multidisciplinary response to sexual assault, meet regularly, and serve adult sexual assault survivors. Given these criteria, 81 out of the randomly sampled 268 teams were determined to be ineligible to participate, leaving a remainder of 187 SARTs. Ultimately,

researchers successfully contacted, obtained consent from, and interviewed members from 172 teams, resulting in a response rate of 92%. Ultimately, responses from 157 participants were included in the analysis. A post-hoc power analysis conducted via simulation revealed this sample size to have strong statistical power to determine the effect of the predictor variables on the dependent variable for the main effects regression model, with a collective power of .98. The power to detect the effect on each variable on the dependent variable was .25 for membership breadth, .57 for the number of formal structures, .05 for presence of a leader/coordinator, .70 for the length of time the SART has been in operation, and .17 for rural vs. urban/suburban community.

Moreover, another post-hoc power analysis conducted via simulation revealed a sample size of 157 participants to have strong statistical power to determine the effect of the predictor variables on the dependent variable for the moderated regression model, with a total power of .98. For moderated model, the power to detect an effect of the predictor variable on the dependent variable was .19 for membership breadth, .54 for number of formal structures, .06 for the presence of a leader/coordinator, .76 for length of time SART has been in operation, and .13 for rural vs. urban/suburban community. Additionally, the power to detect an effect on the dependent variable for the interaction terms was .05 for the interaction between membership breadth and leader coordinator, and .08 for the interaction between membership breadth and number of formal structures.

For this study, the participants that were recruited served as a leader or coordinator on the SART. If a leader was unavailable to participate, a longtime member or other recent leader was recruited to be an informant. Participants were recruited by both phone and email by graduate research assistants during different days and times of the week. Additionally, non-responders

(prospective informants who had not responded after being contacted six or more times) were mailed a \$5 incentive, a recruitment letter signed from the research team and the National Sexual Violence Resource Center, and a letter of support from the Director of the National Institute of Justice (Campbell et al., 2013).

Measures

There were no preexisting measures related to assessing SARTs. Therefore, the interview guide was developed by the research team based on past personal experience working with multidisciplinary sexual violence response teams, previous literature on SARTs and other coordinated responses to violence against women, and SART practitioner manuals and guidelines (Campbell et al., 2013). The interview guide consisted of both quantitative and qualitative elements in order to examine a myriad of factors related to SARTs, such as the contextual factors that led to the development of the SART, the goals of the team, membership, levels of formalization and structure, types of collaborative activities, characteristics of cross-system coordination, and forms of leadership (Campbell et al., 2013).

Membership breadth (predictor variable). SART's membership breadth was operationalized as the number of different stakeholder groups that regularly participated on the SART. Participants were provided an 18-item list of stakeholder groups and they responded with either 'yes' or 'no' to report if each discipline participated on the team on a regular basis. This approach to measuring membership breadth has also been utilized in previous studies by Allen (2005, 2006) and Kegler and Swan (2011). Some of the stakeholder groups in the list (provided in Appendix A) included rape crisis center staff/advocates, medical staff, police, and more. Breadth of membership was computed by summing up the total number of disciplines reported by each participant.

Formal structures (moderator variable). Similarly, participants were asked about the use of various formal structures on their SART team. This measure consisted of 11 yes/no questions regarding the presence or absence of formal structures such as subcommittees, formal procedures for decision making and conflict resolution, and bylaws in their SART (the complete list can be found in Appendix A). This measure was adapted from previous work by Butterfoss (1998) and Allen et al. (2010). The measure was computed by summing up the total number of formal structures reported by each participant.

Presence of leader/coordinator (moderator variable). Data on the presence of a leader/coordinator were measured by two specific questions in which participants reported whether they had a designated team coordinator and whether they had a full-time staff member. Because oftentimes SART teams' only full-time staff member is the leader, this predictor was recorded by one variable assessing if a team has a leader and/or a staff member (0 = SART has no leader or staff member, 1 = yes, SART has a leader and/or staff member).

Collaborative activities (dependent variable). Lastly, participants reported whether they engaged in certain collaborative activities used to plan and assess their response to sexual assault. SART's collaborative activities were measured through a list of six activities such as case review, cross-disciplinary trainings; adoption, development, or revision of policy or protocol; adoption, development or revision of memoranda of understanding between different stakeholder groups; and program evaluation of the SART team as a whole (see Appendix A for the full list of collaborative activities). These activities were chosen based upon previous research on SARTs (Zajac 2006; 2009) and SART manuals. For this study, participation in collaborative activities was measured by whether participants reported engaging in each activity

as a team (yes/no). The score for collaborative activities was computed by adding up the total number of activities reported by each respondent.

Rural vs. urban/suburban community and length of SART operation (control variables). Two contextual variables regarding the SART and its community characteristics were also included as control variables in the analyses. The variables that were controlled for in this study include the length of time SART had been in continuous operation and the type of community in which the SART operated. These factors were controlled for because the types of communities in which a SART responds and the age of the SART team may influence the formal structures on the team, the team composition, and their ability to engage in collaborative activities. The length of time the SART has been in continuous operation was measured in years. The type of community was categorized as either rural or suburban/urban and was characterized by the population density of the area. Communities were determined as rural if the population density was less than 500 people per square mile (based on 2010 Census population criteria; Campbell et al., 2013).

Procedure

The study was funded by the National Institute of Justice. All procedures were approved by the Michigan State University IRB. The interviews were conducted over the phone and lasted around an hour; with the consent of participants, interviews were audio recorded. Upon completion of the interview measures, participants were offered the opportunity to receive the study results once the study was completed.

Data analysis. Secondary data were analyzed to examine membership breadth, formal structures, and presence of a leader/coordinator as predictors of SARTs' collaborative activities. Missing data was treated through listwise deletion because the data was missing completely at random (MCAR) and the level of missingness was low. For each individual variable, the level of missingness was below 5%; the overall level of missingness was about 7%. Little's MCAR test revealed a chi-square = 12.915 ($df = 15, p = .609$), indicating that the level of missingness can be treated as completely at random. Therefore, it was determined that deleting cases would not seriously impact the findings and that listwise deletion was still considered appropriate in treating the missing data. Thus, after deleting missing cases via listwise deletion, 157 remaining cases were included in the regression analysis.

Ordinal logistic regression was used for the analysis of the data since the dependent variable (collaborative activities) was measured by discrete ordinal values (Hosmer, Lemeshow, & Sturdivant, 2013). Ordinal logistic regression is a generalization of logistic regression analysis that takes into account the ordered nature of the response categories (Hosmer et al., 2013).

Results

From the sample of 157 participants, about 51% ($n=80$) identified as rape crisis center advocates or staff, about 24% ($n=37$) identified as SANEs or medical/forensic examiners, and 26% ($n=40$) identified as other responders, such as advocates in the victim's witness unit of the prosecutor's office, prosecutors, police, and others. Participants reported having been involved on their SART for an average of five years ($M = 5.17, SD = 4.48$).

On average, SARTs engaged in about four collaborative activities each ($M=3.88, SD=1.38$). About 1% of SARTs did not engage in any collaborative activities ($n=2$), 8% reported engaging in one collaborative activity ($n=12$), 8% of SARTs reported engaging in two

collaborative activities ($n=12$), 13% reported engaging in three collaborative activities ($n=21$), 32% reported four collaborative activities ($n=50$), 32% reported five collaborative activities ($n=50$), and 6% of SARTs reported engaging in six collaborative activities ($n=10$). Participants reported an average of 8.52 stakeholder groups involved on their team ($SD=2.68$) and had an average of five formal structures in place ($M= 4.94$, $SD=2.05$). Moreover, SARTs were in operation continuously for an average of eight years ($M= 7.96$, $SD = 5.65$). The majority of SARTs had a leader or coordinator ($n = 143$, 91%) and only 14 reported having neither a leader nor coordinator (9%). Lastly, approximately two thirds of SARTs served a rural community ($n = 104$, 66%) and the remaining third of SARTs served an urban or suburban community ($n = 53$, 33%).

Two ordinal logistic regression models were run to examine how SART's membership breadth, formal structures, and leadership/coordination predicted teams' engagement in collaborative activities. The first ordinal logistic regression model included only the direct effects of the independent variables (i.e., membership breadth, number of formal structures, presence of a leader/coordinator) and the control variables (i.e., length of time SART has been in continuous operation and rural vs. urban/suburban community) on the number of collaborative activities engaged in by a SART. The second ordinal logistic regression model also included the interaction effects of membership breadth with formal structures and with leadership/coordination. Both membership breadth and formal structures were centered in the moderated ordinal logistic model.

The results partially supported the first hypothesis (hypothesis 1: a higher membership breadth, a greater number of formal structures, and the presence of a leader/coordinator are related to a higher number of collaborative activities). Neither membership breadth ($OR = 1.11$,

95% *CI*, .99 to 1.25, $B = .11$, $SE = .06$, Wald $\chi^2(1) = 3.20$, *n.s.*) nor presence of a leader/coordinator ($OR = .61$, 95% *CI*, .22 to 1.72, $B = -.49$, $SE = .53$, Wald $\chi^2(1) = .86$, *n.s.*) were associated with engagement in collaborative activities; however, formal structures were significantly associated with engagement in collaborative activities. More specifically, for a one unit increase in formal structures, the odds of belonging to a group with a higher number of collaborative activities compared to other groups with fewer collaborative activities were 1.33 times greater (95% *CI*, 1.13 to 1.57, $B = .29$, $SE = .08$, Wald $\chi^2(1) = 11.97$, $p < .001$).

Moreover, one of the control variables, the length of time a SART has been in operation, was significantly associated with engagement in collaborative activities. For a one unit increase in the length of time SARTs have been in operation, the odds of belonging to a group with a higher number of collaborative activities compared to other groups with fewer collaborative activities were 1.10 times greater, (95% *CI*, 1.05 to 1.17, $B = .10$, $SE = .03$, Wald $\chi^2(1) = 12.52$, $p < .001$). The other control variable, whether a SART serves a rural vs. an urban/suburban community, was not found to be associated with engagement in collaborative activities ($OR = 1.46$, 95% *CI*, .78 to 2.75, $B = .38$, $SE = .32$, Wald $\chi^2(1) = 1.41$, *n.s.*). The direct effects of the ordinal regression model can be found on the following page in Table 1.

Table 1: *Ordinal Logistic Regression Results: Direct Effects of Membership Breadth, Formal Structures, Presence of a Leader/Coordinator, Length of SART Operation, and Serving a Rural Community on SARTs' Engagement in Collaborative Activities*

Variable	B^a	$SE B$	Wald χ^2	p	OR^b	95% $CI OR$
Membership breadth	.11	.06	3.20	.07	1.11	[.99, 1.25]
Formal structures	.29	.08	11.97	.00	1.33	[1.13, 1.57]
Presence of leader/coordinator ^c	.49	.53	.86	.35	.61	[.22, 1.72]
Length of time SART has been in operation (years)	.10	.03	12.53	.00	1.10	[1.05, 1.17]
Rural community ^d	-.38	.32	1.41	.24	1.46	[.78, 2.75]

^a B = Logit regression coefficient

^b OR = Odds ratio

^c Dummy coding 0 = "no leader or coordinator" 1.00 = "presence of leader and/or coordinator"

^d Dummy coding 0 = "rural (less than 500 people per square mile)" 1.00 = "urban/suburban (over 500 people per square mile)"

The two moderation hypotheses were not supported by the findings. Inconsistent with the second hypothesis (hypothesis 2: a higher number of formal structures will strengthen the relationship between higher SART membership breadth and a higher number of collaborative activities), formal structures did not moderate the relationship between membership breadth and collaborative activities ($OR = 1.02$, 95% CI , .96 to 1.08, $B = .019$, $SE = .03$, Wald $\chi^2(1) = .46$, $n.s.$). Additionally, inconsistent with the third hypothesis, (hypothesis 3: having a leader and/or coordinator will strengthen the relationship between higher SART membership breadth and higher engagement in collaborative activities), the presence of a leader or coordinator did not moderate the relationship between membership breadth and collaborative activities ($OR = 1.06$, 95% CI , .67 to 1.68, $B = .057$, $SE = .24$, Wald $\chi^2(1) = .06$, $n.s.$).

Table 2: *Ordinal Logistic Regression Results: Interaction Effects of Formal Structures and Presence of Leader or Coordinator on Membership Breadth and Collaborative Activities.*

Variable	B^a	$SE B$	Wald χ^2	p	OR^b	95% $CI OR$
Membership breadth	.054	.23	.06	.81	1.06	[.67, 1.66]
Formal structures	.287	.08	11.94	.00	1.33	[1.13, 1.57]
Presence of leader/coordinator ^c	.398	.53	.56	.46	.67	[.24, 1.91]
Membership breadth*Formal structures	.019	.03	.46	.50	1.02	[.96, 1.08]
Membership breadth*Presence of a leader / coordinator	.057	.24	.06	.81	1.06	[.67, 1.68]
Length of time SART has been in operation (years)	.101	.03	12.61	.00	1.11	[1.05, 1.17]
Rural community ^d	-.373	.32	1.35	.25	1.00	[.77, 2.73]

^a B = Logit regression coefficient

^b OR = Odds ratio

^c Dummy coding 0 = “no leader or coordinator” 1.00 = “presence of leader and/or coordinator”

^d Dummy coding 0 = “rural (less than 500 people per square mile)” 1.00 = “urban/suburban (over 500 people per square mile)”

Discussion

The purpose of this present study was to examine how team characteristics such as membership breadth, formal structures, and leadership predicted stakeholder engagement in collaborative activities on SARTs. Community coalition action theory (CCAT) posits that characteristics like membership that represents a diverse group of stakeholders, formal structures, and the influence of a leader or coordinator can all contribute to a coalition’s collaborative synergy, or the ability to accomplish more as a group than as individual entities

(Butterfoss & Kegler, 2009). Likewise, other related literature supports the notion that membership diversity, formal structures, and the presence of a leader can impact collaboration within multidisciplinary groups (Allen, 2005; Bronstein, 2002, 2003; Foster-Fishman et al., 2001; Hays et al., 2000; Lasker et al., 2001; Roussos & Fawcett, 2000). Therefore, it was hypothesized that a higher membership breadth, a greater number of formal structures, and the presence of leader/coordinator would predict SARTs' engagement in a higher number of collaborative activities. Moreover, it was also hypothesized that both formal structures and the presence of a leader/coordinator would strengthen the relationship between a higher SART membership breadth and a higher number of collaborative activities.

Interpretations and Implications for Practice

The analyses revealed that an increase in the formal structures utilized on a team did, in fact, predict SARTs' engagement in collaborative activities. This finding is consistent with CCAT and other literature on multidisciplinary collaboration (Allen, 2005, 2006; Bronstein, 2002, 2003; Butterfoss & Kegler, 2009; Foster-Fishman et al., 2001; Jasuja et al., 2005; Lasker et al., 2001; Roussos & Fawcett, 2000). This suggests that the more formal structures established on a team (such as bylaws, subcommittees, mission statements, and others), the more SARTs may engage in collaborative activities (such as case review, cross-disciplinary trainings, policy development, and others). This suggests that it may be advantageous for SARTs to adopt more formal structures to help organize their team and facilitate more collaborative activities.

The remaining hypotheses were not supported by the data. Neither membership breadth nor presence of a leader/coordinator predicted SARTs' engagement in collaborative activities. Furthermore, there were no significant interactions between membership breadth and formal structures, or membership breadth and presence of a leader/coordinator. Regarding the

nonsignificant finding of membership breadth, there are both methodological and theoretical considerations that may have resulted in these findings. One potential consideration is the unique nature of SART team composition and focus. SARTs generally consist of key responders such as victim advocates, medical professionals/SANEs/forensic examiners, law enforcement, and prosecutors. They may also consist of other additional related stakeholders such as domestic violence advocates, higher education administrators, and public health agencies. While research does suggest that having a wider membership breadth predicts perceived legal effectiveness on SARTs, (Greeson & Campbell, 2015), it is possible that the participation of these additional stakeholders in certain collaborative activities is less necessary than the participation of key responders. In other words, it may be more important for key responders such as law enforcement, victim advocates, or medical personnel to be involved in certain collaborative activities like case review or protocol development than stakeholders like higher education administrators or public health agencies.

Furthermore, membership diversity can be captured in different ways other than simply the number of stakeholder groups involved on SARTs. Within SARTs, membership diversity could include striving to involve multiple agencies within the same discipline (i.e. multiple separate police agencies or several different hospitals within a community) or members from different levels of work (e.g. front-line responders and administrative/decision makers). Membership diversity can also occur across individual-level characteristics (e.g. race, gender, ethnicity, SES, etc.). Additionally, it is important to consider the community context in which SARTs operate. Since there is no one singular model of SART functioning, a team's membership, level of formalization, or engagement in collaboration may differ widely depending on the characteristics and needs of their community. A team's membership breadth may be

contingent upon the diversity present in their community. In other words, if a community has few relevant stakeholders present in their community, the number of the disciplines represented on their team will likely be less than teams responding in communities with a wide variety of relevant stakeholders. However, that SART with a narrow membership breadth may still be able to successfully collaborate together because their representation is ultimately proportional to the diversity (or lack thereof) within their community. Both of these considerations may explain why the number of stakeholder groups alone were not related to SART collaborative activities.

Lastly, having a leader/coordinator did not predict SARTs' engagement in collaborative activities, not did it moderate the relationship between membership breadth and engagement in collaborative activities. These results may have occurred due to the limited number of SARTs in the sample that did not have a formal leader/coordinator (9%). Since the groups of SARTs with leaders and SARTs without leaders were so unequal in size, there was a limited ability to detect an effect of the variable on engagement in collaborative activities.

Limitations and Implications for Future Research

There are several limitations of this study, that can inform future research on this topic. One limitation is the operational definition of variables such as collaboration and membership breadth. According to CCAT, collaborative synergy consists of the three different constructs of planning and assessment activities (i.e. collaborative activities, pooled resources, and member engagement). Within this study, only engagement in collaborative activities was used as an indicator of collaborative synergy on SARTs. Examining the number of collaborative activities a team engaged in may not have been enough to fully ascertain the level of collaboration on a SART. Therefore, this study may have been limited by not considering the other potential constructs that make up collaborative synergy, such as the extent to which SARTs can pool

resources and engage members. Future research on SARTs' collaboration should examine the extent to which SARTs can pool resources and engage members in addition to participate in collaborative activities.

Another limitation may have been the way the study operationalized SART's membership diversity. The current study only examined stakeholder breadth. As previously discussed, membership diversity can occur across numerous domains, including the number of agencies within the same discipline or the different levels of roles held by individuals. Therefore, this study may have been limited by only examining the number of stakeholders involved on a SART. Considering this, future research can examine how other types of membership diversity may impact collaboration on SARTs. Lastly, future research could also examine how other team characteristics outside of membership composition (e.g. the types of goals prioritized on a team) may impact collaboration.

A final limitation is the direction of causality between formal structures and collaborative activities. While the results did indicate that the higher the number of formal structures in place, the more collaborative activities SARTs engaged in, caution must be exercised in the interpretation of this findings. The analysis revealed a correlational relationship, but could not demonstrate the direction of that relationship. In other words, it is unclear whether having more formal structures could result in more engagement in collaborative activities, or if engaging in more collaborative activities could lead to a team having more formal structures in place. Future research could continue to explore the nature of this relationship between formal structures and engagement in collaborative activities through ongoing evaluation of SARTs and intentional manipulation of the number of formal structures on teams to observe whether there is an effect on engagement in collaborative activities, and vice versa.

Appendix A: Specific Operationalization of Predictor, Moderator, and Criterion Variables

Position of Membership	Formal Structures	Collaborative Activities
<p>1. Sexual Assault Nurse Examiner/Sexual Assault Forensic Examiner</p> <p>2. Other medical personnel</p> <p>3. Rape crisis center staff</p> <p>4. Prosecutor</p> <p>5. Police</p> <p>6. Crime lab personnel</p> <p>7. Advocate within the victim’s witness unit in the prosecutor’s office</p> <p>8. Judicial</p> <p>9. Sex offender treatment</p> <p>10. Corrections (includes probation and parole)</p> <p>11. Clergy or the faith community</p> <p>12. School (grades k-12)</p> <p>13. Higher education (meaning, a college or university)</p> <p>14. Child Advocacy Center</p> <p>15. Domestic violence agency</p> <p>16. Other social services</p> <p>17. Victims/survivors who represent victims and not an organization on the SART</p> <p>18. Other (please specify)</p>	<p>1. Written mission statement</p> <p>2. Meeting attendance/sign in sheets</p> <p>3. Written meeting agendas</p> <p>4. Meeting minutes</p> <p>5. Newsletters for SART members</p> <p>6. Subcommittees</p> <p>7. SART organizational chart</p> <p>8. Formal bylaws or operating rules/procedures specific to the operation of the SART.</p> <p>9. Formal procedures for decision-making</p> <p>10. Formal procedures for conflict resolution</p> <p>11. An established mechanism for ensuring members are accountable to the rest of the SART in completing tasks</p>	<p>1. Case review</p> <p>2. Cross-disciplinary trainings</p> <p>3. Trainings conducted by non-SART members or presentations from guest speakers that all SART members are invited to attend.</p> <p>4. Policy or protocol adoption, development, or revision</p> <p>5. Development, adoption, or revision of memoranda of understanding between different stakeholder groups</p> <p>6. Program evaluation of the SART team as a whole</p>

References

- Ahrens, C., Cabral, G., & Abeling, S. (2009). Healing or hurtful: Sexual assault survivors' interpretations of social reactions from support providers. *Psychology of Women Quarterly, 33*, 81–94. <http://dx.doi.org/10.1111/j.1471-6402.2008.01476.x>.
- Allen, N. (2005). A multi-level analysis of community coordinating councils. *American Journal of Community Psychology, 35*, 49-63. <http://dx.doi.org/10.1007/s10464-005-1889-5>.
- Allen, N. (2006). An examination of the effectiveness of domestic violence coordinating councils. *Violence Against Women, 12*, 46–67. <http://dx.doi.org/10.1177/1077801205277405>.
- Black, M.C., Basile, K.C., Breiding, M.J., Smith, S.G., Walters, M.L., Merrick, M.T.,... Stevens, M.R. (2011). *The National Intimate Partner and Sexual Violence Survey (NISVS): 2010 Summary Report*. Atlanta, GA: National Center for Injury Prevention and Control, Centers for Disease Control and Prevention. Retrieved from: https://www.cdc.gov/ViolencePrevention/pdf/NISVS_Report2010-a.pdf.
- Bronstein, L. (2002). Index of interdisciplinary collaboration. *Social Work Research, 26*, 113-123. <https://doi.org/10.1093/swr/26.2.113>.
- Bronstein, L. (2003). A model for interdisciplinary collaboration. *Social Work, 48*, 297-306. <https://doi.org/10.1093/sw/48.3.297>
- Butterfoss, F., & Kegler, M. (2009). The community coalition action theory. In: DiClemente, R., Crosby, R., & Kegler, M. (Eds). *Emerging Theories in Health Promotion Practice and Research*, 2nd edn (237-276). San Francisco, CA: Jossey-Bass.
- Butterfoss, F., Goodman, R., & Wandersman, A. (1996). Community coalitions for prevention and health promotion: Factors predicting satisfaction, participation and planning. *Health*

- Education Quarterly*, 23, 65–79. <http://dx.doi.org/10.1177/109019819602300105>.
- Butterfoss, F., Goodman, R., & Wandersman, A. (1993). Community coalitions for prevention and health promotion. *Health Education Research*, 8, 315-330.
<https://doi.org/10.1093/her/8.3.315>
- Campbell, R. (1998). The community response to rape: Victims' experiences with the legal, medical, and mental health systems. *American Journal of Community Psychology*, 26, 355-379. <http://dx.doi.org/10.1023/A:1022155003633>
- Campbell, R. (2005). What really happened? A validation study of rape survivors' help-seeking experiences with the legal and medical systems. *Violence and Victims*, 20, 55-68.
<http://dx.doi.org/10.1891/088667005780927647>.
- Campbell, R. (2005). Understanding rape and sexual assault: 20 years of progress and future directions. *Journal of Interpersonal Violence*, 20, 127-131.
<http://dx.doi.org/10.1177/0886260504268604>.
- Campbell, R. (2006). Rape survivors' experiences with the legal and medical systems: Do rape victim advocates make a difference? *Violence Against Women*, 12, 30-45.
<http://dx.doi.org/10.1177/1077801205277539>.
- Campbell, R. (2008). The psychological impact of rape victims' experiences with the legal, medical, and mental health systems. *American Psychologist*, 68, 702-717
<https://doi.org/10.1177/1077801205277539>.
- Campbell, R., Greeson, M., Bybee, D., & Watling Neal (2013). Sexual assault response team (SART) implementation and collaborative process: What works best for the criminal justice system? Washington, DC: U.S. Department of Justice. Retrieved from:
<https://www.ncjrs.gov/pdffiles1/nij/grants/243829.pdf>.

- Chavis, D. (2001). The paradoxes and promise of community coalitions. *American Journal of Community Psychology, 29*, 309-320. <http://dx.doi.org/10.1023/A:1010343100379>.
- Cole, J. (2016). Structural, organizational, and interpersonal factors influencing interprofessional collaboration on Sexual Assault Response Teams. *Journal of Interpersonal Violence, n.v.*, 1-22. <http://dx.doi.org/10.1177/0886260516628809>.
- Cole, J., & Logan, T. K. (2008). Negotiating the challenges of multidisciplinary responses to sexual assault victims: Sexual assault nurse examiner and victim advocacy programs. *Research in Nursing & Health, 31*, 76-85.
- Cole, J., & Logan, T. K. (2010). Interprofessional collaboration on sexual assault response teams (SART): The role of victim alcohol use and partner-perpetrator. *Journal of Interpersonal Violence, 25*, 336-357. <http://dx.doi.org/10.1177/0886260509334406>.
- Foster-Fishman, P., Berkowitz, S., Lounsbury, D., Jacobson, S., & Allen, N. (2001). Building collaborative capacity in community coalitions: A review and integrative framework. *American Journal of Community Psychology, 29*, 241-261. <http://dx.doi.org/10.1023/A:1010378613583>.
- Gray, B. 1989. *Collaborating: Finding Common Ground for Multiparty Problems*, 1st ed. San Francisco: Jossey-Bass.
- Greeson, M. R., & Campbell, R. (2013). Sexual assault response teams (SARTs): An empirical review of their effectiveness and challenges to successful implementation. *Trauma, Violence, & Abuse, 14*, 83-95. <http://dx.doi.org/10.1177/1524838012470035>.
- Greeson, M. R., & Campbell, R. (2015). Coordinated community efforts to respond to sexual assault: A national study of sexual assault response team implementation. *Journal of Interpersonal Violence, 30*, 2470-2487. <http://dx.doi.org/10.1177/0886260514553119>.

- Greeson, M. R., Campbell, R., Bybee, D. & Kennedy, A. (2016). Improving the Community Response to Sexual Assault: An Empirical Examination of the Effectiveness of Sexual Assault Response Teams (SARTs). *Psychology of Violence, 6*, 280-291. <http://dx.doi.org/10.1037/a0039617>.
- Harrison, D., & Klein, K. (2007). What's the difference? Diversity constructs as separation, variety, or disparity in organizations. *The Academy of Management Review, 32*, 1199-1228. <http://dx.doi.org/10.5465/AMR.2007.26586096>.
- Hays, C., Hays, S., DeVille, J., & Mulhall, P. (2000). Capacity for effectiveness: The relationship between coalition structure and community impact. *Evaluation and Program Planning, 23*, 373-379. [https://doi.org/10.1016/S0149-7189\(00\)00026-4](https://doi.org/10.1016/S0149-7189(00)00026-4).
- Himmelman, A. (2001). On coalitions and the transformation of power relations: collaborative betterment and collaborative empowerment. *American Journal of Community Psychology, 29*, 277-284. <http://dx.doi.org/10.1023/A:1010334831330>.
- Hosmer, Lemeshow, & Sturdivant, (2013). *Applied logistic regression*. (3rd ed). New Jersey: Wiley.
- Jasuja, G., Chou, C. Bernstein, K., Wang, E., McClure, M. & Pentz, M. (2005). Using structural characteristics of community coalitions to predict progress in adopting evidence-based prevention programs. *Evaluation and Program Planning, 28*, 173-184. <https://doi.org/10.1016/j.evalprogplan.2005.01.002>.
- Kegler, M., & Swan, D. (2012). Advancing coalition theory: The effect of coalition factors on community capacity mediated by member engagement. *Health Education Research, 27*, 572-584. <http://dx.doi.org/10.1093/her/cyr083>
- Kegler, M., & Swan, D. (2011). An initial attempt at operationalizing and testing the community

- coalition action theory. *Health Education & Behavior*, 38, 261-270.
<http://dx.doi.org/10.1177/1090198110372875>.
- Klein, K., & Harrison, D. (2007). On the diversity of diversity: Tidy logic, messier realities. *Academy of Management Perspectives*, 21, 26-33.
<http://dx.doi.org/10.5465/AMP.2007.27895337>.
- Lasker, R., Weiss, E., & Miller, R. (2001). Partnership synergy: A practical framework for studying and strengthening the collaborative advantage. *Milbank Quarterly*, 79, 179-205.
<http://dx.doi.org/10.1111/1468-0009.00203>.
- Ledray, L. E., Faugno, D., & Speck, P. (2001). SANE: advocate, forensic technician, nurse?. *Journal of Emergency Nursing*, 27, 91-3. Retrieved from:
[https://www.jenonline.org/article/S0099-1767\(01\)58757-7/abstract](https://www.jenonline.org/article/S0099-1767(01)58757-7/abstract).
- Logan, T., Evans, L., Stevenson, E., & Jordan, C. (2005). Barriers to services for rural and urban survivors of rape. *Journal of Interpersonal Violence*, 20, 591-616.
<http://dx.doi.org/10.1177/0886260504272899>.
- Lonsway, K. A., & Archambault, J. (2008). Advocates and law enforcement: Oil and water? *Sexual Assault Report*, 11(6), 81–82, 86–95. Retrieved from: <http://expert-witness.mncasa.org/assets/PDFs/Advocates+LE-Oil+Water.pdf>.
- Lonsway, K. & Archambault, J. (2012). The "justice gap" for sexual assault cases: Future directions for research and reform. *Violence Against Women*, 18, 145-168.
<http://dx.doi.org/10.1177/1077801212440017>.
- Maier, S. (2008). "I have heard horrible stories . . .": Rape victim advocates' perceptions of the revictimization of rape victims by the police and medical system. *Violence Against Women*, 14, 786-808. <http://dx.doi.org/10.1177/1077801208320245>

- Martin, P. Y. (2005). *Rape work: Victims, gender, and emotions in organization and community context*. New York: Routledge.
- Moylan, C., & Lindhorst, T. (2015). "Catching flies with honey": The management of conflict in sexual assault response teams. *Journal of Interpersonal Violence, 30*, 1945-1964. <http://dx.doi.org/10.1177/0886260514549464>.
- Moylan, C., Lindhorst, T., and Tajima, E. (2015). Sexual assault response teams (SARTs): Mapping a research agenda that incorporates an organizational perspective. *Violence Against Women, 21*, 516-534. <http://dx.doi.org/10.1177/1077801215569607>.
- Moylan, C., Lindhorst, T., and Tajima, E. (2017). Contested discourses in multidisciplinary sexual assault response teams (SARTs). *Journal of Interpersonal Violence, 32*, 3-22. <http://dx.doi.org/10.1177/0886260515585530>.
- National Sexual Violence Resource Center. (2011). *Sexual assault response team development: A guide for victim service providers*. Enola, PA: NSVRC. Retrieved from: http://www.nsvrc.org/sites/default/files/Publications_NSVRC_Guide_SART-Development.pdf.
- Patterson, D., Greeson, M., & Campbell, R. (2009). Understanding rape survivors' decisions not to seek help from formal social systems. *Health & Social Work, 34*, 127-136. <http://dx.doi.org/10.1093/hsw/34.2.127>.
- Pennefather, M. & Patterson, D. (2015). Interdisciplinary team conflicts among forensic nurses and rape victim advocates. *Affilia: Journal of Women and Social Work, 30*, 40-53. <http://dx.doi.org/10.1177/0886109914531955>.
- Postmus, J., Severson, M., Berry, M., & Ah Yoo, J. (2009). Women's experiences of violence

and seeking help. *Violence Against Women, 15*, 852-868.

<http://dx.doi.org/10.1177/1077801209334445>.

Rich, K., & Seffrin, P. (2013). Police officers' collaboration with rape victim advocates: barriers and facilitators. *Violence and Victims, 28*, 681-96. <http://dx.doi.org/10.1891/0886-6708.VV-D-12-00044>.

Roussos, S., & Fawcett, S. (2000). A review of collaborative partnerships as a strategy for improving community health. *Annual Review of Public Health, 21*, 369-402. <http://dx.doi.org/10.1146/annurev.publhealth.21.1.369.21>

Spohn, C., & Tellis, K. (2012). The criminal justice system's response to sexual violence. *Violence Against Women, 18*, 169-192. <http://dx.doi.org/10.1177/1077801212440020>.

Wasco, S., Campbell, R., Howard, A., Mason, G., Staggs, S., Schewe, P., & Riger, S. (2004). A statewide evaluation of services provided to rape survivors. *Journal of Interpersonal Violence, 19*, 252-263. <http://dx.doi.org/10.1177/0886260503260246>.

Zajac, J. (2006). Report on the national needs assessment of sexual assault response teams. Enola, PA: National Sexual Violence Resource Center. Retrieved from: <https://www.nsvrc.org/publications/nsvrc-publications/report-national-needs-assessment-sexual-assault-response-teams>

Zajac, J. J. (2009). National sexual assault response team survey report. Enola, PA: National Sexual Violence Resource Center. Retrieved from: <https://www.nsvrc.org/publications/national-sexual-assault-response-team-survey-report-2009>.